STAINED GLASSWORLDS:

STAINED GLASS AT THE INTERNATIONAL EXHIBITIONS

1851-1900

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ABSTRACT

Studies of nineteenth-century stained glass are sparse, and tend to focus on the medium in its ecclesiastical and architectural settings. This thesis broadens such approaches by placing stained glass in its wider cultural, political, economic and global contexts by considering its display at ten international exhibitions held in England, France, the USA and Australia between 1851 and 1900. These temporary exhibitions provide a unique vantage point from which to survey the perception, practice, and status of stained glass during the peak of the medium's revival. Drawing on contemporaneous written and visual sources, as well as recent studies of nineteenth-century culture, this study explores the extent to which the international displays of stained glass at these exhibitions shaped and developed the appreciation, application, understanding and permeation of stained glass throughout the nineteenth-century.

This thesis demonstrates how the classification and various modes of displaying stained glass impacted future perceptions and displays of the medium. It considers the ways in which stained glass was part of a broader culture of spectacle in this period. It identifies those who made and exhibited stained glass for display at the international exhibitions, revealing their motives for participating and additional roles as reviewers and judges of exhibits. This project reveals, for the first time, the significance of the international exhibitions in the history of stained glass. It draws on nineteenth-century critical reviews, visual records and exhibits (both extant and non-extant) and offers close readings of specific stained glass exhibits, which are analysed in relation to stylistic developments, and to medieval and modern glazing techniques. Finally, the thesis demonstrates how stained glass was a symbolic and iconographic vehicle for expressions of nationalism and imperialism at these international events. By considering the presence of stained glass in the international exhibition environments, this thesis suggests the medium is a crucial and neglected aspect of nineteenth-century modernity.

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"Democracy needs the Humanities" (Martha Nussbaum, 2010).

AUTHOR'S DECLARATION

I declare that that this dissertation is the result of my own work and has not been submitted for any other degree at the University of York or any other institution. Parts of Chapter 3 were published in an article entitled 'Stained Glass and the Culture of the Spectacle, 1780-1862', *Visual Culture in Britain* (2012), 13:1, 1-23.

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INTRODUCTION

RE-WRITING GLASSWORLDS

In Victorian Glassworlds: Glass Culture and the Imagination 1830-1880 (2008), Isobel Armstrong argued that glass culture was at the centre of debates surrounding nineteenthcentury modernism, including "spectacle in an industrial society". In spite of Armstrong's lucid readings of glass in this period, and Walter Benjamin's earlier recognition of the significance of glass architecture in *The Arcades Project* (written between 1927 and 1940, edited, translated into English and published in 1999).² scholars have continued to overlook the material, symbolic and cultural experiences and impacts of stained glass.³ Armstrong has described the nineteenth century as "the era of public glass". glass-covered promenades, shop façades, and glazed window openings played a vital part in the building and self-fashioning of nineteenth-century homes, civic buildings, public houses, places of worship, railway stations, and shops. Yet, stained glass is almost entirely absent from Armstrong's study, regardless of the fact that, in the nineteenth century, the medium experienced an unprecedented revival, not only in ecclesiastical interiors, but also in civic, collegiate and domestic settings.⁵ As one review of Victorian Glassworlds remarked, "neo-medieval stained-glass was still part of 'glass culture', and its awkwardness in relation to modernity could have generated some fruitful ideas here".6

Glass, Exhibitions and Modernity

The large ephemeral glass palaces built for International Exhibitions created some of the most significant glass vistas of the nineteenth century. These buildings were triumphs of modern industrial engineering and roused public interest in the production of glass. Historians have claimed that they also created a new glass consciousness that can be associated with the

¹ Armstrong, 2008: 362.

² Stained glass is notably absent in *The Arcades Project*. Benjamin is more concerned with the social and visual transparency of glass. Benjamin, 1999 (1927-1940): 465, 541. For Benjamin and the utopia of glass see Mertins, 1996.

³ In this thesis, the term 'stained glass' primarily means stained glass panels and windows, but is here used in its widest sense to include leaded; painted; ornamental; enamelled; engraved; printed and photographic glass transparencies.

⁴ Armstrong, 2008: 1.

⁵ For reviews of Armstrong's book see Flint, 2009; Plotz, 2009; Rudd, 2009; Muthesius, 2010; Cormack, 2010; Plunkett, 2012.

⁶ Rudd, 2009: 96-97. See also Cormack, 2010: 193-94.

emergence of modern society.⁷ Paxton's Crystal Palace, constructed from 956,000 square feet of glass in Hyde Park, London for the Great Exhibition of 1851, fully exploited the spectacle created by the "sea of glass" (Fig. 0.1).⁸ Upon the Exhibition opening, *The Times* reported:

The eye, accustomed to the solid heavy details of stone [...,] wanders along those extensive and transparent aisles, almost distrusting its own conclusions on the reality of what it sees, for the whole looks like a splendid phantasm, which the heat of the noonday sun would dissolve, or a gust of wind scatter into fragments, or a London fog utterly extinguish.

The Crystal Palace appears here as a metaphor for the fragility of modern life. Contemporary writers viewed the glass structure with awe and anxiety, remaining acutely aware and cautious of the transparent building.¹⁰ For instance, another account viewed the enormous glass structure like a panorama and struggled to differentiate between the glass building and its natural surroundings: "instead of moving from the wall at one end to that at the other, the eye sweeps along an unending perspective which fades into the horizon".¹¹

This effect would have been heightened by the interior decorative scheme of blue, red and buff, devised by Owen Jones. Contemporary reports speak of the dominance of blue (the red was only applied to the under sides of the iron girders), which caused the building to dissolve into the air, "amalgamating with the sky", 12 and appearing "like an ariel vault" (Fig. 0.2). 13 The Crystal Palace structure prioritised light over form. The transparent glass panes permitted a large amount of light to enter into the building, and enabled the outside world to be seen from within it, and vice-versa, breaking down more traditional interior/exterior divisions of architectural space. 14 A writer for *The Ecclesiologist* observed, "[s]tanding at the west end of the building the roof as it recedes seems to get more and more blue, until at last it dissolves into a sort of light blue fog, and is lost". 15 These accounts are reminiscent of Marx's statement,

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⁷ See Shand, 1937; Fierro, 2003.

⁸ Armstrong, 2008: 4, 38; *ILN* (January 18, 1851): 42.

⁹ The Times (January 15, 1851).

¹⁰ Ruskin, Pugin, and Carlyle detested the building; Pugin referred to Paxton's structure as the "glass monster" ("monstre verre"), and Thomas Carlyle called it a "big Glass Soapbubbble". See Ruskin, 1854 and Wynne, 2001: 228-34

¹¹ Lothar Bucher, first quoted by Giedion, 1954 (1941): 253-54. Cited in Armstrong, 2008: 152.

¹² The Ecclesiologist, 1851: 273. Such accounts are incongruous with Armstrong's statement that the prevailing colour was red, and that the building was a "blush in the environment". Armstrong, 2008: 100.

¹³ Dickens, (May 3, 1851): 122.

¹⁴ See also Armstrong, 2008: 9.

¹⁵ *The Ecclesiologist*, 1851: 272-73.

in *The Communist Manifesto* (1848), "all that is solid melts into air"; later used as a title for Marshall Berman's influential book on Modernism.¹⁶

Stained Glass and Glass Culture

Armstrong divides *Victorian Glassworlds* into three parts: (I) the making and breaking of glass, (II) the perspectives of the glass panel (windows, mirrors, walls), and (III) lens-made images and optical toys. All of these facets of glass culture were exhibited *en masse* at the International Exhibitions, where they formed part of the Exhibition spectacle. Although Armstrong's study has heightened our awareness of a material glass culture evident at the Exhibitions, she has not fully explained the role that coloured, or stained glass played within this 'vitromania'. Stained glass can both enhance and complement Armstrong's three facets of glass culture; narratives of stained glass need to be re-written into her *Glassworlds*. The display of stained glass at the International Exhibitions also encourages us to reconsider the medium in relation to modernity, ¹⁷ since, for many scholars the Crystal Palace, as both building and experience, has become "an unofficial forum on the meanings of modernity". ¹⁸ As we shall see, the presence of stained glass panels in the International Exhibitions dramatically altered the exhibition environment, and people's perceptions of it. ¹⁹ These displays also had a significant impact upon the rapid revival and international dispersal of the medium.

(1) Making glass. Chance Brothers' glass factory in Smethwick, Birmingham was the first glassworks to manufacture blown cylinder glass, and the sole supplier of the 300,000 panels of glass needed to build the Crystal Palace. The repeal of glass tax (1845) and window tax (1851) made construction possible.²⁰ As Charles Dickens acknowledged, "Sir Robert Peel, who destroyed the vexations and burdensome excise upon glass in 1845, is a builder of the Palace

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¹⁶ Marx and Engels. 1848: 83.

¹⁷ One might point to the use of coloured glass in twentieth-century architecture too. In *Glassarchitektur* (Berlin, 1914) German author Paul Sheerbart proclaimed that the employment of coloured glass in architecture could transform humanity. Scheerbart's words "Coloured Glass Destroys Hatred" were engraved onto the façade of Bruno Taut's Glass Pavilion at the Cologne Werkbund Exhibition of 1914. See Olsson, 2004.

¹⁸ See Berman, 1983; Miller, 1995; and Davis, 2007. Davis concludes that the Great Exhibition raised the profile of a modernising agenda, which included supporting Free Trade and Industrialisation.

¹⁹ Jonathan Crary argues "the very possibility in the late nineteenth century of concepts of a purified aesthetic perception is inseparable from the processes of modernization that made the problem of attention a central issue in new institutional constructions of a productive and manageable subjectivity". Crary, 1990: 2.

²⁰ After the 1845 glass repeal, prices for glass fell from 4s 6d/ foot to under 2½d/foot. Armstrong, 1996: 127.

of Industry as truly as the Messrs. Chance". Armstrong delves into the archives of these prolific glassmakers, highlighting Chance Brothers' importance in the history of glass production and the development of lighthouse technology. Yet Armstrong does not mention that Chance Brothers also ran a 'Coloured and Ornamental glass' department from 1843 until 1867. During this short period, the department produced a significant number of stained glass windows, some of which were displayed at International Exhibitions held in London (1851 and 1862) and Paris (1867). Furthermore, both George Bontemps, Superintendent of the 'Coloured and Ornamental glass' department at Chance Brothers, 1848-54, and Sebastian Evans, manager of the art department 1857-67, wrote important reviews of stained glass at these Exhibitions (see Appendix 4).

Breaking glass. As Armstrong has demonstrated, the destruction of the windowpane was a common form of physical protest in the nineteenth century; a violent act in which the breaking of glass symbolised the overturn of an establishment.²³ Those who campaigned against the erection of the Crystal Palace were seen as a threat to the building, as exemplified by a satirical cartoon published in *Punch*, portraying Colonel Sibthorp, one of the most outspoken campaigners, throwing stones at the glass panes of the building (Fig. 0.3).²⁴ The stained glass panel was also a target for protesters in the nineteenth century; anti-popery and anti-Irish riots led to the destruction of plain and stained glass windows in several Catholic chapels, and window-breaking was prolific during the Chartist riots. 25 To take one example, escalating animosity between Irish Catholics and English Protestants in Stockport culminated in the riots of 1852, which had begun after a Catholic procession took place through the town on Whitsuntide.²⁶ Both religious parties engaged in the breaking of glass, first smashing domestic windows before turning their attention to places of worship. Late at night, the Catholic chapel of St Michael, in Edgeley Park was attacked by a group of Protestants. The Illustrated London News reported: "the mob first assailed it from the back, [...], by breaking and destroying the large east window over the altar". ²⁷ Such attacks of religious and political iconoclasm are part

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²¹ Dickens, (May 3, 1851): 121.

²² Armstrong, 2008: 37-57.

²³ See also Otter, 2002. One should not forget the significance of glass-breaking in the twentieth-century too; especially the series of coordinated attacks against Jews during Kristallnacht, (the Night of Broken Glass) on 9-10 November 1938.

²⁴ Punch (1851, Vol. 20): 70.

²⁵ In the USA, several Roman Catholic churches were damaged during the Philadelphia Nativist Riots of 1844.

²⁶ See *ILN* (July 3, 1852): 3; *ILN* (July 10, 1852): 28. These riots resulted in 109 men apprehended by the police, 69 of whom were wounded. An Irishman died in his cell from head wounds incurred during the brawl.

²⁷ *ILN* (July 3, 1852): 3

of the history of stained glass.²⁸ Today, the 'breaking' of stained glass windows, either through political activism or mindless vandalism, remains a problem.²⁹

(II) The perspectives of the glass panel. How do nineteenth-century stained glass and ornamental windows fit into considerations of a "new glass consciousness" and the "language of transparency" created by "the gleam and lustre of glass surfaces", their reflections and refractions? Perspectives of stained, or painted, glass are dependent upon the ways in which stained glass intervenes between the viewer and the light source. Stained glass is seen by refracted light rather than reflected light, and this distinguishes it from other artistic media. We do not look through a stained glass window, but we look upon it and thus stained glass is more concerned with translucency, refraction and the manipulation of light rather than transparency and the reflection of light. Reflections do sometimes appear on the surface of coloured, stained and painted glass objects, creating distorted images within images, but its main purpose is to be refractive not reflective.

This is perhaps why Armstrong shies away from engaging with stained glass thoroughly and prefers to focus on its restriction of the gaze. Her comments on stained glass at the Great Exhibition are worth quoting in full:

Despite its strong presence both in a discrete display in the North Gallery and in Pugin's medieval court, stained glass, one of its historians remarks, did not take the Exhibition 'by storm'. For stained glass was intended as a rebuke to glass culture. Its repudiation of the visual logic of crystal and its ambiguities set it apart. The hard, unreflective, hostile didacticism of Millais's stained glass in *Mariana* is instructive here. 'Anything will do for stained glass', Dante Gabriel Rossetti casually said, despite making designs for it, as if speaking of a marginal art.³¹

However, Rossetti's words, written in a letter to fellow Pre-Raphaelite artist Ford Madox Brown, are far from representative of nineteenth-century stained glass designers.³² In fact, the number of artists who designed for stained glass in this period suggests that the medium was

²⁸ During the English Reformation and Civil War, the stained glass window was subject to both mutilation and destruction. See Brown, 2010.

²⁹ Brown and Strobl, 2002: 24-25.

³⁰ Armstrong, 2008: 1.

³¹ Armstrong, 2008:154. Armstrong refers here to Jim Cheshire's remark: "There is little evidence to suggest that the Great Exhibition made the reputation of any glass-painter, or that stained glass took the exhibition by storm, yet the fact that this famous event was beyond the control of the church makes it particularly significant". Cheshire, 2004: 155. Cheshire's statement seems to contradict his own argument that the Great Exhibition was important in establishing stained glass as a secular commodity, however.

³² Hueffer, 1896: 343. Quoted in Harrison, 1980: 40. Rossetti designed stained glass for Morris & Co. 1861-64.

considered a monumental art of importance, and stained glass design was financially lucrative work. Burne-Jones spent the majority of his working life designing stained glass for Morris & Co., while Madox Brown devoted twelve years to the firm. In addition, a large number of high-profile artists turned their hands to stained glass design in the eighteenth and nineteenth centuries (see Chapter 1). Armstrong's statement seemingly exacerbates the marginalisation of stained glass as an art form, and dismisses the potential of the medium for interpretations of nineteenth-century visual culture across the world.

In fact, Armstrong's single visual analysis of stained glass is applied to a painted representation of some medieval stained glass in John Everett Millais' Mariana (1851) and fails to acknowledge its role in illuminating Mariana's psychological and spiritual state (Fig. 0.4). 33 Inspired by a character in Shakespeare's Measure for Measure (1603-04), Millais' painting takes its theme from two of Alfred Tennyson's poems: Mariana (1830) and Mariana in the South (1831).³⁴ In this familiar Pre-Raphaelite painting, Mariana stretches and gazes upon a gothic window containing two stained glass panels depicting the Annunciation, copied from the late thirteenth - early fourteenth-century east window tracery at Merton College Chapel, Oxford (Fig. 0.5). Alistair Grieve argues that other objects may have been copied from life too, including the altar, triptych and censer in the far right of the scene, which he believed were authentic objects from Thomas Combe's Oxford home, where Millais staved in late 1850.35 Combe, a major patron of the Pre-Raphaelites, had affiliations with leading members of the Oxford Movement. Millais' links with Oxford and the fact that he worshipped at a London church known for its ritualistic services have not escaped the attention of those wishing to highlight the Brotherhood's Tractarian tendencies. ³⁶ The inclusion of stained glass in this painting was a bold thing to do in 1851 when anti-popery was rife. In a letter to *The* Times defending the Pre-Raphaelites, John Ruskin made it clear that he disapproved of the Romanising objects depicted in Mariana: "I am glad to see Mr. Millais's lady in blue is heartily tired of her painted window and idolatrous toilet table".³⁷

Yet the presence of the stained glass window in *Mariana* is not only a signifier of the Anglo-Catholic revival, but also evidence of mid-nineteenth-century interest in the transmission and

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³³ See Armstrong, 2008: 123-24.

³⁴ I am grateful to Dr Tim Ayers for sharing his manuscript on stained glass at Merton College, to be published in a forthcoming *Corpus Vitrearum* volume.

³⁵ Grieve, 1969: 295.

³⁶ Millais attended St Andrew's church, Wells Street, London. Barringer, 1998: 111.

³⁷ The Times (May 13, 1851). Quoted in Leng, 1988: 66.

subsequent diffusion of light through stained glass. Millais was especially interested in the visual effect of the light dispersed through the leaded panels of coloured glass, which illuminates the room as well as the painting's psychological and spiritual narrative. As Paul Barlow has noted, Millais "subtly differentiated the patterns of light: diffusions, reflections, lamps and sunlight, while setting up a series of visual paradoxes as the light acts on and in objects". Millais paid careful attention to the light's refraction through the coloured glass, painting smudged red and blue tints on the grey stonework; effects he presumably observed whilst sketching the glass in Merton College from scaffolding. ³⁹

The stained glass panels in Millais' painting prevent Mariana from looking outside of her Grange, but they also shed light on her situation. Gabriel's announcement is paralleled by the "livingly lustful eyes" of Mariana. In this case, the window is an object of reflection upon Mariana's disillusioned state and abandoned possibility of sexual fulfilment. Thus the stained glass window in this painting functions as a kind of mirror; although deliberately didactic, it is not "unreflective". Millais plays the two art forms of stained glass and oil painting, and their ability to pronounce narratives, futures, psychosomatic states and imminence, off against each other in a correlative way.

In *Mariana*, stained glass is used to dramatise the semiotic and visual character of Pre-Raphaelite painting. The Marian image in stained glass refers to Tennyson's *Mariana in the South*, in which Mariana repeatedly prays to the Virgin for relief from her loneliness. The iconography also references a medieval tradition in which the transmission of light through stained glass was seen as a metaphor for the Incarnation, the manifestation of God from immaterial to material, from heaven to earth. The Annunciation, which initiated the incarnation of Christ, was the most significant example of this. The spirit of God enters the Virgin, like light entering a window, and emerges unspoiled but acquiring the coloured glass.⁴² The application of stained glass to a painted literary narrative on canvas which explores themes of

³⁸ Barlow, 2005: 26.

³⁹ Millais saw the windows at Merton whilst staying in Oxford with Thomas Combe in 1850 and sketched the panels from scaffolding while John Hungerford Pollen was painting the roof. Parris, 1984: 89.

⁴⁰ As noted by George MacBeth; see Leng, 1988: 66.

⁴¹ Mirrors in the guise of windows are evident in a number of Pre-Raphaelite paintings, including Holman Hunt's *The Awakening Conscience* (1853), where the light coming through the plain glazed window acts as a mirror reflecting the immorality of the scene.

⁴² A passage attributed to St Bernard of Clairvaux since the seventeenth century translates: "As a pure ray enters a glass win-dow and emerges unspoiled, but has acquired the color of the glass [...], the son of God, who entered the most chaste womb of the Virgin, emerged pure, but took on the color of the Virgin, that is, the nature of a man and a comeliness of human form." Meiss, 1945: 177

sexual frustration, the dangers of worldly ambition and erotic longing, indicates the secular dissemination of stained glass and the strong visual and narrative possibilities of the medium in this period.

(III) *Lens-made images and optical toys*. Stained and ornamental glass participated in, and reflected the eighteenth- and nineteenth-century obsession with optical toys and the popular spectacle. ⁴³ Both lenses and microscopes preoccupied the scientific mind and artistic imagination, as demonstrated by a wide variety of exhibits such as panoramic glass paintings, photographic glass transparencies, the reduced dimensions of Swiss stained glass, and the "coloured church window in miniature" exhibited by A. Bostelmann of Hamburg at the 1851 Great Exhibition.⁴⁴

Bull's eyes, bullions, or *cives*, the rounded ends of mouth-blown crown glass saved from waste, were used to create interesting decorative and optical effects in stained glass windows. Shaped like a plano-convex lens, they provided a contrast to the surface and texture of flat crown glass and altered the optical transparency of a window, like a lens. As Elizabeth Prettejohn has demonstrated, mid-nineteenth-century interest in convex mirrors was enhanced by the National Gallery's 1842 purchase of Jan Van Eyck's *Arnolfini Portrait* (1434) (Fig. 0.6). ⁴⁵ The widespread use of bull's eyes in exhibits at the Paris Exposition Universelle of 1878 offered a similar kind of reflective optical vision, and demonstrated an increased awareness of scopic vision during this period. ⁴⁶ Édouard Didron, nephew of French art historian, archaeologist and stained glass artist Adolphe Napoléon Didron, observed that the use of bull's eyes in the feathers of a stained glass panel depicting a peacock, exhibited by London firm Pitman & Cuthbertson, produced "a play of light which it would be difficult to obtain by another means" (Fig. 0.7). ⁴⁷ Didron also went on to state that, "the English glass painters have become masters in employing these glasses in the form of lenses". ⁴⁸

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⁴³ As explored further in Chapter 3.

⁴⁴ Yapp, 1851: 287. For microscopic culture see Benjamin, 1996 and Armstrong, 2008. For photography see Chapter 5.

⁴⁵ Prettejohn, 2000: 142.

⁴⁶ For modern optics see Plunkett, 2007; Crary, 1992. For glass optics see Armstrong, 2008: 253-271.

⁴⁷ "un jeu de lumière qu'il serait difficile d'obtenir par un autre moyen". Didron: 1880: 84.

⁴⁸ "les peintres verriers anglais sont devenus des maîtres dans l'emploi de ces verres en forme de lentilles". Didron: 1880: 84. French exhibitor Delalande also employed bull's eyes in one of his 1878 exhibits. Didron, 1880: 74.

To return to Armstrong's comments, the stained glass in the 1851 gallery and Pugin's medieval court was not a 'discrete' display. As I shall demonstrate in Chapters 1 to 3, it grabbed the attention of reviewers and artists alike, setting precedents for future displays of the medium. But stained glass is "set apart" from other types of glass, because coloured and painted glass absorbs and transforms light, as we have seen, whilst crystal transmits light, and plain glass reflects light. Rather than being a "rebuke" to glass culture, stained glass was an integral part of it, sharing in the seven theses which Armstrong defines as the elements of a nineteenth-century glass culture: 'breath', 'sand', 'looking through', 'looking on', 'glass spaces', 'glass images', and 'pleasures/violence'. 49 For example, in the nineteenth century, both coloured and transparent glass involved the magical transformation of 'sand' to glass via the furnace and human 'breath'. Ideas of 'looking through' and 'looking on' are important in thinking about the displays of stained glass at the exhibitions, and in defining the characteristics of stained glass. As we shall see, the unique ways in which stained glass manipulates light can produce both 'pleasurable' and 'violent' effects. Stained glass transformed the 'glass spaces' of the exhibitions, and our perceptions of them, and the 'glass images' and iconographies created by the stained glass exhibits, both shaped and reflected nineteenth-century concerns.

The International Exhibitions and their Legacies

This thesis takes an interdisciplinary approach to the study of nineteenth-century stained glass in the cosmopolitan contexts of the International Exhibitions, *Expositions Universelles*, *Weltausstellungen*, or World Fairs, as they are also known. At these vast ephemeral events, international displays of stained glass formed one of the numerous artistic and industrial commodities exhibited on a grand scale to the public, in a predominantly secular environment. In these novel environments, new opportunities were created for stained glass artists and firms to showcase, advertise and disseminate their work and to compare it with their competitors, and the public encountered the medium in new, often spectacular, ways. The Exhibitions also created new forums for professional and amateur art critics to discuss and evaluate stained glass, and were at the centre of debates around the medium's artistic status and modern application. The International Exhibitions thus provide us with the opportunity to consider stained glass across a broad historical and geographical span, enabling a less myopic study of

⁴⁹ Armstrong, 2008: 3-11.

the medium than standard surveys of individual stained glass firms or studies of specific buildings.

Over 40 large-scale International Exhibitions took place across the world between 1851 and 1900, with many more in between.⁵⁰ These events have continued well into the twentieth and twenty-first centuries, albeit in different forms and guises.⁵¹ As Paul Greenhalgh has stated, "[n]o individual text could do full empirical justice to this enormous phenomenon", and few have attempted to do so.⁵² During the period covered in this thesis, 1851-1900, these ephemeral events also occurred alongside modern globalisation shaped by nineteenth-century imperialism and industrialisation. R.D. Mantell has claimed that the International Exhibitions offer "a sort of comprehensive, though variously distorted, flash picture of world civilization at its particular epoch";⁵³ and Peter Hoffenberg has noted that Exhibitions were "agents of change", as well as mirrors of a political and social order.⁵⁴ They made connections between "national and imperial institutions, sets of ideas, social visions and cultural practices".⁵⁵

For the purpose of this thesis, to examine a single category of exhibits, the monumental art of stained and painted glass, I have selected ten International Exhibitions held between 1851 and 1900: London 1851, Paris 1855, London 1862, Paris 1867, Philadelphia 1876, Paris 1878, Melbourne 1880, Melbourne 1888, Paris 1889, Chicago 1893 and Paris 1900 (see Appendix 1). The Great Exhibition of 1851 and the International Exhibition of 1862 were the two largest and most well-attended Exhibitions held in London in the nineteenth century. They took place at a time when the stained glass revival was developing apace, and were significant in setting precedents for future Exhibitions held in France, the USA, and the British colonies.

All five of the Expositions Universelles held in Paris in the nineteenth century (1855, 1867, 1878, 1889 and 1900), have been included. These Paris Expositions are unique in that they

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⁵⁰ See Findling and Pelle, 1990.

⁵¹ The most recent International Exhibition was held in Shanghai in 2012.

⁵² Greenhalgh, 2011: 11.

⁵³ Mandell, 1967: x.

⁵⁴ Hoffenberg, 2001: 27. This echoes Forster-Hahn's statement that "displays do not merely reflect or mirror society and a particular historical moment but actively function as agents that shape the historical process itself", an idea fundamental to the study of cultural history. Forster-Hahn, 1995: 174.

⁵⁵ Hoffenberg, 2001: xiv.

⁵⁶ Amongst some of the significant Exhibitions omitted from this study are Vienna's Weltausstellung, 1873, the only Exhibition held in a German-speaking state in this period (see Maw and Dredge, 1874; Kroker, 1975), and the Glasgow International Exhibition of 1888 (see Allan, 1988; Kinchin and Kinchin, 1988; and Kinghorn, 1988). Few stained glass exhibits appear to have been shown at these exhibitions.

were staged periodically every eleven years, without fail, and continually funded by the French government. Considered from this perspective, the Expositions Universelles provide a measure of the changing attitudes towards stained glass in France. They also demonstrate how Exhibitions could be used to encourage patriotism and propel political regimes through the adoption of the Exposition as a national tradition.

I also include two of the biggest and most successful International Exhibitions held in the USA in the nineteenth century, the Philadelphia Centennial of 1876, and World's Columbian Exposition held in Chicago 1893.⁵⁷ Both these exhibitions commemorated key events in America's colonial history, while showcasing the vast technological and artistic advancements achieved since independence (including developments in stained glass), thus demonstrating the rise of modern America as an economic and political power.

Although the British, French and American Exhibitions form the main case studies in this thesis, I include the two Melbourne International Exhibitions of 1880-81 and 1888-89, which were amongst the first held in Australia, in a significant nineteenth-century colonial city and emerging centre of stained glass production, and thus providing an interesting case study for examining colonial uptake and consumption. Taken together, the nations which hosted the International Exhibitions that I focus on in this thesis, England, France, the USA, and the British settler colonies in Australia, also represent the most significant nineteenth-century producers and consumers of stained glass. I will argue that these exhibitions had an impact on the development of stained glass, and that, in turn, the presence of stained glass changed perceptions of the Exhibition environments.

International Exhibitions were ephemeral, but not discrete events. Most exhibition buildings were intended for immediate demolition. As Alexander Geppert has stated, "this temporality did not hinder them, however, either individually or collectively, from acquiring meaning, founding traditions and creating legacies in architecture, urban development and media history

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⁵⁷ They were not the first however. An exhibition was held in New York in 1853. See Greeley, 1853.

⁵⁸ The 1879-80 International Exhibition held in Sydney, New South Wales, was the first International Exhibition to be held in the Southern Hemisphere, but this focussed on agriculture and livestock production, and received fewer visitors. Young, 1988.

⁵⁹ The other main national producers of stained glass were the German States, Italian States, Austria, Switzerland and Russia, but, besides Vienna no Exhibitions took place in these parts. Both the British and French colonies were significant consumers of stained glass.

that far outlived the expositions themselves". 60 Almost all the nineteenth century Exhibitions left an indelible mark on their hosting cities, transforming local infrastructures and architecture, establishing new international trade links and encouraging commerce. Exhibitions formed part of a grand dialogue and dissemination of knowledge; they had a direct influence upon artistic and technical education, the establishment of museums and institutes across the world.⁶¹

For instance, in London, the entire South Kensington 'Albertopolis' area was purchased from revenue of the Great Exhibition of 1851 and several permanent educational institutes and museums were built upon it, including the V&A (formerly the South Kensington Museum), which was established as a permanent institution to educate British public and artisans in the industrial arts. 62 Both the Champs-Élysées and Champ de Mars, Paris, were developed for the Expositions Universelles, and several Parisian landmarks remain as living legacies of these events. 63 In the USA, Fairmount Park, Philadelphia, and the area around Lake Michigan, Chicago, were planned and landscaped for the exhibitions held in Philadelphia (1876), and Chicago (1893), respectively. 64 Many other leading national museums across the world were formed directly as a result of an Exhibition, including Vienna's Technische Museum für Industrie und gewerbe (1873), the United States' National Museum in Washington (1876), Glasgow's Kelvingrove Museum and Art Gallery (1888), and the Museum of Science and Technology, Chicago (1893). In Melbourne, Carlton Gardens was redesigned for the Melbourne Exhibitions (1880-81 and 1888-89). The Royal Exhibition Building (1880-81) in Carlton Gardens, which I visited in 2010, remains the oldest surviving nineteenth-century 'industrial' exhibition building and has been formative in my thinking around Exhibition spaces.65

⁶⁰ Geppert, 2010: 5.

⁶¹ For the role of exhibitions upon British technical education see Edwards, 2008. On the role of exhibitions in the formation of museums see Ferguson, 1965; Schlereth, 1990; Levin, 1992; Stoklund, 1993; Bennett, 1995; and Kriegel, 2006.

⁶² On the evolution of the South Kensington Museum see Physik, 1982; Purbrick, 1994; Baker and Richardson, 1997; Burton, 1999.

⁶³ Including the Eiffel Tower, Pont Alexandre III, Petit Palais and Grand Palais, and several metro stations. Demolished buildings include the Trocadéro (extant 1878-1939) and Palais des Machines (1889-1909), both also built on Champ de Mars, and the Palais des Industries (1855-1900) built on Champs-Élysées, See Ageorges,

⁶⁴ Memorial Hall, Philadelphia (1876) is now home to the Please Touch Museum.

⁶⁵ The Royal Exhibition Building was designed by Joseph Reed (Reed and Barnes) for the Melbourne Exhibition of 1880-81 and was also used for the Centennial Exhibition of 1888. The building underwent a major conservation and restoration project, completed in 1994. See Dunstan, 1996; Willis, 2004. The Royal Exhibition Building continues to host public exhibitions today. Museum Victoria was built opposite in the late-twentieth century.

Exhibitions also left legacies of vast object collections to national and provincial museums.⁶⁶ Several nineteenth-century stained glass panels in the V&A Collection were purchased at Exhibitions.⁶⁷ The French government acquired a number of fine and decorative art exhibits from Exhibitions.⁶⁸ Many of the exhibits from the Philadelphia Exhibition of 1876 subsequently entered the collections of the Smithsonian Institution, Washington D.C. Colonial commissioners also exchanged their exhibits for English and European ones. As *The Bee Hive* reported in 1862, "[f]rom this source [...] their commissioners are likely to take back the nucleus of a very valuable museum".⁶⁹ Museums continue to play an important role in keeping the history of the Exhibitions alive. Rooms principally devoted to displaying exhibits and ephemera from these events form part of the permanent galleries at the V&A, London; Musée des Arts Décoratifs, Paris; and Museum Victoria, Melbourne, to name just a few. Temporary exhibitions, such as the 1976 exhibit recreating the experience of the Philadelphia Centennial Exhibition of 1876 at the Smithsonian, Washington D.C., have also drawn on the wealth of information and surviving objects from the International Exhibitions.⁷⁰

Studying the Exhibitions: Primary Sources

Given that the International Exhibitions were ephemeral, and few examples of exhibition architecture survive, researchers are reliant upon surviving written and visual sources in order to understand these temporary events and their displays. The number of primary sources pertaining to the nineteenth-century Exhibitions is, however, overwhelming. Primary written sources include the 'Official' Catalogues, Jury Reports and Guides printed and financed by governments; the 'unofficial' guides printed by independent publishing houses; comical and satirical sketches, newspaper and journal reviews; and individual accounts (both real and fictional), which include published and private letters, diaries, memoirs and novels. It is far

⁶⁶ After the Great Exhibition, items from the Indian section were sent to a number of provincial institutions in the UK, as well as the continent of Europe and North America. Desmond, 1982: 74.

⁶⁷ The South Kenington Museum ceramics and glass collection grew by 7 objects after 1851, 75 more after 1862, 99 more after 1867, and a further 100 from the Paris Expositions of 1878, 1889, and 1900. See Trippi 1997. Several stained glass panels were also acquired after the 1864 Exhibition of British Stained Glass and Mosaics. ⁶⁸ For a list of these see:

http://www.culture.gouv.fr/documentation/joconde/fr/decouvrir/expositions/expos_univ/expo_univ-objet.htm (accessed 28 January 2013).

⁶⁹ Quoted in Hoffenberg, 2001: 41.

⁷⁰ Lewis, 1977.

beyond the scope of this study to look at them all, but I have aimed to incorporate representative published and unpublished accounts.

This thesis takes advantage of the numerous primary sources available, whilst maintaining an awareness of their individual and collective weaknesses. To provide some continuity, I have consulted *Official Catalogues* and *Jury Reports* for each Exhibition featured in this study, as well as a set of British periodicals including the *Art Journal*, *The Ecclesiologist*, and *Illustrated London News*. These commentaries have been supplemented (and sometimes contrasted) with unpublished primary source evidence in French and English from local, national, and international archives. Primary research has been undertaken in the UK, France, the USA, and Australia. All French translations are my own, unless otherwise stated.

The starting point for any study of objects exhibited at the Exhibitions remains the Official Catalogues which list the names of exhibitors and the nature of their exhibits, according to a classification scheme and/or exhibiting nation (for a list of stained glass classification schemes, see Appendix 2). Exhibition catalogues reveal names of the exhibiting stained glass firms, and sometimes a designer, and thus shed new light on issues of collaboration, artistic status and authorship. Yet these documents are rarely comprehensive. Many of the stained glass exhibits are merely described as "Painted glass" or "A stained glass window", giving us little information about the specifics of these objects and making it impossible to gain a precise list of exhibitors and exhibits.

Just as it is impossible to grasp the ephemeral Exhibitions *in toto*, it is equally impossible to discuss every exhibitor of stained glass, let alone every window that was exhibited at the ten exhibitions featured in this study. However, Appendix 3 lists the stained glass firms and studios that exhibited within the classification for stained glass at these events.⁷² It can also be cross-referenced to reveal the Exhibitions at which they exhibited, and states (where known) any awards given by awarding juries. Due to the fact that this information has been collated from multiple sources, including catalogues, reports, and press reviews (see Appendix 4), many of which contain errors and omissions, it is not entirely comprehensive and should be

only lists stained glass firms/studios.

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⁷¹ This study is indebted to the increasing number of online databases from which one can access numerous nineteenth-century publications, including the British Newspaper Archives; Illustrated London News Historical Archive; British Periodicals Online; American Periodicals Online; Gallica (France); and Trove (Australia).

⁷² Others may have exhibited stained glass under other categories, but these are not included here. Appendix 3

treated with some degree of caution. It does, however, give us a sense of the scale and importance of these events to stained glass makers across the world.

The exhaustive comparison of catalogue entries with descriptions in jury reports, reviews in periodicals and newspapers, engravings, and private accounts enables us to identify most exhibitors of stained glass and, often their exhibits. In the course of my research, I have attempted to track down, where possible, the intended destination and current whereabouts of as many of the stained glass exhibits as possible. Several windows have been identified, but the incompleteness of some sources leaves this task unfinished. A list of individual exhibits is therefore not included in this thesis, partly because of the sheer quantity, but also because of the difficulties in establishing a complete list. However, it is hoped that a database of exhibits and press reviews will be published in the future. Although, much care has been taken to select examples that are representative of these events, the stained glass exhibits, and the discourses surrounding them, many of the windows discussed in this thesis have been chosen for the practical reasons that visual records survive, and/or the windows have been traced.

Studying the Exhibitions: Secondary Sources

The origins of International Exhibitions have long been narrated. Most contemporary nineteenth-century Exhibition publications, and almost all works since, include a history of the International Exhibition.⁷³ Although the idea of an International Exhibition was born with the French national exhibitions of industry from 1798, the British were the first to stage an International Exhibition in 1851.⁷⁴ Kenneth Carpenter's article on 'European Industrial Exhibitions before 1851' (1972) has reminded us, however, that national Industrial Exhibitions were held across Europe prior to the Great Exhibition,⁷⁵ and Toshio Kusamitsu (1980) has charted the British development of the Industrial Exhibition from those of Mechanics' Institutes and other societies.⁷⁶

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⁷³ Some of the earliest histories of nineteenth century exhibitions include Blanchard Jerrold, 1862; Doncourt, 1889; Norton, 1890; *Journal of the RSA*, 1906-1907; and Démy, 1907.

⁷⁴ De Colmont, 1855.

⁷⁵ Carpenter provides a list of these early Industrial exhibitions which featured awarding juries and reports, catalogues and advertising long before the Great Exhibition.

⁷⁶ See also Hudson and Luckhurst, 1954.

The nineteenth-century International Exhibition phenomenon has generated voluminous scholarship, especially during the last thirty years.⁷⁷ Amongst the seminal works are John Allwood's Great Exhibitions: 150 Years (1977), which chronologically outlined the key international exhibitions held over 125 years as great historical activities. 78 John MacKenzie's chapter on 'Imperial Exhibitions' in Propaganda and Empire: The Manipulation of British Public Opinion, 1880-1960 (1984), was the first to assess the imperial motives and ideas behind exhibitions and their displays. ⁷⁹ Paul Greenhalgh's thematic assessment of these events in Ephemeral Vistas: The Expositions Universelles, Great Exhibitions and World's Fairs, 1851-1939 (1988), established a canonical framework for studying International Exhibitions. Greenhalgh substantially revised and extended this text in Fair World: A History of World's Fairs and Expositions from London to Shanghai 1851-2010 (2011). Finally, the Historical Dictionary of World's Fairs and Expositions, 1851-1988 edited by John Findling and Kimberley Pelle (1990), has provided an invaluable encyclopaedic tool for historians and researchers, although by including bibliographies known to contributing authors at the time of the book's publication, this soon became out-dated. Since, a wealth of literature on the Exhibitions has been produced, and keeping up-to-date with international scholarship in this enormous field is no mean feat, rending the Internet a particularly useful tool for global communication about the Exhibitions.

Some of the most fruitful considerations of the International Exhibitions relevant to this study are explorations of the history and development of fairs, popular shows, exhibitions and museum culture. In *The Book of Fairs* (1939), Helen Augur provided a narrative of the Fair tradition and its place in society from 2000BC to 1939, and explained the genesis of the modern industrial exhibition as a development of primitive fairs and medieval festivals. Richard Altick's *The Shows of London: A Panoramic History of Exhibitions, 1600-1862* (1978) made a remarkable contribution to this field, drawing attention to the variety of shows which amused, instructed, aroused curiosity, and created wonder in the metropolis. In outlining the development of these popular public shows from the seventeenth-century, Altick

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⁷⁷ It is impossible to give here a thorough review of literature surrounding the International Exhibitions. Works discussed are those which have the most direct relevance to this study.

⁷⁸ A second edition of this book, with revisions, was published in 2001 and further extended the chronological scope of the work to incorporate events up to the second millennium. See Allwood, 2001.

⁷⁹ Aspects of MacKenzie's work have since been developed by Corbey, 1993; Rydell and Gwinn, 1994; and Benedict, 1994.

⁸⁰ The book was republished in 1971 and remains the only work of its kind to show the fair throughout the ages from its primitive impulse.

explored earlier precedents for the more 'instructive' enterprises of the International Exhibitions.⁸¹ Aspects of Altick's publication have recently been further developed and chronologically extended in *Popular Exhibitions, Science and Showmanship, 1840-1910* (2012), a collection of essays edited by Joe Kember, John Plunkett and Jill A. Sullivan.⁸²

Others have avoided historicising the events by focusing on particular cultural and social aspects of the Exhibitions. Werner Plum's *World Exhibitions in the Nineteenth Century: Pageants of Social and Cultural Change* (1977) offered a Marxist analysis of the Exhibitions across this period. ⁸³ Thomas Richards and Joseph Bizup examined and interpreted the expositions in light of industrial mass-manufacture, Capitalism and its effect on culture in *The Commodity Culture of Victorian England* (1990), and *Manufacturing Culture* (2003), respectively. Elizabeth Holt's *The Art of All Nations, 1850-73: The Emerging Role of Exhibitions and Critics* (1981) demonstrated the role of these events in the development of art criticism, and provided a useful anthology of contemporaneous essays on the architecture, decorative arts, and fine arts at International Exhibitions. The impact of the Exhibitions on nineteenth-century consumption in France has been explored by Rosalind Williams in *Dream Worlds: Mass Consumption in Late Nineteenth-Century France* (1982), and in the United States by Neil Harris in *Cultural Excursions: Marketing Appetites and Tastes in Modern America* (1990).

Philippe Hamon's *Expositions: Literature and Architecture in Nineteenth-Century France* (1992) is a remarkable work which bridges social, cultural, architectural and literary history, combining analysis of nineteenth-century literary texts with semiotic considerations of the practice and ideology of the *exposition*. Hamon identifies stained glass as a key object (or 'techneme') in this literary genre, and explores how French writers used stained glass as a literary tool to explore mobility and transitivity. Such themes are significant in highlighting the role of glass and stained glass in shaping modernity. Armstrong's *Victorian Glassworlds* (2008), in which, as we have seen, glass exhibition buildings play a key part, should also be included in this category.

⁸¹ Altick, 1978: 509. The aims of national instruction are followed up in Taylor, 1999: 67-100.

⁸² See especially Hunt, 2012.

⁸³ For an early assessment of the economic usefulness of the Exhibitions see Gérault, 1902.

⁸⁴ Hamon, 1992: 39.

Despite being international in their scope, the nineteenth-century International Exhibitions were inextricably bound up with national ideas, types and self-identifications. Many studies have explored exhibitions in regards to the politics, affairs and development of a national identity. Exhibition (both 1999) provided explorations of British identity in relation to the first International Exhibition of 1851. Similarly, Pascal Ory's *Les expositions universelles de Paris* (1982) focussed on the development of expositions held in the French capital. Representations: World's Fairs and the Modern World (1994), co-edited with Nancy Gwinn, and Fair America: World's Fairs in the United States (2000), co-edited with John E. Findling and Kimberly D. Pelle, have assessed the influence of the American-hosted exhibitions on the development of modern America.

The Australian Exhibitions have recently been repositioned within Exhibition scholarship in *Seize the Day: Exhibitions, Australia and the World* (2008), a collection of essays edited by Kate Darian-Smith, Caroline Jordan, Richard Gillespie and Elizabeth Willis. Several published articles and unpublished theses have also made connections between the International Exhibitions, colonial representation and the formation of modern Australia. With the current trend for transnational and transcultural history, some publications have sought to readdress issues of internationalism and multiculturalism, for example, *Britain, the Empire, and the World at the Great Exhibition of 1851* (2008), edited by Auerbach and Hoffenberg, brought together not only two leading academics, but a range of international expertise and interdisciplinary approaches in order to consider the national, international and imperial politics, relations and identities at the Great Exhibition.

Few scholars have examined in detail the art-historical, cultural and social importance of individual exhibits and objects displayed at these exhibitions, despite their importance. Jane Spillman's *Glass from World Fairs 1851-1904* (1986) provided an overview of glass objects displayed during this period, but, like Armstrong's *Victorian Glassworlds*, stained glass is

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⁸⁵ See Barth, 1991; Stoklund, 1994; Howe, 2002.

⁸⁶ In this vein see also Démy, 1907; Isay, 1937; Mainardi, 1987; Gaillard, 2003; Bacha, 2005; Demeulenaere-Douyère, 2010; Carré et al., 2012.

⁸⁷ See also Curti. 1950 and Hunter, 1996.

⁸⁸ See Parris and Shaw, 1980; Sweet, 1991; Cowley and McCormack, 1995; Orr, 2006; Darian-Smith, 2007; Douglas, 2008.

somewhat side-lined from this account. Spillman briefly discusses the New York stained glass firms Tiffany Studios and Lamb Studios, who exhibited in 1893 and 1900, but neglects to mention the stained glass exhibited by European makers (who formed the majority of exhibitors). Phase Charlotte Gere's study of 'European Decorative Arts at the World's Fairs, 1850-1900' (1999) is useful but limited in its focus on the decorative arts in one museum collection at the Metropolitan Museum of Art, New York. Jonathan Meyer's *Great Exhibitions: London - New York - Paris - Philadelphia 1851-1900* (2006) examined furniture, decorative bronzes and garden furniture at the Exhibitions. Meyer justified this isolated study by drawing attention to the fact that "the coverage" that the decorative arts "generated in the journals and press of the time was a greater proportion than was warranted by the space they occupied in the exhibition as a whole". This also holds true for stained glass, which was displayed at almost all the Exhibitions in one way or another, and discussed extensively in the contemporary press.

Over the last thirty to forty years, several monographs have been published to coincide with anniversaries of Exhibitions. 91 The year 2001 (150 years after the Great Exhibition) marked a series of important publications that readdressed previously side-lined issues of empire, race, religion, class, labour and gender at the Exhibitions. Amongst these we should mention Peter Hoffenberg's An Empire on Display: English, Indian, and Australian Exhibitions from the Crystal Palace to the Great War (2001), which provides a comprehensive guide to the complex imperial structures and ideologies of exhibitions in relation to the British colonies of Australia and India. John Burris's Exhibiting Religion: Colonialism and Spectacle at International Expositions, 1851-1893 (2001) examined the role of exhibitions in the development of religion as an intellectual inquiry, but did not engage with religious exhibits such as stained glass. The collection of essays edited by Louise Purbrick, in The Great Exhibition of 1851: New Interdisciplinary Essays (2001), highlighted social aspects of the exhibitions and re-examined the role of labour at these events. Finally, Martha Sear's article on 'Fair Women's Worlds: Feminism and World's Fairs 1876-1908' in Identity and Universality (2001), a collection of essays edited by Volker Barth, discussed womens' involvement in the Exhibitions and their relationship to Feminism.⁹²

⁸⁹ Spillman, 1986: 44.

⁹⁰ Meyer, 2006: 12.

⁹¹ For example, Post, 1976; Kinghorn, 1988; Kinchin and Kinchin, 1988; Mabire, 2000; and Leapman, 2001.

Continued re-examinations of the events continue to take place through conferences and temporary exhibitions across the world. A number of 'anniversary' conferences were held in London in 2012, upon the 150th anniversary of the 1862 Exhibition, including 'Internationality on Display: Revisiting the 1862 International Exhibition' at the V&A (February 2012); a workshop at Tate Britain entitled '"The Device of Bringing Them All Together": International and Imperial Exhibitions, 1851-1924' (June 2012); and 'Almost Forgotten: The International Exhibition of 1862' a William Shipley Group for RSA (Royal Society of Arts) History event (November 2012).

In Paris, the exhibitions 'Paris et ses expositions universelles, architectures 1855-1937', at the Centre des monuments nationaux, la Conciergerie (12 December 2008 - 12 March 2009), and 'Exotiques Expositions, Les expositions universelles et les cultures extra-européennes France, 1855-1937', at the Archives Nationaux (31 March - 28 June 2010) readdressed the architectural constructions and presentation of non-European cultures at the Paris Expositions. ⁹³ In addition, The Nelson-Atkins Museum of Art, Kansas City, USA, held an exhibition entitled 'Inventing the Modern World: Decorative Arts at the World's Fairs 1851-1939' (April - August, 2012), which was of major significance as the first exhibition of such a scale to bring together surviving decorative art exhibits from across the world, and to feature some stained glass panels by Morris & Co. designed and made for the Calcutta Exhibition of 1883-84, from the collection of Birmingham Museum and Art Gallery (BMAG). ⁹⁴

Stained Glass Scholarship⁹⁵

The Exhibitions have only recently begun to reawaken the interest of stained glass historians, in spite of the fact that their significance in the history of stained glass was acknowledged in the nineteenth century. Alexandre Brongniart, director of the Royal Manufactory of Sèvres 1800-47, noted the importance of the early-nineteenth-century French national industrial exhibitions upon the early revival of stained glass in his *Mémoire sur la peinture sur verre* (1829). The stained glass exhibited at the London Exhibitions of 1851 and 1862 featured in

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⁹³ A colloquium was held in Paris to coincide with this exhibition, 14-16 June 2010. The papers were recently published in Carré et al., 2012.

⁹⁴Busch and Futter, 2012.

⁹⁵ Although this thesis has drawn on texts published in English and French, the German contribution is also important. I note especially Vaassen, 1997.

Charles Winston's important publications on stained glass. ⁹⁶ In *Le vitrail* (1896), Léon (known as Louis) Ottin, drew attention to the important roles that the 1878 and 1889 Expositions played in the rapid development of French stained glass. In *Glass-Making in England* (1923), British stained glass artist Harry J. Powell (of Powell & Sons) included a list of the firm's stained and painted glass exhibits at the London Exhibitions of 1851 and 1862. ⁹⁷

However, chapters on nineteenth-century stained glass in chronological studies of the medium published between 1920 and 1980 tend to be slight, overly critical, and even damning. 98 As Christopher Woodforde noted in 1954, "it is customary to call all nineteenth-century stained glass 'Victorian' and to dismiss it as unworthy of serious consideration". 99 In 1974, Alec Clifton-Taylor advocated the removal of "bad Victorian glass", on the principle that "the general standard of these windows is frankly appalling". On the whole, the medium has been neglected in studies of nineteenth-century art, architecture and the decorative arts. 101 However, Charles Sewter's two-volume study The Stained Glass of William Morris and His Circle (1974), and Martin Harrison's Victorian Stained Glass (1980) set a high standard for the re-assessment of nineteenth-century stained glass in Britain. Since, a number of biographies and gazetteers have contributed to our knowledge of nineteenth-century stained glass, notably Birkin Haward's gazetteers of Norfolk and Suffolk (1984 and 1989); various contributions to the Journal of the British Society of Master Glass-Painters; 102 Michael Donnelly's Scotland's Stained Glass: Making the Colours Sing (1997); Ronald Torbet's The Wonderful Windows of William Wailes 1808-81 (2003); William Waters' Stained Glass from Shrigley and Hunt (2003); Michael Fisher's Hardman of Birmingham (2008); and Stanley Shepherd's The Stained Glass of A.W.N. Pugin (2009). 103

The most recent overviews of British nineteenth-century stained glass include Jim Cheshire's Stained Glass and the Victorian Gothic Revival (2004) and William Waters' Angels & Icons: Pre-Raphaelite Stained Glass 1850-1870 (2012). Despite Cheshire's introduction on 'Stained

⁹⁶ Winston, 1847 (2 Vols); Winston, 1865.

⁹⁷ Powell, 1923: 161.

⁹⁸ For example: Read, 1926; Baker, 1960.

⁹⁹ Woodforde, 1954: 55.

¹⁰⁰ Clifton-Taylor, 1974: 148, 143

¹⁰¹ This is partly due to the hierarchical divide between fine art and decorative art which places the arts of painting, sculpture and architecture above those of the so-called applied, decorative or industrial arts. The unique medium of stained glass remains somewhat in flux between these categories, as shall be discussed in this thesis.
¹⁰² Hadley and Hadley, 1989-90; Kerney, 1996; and Kerney, 2007.

Other important biographical work includes Harrison, 1973; Skeat, 1976; Skeat, 1978; Skeat, 1979; Skeat, 1980; Donnelly, 1981; Larkworthy, 1984; Kerney, 2001; and Galicki, 2001.

Glass and Victorian Culture', the focus of his text is geographically and thematically limited to issues of ecclesiology, economics and patronage within the south-west region, focusing on the studios of Joseph Bell, John Toms, and the Beer family. Waters' book, published two months before this thesis was submitted, reassesses the work of five influential British stained glass firms, Clayton & Bell; Heaton, Butler & Bayne; Lavers, Barraud & Westlake; Powells; and Morris & Co., all of whom exhibited stained glass at International Exhibitions, in relation to wider developments in British Pre-Raphaelitism, 1850-70.

All the key British publications on nineteenth-century stained glass have mentioned the significance of the International Exhibitions on the development of the medium, but fail to elaborate on this matter. The Great Exhibition of 1851, the first international secular display of stained glass, has been described by Harrison as "the major event which reflected the progress made in the early stages of the stained glass revival"; Sarah Brown has similarly declared that the "transformation of stained glass production in the first half of the nineteenth century can be gauged from the Great Exhibition of 1851"; and Cheshire has recognised that "stained glass had never been exhibited on this scale or in this type of situation before". 104 The significance of the Exhibitions is implicit in Harrison's publication; he makes reference to the London International Exhibition of 1862 and Paris Expositions of 1867 and 1878 in passing. But it is doubly significant that many of the windows Harrison illustrates and discusses were displayed at one or more of the Exhibitions. 105 A few pages of Waters' recent publication highlight the significance of 'Exhibitions' in attracting potential clients and showcasing developments in British stained glass. 106 In addition to his brief discussion of the British contribution to the stained glass displays at the London and Paris International Exhibitions held between 1851 and 1867, Waters reminds us of the role of national exhibitions such as those hosted by the Architectural Association and South Kensington Museum.

Across the channel, scholars have made more definite progress in claiming the significance of these events for the history of stained glass. In 1981, archivist-palaeographer Jean-Michel Leniaud listed the official catalogues and jury reports of the French Expositions Universelles

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¹⁰⁴ Harrison, 1980; 23: Brown, 2002; 10: Cheshire, 2004; 156.

¹⁰⁵ For example, the Waltham Abbey east window designed by Edward Burne-Jones for Powell & Sons; Morris & Co.'s early glass at Selsley, Gloucestershire; James Milner Allen's designs for the Northampton Town Hall windows made by Lavers & Barraud; and the window at Mere designed by Henry Holiday and made by Powells. ¹⁰⁶ Waters, 2012: 306-11.

as important sources for studies of nineteenth-century stained glass. ¹⁰⁷ Nineteenth-century French stained glass was the subject of several special issues of journals in the 1980s, including *Metiers d'Art* 20 (November 1982); *Revue de l'art* 72 (1986); and *Annales de Bretagne et des Pays de l'Ouest* 93.4 (1986), all of which contain a number of important articles on stained glass makers, and the iconography and techniques employed by them. ¹⁰⁸ Significantly, Catherine Brisac's survey *A Thousand Years of Stained Glass* (1986) acknowledged the importance of the Expositions Universelles on the development of secular glass, ¹⁰⁹ and this has been further emphasised by Laurence de Finance, Dominique Hervier et al. in *Un patrimoine de lumière 1830-2000: verrières des Hauts-de-Seine, Seine-Saint-Denis, Val-de-Marne* (2003).

It was not until 1990, however, that Elisabeth Hardouin-Fugier provided the first in-depth analysis of the participation of stained glass artists at Expositions in her article on the Paris Exposition of 1878, which opened up issues surrounding artistic status and representation at these events. Chantal Bouchon's 1995 chapter on religious stained glass under the Second Empire, published in an edited collection on stained glass in the Picardy region and the north of France, included a short section on 'Les expositions universelles et internationales', in which she summarised French participation in the London and Paris International Exhibitions of the 1850s and 1860s. A special issue of *Monumental: revue scientifique et technique des monuments historiques. Dossier vitrail, semestriel 1* (2004) published articles by Françoise Gatouillat, Robert Dulau, and Véronique David, each of which focussed on extant stained glass windows from the Paris Expositions of 1867, 1878 and 1900. 111

Since then, Jean-François Luneau has explored French glass-painter Félix Gaudin's participation in Expositions, Salons and competitions in his biography and catalogue of Gaudin's work. A 2007 article by Élisabeth Pillet explored the participation of stained glass artists in the first Paris Exposition of 1855. Pillet has also drawn attention to the significance of the Great Exhibition and the 1855 Paris Exposition for the development of Prosper Lafaye's career as a glass-painter and restorer of stained glass in Paris in a recent *Corpus Vitrearum*

¹⁰⁷ Leniaud, 1981.

¹⁰⁸ See, for example, Bouchon and Brisac, 1986.

¹⁰⁹ Brisac, 1986: 157-59.

¹¹⁰ Bouchon, 1995: 12-16.

¹¹¹ See Gatouillat, 2004; Dulau, 2004; David, 2004.

¹¹² Sections relevant to this study include those on Paris, 1878; Chicago, 1893; and Paris 1900. See Luneau, 2006.

volume (2010).¹¹³ Most recently, however, Luneau's chapter on 'Les peintres-verriers dans les expositions universelles: histoire d'un désamour', published in a collected volume of conference papers, *Les expositions universelles en France, au XIX*^e siècle. *Techniques. Publics. Patrimoines* (2012) has directly engaged with glass-painters' dissatisfaction with the classification of stained glass and the provision for its display at the Paris Expositions. Much of his discussion is extended, and placed into a wider international context, in Chapters 1 and 2 of this thesis.

Besides these British and French publications, American scholar Virginia Raguin's article, 'Revivals, Revivalists, and Architectural Stained Glass', published in *The Journal of the Society of Architectural Historians* (1990) made a notable contribution to the field, by considering international trends towards the revival of stained glass in this period. In addition, articles by Raguin and Jean Farnsworth in *Nineteenth Century: Magazine of the Victorian Society in America* (1997) have acknowledged the influence of international artistic exchange and early American Mechanics' Fairs upon the development of American stained glass. The stained glass of the La Farge and Tiffany studios is well documented by Alastair Duncan, Julie Sloan, Martin Eidelberg and James Yarnall.¹¹⁴ In particular, Yarnall's recent monograph discusses La Farge's participation in the 1889 Paris Exposition Universelle in Paris.¹¹⁵ The 2000 publication *Art, technique et science: la creation du vitrail de 1830 à 1930*, edited by Jacques Barlet, is an important collection of chapters derived from papers given at an international colloquium on stained glass held in Liège, which consider nineteenth and early-twentieth-century stained glass in a global context.¹¹⁶

The stained glass heritage of the former British colonies of Australia, New Zealand, Canada and India is vastly under-researched in comparison with that of Europe and America. The two major publications on Australian stained glass are Peter and Jane Donovan's *150 Years of Stained and Painted Glass* (1986) and Beverley Sherry's *Australia's Historic Stained Glass* (1991), which highlighted the wealth of surviving stained glass in Australia, and drew attention to Australian stained glass artists' participation in International Exhibitions,

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¹¹³ Pillet, 2010: 133.

¹¹⁴ See Duncan, 1980; Yarnall, 1986; Sloan and Yarnall 1992; Sloan, 1997; Sloan, 2004; Eidelberg et al., 2007; Yarnall, 2012.

¹¹⁵ Yarnall, 2012; 160-64.

¹¹⁶ See especially, Vanden Bemden, 2000.

especially those held in Melbourne and Sydney.¹¹⁷ Jude Holliday's *Stories in Glass: The Stained Glass Heritage of Bombay* (2012) is the first book to deal with stained glass of this period in India, although it focusses mainly on imported stained glass rather than windows made in India. To date, there is no standard text on Canadian stained glass, although Gerald Stevens' important study *Early Canadian Glass* (1961) made a start in documenting the production of stained glass in Canada, and since, Rosalind Pepall's article on 'Stained Glass Windows in Montreal at the Turn of the Century' (1981), has furthered knowledge. A 'Bibliography of Stained Glass Windows in Canada' is available from the website of the Registry of Stained Glass Windows in Canada.¹¹⁸

This study expands upon the work begun by French scholars Pillet, Hardouin-Fugier, and Luneau, by considering the display of stained glass at International Exhibitions held across the globe between 1851 and 1900. The *international* scope builds on extant scholarship on nineteenth-century stained glass, which, in spite of interventions made by the likes of Raguin and Vanden Bemden, remains primarily studies of a national or individualistic nature. In addition, this study has been influenced by recent interdisciplinary research on nineteenth-century visual culture that features stained glass. In doing so, it incorporates new art-historical approaches to the medium alongside traditional historical, iconographical and ecclesiological methodologies. In particular, Laura Morowitz and Elizabeth Emery's *Consuming the Past: The Medieval Revival in Fin-de-Siècle France* (2003) has recognised the medium's importance as a visual and cultural art form, with the potential to shed light on the religious, political and cultural climates of a 'modern' French era. This thesis extends such an approach to the International Exhibition environments, drawing attention to ways in which stained glass was at the centre of negotiations between medieval tradition and modern innovation, not just in France, but across the world.

Finally, Caroline Arscott's recent explorations of how the windows designed by Burne-Jones at St Philip's Cathedral, Birmingham (made by Morris & Co., and installed between 1885 and 1897) "interrogate the relationship between the two-dimensional artwork and the pictorial"

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¹¹⁷ There are also a number of invaluable theses: Down, 1975; Giedraitylte, 1983; Hughes, 1997; and Hughes, 2007. For New Zealand, see Ciaran, 1998.

¹¹⁸ Brown, 2007.

¹¹⁹ Across the world attempts to reassess and value nineteenth-century stained glass have remained limited to monographs on individual stained glass artists or firms, or regional and national surveys. In addition to works previously cited, see Bayne, 1986; Cormack, 1999.

have marked a new approach to the medium of stained glass (Fig. 0.8). 121 Although Arscott focuses on a handful of windows by Morris & Co., and thus contributes to the art-historical fetishisation of this firm at the expense of the rest of nineteenth-century stained glass, 122 she makes an important assertion that stained glass is a medium that inter-relates the pictorial and sculptural to produce the decorative. Arscott argues that these windows have a "sculptural logic", that the leads, or "interruptive black lines", act as both "fetters" and joiners; they break up the mosaic glass composition whilst emphasising the pictorial design and uniting the window. 123 While it is questionable whether stained glass can be described as 'sculptural' (and indeed, this term was later dropped by Arscott), 124 such comments prompt us to reconsider the relationship between stained glass and other pictorial and decorative arts. 125 Since, at the International Exhibitions, stained glass was continually categorised in relation to other artistic media, questions and considerations of intermediality are important in my discussion of the classification, display and visitors' experience of stained glass at these events.

My Approach and Chapter Outline

Stained Glassworlds is not a stylistic history of nineteenth-century stained glass, but a cultural and experiential history that aims to reclaim the significance of the stained glass displays at the International Exhibitions, 1851-1900. As such, each of my chapters examines stained glass in relation to Exhibition themes such as material taxonomies, the history of display, spectacle, exhibitors' international networks, production and consumption, nationalism, and imperialism. It thus challenges many of the major methodological and historiographical assumptions and paradigms relating to the study of stained glass. ¹²⁶

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¹²¹ Arscott, 2004: 40.Arscott's article first appeared in *Body Doubles: Sculpture in Britain, 1877-1905*, edited by David Getsy (2004), and was re-published, in a slightly altered form, in a chapter on stained glass in her monograph *William Morris and Edward Burne-Jones: Interlacings* (2008).

¹²² A whole wealth of literature exists on Morris glass whilst other nineteenth century stained glass firms have elicited far less attention. It is my opinion that Nikolas Pevsner's widespread damning comments about 'Victorian' stained glass in the first editions of the *Buildings of England* series did little to help in establishing a trend in the canon of art history in which Morris (and more generally Arts and Crafts) is seen to be the *apogée* of stained glass production in this period, a fact which remains to be properly contested.

¹²³ Arscott, 2004: 40, 44.

¹²⁴ The term 'sculptural' was not used in the 2008 publication.

Other authors have sought to address issues of intermediality. See especially, O'Neill, 2010.

¹²⁶ The majority of publications on nineteenth-century stained glass perpetuate a chronological and stylistic history of the medium's development that begins with the gothic revival and ends with art nouveau. For example: Harrison, 1980; Brown, 1992; and Barlet, 2000.

In spite of recent interest in transnational and global art histories, and recognition that Exhibitions were a "transnational phenomenon", 127 this thesis uses the term 'international' throughout, following its contemporaneous usage in the nineteenth century. Due to the international span of this thesis, the term 'Victorian' used by so many British historians of stained glass has been replaced with 'nineteenth-century'. The first half of the thesis discusses the ways in which stained glass was encountered at the International Exhibitions. It focuses on the medium of stained glass at these events, rather than the stained glass makers, although their roles are examined in later chapters. Chapter 1 focuses on the classification and status of stained glass, revealing the ways in which Exhibitions contributed to debates over the artistic status and arrangement of the medium within displays. As we shall see, 'artist' is a problematic term when applied to stained glass production, for the medium relied upon the cooperation and labour of many individuals. 128

Chapter 2 explores, chronologically, the ways in which stained glass was actually displayed in these environments, and charts the reaction of exhibitors, the public and critics to the stained glass displays. Although exhibitions of stained and painted glass had existed prior to the International Exhibitions (see Chapter 3), in the second half of the nineteenth century stained glass was still predominantly seen in an architectural context, whether that was religious, civil, collegiate or domestic. As stained glass artist Francis William Oliphant's declared in 1855, stained glass was "never intended to be made for exhibition or sale, and here it is not alone; fresco and panel painting are in a like position; it must have a purpose to fulfil, and a place provided for it". 129 Yet stained glass panels were displayed in great number, and to great effect, at the International Exhibitions. Here visitors viewed the medium separately from their architectural contexts (although the intended architectural destinations for many of these windows was often known), and exhibitors, exhibition reviewers and jurors were able to compare and consider the merits of stained glass exhibits from all over the world.

The large displays of contemporary stained glass at the International Exhibitions immersed the medium into a new environment centred on spectacle. Its presence here arrested visitors'

¹²⁷ Iriye and Saunier, 2009: 370.
128 For the Exhibitions and labour see Barringer, 2005: 1-19.

¹²⁹ Oliphant, 1855: 65-66.

attention and encouraged fresh interpretations of the medium. 130 Chapter 3, therefore, interprets the presence of stained glass in the exhibition environment as part of a wider culture of spectacle, placing the medium in a broad chronological and intermedial context, in order to consider its spectacular effects and widespread popularity and imitation as emblematic of nineteenth-century modernity. 131 It thus makes an unusual, perhaps unexpected, further intervention in current scholarship which encourages the careful consideration of stained glass in relation to other artistic media and popular cultural forms.

The remaining three chapters suggest the broader implications of these displays and the individual stained glass exhibits upon the global stained glass industry, stylistic development, and representations of nationalism and imperialism. Chapter 4 seeks to ascertain whether the stained glass exhibitors were representative of the nineteenth-century stained glass industry at large, and outlines their individual roles in the bureaucratic organisation of Exhibitions and their commercial incentives for participating. It asks, especially, did these displays help exhibitors gain commissions and influence abroad? It also considers the ways in which exhibitions shaped exhibitors' reputations through jury awards, and discusses the afterlife of stained glass exhibits when the Exhibitions closed.

Chapter 5 discusses the ways in which the stained glass exhibited at these events demonstrate a stylistic eclecticism, and explores how modern stylistic development was continually assessed in relation to medieval precedent. The Exhibitions present an opportunity to consider 'modern' aspects of the medium, given that, according to the Palgrave Dictionary of Transnational History, "[t]he international exposition as it developed from the mid 19th until the mid 20th centuries was a product, indeed an avatar of modernity". 132 This thesis considers the medium of stained glass within these sites of modernity, ¹³³ and suggests that these events reveal ways in which nineteenth-century stained glass might be considered 'modern' in terms of a 'modern art' defined by David Peters Corbett and Lara Perry as one which "grows out of and responds to modern conditions, whether it is innovative or not". 134 It does this by

¹³⁰ Of course, viewers could encounter stained glass fragments, free-standing panels and entire windows in the glazier's workshop or auction house. Images of stained and painted glass were also disseminated via engravings and other print media, photography and oil painting.

131 An earlier version of this chapter was published in *Visual Culture in Britain*. See Allen, 2012.

¹³² Iriye, 2009: 371.

¹³³ As Geppert notes, the Exhibitions are referred to on the first page of Henri Lefebvre's *Introduction de la* modernité (Paris, 1962). See Geppert, 2010: 1.

¹³⁴ Peters Corbett and Parry, 2000: 2.

considering the ways in which stained glass was continually associated with medievalism at the Exhibitions, while identifying other ways in which artists also encountered and adopted international styles such as Japonisme and Art Nouveau at these events.

Finally, Chapter 6 discusses how the Exhibition environment stimulated new iconographies and meanings in stained glass, particularly how the exhibits reflected, and influenced, some of the big themes of the nineteenth-century Exhibitions: Nationalism, Imperialism, and attitudes towards Race. As this is the first study to look at stained glass of this period in such a wide International Exhibition context, it is hoped that it will encourage further investigation into the cross-cultural, transnational, and global dissemination of stained glass into public and religious buildings, houses and museums in the nineteenth century.

CHAPTER 1

EXHIBITING STAINED GLASS: CLASSIFICATION, ORGANISATION AND STATUS

Introduction

In the second half of the nineteenth century, stained glass was simultaneously perceived as an applied art, art-manufacture, craft, decorative art, industrial art, manufactured product, commodity and contemporary anachronistic art form. This chapter considers how these perceptions informed and were shaped by the official classification and critical commentaries of the medium at the International Exhibitions between 1851 and 1900. It begins by examining the potentialities and problems of displaying an architectural art such as stained glass in an ephemeral exhibition setting. It then explores how most Exhibition classification schemes propagated interpretations of stained glass as a manufacture rather than a fine art. The displays of stained glass were shaped by the Exhibition context, where new narratives of viewing and interpreting the medium were formed, but official Exhibition classifications were also challenged by stained glass as a medium. In particular, stained glass artists refuted taxonomic classification based on the binary division of art and industry. Throughout this chapter, I draw attention to conflicting views over the status of stained glass as a result of the character of the medium and its collaborative production.

Exhibiting Stained Glass: Problems and Potentialities

The art of glass-painting can rarely receive justice in a general exhibition. Its dimmed light is injurious to most other objects. It is as exclusive in an exhibition as a beech-tree in a forest, under which nothing else will grow. 135

Most stained glass panels are designed to fit a particular architectural opening, and, in its architectural context, the medium performs a practical, symbolic and aesthetic function within an architectural space, keeping the elements out; regulating, refining, and refracting light into a building; and illuminating pictorial subjects and patterns. When stained glass inhabits a new space in a different context, it adopts a variant set of functions, symbolism and aesthetics, and in turn opens a range of methodological questions for stained glass historians. What are the

¹³⁵ Gambier Parry, 1867: 275.

implications of the temporary or permanent displacement of stained glass panels, designed to fit a particular window opening, to new architectural settings, geographical contexts, and social environments?

A number of practical and theoretical problems arise with the display of stained glass in an exhibition setting, along with new opportunities for experiencing and interpreting the medium. Stained glass panels require structural support to hold them in place, and need a sufficient amount of light from behind in order to be seen. They are indeed unwieldy objects to exhibit, remarked American art critic Charles de Kay after the 1893 Chicago Exposition. Furthermore, most stained glass windows are supposed to be viewed from a distance, rather than up-close. As E.G. Howard observed in 1887, "[p]ainted glass appears to great disadvantage in museums. Large figures and subjects intended to be seen from a considerable distance are brought close to the eye, so that the effect they were calculated to produce is entirely lost". 138

Although many modern museums have found innovative and attractive ways of displaying stained glass, the sheer size and scale of some panels make it difficult, if not impossible, to display an entire window (and rarely a whole scheme of windows), ¹³⁹ unless housed in a purpose-built architectural structure. ¹⁴⁰ In 1994-95, Virginia Raguin considered the implications of such a displacement and urged curators to evaluate historic stained glass windows within their architectural contexts:

The nature of the detached object, of necessity, is in conflict with the object in use. No object can be simultaneously in use and on exhibit in a museum, and therefore we find the exclusion of functional, living art, an inevitable result ¹⁴¹

¹³⁶ In museums such as The Stained Glass Museum, Ely, stained glass panels are illuminated with artificial backlighting. The V&A Museum, London, Metropolitan Museum, New York, and Burrell Collection, Glasgow, use

¹³⁹ These problems were acknowledged at a recent conference 'Stained Glass and the Modern Museum Conservation, Research, Display' held in York, March 10-11, 2011.

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both back-lighting and natural lighting. The Vitromusée, Romont, explores a number of diffferent ways of lighting stained glass.

 ¹³⁷ See Long, 2002: 79.
 138 Howard, 1887: 799. Howard is speaking of monumental windows, as small-scale painted glass roundels provide an exception to this rule.
 139 These problems were acknowledged at a recent conference 'Stained Glass and the Modern Museum:

¹⁴⁰ Such as the architectural ensemble assembled from medieval fragments at The Cloisters Museum and Garden, a branch of the Metropolitan Museum of New York, which houses much medieval stained glass. See Parker and Shepard. 1992.

¹⁴¹ Raguin, 1994-95: 52.

Raguin's chief concern is that when individual stained glass panels are isolated from their original or intended setting and placed on display in an exhibition or museum, they lose their physical and metaphysical connections with wider aesthetic, symbolic and architectural contexts. Raguin acknowledges that the stained glass window in a museum is no longer 'living'; instead, it adopts a "museal mortality", as Theodor W. Adorno wrote in his essay on the 'Valéry Proust Museum' (1952-54):

The German word *museal* [museumlike] has unpleasant overtones. It describes objects to which the observer no longer has a vital relationship and which are in the process of dying. They owe their preservation more to historical respect than to the needs of the present.¹⁴²

Both Raguin and Adorno subscribe to a Benjaminian school of thought. Once the object is separated from its architectural framework, site-specific function and symbolism, its "cult value" becomes irretrievable and, instead, assumes "exhibition value". 143

As Svetlana Alpers has observed, the placing of objects in new spaces can establish new parameters of visual interest; when cultural objects are "severed from the ritual site, the invitation to look attentively remains and in certain respects may even be enhanced". 144 It is significant that Alpers demonstrates her paradigm through the example of Romanesque capitals and Renaissance altarpieces. Like stained glass, both these cultural objects have a particular functional, symbolic and ritualistic relationship with their architectural surroundings. Yet, as we shall see in Chapter 2, many of the displays of stained glass in the nineteenth-century International Exhibitions recreated architectural contexts, both ecclesiastical and secular, and encouraged consideration of the medium as a 'cult object' within these displays. Furthermore, a number of exhibited windows regained their 'cult value' when they were subsequently installed in churches and buildings across the world. Thus international exhibitions represent an intermediary display space between the glazier's studio, where the window was made, the 'living' architectural context, and the museum. The stained glass window on display in the ephemeral exhibition environment is neither living art, nor in the process of dying. Instead, it adopts a new exhibitional life.

¹⁴² Cited in Crimp, 1983: 43.

¹⁴³ "Works of art are received and valued on different planes. Two polar types stand out; with one, the accent is on the cult value; with the other, on the exhibition value of the work." Benjamin acknowledged that "It is easier to exhibit a portrait bust that can be sent here and there than to exhibit the statue of a divinity that has its fixed place in the interior of a temple". Benjamin, 1992 (1936): 218-19. Raguin adopts Benjamin's stance in her argument, drawing attention to the integral role stained glass plays in the space for which it was designed and commissioned. Raguin, 1994-95: 49.

Central to Françoise Forster-Hahn's article 'The Politics of Display or the Display of Politics?' is the fact that such displays both shaped and reflected society and historical discourse:

When objects previously separated by time and space are brought together to interact in a unique visual environment, past valances are repressed and new references are effected, so that novel meanings or layers of meaning emerge which reach beyond the temporal boundaries of the individual exhibition.¹⁴⁵

The temporary placement of stained glass within these environments created new spatial, material and symbolic meanings, and formed new iconographic and aesthetic relationships, which may cross temporal, geographical, religious and stylistic boundaries. To consider the implications of these unique displays is to begin unwrapping these layers of meaning, and to acknowledge the significance of the International Exhibitions as temporary "intersecting spaces" for the past and present, old and new technologies, historic and current perceptions, where products and peoples, animals and machines from all over the world were brought together for the purpose of display under the collective guise of exhibition, showroom, spectacle and ceremony.

Within these spaces, stained glass formed new intermediary displays, no longer integrated with an architectural whole, but defined through a new, perhaps altogether different, collection. According to literary critic Susan Stewart, "the collection replaces history with *classification*"; and "is dependent upon principles of organization and categorization". ¹⁴⁷ So that, in the contexts of the International Exhibitions, stained glass exhibits were identified in terms of their exhibitor and/or maker (these were not always the same), subject, date, material, patron and destination, and placement, and continually compared and described in relation to other exhibits, rather than in relation to their architectural function, or role in a multimedia iconographic or decorative scheme. The ephemeral International Exhibitions brought together a vast collection of objects from across the world that had never before been displayed together. Placed in such a collection, individual exhibits formed new contexts and connections and stained glass reached diverse audiences.

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¹⁴⁵ Forster-Hahn, 1995: 175.

¹⁴⁶ Berlo, 1995: 6.

¹⁴⁷ Stewart, 1993: 151, 153. Stewart is mostly writing about private collections, but her argument about the ways in which the collection depends upon the decontextualisation of the objects and the creation of new narratives also applies to the 'collection' of objects within a temporary exhibition display.

The placing of stained glass within a heterogeneous and eclectic collection of international exhibits triggered contemporary debates about the status, display and function of the medium. The stained glass displays at the Paris Exposition of 1867 prompted Thomas Gambier Parry to write:

The questions naturally suggested by this Exhibition are – what are the especial principles of glass-painting, and what are its limitations? [...] All productions of art are properly subject to two restrictions – the nature of their materials and the nature of the human eye. We have now to do with an art which is especially connected with those of architecture and of picture – with the former as an adjunct and ornament, with the latter as a sister art of colour and design. ¹⁴⁸

The Exhibitions provided opportunities to experiment with displaying stained glass and to explore the relationship between stained glass, architecture, painting, and a range of other objects and media. The Exhibitions became forums for discussion over the role of stained glass in nineteenth-century society, where artistic and architectural practionners, critics, and the public questioned the medium's status. This chapter addresses these issues by first discussing the categorisation and ordering of stained glass exhibits at the International Exhibitions through classification schemes, written catalogues and arrangements. It suggests that the medium's production methods may have contributed to a classification problem. Finally, it demonstrates the ways in which ordering principles shaped perceptions of the medium as a manufacture, and reveals how individual stained glass exhibitors refuted classification by forming their own displays.

Classifications and Order, Redressing the Balance of Power

In 'The Exhibitionary Complex' (1988), Tony Bennett suggested ways in which power was exercised through the spectacle of the International Exhibition, where he declared a problem of order was transformed into a problem of culture. Bennett proposed that the International Exhibitions brought together "an ensemble of disciplines and techniques of display" whilst "simultaneously ordering objects for public inspection and ordering the public that inspected". He compared the architectural design of Bentham's Panopticon prison, built for surveillance, to Paxton's Crystal Palace built for the Great Exhibition, which combined spectacle and surveillance in a space that enabled everyone to see, as well as creating vantage

¹⁴⁸ Gambier Parry, 1867: 276.

¹⁴⁹ Bennett, 1988: 74.

points which enabled them, simultaneously, to be seen. According to Bennett, this "rhetoric of power" was manifest in the ordering of objects and peoples for the purpose of demonstrating collective national achievement. This Foucauldian perspective has recently been criticised. Bennett's viewpoint prioritises the hierarchical relationship between state and subject, omitting a number of independent intermediary powers including the exhibitor, without whom these Exhibitions could not have been possible. Furthermore, spaces were not all ordered by the same positions of power, nor according to the same principles. National courts were left to their respective countries, and, within a hosting country's exhibiting space, specific courts and galleries were organised and arranged by separate groups and individuals. Similarly, visitors constructed their own convenient entrances and routes around Exhibition buildings, in spite of the architect's intention and guidebook's instruction.

In his essay, 'Exhibiting Intentions', Michael Baxandall identifies three independent agents involved in the visual display of cultural objects in a museum; the maker, the exhibitor of the made object, and the viewer, all of whom have different ideas, values and purposes for making, displaying and seeing the object in question. ¹⁵⁴ At the International Exhibitions, however, several other agents were active too, including the journalist/critic; Exhibition Commissioners; official, national or commercial representatives; the owner or donor of the object (often in the case of stained glass, a parish or individual); the proprietor, exhibiting company or manufacturer; and labourers who installed the exhibits. ¹⁵⁵ Exhibition Commissioners, usually official state representatives who were responsible for official governmental displays and policies, oversaw the whole. Peter Hoffenberg refers to Commissioners as "the authors of the Exhibitions". ¹⁵⁶ Commissioners devised exhibition classification schemes, although exhibitors selected the class and sub-category under which they submitted their exhibits, enabling some individual control over the classification of their

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¹⁵⁰ Bennett, 1988: 74-78.

¹⁵¹ Bennett, 1988: 80.

¹⁵² See Goodlad, 2003; Kriegel, 2006; Hill, 2008a; Nichols, 2009; Otter, 2009.

¹⁵³ See *Bentley's Miscellany* (July 1867): 53. One publication reported at the Melbourne Centennial Exhibition of 1888-89 that the public "consulting their own convenience, have made the eastern door the main entrance", rather than entering at the south into the dome, because this entrance was closer to the train terminal which brought visitors to the Exhibition. *The Centennial Magazine*, 1888: 61.

¹⁵⁴ Baxandall, 1991: 36.

¹⁵⁵ The roles of some of these intermediary agents are discussed in Chapter 4.

¹⁵⁶ Hoffenberg, 2001: xviii.

products.¹⁵⁷ National and colonial commissioners exerted varying amounts of control over the selection and display of exhibits during this period, especially with regard to colonies, dominions and dependencies.¹⁵⁸ In addition, some exhibition commissioners were assigned the task of selecting and overseeing the arrangement of exhibits in committees of admission and installation, whose members incorporated stained glass exhibitors (see Chapter 4). But these organised committees tell us more about middle-class bureaucracy than nineteenth-century labour. Much of the work at the exhibitions was hidden from view and has been omitted from our subsequent exhibition histories.¹⁵⁹ For example, we know almost nothing about those who packed, transported and installed the stained glass exhibits.

Classification systems attempted formally to organise the vast amount of exhibits on display into comprehensible sections. The schemes reflect an era preoccupied with taxonomies and the desire to order the world and its contents, naturally, scientifically, philosophically, and commercially. ¹⁶⁰ The endless revisions and additions made to classification schemes between 1851 and 1900 demonstrate attempts to understand the "spectacularized commodity", the product of capitalism. ¹⁶¹ They also highlight the philosophical problems of taxonomy; as Armstrong has articulated, the "anarchic, exponential multiplication of classification actually defeats ordering principles". ¹⁶² On the other hand, whilst nineteenth-century men and women were aware of the paradoxes and inherent weaknesses of these classification schemes, they were accepted as practical and instrumental in furthering knowledge. In *London Labour and the London Poor* (published serially in 1840s, and as three volumes in 1851), Henry Mayhew declared, "[o]f all scientific processes, the classification of the various phenomena [...] is perhaps the most important; indeed, [...] without distinguishing between one object and

¹⁵⁷ Sir Redmond Barry, Executive Commissioner for the Colony of Victoria, noted that Exhibition Commissioners were responsible for preparing classifications and displays, amongst other tasks. See Galbally, 2004.

The Royal Commission orchestrated the British colonies and dependencies at almost every exhibition. The Colonial and Indian Exhibition of 1886 was an exception – each Colonial Commission devised its own classification scheme according to its needs and produced its own catalogue and guidebook, while a general universalising handbook of the British Indian and Colonial Empire was produced by the Royal Commission. Cundall, 1886: 3.

¹⁵⁹ Visual records of the Crystal Palace exclude the labourers involved in its construction and omit the workers' strikes of 1850-51. See Purbrick, 2001. In 1862 many workers were injured and a couple died erecting the Exhibition buildings. See Hoffenberg, 2001: 182.

¹⁶⁰ Taxonomies appeared in many aspects of nineteenth-century society. In 1817 Thomas Rickman's publication *An Attempt to discriminate the Styles of English Architecture from the Conquest to the Reformation* categorised gothic architecture into the styles still loosely adhered to today. Darwin's theories of common descent and natural selection had an enormous influence on biological classification.

¹⁶¹ Edwards, 1996: 38. See also Richards, 1990; Miller, 1995.

¹⁶² Armstrong, 2008: 192.

another, there can be no knowledge, nor, indeed, any perception". ¹⁶³ William Whewell similarly recognised that sharing knowledge was crucial to educational and industrial development. He called for a universal classification scheme (and units of measurement) for the Great Exhibition that created a "settled and common" language amongst the manufacturer, man of science, artisan, and merchant. ¹⁶⁴ This was important in raising the standards of national production to compete in a global marketplace, reminding us of the universal economic aims of the exhibitions.

Like the International Exhibitions, classification schemes were self-consciously revisionary of previous schemes and developed chronologically. 165 Almost all exhibition classification schemes were derivatives of the Great Exhibition's hierarchical system of 1851, which divided exhibits into four categories demonstrating the progressive stages of the manufacturing process: raw materials, machinery, manufactures, and the fine arts, and subdivided them into a total of thirty classes. 166 The shift from materials to processes to products demonstrated the increasing importance of the culture of commodity. 167 Such a scheme confirmed the aims of the International Exhibitions to display the achievements of the world's industry and to encourage the progress of industrial civilisation. At successive exhibitions, classification schemes gradually became more complex, with the addition of new sections and sub-sections to reflect novel technologies and shifts in scientific or philosophical perception, especially concerning the autonomy of individual products and groups of people. By 1900, the comprehensive classification system at the Paris Exposition Universelle consisted of eighteen subject groups subdivided into a further 121 classes and ranked by their importance to mankind, from education and fine arts to colonisation and military objects. This was a remarkable development from the industrial classification system of 1851, and demonstrates the impact of the International Exhibitions on the value and appreciation of art. In addition, and following this Exposition's retrospective theme, each group included a historical exhibit marking the progress made since 1800.

Thomas Richards identified the Victorian fixation with taxonomies as characteristics of an "Imperial Archive"; attempts to unify an empire made of territories through statistical data and

¹⁶³ Yet Mayhew derided the Great Exhibition classification scheme as "puerile". Mayhew, 1861, Vol. III: 452. Cited by Gillooly, 2007: 23.

¹⁶⁴ Whewell, 1852-53: 25.

¹⁶⁵ For a good summary of the development of classification schemes see Gilberti, 2002: 1-27.

¹⁶⁶ Allwood, 1980: 450-51.

¹⁶⁷ Bennett, 1988: 94.

text.¹⁶⁸ Similarly, Steve Edwards has asserted that the Exhibition taxonomies did not only reflect technological production and a hierarchy of labour, but helped create national, political and artistic identities, and demonstrated imperial, racial, national, and political agendas.¹⁶⁹ The national and imperial grouping of exhibits became more pronounced over the period, and led to displays within separate national, private and colonial pavilions (see Chapter 6). The classification of stained glass at these Exhibitions played an important role in shaping public understanding of the medium in this period, and triggered debates over its artistic status. Moreover, exhibition classification schemes have had a significant influence upon our classification and interpretation of the medium today.

Stained Glass Taxonomies, 1851-1900

Official classification schemes at International Exhibitions separated manufactured industrial products and the fine arts. At almost all of the Exhibitions featured in this study, stained glass was classed as a manufacture rather than a fine art (see Appendix 2), although cartoons, designs and maquettes for stained glass were often admitted as part of the fine-art displays. Consequently, the medium was most frequently discussed in articles on materials and industries, rather than in reviews devoted to the 'Fine Arts'. At the Great Exhibition of 1851, stained and painted glass exhibits formed part of the Manufactures section under Class XXIV. 'Glass', and were further sub-divided into 'A. Window glass', and 'B. Painted and Ornamental Window glass', of which stained glass formed a part. Following this format, stained glass was categorised along with general glass manufactures at numerous successive Exhibitions. Those held in New York (1853-54) and Dublin (1853) followed the classification system devised for the Great Exhibition almost exactly. 170 But the first Paris Exposition Universelle (1855) assigned stained glass to Class XVIII, 'Glass and Pottery' (Industries de la céramique et de la verrerie), and thus relocated stained glass within Group 5, manufactures which derived from mineral products and were fired at high temperatures. ¹⁷¹ In addition to these classes (which had grown in number since London's 1851 Exhibition), the French introduced further subsections. Stained glass was submitted in: A. 'Verre à vitres et à glaces' (Window glass and

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¹⁶⁸ See Richards, 1993: 4; Barringer and Flynn, 1998: 11.

¹⁶⁹ "The taxonomy of the exhibitions reveals another, parallel process, one in which the bourgeoisie struggled to know that which they could not know: the order, not of fishes or minerals, but of their society and their power". Edwards, 2001: 38.

¹⁷⁰ For Dublin 1853 see *Dublin University Magazine* (June 1853): 658-62; Sproule, 1854; and Jones, 1854. For New York, 1853, see *The Athenaeum* (August 6, 1853): 944-45; Carstensen, 1854. At both these exhibitions stained glass was classed as a manufacture in the 'Glass' section.

¹⁷¹ The 1855 classification scheme was devised by Frédéric Le Play. See Mainardi, 1987.

mirror glass), and B. 'Objets de céramique et de verrière ayant spécialement une valeur artistique' (Ceramic and glass manufactures, having especially an artistic value). ¹⁷² This highlighted the dual architectural and decorative function of stained glass.

By the time of the London International Exhibition of 1862, many more classes had appeared to incorporate growing branches of industry.¹⁷³ Yet stained glass remained classed as a manufacture in a group devoted to general glassware, Class XXXIV, which was split into subdivisions A. 'Stained Glass and Glass Used in Buildings and Decoration', and B. 'Glass for Household Use and Fancy Purposes'. Stained glass was found under category A, but the three subsections created within this category, seemingly divided by application, demonstrate that classifications could generate multiple categories for the placing of stained and painted glass, depending on one's interpretation of the medium and its intended symbolic or functional use: (i) 'Window glass, including sheet glass, crown glass, and coloured sheet glass', (ii) 'Painted and other kinds of ornamented window glass', and (iii) 'Stained and painted windows for ecclesiastical decoration'. However, as we shall see, the distinction between sacred and secular made in classification schemes, was not always so clear in exhibition displays.

In 1867, at the second Paris Exposition Universelle, stained glass remained classed with general items of glass manufacture such as crystal goblets, cut glass, glazing, and shaped glass covers; glazed, crackled, watermarked, and optical glass; and ornamental objects in Class XVI, 'Cristaux, verrièrre du luxe et vitraux' (Crystals, luxury glass and stained glass). As Édouard Didron lamented, this meant that "one compares them [the stained glass exhibits] to all the other products of glass and crystal, and that, consequently, glass painters are classed among the manufacturers of bottles and jars for vegetables". Class XVI was incorporated within Group III, a section devoted to 'Meubles et autres objets destinés à l'habitation' (Furniture and other articles intended for human habitation). This type of categorisation followed consumerist ideals and function and grouped together all decorative furnishings, without making a distinction between ecclesiastical and secular. It may also explain why several French exhibitors chose to display their ecclesiastical stained glass exhibits in the

¹⁷² Catalogue officiel, 1855: 338-39. Although the majority of stained glass was classed in sub-section B.

The exhibition was originally planned for 1861, but delayed following the Italian War of Independence. Classes for fine arts and music were also added.

¹⁷⁴ See Mainardi, 1987.

¹⁷⁵ "[O]n les [vitraux] assimile à tous les autres produits de verre et de cristal, et que, par consequent, les peintres verriers sont classés parmi les fabricants de bouteilles et de cloches pour les légumes." Didron, 1868: 4.

separate display space of a Catholic chapel rather than with the remaining exhibits from this category (see Chapter 2).

One exception to this developing pattern of classification was the series of London International Exhibitions intended to take place annually throughout the 1870s, but only occurring from 1871 until 1874, when they were discontinued after resulting in large deficits. These exhibitions were International, but not Universal. The exhibition of manufactures varied from year to year, each focussing on a particular group of items, e.g. pottery and porcelain, or cotton and woollen worsted. A special exhibition of glass manufactures, including 'stained glass used in buildings', scheduled for 1878, never took place, yet stained glass was exhibited each year under the 'Fine Art' category in a class devoted to 'paintings of all kinds in oil and water-colours, distemper, wax, or enamel; on glass, porcelain, or mosaics, &c.' Thus at this series of Exhibitions, stained glass was 'officially' classed as a manufacture, but also present as a fine art.

Although these exhibitions were deemed a failure by contemporaries and have been relatively ignored by scholars since, the inclusion of stained glass within the 'Fine Art' category was a significant moment, which influenced the classification of stained glass as a fine art beyond Britain and France. For example, both the Vienna *Weltausstellung* of 1873,¹⁷⁹ and the Philadelphia Centennial of 1876 categorised stained glass as a fine art. The Philadelphia Centennial was also the first exhibition to give stained glass an autonomous class.¹⁸⁰ Class 453, 'Stained Glass', was part of a group of ten classes in the Fine Arts Department devoted to 'Decoration with Ceramic and Vitreous Materials, Mosaics and Inlaid Work', and therefore primarily recognised the role that stained glass, mosaics, *opus sectile* (opaque glass mosaic used for floor decoration and stone memorial tablets),¹⁸¹ and inlay played in architectural decoration. The shared medieval heritage, techniques and formal qualities of stained glass and mosaics may explain why they were often classified together at International Exhibitions. Although many stained glass firms produced both stained glass windows and mosaic decoration, these two media are rarely discussed together by scholars. The fleeting recognition

¹⁷⁶ See Journal of The Royal Society of Arts (1906-1907): 1140-46; Findling and Pelle, 1990.

¹⁷⁷ Each exhibition focussed on a class or small number of classes of manufactured goods, scientific discoveries and works of art, an idea put forward by Henry Cole. In part, this responded to the problems of exhibiting everything in one place at one time. See Wallis, 1871: 21.

¹⁷⁸ Cole, 1878-79: 39.

¹⁷⁹ In Vienna, stained glass appeared in the subsection 'ecclesiastical art'. See Welt-Ausstellung, 1873.

¹⁸⁰ See Gilberti, 2002.

¹⁸¹ See Hadley, 2004.

of stained glass as a 'Fine Art' in Britain and the USA in the 1870s may reflect the increasing regard given to decorative arts by the emerging Arts and Crafts and Aesthetic sensibilities of this period, which attempted to elevate the status of decorative art to that of fine art.¹⁸² However, at later exhibitions in Paris throughout the century, Melbourne in 1880-81 and 1888, Glasgow in 1888, and Chicago in 1893, stained glass remained categorised as a manufacture.

The French classification systems remained fairly consistent throughout this period. Following previous expositions, at both the Paris Expositions of 1878 and 1889, stained glass was included with all industries for which glass was the object or base material, in Class XIX, 'Cristaux, verrerie et vitraux' (Crystal, glassware and stained glass), within Group III, 'Mobilier et accessoires' (Furniture and fixtures). 183 This class included drinking glasses of crystal and cut glass; plated and mounted crystal; table glass; common glass and bottles; window and mirror glass; cast, enamelled, crackled, frosted and tempered glass; glass for optical purposes; ornamental glass; and commercial stained glass. This extensive list demonstrates the wealth of glass products available at the time, but each had a different purpose, aesthetic effect and methods of production. The inclusion of stained glass caused Didron to remark, "it is truly too defective to join together the stained glass with various industries of glass". 184 Yet the Melbourne International Exhibition of 1880 followed this lead. placing stained glass in Group III of the Manufactures section (dedicated to Furniture) in Class 19, 'Crystal, glass and stained glass', of which sub-section 8 was dedicated to 'Painted and stained glass'. 185 The Glasgow International Exhibition of 1888 also classified stained glass as a manufacture, placing it in Class 17, 'Pottery, Crystal Glass and Stained Glass' along with other manufactures subject to firing in a kiln. 186 The second Melbourne exhibition of 1888-89 similarly placed stained glass in the Manufactures, Group IV, Class 26, 'Crystal, glass and stained glass'. 187

At the World's Columbian Exposition, held in Chicago in 1893, the Manufactures section (Department H) included 35 groups, each one with ten or more classes divided into twenty or

¹⁸² See Prettejohn, 1999; Hart, 2010 and Hart, 2011. For more on Aestheticism with regards to stained glass see: Harrison, 1980: 51-63.

¹⁸³ Didron, 1880: 4; Champigneulle, 1890.

¹⁸⁴ "il est véritablement trop défectueux de réunir les vitraux peints aux diverses industries du verre". Didron, 1880: 4.

¹⁸⁵ Melbourne International Exhibition 1880-81. Official Record (1882).

¹⁸⁶ International Exhibition, Glasgow, 1888. The Official Catalogue (1888).

¹⁸⁷ Official Record of the Centennial International Exhibition, Melbourne, 1888-89 (1890).

more smaller classes, some of which were further sub-divided. ¹⁸⁸ Several groups within the Department of Manufactures included stained glass. ¹⁸⁹ Group 95, within the Glass and Ceramics groups, was devoted to 'Stained Glass in Decoration' and sub-divided into several classes in which the majority of stained glass was found in Class 596, 'Civic and domestic stained glass work, panels, windows etc.', and Class 597, 'Ecclesiastical Stained glass work'. ¹⁹⁰ This made a clear distinction between stained glass for religious and secular settings, recognising both as suitable outputs for the medium but also their different functions. In addition, the group 'Stained Glass in Decoration' classified the medium as a decorative art, following the 1876 Philadelphia Centennial. The final exhibition in this study, the Paris Exposition of 1900, continued to label stained glass as a 'manufacture', but, for the first time at an Exhibition held in Europe, stained glass received a full class of its own (this had occurred previously at the Philadelphia Centennial Exhibition of 1876): Class LXVII, 'Vitraux', within Group XII, 'Décoration et mobilier des edifices publics et des habitations' (Decoration and furnishing of public buildings and homes), incorporating both religious and secular glass. ¹⁹¹

Thus, at all the exhibitions featured in this study, stained glass was subject to three philosophical levels of classification; firstly, as a Fine Art or Manufacture; secondly, according to its material structure (glass) and production techniques (kiln-fired); and, thirdly, according to its practical application (e.g., decorative, domestic, ecclesiastical). Apart from the few exceptions outlined above, stained glass was continually classed as a manufacture rather than a fine art, and grouped with other vitreous and ceramic objects of mineral composition that require kiln firing. That said, the International Exhibition taxonomies also show a chronological development towards the acceptance of stained glass as a unique and independent exhibit, as it gained autonomous classification at Philadelphia in 1876, Chicago in 1893 and Paris in 1900. As we shall see, many stained glass artists challenged the classification of stained glass as a manufacture, yet its interpretation as an industrial manufacture had advantages too, particularly in claiming the modern application and significance of the medium.

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¹⁸⁸ Three new categories (or 'departments') were added to those at the preceding Exposition in Paris in 1889: Fisheries, Transportation, and Women.

Within the Fine Arts Categories (Department K), Group 142 was devoted to 'Paintings on Ivory, on Enamel, on Metal, on Porcelain or other wares; Fresco Painting on Walls, & c.' While some painted glass could have conceivably been exhibited in this group, none appears to have been.

¹⁹⁰ See Truman, 1976 (1893); Bolotin and Laing, 1992; Harris, 1993.

¹⁹¹ Exposition Universelle de 1900. Catalogue Général Official, 1900.

¹⁹² It is interesting to note that stained glass is still distinguished in this way at the V&A Museum.

Yet, to complicate matters, and indicative of the diversity of forces involved in organising the exhibitions, stained glass was actually exhibited under multiple categories at individual exhibitions, and judged by Exhibition juries in additional classes. For instance, at the Great Exhibition of 1851, stained glass was classed as a 'glass manufacture', but displayed separately in its own gallery, and the Fine Arts jury awarded medals for stained glass. 193 At the Philadelphia Centennial Exhibition of 1876, stained glass was classed with mosaics in a group devoted to 'Decoration with ceramic and vitreous materials', but judged in the group for 'Plastic and Graphic Art'. 194 These examples draw attention to the "incongruities" and "impossibilities" of nineteenth-century classification systems. 195 We are reminded of Armstrong's comment that an "anxiety of taxonomy is evident throughout Exhibition rhetorics, acknowledging that it could not be a monologic event". ¹⁹⁶ Indeed, these examples demonstrate how multiple taxonomies co-existed for stained glass, suggesting that we might view the medium in relation to a number of different artistic media. Taxonomies reveal the difficulties with pigeonholing stained glass into finite divisions. Stained glass could be construed as both a 'manufacture' and a 'fine art', and official classification systems were not sympathetic to this.

Art versus Industry? The Status of Stained Glass

As a medium produced by divided artistic and industrial labour, stained glass refuted rigid classification schemes based on the progressive stages of the manufacturing process, exposing problems and inconsistencies with Exhibition taxonomies that divided art and industry. Stained glass was not alone in this problem. Alison Yarrington has drawn attention to the fact that nineteenth-century sculpture was similarly "unstable, both distinguished and uneasy in its role as high art and industrial product". The then-recent invention of photography also confounded classification, as Steve Edwards has demonstrated. Bedwards states that, logically, photography ought to have been placed with the manufactures alongside other

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¹⁹³ 'Fine Arts' was a misleading category as paintings were not included in the exhibition, unless they demonstrated a significant innovation in materials or industrial techniques. Other media, such as sculpture suffered from similar distinctions; bronze editions or sculptural works associated with natural history were judged outside of the Fine Arts class. See Yarrington, 2008: 86.

¹⁹⁴ Walker, 1877.

¹⁹⁵ As identified by polymath William Whewell after the Great Exhibition. Whewell, 1852-53: 20.

¹⁹⁶ For taxonomies, see Armstrong, 2008:192.

¹⁹⁷ Yarrington, 2008: 86.

¹⁹⁸ Photography was classified as a 'philosophical instrument' and displayed in the machinery section at the 1851 Exhibition. In 1862 it was classified as Machinery. Several complaints were made to the Commissioners insisting that photography was an art. Some photographers boycotted the Exhibition in response to the Commissioners' decision. Edwards, 1996: 39-40.

products of mechanical labour.¹⁹⁹ As this would have still omitted photography from inclusion within the fine arts, the suggestion appears to undermine his argument. However, the division of labour and the use of industrial and chemical techniques employed in making stained glass, sculpture, and photography certainly made classification more difficult.

In his capacity as Jury Reporter for the Paris Exposition of 1867, French glassmaker George Bontemps conceded: "it is quite difficult, in effect, to draw a rigorous line between those productions in the realm of art and those which belong to industry". Furthermore, how did one make this distinction? One of the ways this was differentiated was through studio practice. A paper read to the Oxford Architectural Society on 11 March 1858 by gothic revival architect Charles Buckeridge, entitled 'The Production of Modern Stained Glass Windows' (of which an extract was printed in *The Ecclesiologist*), addressed the main issues:

[W]ith a few exceptions, our stained glass windows are turned out of establishments the owners of which have no more artistic skill than a linendraper; these men turn art into a trade, and deal with it in much the same spirit as a greengrocer deals in vegetables. 'Is the production of stained glass windows an art or a manufacture?' Some call it one, some the other, and others split the difference and call it an 'art-manufacture,' – a very ambiguous term this, which generally means that manufacture has more to do with it than art.²⁰¹

Buckeridge recognised that stained glass was commonly perceived and treated as a manufacture, despite its artistic characteristics. He disliked the increasingly blurred boundary between art and trade.

Ten years later, Bontemps declared that if we must distinguish between industrial art and fine art, then a work of art must be executed by the artist's hand. But, in the nineteenth century, there were many people involved in the production of a stained glass window, including the chemist, glassblower, designer, cartoonist, glass cutter, glass painter, workman responsible for firing the glass, and the glazier to lead the pieces of glass together to form the window. The language used by nineteenth-century critics to describe these workers demonstrates an awareness of this divided labour, the related problem of artistic attribution, and the importance

²⁰⁰ "Il est assez difficile, en effet, de tracer une limite rigoureuse entre les productions qui sont du domaine de l'art et celles qui appartiennent à l'industrie". Bontemps and Boeswillwald, 1868: 88.
²⁰¹ *The Ecclesiologist*, 1858: 119.

¹⁹⁹ Edwards, 1996: 42.

²⁰² Bontemps and Boeswillwald, 1868: 88. He inferred that a stained glass cartoon, designed by an 'artist', was a work of art, but a stained glass window, produced by a small team of skilled glaziers, was an industrial production.

of the workshop processes involved in producing a stained glass window as well its artistic design. An anonymous writer for *The Illustrated Exhibitor* of the 1851 Great Exhibition noted, "great as is the difference between a first sketch and a finished painting, or between the clay and the marble, it is still more difficult to pronounce how a very showy cartoon will turn out in actual execution in glass". The role of the industrial glazier was acknowledged in *Cassell's Illustrated Exhibitor* for the London International Exhibition of 1862, when the author, in all seriousness, referred to the glazier as an "artistic plumber"! According to Didron, the division of labour and collaborative production of stained glass was the main reason for its classification as a manufacture at the Exhibitions. In his report on stained glass at the Paris Exposition of 1867, he declared:

The administration also refuses the quality of these products as works of art which seem to them to fall in the domain of industry. Why? The cause is quite simple, in appearance at least; that the stained glass window does not leave, complete from head to toe, the hands of the artist, and that it should enlist the services of collaborators, each with a speciality.²⁰⁶

Didron uses birth as a metaphor for artistic production here, and the figurative character of sculpture, moulded by the sculptor's hands, was a widespread ideal in the fine art world. Yet very few nineteenth-century stained glass windows were the productions of a single hand.

In the mid-Victorian period, Henry Cole and a number of his peers advocated the use of trained artists to design manufactured objects. This was an important moment in the history of modern design, which had two effects: first, improving the standard of Britain's manufactures. Second, it helped to raise the status of the decorative arts. As Winston had acknowledged in his influential 1847 publication *An Inquiry into the Difference of Style Observable in Ancient Glass Paintings*, "if therefore we are anxious to cultivate glass-painting as an art, we must encourage artists to practise it, by ceasing to countenance those mere artisans who at present make it their trade, and confine it to the lowest degradation". ²⁰⁷ Prior to the International

²⁰⁷ Winston, 1847: 283.

²⁰³ Even in the late-eighteenth century Pierre Le Vieil, called us to "examine what we call the art of the glazier" ["examinons ce qu'on peut appeler l'art du vitrier"]. Le Vieil, 1774: 199; Pillet, 2010: 21.
²⁰⁴ Cassell, 1851: 380.

²⁰⁵ "[B]esides the artist to make the original design upon paper, there must be the artist-workman to transfer it to glass, the chemist to nicely calculate the various proportion of the several colours, the careful workman to 'fire' or fix the colours on the glass, and the artistic plumber to place the several pieces together". Cassell, 1862: 31. ²⁰⁶ "L'administration refuse également la qualité d'oeuvres d'art à ces produits qui lui semblent tomber dans le domaine de l'industrie. Pourquoi? La cause en est bien simple, en apparence du moins: c'est que le vitrail ne sort pas, achevé de pied en cap, des mains de l'artiste, et que celui-ci doit s'adjoindre des collaborateurs ayant chacun une spécialité." Didron, 1868: 3-4.

Exhibitions, several glass painters had attempted to raise the status of stained glass by association with fine art. James Ballantine intended "to show that Glass Painting is a medium of expression worthy of the energies of genius". William Warrington believed that stained glass was "the highest department of decorative Art" and demonstrated the capabilities of nineteenth-century stained glass by accompanying his folio publication, dedicated to Queen Victoria, with chromolithographs of his own stained glass designs. In doing so he made use of the recent invention of chromolithography, which played a key role in the dissemination and documentation of stained glass.

As Francis William Oliphant declared in 1855, "the artist in glass requires the natural gift, the cultivated faculty, just as much as any other". 211 Yet, as far as artistic training went, international stained glass artists represented a diversity of experience. The majority of nineteenth-century stained glass artists in continental Europe were trained in fine art academies and studios. Prosper Lafave began his career as a painter. ²¹² Claudius Lavergne, Gaspard Gsell and Pierre-Eugène Guérithault were all pupils of Jean-Auguste-Dominique Ingres; Eugène-Stanislas Oudinot and Émile Hirsch were pupils of Eugène Delacroix; Paul Nicod and Léon Ottin studied under Paul Delaroche; Julien-Léopold Lobin under Charles de Steuben; Henri Carot under Jean-François Millet; Charles-Laurent Maréchal was a pupil of Jean-Baptiste Regnault. 213 Luc-Olivier Merson, author of Les Vitraux (Paris, 1895) was a student of Isidore Pils and a respected Academician who had won the Grand Prix de Rome in 1869.²¹⁴ Giuseppe Bertini received a fine-art education at the Brera Academy in Milan.²¹⁵ Belgian Jean-Baptiste Capronnier was the son of a painter for the Sèvres porcelain manufactory and took up his father's work. 216 German stained glass artists Joseph Gabriel Mayer and his son-in-law Franz Zayer Zettler (of Munich firms Mayer & Co. and F.X. Zettler) were academically trained. For many of these men, stained glass was a form of monumental painting, and painting was the most prestigious medium in the Academy.

²⁰⁸ Ballantine, 1845: 3.

²⁰⁹ Warrington, 1848: preface. Harrison, 1980: 22.

²¹⁰ For further discussion of chromolithography see Chapter 4.

²¹¹ Oliphant, 1855: 26.

²¹² See Pillet, 2010.

²¹³ See Luneau, 1999: 71.

²¹⁴ Merson had a long standing relationship with the École des Beaux-Arts, becoming Professor there in 1906, and designed stained glass for several glass painters including Oudinot, Gaudin, and Champigneulle.

²¹⁵ For Bertini see Malfatti, 1991-93; Brivio, 2000: 28.

²¹⁶ The Sèvres workshop, active 1828-54, used Devéria, Ingres and Delacroix as designers. Similarly, the Königliche Glasmalereianstalt studio at Munich was founded in 1827 as a department of the Royal Porcelain Manufactory. See Rush, 2001.

In England and Scotland, however, the establishment of Schools of Design and Mechanics Institutes provided new teaching methods and training to decorative artists, complementing those of the traditional Royal Academy. This may explain the more varied backgrounds of British stained glass artists. A few were fine-art trained, but the majority of individuals running glass studios came from a family of glaziers, or received training in the office of notable architects. Those who received formal artistic training were commonly heraldic painters, like Michael O'Connor, Thomas Willement and Warrington. James Ballantine studied draughtsmanship at the Trustees' Academy in Edinburgh, and was a trained house decorator and painter of theatrical scenery. In contrast, William Wailes was a self-made man, a former tea dealer and grocer who rose from tradesman to stained glass artist. His background, exemplary of Victorian social mobility and the emerging middle class, reminds us of Buckeridge's comparison of the stained glass manufacturer to a greengrocer. In the case of Wailes, stained glass windows were not always worlds apart from the glass vegetable jars with which they were classified.

John Richard Clayton (of London-based stained glass firm Clayton & Bell) presented a different calibre of stained glass artist; he initially trained as a sculptor at the Royal Academy and was later apprenticed to architects.²¹⁹ Waters has argued that Clayton, who was well acquainted with the young Pre-Raphaelite painters, a progressive group disillusioned with the RA, "became the anchor upon which the new design movement in stained glass was founded".²²⁰ As we have seen, many Pre-Raphaelite painters turned their hands to stained glass design, including Burne-Jones, Rossetti, Madox-Brown, and Simeon Solomon,²²¹ but historians have only just begun to readdress the interrelationship between stained glass and contemporary canvas painting.²²²

Stained glass firms also deliberately associated themselves with practising artists, in an attempt to raise their status. As Cox & Sons' 1870 *Illustrated Catalogue of Designs for Stained Glass Windows for Churches and Domestic Use* advertised, "[t]he cartoons for such a [figure] window are prepared by an Artist who has devoted his life to the study of this branch

²¹⁷ Nicholson, 2004.

²¹⁸ For Wailes, see Torbet, 2003. Cheshire attributes Wailes' success partly to his affordable prices. Cheshire, 2004: 40-41.

²¹⁹ Harrison, 1980: 30.

²²⁰ Waters, 2012: 22.

²²¹ Sewter, 1974.

²²² Waters states his own publication is "an attempt to present stained glass as a fine art". Waters, 2012: 11.

of Art, and has spent many years on the Continent, studying the works of the old masters". American stained glass designers similarly promoted their work by claiming their association with more established English and Continental masters. For example, Arthur Fitzpatrick of Staten Island advertised his training with Pugin; and Alphonse Frederick Bros. of Brooklyn were championed as pupils of successful French glass-painter Maréchal. 224

Despite the fact that many trained and respected artists willingly turned their attention to the production of stained glass in the nineteenth century, snobbery towards the applied and decorative arts remained. There was a prevailing sense that painting on canvas was a more prestigious art, in terms of status and financial income. As architect William Burges explained, "a young painter does not sell his pictures, and is willing to work, say for a stained-glass manufacturer, at the rate of a guinea-a-day", yet as soon as he becomes successful, he "turns his nose up at cartoons or wall-painting, and paints nothing else but easel pictures". 225 As Gambier Parry stated in his review of stained glass at the 1867 Exposition, "there is plenty of room for genius of the highest order in this art [...]. Donatello, Ghiberti, Perino del Vaga, and Perugino designed for glass. Those giants were not too big for such an art". ²²⁶ The article went on to remind readers of the different languages of canvas and glass, stating that the "beautiful art of glass-painting is often misconceived both by artists and by the public [...]. A man cannot draw too well for it, nor think too poetically; only let him remember into what he has to translate his thoughts – glass, lead, and light". 227 Nonetheless, a number of nineteenth-century stained glass windows took their subjects directly from canvas paintings by Joshua Reynolds, Frederick Leighton and William Holman Hunt.²²⁸

The stained glass studio is a useful venue from which to reconsider the role of the 'artist' and artistic labour in nineteenth-century industrial society. 229 Stained glass studios varied in size,

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²²³ Farnsworth, 1997: 18.

²²⁴ Farnsworth, 1997: 18.

Burges, 1865: 11. Such attitudes remained at the end of the century. When La Farge was invited to a one-man show at the Paris Salon in 1894, Puvis de Chavannes intended to exalt his contribution to American stained glass, but La Farge wanted recognition in Paris as a painter. Yarnall, 2012: 205-206.

²²⁶ Gambier Parry, 1867: 275.

²²⁷ Gambier Parry, 1867: 275.

Reproductions of Holman Hunt's painting *The Light of the World* (1851-53) in stained glass are to be found across the world. The painting's popularity continued into the twentieth century after a second version (1900-1904) toured the British colonies. Frederick Leighton's painting *Wedded* was purchased by the Art Gallery of New South Wales (NSW) in 1882 and subsequently translated into stained glass for Sydney residences. Examples survive at Mandama, Croydon Park, 1899 by Goodlet & Smith. Sherry, 1991: 44.

²²⁹ See Ruskin, 1851-53; Barringer, 2005.

and had diverse clientele. 230 Like other nineteenth-century arts, especially sculpture, stained glass windows were, to an extent, mass-produced; designs were replicated and cartoons were commonly reused with little variation. In an article on stained glass design published in the Art Journal in 1887, decorative artist and stained glass designer Lewis Foreman Day commented that the "translation of the artist's design by another and almost inevitably lesser artist, must be to the detriment of Art, if to the profit of the manufacturer". 231 Thus the mechanical workman, employed to work from stock cartoons or catalogues of another's designs, was set up in opposition to the independent artist-designer. In the same article, Day went on to say that, "it is a pity only that manufacture cannot in the nature of things rise to the highest level of Art"; ²³² a statement directly related to nineteenth-century ideas and ideals of labour and commerce. Although unrepresentative of the complex and varied roles and production methods of stained glass, this binary position sparked a prolonged debate over the status of stained glass, inciting responses and innovative practical solutions from critics, architects, and stained glass artists throughout the nineteenth century.

French Artists' Taxonomies

During the Paris Expositions Universelles, French artists engaged with and constructed taxonomies for themselves, explicitly and inexplicitly, by participating in key discussions over the symbolic and literal placing of stained glass at these Expositions.²³³ Their more active participation in these debates may be explained by the fact that French Expositions were centrally organised, state-sponsored events rather than private ventures. From the first French Exposition Universelle in 1855, the decision to include stained glass in the Palais de l'Industrie, rather than the Palais des Beaux-Arts, 234 caused French glass-painter Alfred Gérente to write to the Commissioner-General of the Exposition des Beaux-Arts on 15 March 1855:

I was very surprised when your employees, having the role of receiving the goods of artists, declared to me that the stained glass windows could not be

²³⁰ Most stained glass studios had 10-30 employees, although larger studios such as Maréchal and Champigneulle employed 100-125 people. See Hardouin-Fugier, 1990: 211. ²³¹ Day, 1887: 194.

²³² Day, 1887: 193.

²³³ See Luneau. 2012.

²³⁴ The construction of the Palais des Beaux-Arts affirmed France's role in promoting the Fine Arts, after the Great Exhibition had only admitted paintings which exhibited scientific developments.

regarded as works of art and were to be exhibited at the Palace of Industry.²³⁵

Despite the agreement of committee-member and architect Jean-Baptiste Lassus, who wrote in the margins of this letter that "painting on glass should not be relegated to the exhibition of the industrial products", ²³⁶ Gérente received a reply from the Commissioner-General two weeks later asking him to come to the Palais des Beaux-Arts to withdraw his case of stained glass.²³⁷ Across the Channel, this decision was also contested. A writer for *The Ecclesiologist*, Journal of the Cambridge Camden Society (founded in 1839 and known as The Ecclesiological Society from 1845), asked "why are the painted windows in the industrial department?" ²³⁸

From the outset, stained glass exhibitors found ways of defying classification schemes and elevating the status of the medium through their own displays. Although the display of stained glass windows at the Paris Exposition Universelle of 1855 was restricted to the Palais de l'Industrie, in the Palais des Beaux-Arts cartoons for stained glass were framed and hung amongst grand history paintings.²³⁹ A photograph from a souvenir album of the Beaux-Arts displays, taken in the room devoted to the works of Ingres in the Galerie Française, shows three cartoons for stained glass which Frank Trapp has identified as St Louis, St Helen, and St Henry II, for the Chapel of Saint Ferdinand, Neuilly (Figs. 1.1 and 1.2). 240 Alongside fortythree paintings. Ingres exhibited twenty-five cartoons for the Chapel at Neuilly and some for the Royal Chapel at Dreux, both prestigious buildings with royal connections.²⁴¹ Ingres, who had worked for and been honoured by every French regime of the nineteenth century, selected and arranged the pictures himself.²⁴²

The incorporation of Ingres' stained glass cartoons in the Palais des Beaux-Arts provided an unexpected meeting of neo-classicism and neo-gothicism in the mid-1850s, and acknowledged

²³⁵ "[J]'ai été fort surprise lorsque vos employés, ayant pour mission de recevoir les depots des artistes, m'ont declare que les vitraux ne pouvaient être considérés comme œuvres d'art et devaient être exposés au palais de l'Industrie". Quoted in Pillet, 2007: 53.

²³⁶ "la peinture sur verre ne doit pas être reléguée à l'exposition des produits industriels". Quoted in Pillet, 2007:

<sup>54.
&</sup>lt;sup>237</sup> Letter dated 29 March 1855. Quoted in Pillet, 2007: 53.

²³⁸ The Ecclesiologist (October 1855): 265-66.

²³⁹ Amongst these was a coloured drawing of a window executed by Gérente for the Chapel of St Theodore, Amiens Cathedral, and a design for a window commemorating the apostolic mission in Gaul for the Synodal Hall in the Archiepiscopal Palace at Tours designed by M. Halley, a pupil of Overbeck, and manufactured at Sèvres. Some chromolithographs of ancient stained glass were also exhibited by Emile Beau. The Ecclesiologist (October 1855): 288-90.

²⁴⁰ The Ecclesiologist (October 1855): 291: Trapp. 1965: 305.

These cartoons are now in the Louvre Collection. See Mainardi, 1987: 51, n. 8; Foucart, 2002.

²⁴² Mainardi, 1987: 51, n. 8.

the complex relationship between the 'higher' arts of painting and the 'subordinate' applied decorative and architectural art of stained glass. Such displays reflected an artistic and aristocratic hierarchy which valued painting on opaque surfaces, such as canvas, more highly than painting on translucent surfaces, like glass. Ingres' figure designs were later adapted by gothic revival architect Viollet-le-Duc, and were finally transformed into stained glass by the manufactory at Sèvres.²⁴³ In these surroundings, the design of stained glass was elevated to an art of utmost importance through its association with the most senior artist in the French Academy and the most influential French architect of the gothic revival. Although an allusion was made to the French Royal Manufactory, artistic design was celebrated above industrial manufacture in the Palais de Beaux-Arts.

French glass-painters also frequently exhibited windows adjacent to their original designs in an attempt to align the stained glass window with fine art. For instance, in 1893 Félix Gaudin exhibited some of his completed windows alongside the original designs by artist-designers Éugene Grasset, Merson and Émile Delalande in the Fine Arts section of the World's Columbian Exposition at Chicago.²⁴⁴ At the 1900 Paris Exposition, one of Henri Carot's windows intended for the Hôtel de Ville, Paris, was displayed next to Albert Besnard's full-scale cartoon.²⁴⁵ Léon Daumont-Tournel, Parisian glass-painter and author of the jury report, embraced this collaborative display. He wrote:

The artist did not fear that the glassmaker could betray his work. Comparative examination of the cartoon and the stained glass was of great interest: there was the feeling that a collaboration like this was fertile, that each brought his share of talent to the shared work.²⁴⁶

Thus, in such a combined display, the work of designer and glass manufacturer could be recognised equally.

²⁴³ For Viollet-le-Duc and Sèvres, see Blondel, 1980; Perrot, 1980.

²⁴⁴ Luneau, 2006: 182.

²⁴⁵ This window was entitled *Au Buffet*, and was one of two windows executed in 1891 which Carot refused to give to the Town Hall. Two later windows remain in the town hall however; one of which, *Le Mail* (1895), was also designed by Besnard for the bar. See David, 2004: 38-47; De Finance and Hervier, 2003: 298; De Finance and Stahl, 2009: n.14.

²⁴⁶ "L'artiste n'avait pas craint que le verrier pût trahir son oeuvre. L'examen comparatif du carton et du vitrail présentait un grand intérêt: on avait le sentiment que la collaboration ainsi entendue était féconde, que chacun apportait sa part de talent à l'oeuvre commune." Daumont-Tournel, 1902: 56.

Counter-Classifications: Conflicts and Cartographies

Although exhibition classification schemes sought to structure the organisation of exhibits, they were continually disrupted and redefined by plans based on geographical, national, racial, or imperial groupings (as demonstrated in Chapters 2 and 6), as well as practical display requirements and the availability of space. It was a given that visitors to Exhibitions should be able to cross-reference types of exhibit with their country of origin, a matter which made for varied displays, both thematically (according to material and products) and geographically (according to exhibiting country). The arrangement of exhibits inside the exhibition buildings rarely adhered to the classification schemes adopted.

At the Great Exhibition, foreign exhibits were placed in the eastern end of the Crystal Palace and their arrangement was left to individual foreign commissions, whilst British exhibits assumed the western part and displays were divided into their classification groups. ²⁴⁷ This inconsistency between classification and display, also apparent in the Official Catalogues, led one contemporary journal to recall that the Exhibition had a "territorial character", ²⁴⁸ as the north and south transepts acted as an equator dividing Britain from the rest of the world. ²⁴⁹ Similar pressures were at work elsewhere. A guide to the Melbourne Centennial Exhibition of 1880-81 lamented the fact the courts were not classified into groups in line with the classification scheme and remarked, "on what principle the spaces have been allotted, unless, indeed, it were Yankee Grab, it would be difficult to divine, but the result is heterogeneosity, if one may be allowed the term". ²⁵⁰

The troubled relationship between classification systems and arrangement within an International Exhibition was an important issue for Exhibition organisers and participants. American geologist William Phipps Blake, who designed the classification system for the Philadelphia Centennial Exhibition of 1876,²⁵¹ persuaded the Centennial Commission to adopt a dual system loosely relating classification and arrangement:

A classification presupposes some arrangement or placing of objects in accordance with it; but, though connected, classification and arrangement are

²⁴⁷ Such a display has been interpreted as a statement of British superiority. See Buzard, 2007.

The Ecclesiologist (October 1855): 265. The Official Catalogue only listed British exhibits by classification; the products of foreign territories were not arranged in a particularly logical manner.

²⁴⁹ Ffrench, 1950: 213.

²⁵⁰ Whitworth, 1880: 25.

²⁵¹ The classification system divided everything into seven main departments, and appears to have been the basis for the Dewey Decimal Classification System. See Gilberti, 2002. See Allwood, 1980: 454.

not necessarily one, objects may or may not be placed in the order or relations established by classification.²⁵²

Yet writing after the exhibition, Henry Pettit, engineer and architect of the Main Exhibition Building, commented:

[G]enerally the visiting public have no need for a system of classification, except as it is embodied in the arrangement, and this fact should establish the rule that a system of "classification" for exhibits and "arrangement" for exhibits should be considered as practically one and the same thing.²⁵³

Perhaps the most innovative attitude towards dual classification and arrangement took place at the Paris Exposition Universelle of 1867. The main Palais, designed by French engineer, sociologist, economist, and General-Commissioner Frédéric Le Play, was a giant elliptical building with a central garden and a series of concentric bands; each band housed a different category of exhibits, moving hierarchically from Fine Arts at the centre to Machinery on the periphery (Fig. 1.3). Four main avenues and twelve smaller ones intersected the bands by radiating from the centre, dividing the space into national sectors.²⁵⁴ English journalist Augustus Sala recalled:

It was perfectly easy both to get into and out of the place, and nobody could lose his [sic] way. The radiating streets which converged to the interior gardens, and the great raised platform which ran right round to the machine galleries, were all original ideas, ingenious in conception, and skilfully worked out.²⁵⁵

Le Play's innovative elliptical exhibition building created a spatial articulation of the classification system and a new viewing environment, spectacularly different to the rectangular-plan buildings of previous exhibitions. As reporter for *Fraser's Magazine*, C.R. Weld observed, the chair-tax and the absence of a promenade meant that there was "certainly no inducement to lounge indolently through the building, and you are thus forced, so to speak, to examine the objects around you".²⁵⁶

²⁵² Quoted in Gilberti, 2002: 87.

²⁵³ Quoted in Gilberti, 2002: 87.

²⁵⁴ This design was loosely based on a plan designed by Edward Payne for the Exhibition Building of 1862, which followed a system of classification by George Maw, although it was a late submission. See *The Builder* (February 16, 1861): 108.

²⁵⁵ Sala, 1895, Vol. 2: 107.

²⁵⁶ Weld, 1867: 408. M. Bernard was responsible for supplying chairs; he paid the Commission six francs for every chair he brought into the Exhibition, and by collecting money from everyone who sits down, reimbursed himself.

The display had a dual purpose, to enable visitors to see the products of a single nation (by sector), and the international exhibits of a single category (by concentric band). Furthermore, the placing of certain nations adjacent to one another, particularly England and France, Belgium and Germany, enabled visitors to view products in relation to their direct international competitors. In theory it was a masterful plan, but not every nation could supply exhibits in all categories, leaving some spaces overcrowded with objects, and gaps in others. For example, only twelve countries contributed stained glass, and its particular requirements of display meant that it was not to be found amongst the glass products in the allocated concentric band, but scattered around the Palais and its periphery buildings in the park.

In defiance of predicated classification schemes and display space, many French exhibitors erected private pavilions or chapels in which to show their stained glass exhibits. One of the most innovative examples of such a display, as we shall see in the following chapter, was the full-sized, neo-gothic chapel erected in the Park at the 1867 Paris Exposition by Charles Lévêque, a glass-painter from Beauvais (Fig. 1.4). In 1876, meanwhile, Didron, a member of the Committee of Admission and Installation for Class XIX of the 1878 Paris Exposition, requested a special gallery for stained glass with well-lit bays of a sufficient size in a wing of the Palais on the Champ de Mars for the forthcoming exposition. In order to level the competition between glass painters, Didron proposed that no exhibitor should be allowed to erect their own pavilion, a practice that had become popular at the previous 1867 Exposition.

Although the Committee agreed to Didron's proposal, on the principle that the glass painters paid for the construction, the project was abandoned in 1877. Some dissatisfied glass painters refused to exhibit and, as a result, reformed the Corporation des artistes peintres-verriers de France.²⁶¹ The Corporation sent a petition to the Ministère de l'Agriculture, Commerce et d'Industrie requesting that stained glass be placed with the fine arts, but by this time it was too late as the Exhibition classification and rules had already been published.²⁶² Consequently, many glass painters abstained from exhibiting in 1878. Others erected private pavilions to ensure their exhibits would be seen in good conditions (see Chapter 2).

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²⁵⁷ Wallis, 1871: 18.

²⁵⁸ Gambier Parry, 1867: 275. See also, Chapter 2.

²⁵⁹ The glass painter's role in the organisation of these events, is also discussed in Chapter 4.

²⁶⁰ See Hardouin-Fugier, 1990 and Luneau, 2006: 79-80.

²⁶¹ Although the Corporation had existed from 1867, in 1877 a new corporation was formed. See L.G., 1877: 82; Luneau, 2006: 82-87; Luneau, 2012: 249-51.

²⁶² Luneau, 2006: 80, n.202.

At the following Paris Exposition in 1889, glass painters remained exasperated at the poor classification and provision for the display of stained glass. In his jury report, Charles Champigneulle exclaimed that "[f]our decennial expositions have already passed and the error of the first day remains. It is time that this ceases at last, and that one renders stained glass its true place!" The disregard of the special exhibition requirements of stained glass had taken its toll on the glass painters, as Léon Appert reported, "[t]he glass painters seem to be more and more uninterested in exhibitions where their works are generally placed in bad conditions of lighting, elevation, and above all classification". Champigneulle called for the General-Commissioner to ensure stained glass would have a unique class of its own, an allocated building and individual jury at the following exposition in 1900, a request that was finally granted after fifty years. However, at this turn-of-the-century exposition, stained glass remained categorised as a sub-group of the manufactures rather than as a fine art. Elsewhere, stained glass artists appear to have been less influential. American innovator Louis Comfort Tiffany's request for a special gallery devoted to the American stained glass exhibits at the World's Columbian Exposition in Chicago, 1893, was denied.

To add further complexity, Official Catalogues, which documented the Exhibitions by listing the exhibits of every participating nation, provided alternate taxonomies. In 1855, the *Official Catalogue* for the Paris Exposition Universelle rearranged the classification system in order to make it more legible. The *Art Journal* reported:

The classification adopted on paper has resulted in a most glorious defiance of almost everything like classification in the actual arrangements. Not content with a *single* intelligible principle, its authors adopted *two*. In one, objects are classified according to use, in the other according to the nature of the material, or mode of manufacture.²⁶⁷

Furthermore, the actual arrangement of objects in the 1855 Palais de l'Industrie was, according to *The Ecclesiologist*'s reporter, entirely unsatisfactory. He lamented the fact that a "very beautiful paper plan" had not been carried out:

²⁶³ "Quatre Expositions décennales sont déjà passés et l'erreur du premier jour subsiste. Il est temps qu'elle cesse enfin, et qu'on rende au vitrail sa vraie place!" Champigneulle, 1891: 182.

²⁶⁴ "Les peintres verriers semblent se désintéresser de plus en plus des expositions où leurs œuvres sont placés généralement dans de mauvaises conditions d'éclairage, d'élévation et surtout de classification". Appert and Henrivaux, 1890: 372.

²⁶⁵ Champigneulle, 1891: 175, 183. See also, Luneau, 2012: 254.

²⁶⁶ Tiffany wrote: "you will look in vain in the great 'White City' on the shores of Lake Michigan for a department in the Exposition devoted exclusively to exhibiting the results of the development in this particular art". Quoted in Garfinkle, 1996: 105.

²⁶⁷ Wallis, 1855: ii.

The material arrangement is vicious in the extreme. It affects scientific classification and fails in it, rather more egregiously than did the Hyde Park Exhibition [...]. The arrangement is neither topographical nor scientific, but unhappily combines the vices of both.²⁶⁸

Classification systems certainly generated discussion, not only around general themes of labour and taste, but around the exhibits themselves. Andrew Miller has observed how commentaries "collapsed these official categories and, in their writing, implicitly constructed a range of new relations between the manifold objects on display". These new relations and new readings provide us with alternative ways in which to approach displays of stained glass at the Exhibitions. They also challenge Bennett's Exhibitionary Complex and Foucauldian museological perceptions of the Exhibition environment by highlighting the role of exhibition journalism in reordering and re-orientating visitors.

Conclusion: A Multitude of Displays

Stained glass is a medium dependent upon both artistic design and skilled execution and thus it exposed the futility of official exhibition classifications based on the binary division of manufactured products and the fine arts. Many exhibitors protested against its continual classification as a manufacture, and some French and American exhibitors went a step further in raising the medium's status by forming their own separate displays. Stained glass was caught between art and commerce, as well as between art and industry. As Champigneulle stated in his report of the 1889 Exposition: "art disavows it [stained glass] and returns it to the trade as his work; the trade pushes it back and treats it, with distinguished honour, as a work of art". ²⁷⁰ The division of labour involved in the production of stained glass further complicated its status. ²⁷¹ The exhibitions highlighted the hybridity of nineteenth-century artistic and industrial studio practice. Despite recognition by Exhibition critics that a stained glass artist "must be a good glass manufacturer, and a skilful designer", ²⁷² exhibition catalogues often left anonymous the glass painter, cutter, glazier and other individuals involved in making a stained glass window. Most stained glass panels were exhibited and catalogued under a company

²⁶⁸ The Ecclesiologist (October 1855): 265.

²⁶⁹ Miller, 1995: 52.

²⁷⁰ "L'art le renie et le renvoie au commerce comme son oeuvre; le commerce, lui, le repousse et le traite, honneur insigne, d'oeuvre d'art". Champigneulle, 1891: 182.

²⁷¹ For Henry Holiday and William Morris' reactions to the division of labour under the force of Capitalism, see Holiday, 1896: 110-11; Pearson, 1981: 11.

²⁷² Dickinson's, 1852, Vol. II: Text accompanying Plate XIII.

name, for example Hardman & Co., or Powell & Sons, thus associating the medium with commercial businesses rather than 'artists'.

This chapter has assessed the ways in which stained glass was categorised and ordered at the Exhibitions, but very little has been said about visitors' experiences and modes of viewing the medium within these complex environments. Of course, mass audiences attended the Exhibitions from all around the world. There is no such thing as the generic 'visitor' and it is impossible to surmise a singular experience or to make generalisations about spectators' observational habits, although we can read about individual reactions to the displays through visitors books, diary entries and other personal accounts.²⁷³ The following chapter considers the various ways in which visitors might have encountered the medium in these unique exhibitionary displays. Not only was it difficult to find one's way around these Exhibitions, but it was also impossible for visitors to grasp the display *en masse*.²⁷⁴ As one record of the 1862 Exhibition commented, the scale of the Exhibition "renders it almost, if not utterly impossible for any individual, however laborious, to acquire a thorough and comprehensive insight into its collective details".²⁷⁵

The multitude of displays at the International Exhibitions meant that most visitors probably only saw a small proportion of the items on display, and it is impossible to ascertain which sections. Yet certain stained glass exhibits, placed in prominent positions within Exhibition buildings, would have certainly attracted notice. The following chapter maps the displays of stained glass, geographically and chronologically, and explores how they affected the interpretation of the medium in terms of both classification and experience. It examines the practical responses to the problems of displaying stained glass in such settings, the opportunities presented by individual exhibition spaces and buildings, and the different modes of viewing stained glass in these environments, particularly in relation to concepts of the individual and collective exhibit, to national and international, to ecclesiastical and secular, and to part and whole.

²⁷³As demonstrated by Barth, 2008; Nichols, 2009. The Visitors Book for the 1880-81 Melbourne Exhibition records visitor's comments from metropolises and provincial towns across Australia, as well as India, England, France, Germany, and North America. Many of these had attended other International Exhibitions and compared them to one another; one comment in the Melbourne Visitors Book, records "Better than Paris". See Hoffenberg, 2001: 251.

²⁷⁴ See especially, Dickens, (July 5, 1851): 357. Wynne, 2001: 228-29.

²⁷⁵ Views of the International Exhibition: The Interior, 1862: 1-2.

CHAPTER 2

MAPPING STAINED GLASS AT THE INTERNATIONAL **EXHIBITIONS**

Introduction

In short, painted glass is the one art treated with indifference - its specimens are put about anywhere, without classification and without regard to its place or distance.²⁷⁶

The eclectic modes of exhibiting stained glass, and its dispersal across official exhibition buildings and unofficial private pavilions, were perhaps the strongest and most powerful way in which the medium refuted its classification, transgressing spatial as well as national, geographical, political, cultural, and stylistic boundaries. This chapter outlines, chronologically, the principal displays of stained glass at the International Exhibitions between 1851 and 1900, and considers the various ways in which viewers might have encountered stained glass in these contexts. It focuses on the overall character of the displays, rather than a close-reading of the individual exhibits, which feature more prominently in later chapters, in order to demonstrate how exhibitors and exhibition organisers met the challenges of exhibiting stained glass in these new settings and contexts. Many stained glass exhibits were arranged in galleries and courts in a manner not dissimilar to paintings, yet with natural lighting from behind. Some were exhibited like sculptures as freestanding exhibits, while others were treated architecturally and installed into more conventional wall openings within exhibition buildings and inside separate pavilions. 277 As well as responding to the particular display requirements of stained glass, the varying types of display demonstrate an anxiety and uncertainty over the status of the medium, while revealing its modern potential and function as a monumental architectural and decorative art.

What Kate Hill has described as "techniques of display": the lighting, density of objects exhibited, presentation of textual material (if any), the type of case/frame used, and the routes one was expected to navigate around an exhibition, play an important part in my mapping of

 ²⁷⁶ Gambier Parry, 1867: 265.
 ²⁷⁷ The stained glass windows in some of the national and colonial pavilions are discussed in Chapter 6.

stained glass at the Exhibitions.²⁷⁸ These techniques organised information and aimed to create an attractive, educational and commercial display to entice and sustain visitors' attention. Furthermore, stained glass exhibits were rarely viewed in isolation from the wider context of the 'Exhibition collection'. Therefore, this chapter considers visitors' movement in and around the stained glass displays and aims to discover and rediscover spatial, geographical, iconographic and stylistic relations between exhibits within these Exhibition contexts. Mapping these ephemeral displays involves reading and interpreting published guides alongside images of exhibits and floor plans, and comparing these with the classification schemes outlined in the previous chapter, in order to reveal the provision for, and geographical arrangement of, stained glass within each Exhibition. In each case, we need to think about the relationship between stained glass and its frame (physical, metaphysical, or architectural), its position within the building (location, prominence, height, and viewers' access), relationship with surrounding exhibits, architectural decoration, and light conditions. These factors all contributed to contemporary receptions of the displays, and influenced debates over the use of stained glass in monumental, industrial, commercial, museological, architectural (both ecclesiastical and secular) and decorative contexts.

We must also think about the Exhibitions as multi-sensory spaces where a multitude of sights were accompanied by touch sensations, different sounds, tastes and smells. Climates varied throughout the year and in different parts of the world. For instance, one might have experienced unbearable heat underneath glass exhibition buildings during European summers or at exhibitions held in the Southern Hemisphere at the Royal Exhibition Building, Melbourne; or very cold temperatures and the sound of wind, rain, and snow during winters. The amount and intensity of light entering the exhibition buildings, which varied throughout the day and year, would have had a particularly significant effect on viewing stained glass, a medium which controls and responds to light, and therefore heat, in a sensory environment. In addition, the smells of refreshments served in the restaurants mixed with scents of perfumes, well-oiled machines and agricultural produce. The sounds of machinery-in-motion, regional accents, gendered and classed voices, foreign tongues and dialects, footsteps upon the wooden

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²⁷⁸ Hill, 2008: 8.

floor boards, ²⁷⁹ splashes in puddles, and bellowing organs, all providing an eclectic sensory backdrop. ²⁸⁰

London, 1851: Great Exhibition

The World's First Modern Stained Glass Gallery

Whilst glass manufactures were displayed on the ground floor at the eastern and western extremities of Paxton's Crystal Palace, the majority of the British and foreign stained glass exhibits were placed upstairs in an 840ft-long by 24ft-wide space in the north-eastern gallery (Fig. 2.1).²⁸¹ This was the world's first large-scale, modern, public stained glass gallery. Ecclesiastical windows were displayed alongside their secular counterparts, and arranged "without national distinction".²⁸² A colour lithograph from *Dickinson's Comprehensive Pictures of the Great Exhibition* (1852) gives us an impression of the clerestory-like gallery display (Fig. 2.2). Visitors could view the stained glass exhibits in the gallery both up-close and at a distance from the nave below, as several illustrations of the foreign courts demonstrate (Figs. 2.3 and 2.4).²⁸³ In *Tallis's History and Description of the Crystal Palace* (1851-52), John Tallis noted it was "a rare satisfaction to be enabled to scan closely the merits of those productions".²⁸⁴

In this large display of stained glass, some exhibits stood out, as Tallis remarked, "[o]n taking a first and cursory view of the long range of stained glass windows and medallions in the northern galleries [...], our attention was forcibly arrested by the striking works of MM. Marechal [sic] and Gugnon, of Metz". The same author also observed that "M.P. Lafaye was doubly unfortunate in being placed by the side of Marechal [sic], to whose works his specimens served as a foil. They were muddy in colour, and very inferior in design". These

²⁷⁹ For an interesting account of a Blind Man's visit to the 1862 Exhibition, see *Temple Bar* (March 1863): 227-37

Pools of water gathered on the floor of the 1867 Exhibition building. Weld, 1867: 409.

²⁸¹ For dimensions of Paxton's Crystal Palace in 1851, see Downes, 1852.

²⁸² "sans distinction de nationalité". Bontemps, 1851: 51.

²⁸³ See the chromolithographs of Russia; North Germany; Holland; Italy; and Spain and Portugal, in *Dickinson's*, 1852, Vol. I and II.

²⁸⁴ Tallis, 1851-52: 96.

²⁸⁵ Tallis, 1851-52: 97.

²⁸⁶ Tallis, 1851-52: 98.

comments remind us that such a display invited comparative looking. The particular placement and juxtaposition of stained glass panels effected visitors' impressions of the exhibits. In this case, it was no doubt the hot hues of Maréchal's pictorial-style windows that "forcibly arrested" the author, ²⁸⁷ and stood out against the more 'antique' tones of Lafaye's archaeological exhibits (see Chapters 3 and 5).

A month before the Great Exhibition opened, Paxton remarked that "[glass] structures of this kind are susceptible of the highest kind of ornamentation in stained glass and general painting; and that they may well be expected to come into almost universal use". 288 Yet the light conditions in the Crystal Palace presented problems for displaying stained glass. The structural engineering of the building meant that the exterior walls of glass were braced with diagonally-crossed wrought-iron rods, visible from both the interior and exterior (Fig. 2.5). 289 How did this diagonal bracing, and the 'ridge and furrow' configuration of the glass roof used to form the curtain-wall exterior of the Crystal Palace effect the transmission of light through the stained glass panels, and the visitor's viewing experience? (Fig. 2.6) Special measures were taken to ensure better viewing conditions in the gallery; the stained glass panels were mounted in painted black wooden frames, the roof was darkened, and dark canvas enclosed the space so that light was only admitted from the north side. 290

Additional British stained glass exhibits were fitted into the extreme west end of the gallery, above a display of naval architecture, arms, clocks and organs (see Fig. 2.1). This display incorporated both ecclesiological subjects, including O'Connor's window for St George's Cathedral, Georgetown, Guyana (former British Guiana),²⁹¹ which gives us our first sense of the significance of the British Empire to the stained glass industry (a topic to which we return in Chapters 4 and 6), along with secular ornamental and enamel-painted glass by British exhibitors Hall & Sons, and William Davies.²⁹²

²⁸⁷ Tallis, 1851-52: 98.

²⁸⁸ Paxton, 1851: 190.

²⁸⁹ On the construction of the Crystal Palace see Kihlstedt, 1984: 126-28.

²⁹⁰ 'Stained Glass Gallery', *Dickinson's*, 1852, Vol. II: Text accompanying Plate XIII.

²⁹¹ The first cathedral building was erected in 1842, but was declared structurally unsafe and dismantled in 1877. See Goodrich, 1994.

²⁹² The Ecclesiologist, 1851:183.

Pugin's Medieval Court

Besides the two gallery displays, panels of stained glass by Birmingham firm, John Hardman & Co., could be seen surrounded by dark canvas along the entire north wall of Pugin's Medieval Court; a curated exhibition space in the south-western part of the ground floor of the Crystal Palace (Figs. 2.7, 2.8, and 2.9). For many of Pugin's contemporaries and recent historians, the Medieval Court represented the *apogée* of the gothic revival interior.²⁹³ Along with gothic-style fabric and wallpaper, Hardman stained glass filled 1,360 sq. ft. of wall space, whilst the floor space was filled with medieval-inspired furniture by Royal Decorators John Gregory Crace & Sons, encaustic tiles by Minton & Potter, stone-carving by George Myers, and a range of metalwork by Hardman to Pugin's designs.²⁹⁴ As Michael Fisher has pointed out, in Pugin's Court "[Hardman's] glass was seen in the broadest context of the Gothic Revival, and he was the only Englishman to receive a prize medal for stained glass".²⁹⁵ The selective display of stained glass within this integrated display, "which appeared aesthetically as a unity", was evidently successful.²⁹⁶

The windows on display represented the gothic style from the fourteenth to the mid-sixteenth centuries.²⁹⁷ The 'Decorated style' was represented by the east window of the chantry chapel of St. Edmund's College, Ware, (nVII, since destroyed), which Pugin selected "because we can have it & it is an easy subject[:] 2 Large Saints under canopies".²⁹⁸ Pugin showed three windows from his own church, St. Augustine's, Ramsgate, Kent.²⁹⁹ Two windows for the south wall of the Lady Chapel (sIII and sIV), showing episodes from the Life of the Virgin with tracery (Fig. 2.10), and one for the south aisle west wall (sVIII) depicting Saints Ethelbert and Bertha under architectural canopies, were readily available for exhibition (Fig. 2.11).³⁰⁰ Glass in the late style, *c*.1390-1540, included the chancel north window (nII) of St. Andrew's Church, Farnham, Surrey (depicting St Andrew and scenes from the New Testament), and two lights containing the transfiguration and Crucifixion from the east window (I) (Fig. 2.12).

²⁹³ See Wedgwood, 1994; Brooks, 1999; Lewis, 2002; Fisher, 2008; Shepherd, 2009.

²⁹⁴ Fisher, 2008: 62.

²⁹⁵ Fisher, 2008: 77. Fellow glazier Edward Baillie protested that Pugin, who had active involvement with the firm, was on the jury for that section. Leapman, 2001: 260

²⁹⁶ Pevsner, 1951: 50.

²⁹⁷ This did not represent the full chronological span Pugin intended. See Chapter 4.

²⁹⁸ The window depicted St Thomas the Apostle and St Thomas of Canterbury, the patron saints of Bishop Griffiths, the founder of the Chapel. Pugin to Hardman, HLRO 304, letter no. 456. Quoted in Shepherd, 2009: 89. ²⁹⁹ See Fleet and Blaker, 2010.

³⁰⁰ Another unidentified panel of a Virgin Mary under a canopy was also exhibited as an example of the decorated style. *ILN* (September 20, 1851): 362.

Secular stained glass on display included panels from the Talbot window for the Earl of Shrewsbury's dining room at Alton Towers (Fig. 2.13).³⁰¹ The central light, depicting the standing figure of the First Earl of Shrewsbury, the Great Talbot, crowned and dressed as a knight of the garter, was shown along with panels from the outer lights – heraldic shields supported by Talbot hounds.³⁰² The tracery lights and main-light borders of this window remain in situ at Alton Towers today, although only a few of the main panels survive in a jumbled rearrangement (Fig. 2.14).³⁰³ Despite the presence of secular exhibits, including gothic stoves, objections were made to the predominantly ecclesiastical character of Pugin's Court within the 'secular' Exhibition. A large roodscreen decorated with a cross rallied cries of 'popery'.³⁰⁴ Nonetheless, the court had an enormous influence on the development of the gothic revival, and medieval courts became a regular feature of later Exhibitions held in Britain, Australia and the USA.³⁰⁵ When the Crystal Palace reopened in Sydenham, the new displays featured a Medieval Court that also contained panels of stained glass by Hardman (Fig. 2.15).³⁰⁶

Hardman & Co. began to produce stained glass upon Pugin's suggestion in 1845 and they had previously collaborated for the 1849 Birmingham Exposition of Arts and Manufactures. The 1851 Medieval Court built on this successful display. Yet Pugin was worried about displaying stained glass in Paxton's glass palace. Prior to the opening of the Exhibition, he wrote to Hardman: "since I have been to see the Crystal Palace I am quite out of heart / It will be impossible to exhibit painted glass there / It will be all light". He feared that, "in such a flood of reflected light", Hardman's stained glass would not be seen to its full advantage. He was not wrong. *The Ecclesiologist* lamented that the stained glass panels were "barely visible from their internal position in the medieval court". In order to get the best view, the *Illustrated London News* recommended that their readers visit the Court in the morning, for "a very tolerable idea of the designs and colours may be obtained from about nine till one on a

³⁰¹ *ILN* (September 20, 1851): 362.

³⁰² The figure of the 'Great Talbot' was derived from John Talbot's fifteenth-century effigy at St Alkmund's church, Whitchurch, Shropshire, a plaster cast of which is at the V&A.

³⁰³ This window was removed in 1952. See Fisher, 1999.

³⁰⁴ Wedgwood, 1994: 238-39.

³⁰⁵ See Ganim, 2002; D'Arcens, 2008.

³⁰⁶ Wyatt and Waring, 1854: vi.

³⁰⁷ Fisher, 2008: 61-63. A similar Medieval Court was erected by the Firm for the Dublin Exhibition of 1853.

³⁰⁸ HLRO 304, letter no. 802. Quoted in Shepherd, 2009: 89.

Letter from J.S. Gammell to Hardman, 15 March 1851. Quoted in Shepherd, 2009: 201-202.

³¹⁰ The Ecclesiologist, 1851: 182.

fine morning, when the southern sun strikes upon them". ³¹¹ In doing so, the reviewer acknowledged how the viewing of stained glass is affected not only by its internal position and compass direction, but by naturally varying light conditions, reminding us that we should approach reviews of stained glass with caution, as the medium changes depending upon the light source and so exhibits varied in appearance over the course of a day as well as the sixmonth duration of an exhibition.

Stained Glass in the Foreign Courts: Bertini's Dante

Elsewhere, a few stained glass panels were exhibited in foreign courts facing the nave on the ground floor of the Crystal Palace. Giuseppe Bertini's window, *Il Trionfo di Dante* (1850-51), which depicted a pensive Dante, seated with Beatrice and Matilda on either side, the friars Dominic and Francis of Assisi and scenes of the inferno above, held a prominent place within the Austrian Court, as a number of chromolithographs and engravings of the foreign nave demonstrate (Fig. 2.16). Bertini's window was placed next to a zinc copper-plated version of August Kiss's critically-acclaimed sculpture, *An Amazon Being Attacked by a Tiger*, which received international praise (Fig. 2.17). This position aligned stained glass with the art of sculpture, which dominated the nave, and thus elevated its status, in spite of its classification as a manufacture. As Eileen Gillooly has stated:

[S]ome objects "demanded" peculiar attention, impressing themselves on one's apprehension and memory, not because they were identified in particular exhibits to be synecdochic of the nation displaying them (often quite the opposite), but rather because their appearance in the Crystal Palace at all ("some distance" from their place of origin) or else their contextual placement within a particular exhibition area forced the viewer's notice. ³¹⁴

Bertini's window certainly arrested visitors' attention. It was taller than most exhibits in the nave, and was displayed in an apex-wooden-framed canopy structure covered with red fabric, which, as we shall see in Chapter 3, was designed to reduce the amount of light emitted from

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³¹¹ *ILN* (September 20, 1851): 362.

³¹² The window is now housed in the Pinacoteca Ambrosiana, Milan. A reduced copy (1853-54) can be seen set amongst plain glazing decorated with bull's-eyes in the Dante Room of the Museo Poldi Pezzoli, Milan.
³¹³ Kiss's *Amazon* was modelled in clay in 1839 upon the instigation of Karl Friedrich Schinkel. The sculpture

was first copied in zinc by Moritz Geiss the same year. In 1843, an enlarged group was cast in bronze by public subscription and placed at the foot of the steps in front of the Königliches Museum, Berlin, now known as the Altes Museum. See Grissom, 2009: 227.

³¹⁴ Gillooly, 2007: 30.

the front and sides and create a unique viewing experience.

The window also held patriotic significance for Italians during the *Risorgimento*. Completed shortly after the failed insurrection of the *cinque giornate di Milano*, *Il trionfo di Dante* was a symbol of hope to the Milanese inhabitants and exiles. Before being shipped to London for the Great Exhibition, Bertini displayed the window in his Milan studio for three days, during which time it was much admired. After the Exhibition, a small replica window was commissioned for the home of Gian Giacomo Poldi Pezzoli, a Milanese collector who, like Dante, lived in exile; he escaped to Switzerland after the Austrians regained power of the city (Fig. 2.18). In many ways, then, the iconography and symbolic significance of this window for Italians under Austrian rule contradicted and contested its placement in the Austrian Court.

The proximity of Kiss's sculpture and Bertini's stained glass window also invites commentary on relations between the two European powers of Prussia and Austria. Kiss's sculpture was placed in the court of the Zollverein, a coalition of German states. Since Milan was under Austrian rule until Italian unification in 1861, Bertini's window, despite being a Milanese production, was placed in the Austrian section. The two artworks were placed in opposition to one another; not *tête à tête*, but back to back (Fig. 2.19). This reflects the division of the interior space into national or state-controlled courts. The rear of the horse in Kiss's sculpture marked the boundary of the Zollverein court, and the back of Bertini's window that of the Austrian court. Such a placement emphasised the artistic, political and economic differences and rivalry between Austria and the Zollverein. In this political context then, Kiss's Prussian sculpture partially obscured the Austrian window, acting as a barrier for the light to pass round. Furthermore, the forward charge of the "undaunted Amazon" was suggestive of the decisive victory that Prussia would gain over Austria in the later Austro-Prussian War of 1866. Thus exhibition spaces provide opportunities for new readings and meanings of stained glass.

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³¹⁵ Pini, 1999; Pini, 2002.

³¹⁶ The Zollverein (or German Customs' Union) was formed in 1818 to manage customs and economic policies. By 1851, the German Zollverein covered most of the German Federation, but Austria was excluded from this group, and this exacerbated Austro-Prussian rivalry. See Green, 2003.

³¹⁷ Dickinson's, 1852: Vol. I, unpaginated.

Paris, 1855: Exposition Universelle

Pavilions in the Palais de l'Industrie

At the 1855 Exposition, following the classification scheme, the official space allocated to stained glass was inside the Palais de l'Industrie (Fig. 2.20). This edifice, with walls of cutstone, interior compartments of cast iron, and a plate-glass roof, was situated between Rond Pont and Place de la Concorde, the Avenue des Champs-Élysées and Cours-la-Reine, on the site now occupied by the Grand Palais and Petit Palais, both of which were built for the later Exposition Universelle of 1900 (Fig. 2.21). Stained glass was displayed in the four pavilions located at each corner of the building, forming "the entrance to the galleries" (Fig. 2.22). The placing of stained glass in these marginal spaces was an afterthought. British Commissioner Henry Cole noted that the French had initially planned to use this space for refreshments, but later used it to exhibit goods.

The way in which the stained glass exhibits were distributed across these pavilions followed a general plan and arrangement, which separated French and foreign exhibits. Thus foreign stained glass exhibits were contained in the south-eastern pavilion, whilst the French exhibits were divided amongst the other pavilions. Unfortunately no visual records of these spaces survive, so it is difficult to know how the stained glass exhibits were arranged internally, but they would have presumably had a higher footfall, being adjacent to the main staircases leading to the galleries.³²¹

Maréchal's allegorical windows for the Palais de l'Industrie

After his successful participation at the Great Exhibition, French glass-painter Maréchal returned to France eager to ensure that the first Exposition Universelle presented a favourable display of French stained glass. Aware of problems with the lighting conditions in London's Crystal Palace, Maréchal wrote a letter to Prosper Mérimée, member of the Imperial Commission for the Beaux-Arts, concerning the necessity of exhibiting stained glass in good

³¹⁸ The 1855 building was destroyed in 1897-99. De Finance, 2003: 262, n.1279.

³¹⁹ The Ecclesiologist (October 1855): 282. Wallis, 1855: xv.

³²⁰ Cole, 1856: 26.

³²¹ The Critic (August 15, 1855): 409.

conditions at the forthcoming Exposition.³²² To ensure that the windows would not be flooded in light, Maréchal proposed a special gallery, lit by natural daylight, and of a sufficient size to enable the stained glass to be seen from a distance. These two main concerns, lighting and distance, repeatedly surface in official reports and popular criticism; they remain the most important yet difficult factors in displaying stained glass today.

Maréchal's request was not granted, although he was honoured with a significant commission from Louis-Napoléon Bonaparte (Emperor Napoléon III) for two large stained glass windows to decorate the *tympana* at either end of the Palais de l'Industrie, each space 42m in diameter (Fig. 2.23). This was the first major stained glass commission for an International Exhibition building, and marked a new application of the medium. As French archaeologist Arcisse de Caumont noted, in his jury report:

[T]he growing use of iron in public and private constructions will, sooner or later, by consequence leave a large square of glass reducing masonry surfaces; the use of painted glass will become an absolute necessity to temper, in many cases, the brightness of the light.³²⁴

A Commission formed by painters Eugène Delacroix and Henri Lehmann, as well as architects Jean-Jacques Arveuf and Jean-Baptiste Lassus, approved Maréchal's designs. The lunette windows, painted in washy enamel on large panels of white glass, served as visual propaganda for the newly established French Republic and Napoléon III's regime, following the French Revolution of 1848 and the Crimean War, and also celebrated the Exposition Universelle. 325

The first of these grand allegories, *La France conviant les nations à l'Exposition Universelle* (*France inviting all Nations to the Exposition*), depicted France seated on a throne with allegorical figures of 'Art', holding a lyre, and 'Science', with a celestial sphere, seated at her feet (Fig. 2.24). Maréchal referred to Art and Science as "the glory of the nations" and "the indices of the prosperity that accompany their moral development". Art' turned towards the 'East', whose primitive industries were represented by a seated shepherd, a trio of upright

³²² For a transcript of this letter, see Pillet, 2007: 53.

³²³ They were commissioned on 6 August 1854 and installed 5 May 1855.

³²⁴ "l'emploi toujours croissant du fer dans les consturctions publiques et privées aura, tôt ou tard, pour conséquence de laisser une grand place au verre en diminuant les surfaces en maçonnerie; l'emploi du verre peint deviendra d'une absolue nécessité pour tempérer, dans beaucoup de cas, l'éclat de la lumière." De Caumont, 1856: 955.

³²⁵ As articulated by the Emperor at the opening of the Exposition: "I open with happiness this Temple of Peace". *Catalogue Officiel*, 1855: 4.

³²⁶ "la gloire des nations" and "les indices de la prospérité qui accompagne leur développement moral". See Maréchal, 1854. The windows were also described in *The Critic* (August 15, 1855): 409.

women carrying an Indian shawl, a Chinese vase, precious stones, and weapons of Arabia, the latter suggesting the historic characteristic of war compared to the enlightened European trade. 'Science' turned towards the 'West', whose industries were represented by a seated blacksmith at work, a trio of upright women carrying a steam engine, an electric telegraph and a power loom.

In the second window, L'Équité président à l'accroissement des échanges (Equity governing the increased exchanges amongst Nations), Equity was depicted seated on a throne carrying a balance (Fig. 2.25). In this composition, 'Art' was shown giving a pediment of the Parthenon inscribed 'The beautiful one!' to 'Science', who, in turn, presented 'Art' with a forule of Leibniz, inscribed 'Truth'. The mutual exchange of these objects and ideas demonstrated the role of the International Exhibitions in bringing together nations, encouraging international artistic and industrial exchange, and examining progress.

The windows also reflected the attitudes of nineteenth-century European Imperialism. France was, ideologically and physically, depicted at the centre of these compositions, and exhibits from France, closely followed by Britain, dominated the Exposition displays. In a letter to F. Blanc, editor of the *Courrier de la Moselle*, 4 October 1854, Maréchal justified the primary positions of France and England in his composition, on the basis of imperial and industrial prowess:

In giving to France and England the importance that they have in my scenes, I did not cede to narrow views of nationality. I did nothing but indicate the rank conquered by the intervention of these two great nations in world affairs, through the development of their colonial establishments and that of their productive forces.³²⁷

Such a statement also demonstrated Anglo-French accord after the Napoleonic Wars, and celebrated the alliance between the two nations during the Crimean Campaign.

In representing only a handful of nations and giving them a unifying appearance through classicised allegorical figures with ethnographic-physiognomic visual traits, Maréchal's windows were selective ideologies. They employed a dual iconography which divided nations

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³²⁷ "En donnant à la France et à l'Angleterre l'importance qu'elles ont dans mes scenes, je n'ai cédé ni à des vues étroites de nationalité. Je n'ai fait qu'indiquer le rang conquis par l'intervention de ces deux grandes nations dans les affaires du monde, par le développement de leurs établissements coloniaux et par celui de leurs forces productives." Maréchal, 1854.

into two geographical and cultural groups characterised by their chief artistic and industrial contributions to the exhibitions: Maréchal associated the non-European group (incorporating China, Arabia, the British colony of India and French colony of Algeria) with 'primitive' industries, and the Europeans (a highly selective group incorporating the two main modern empires of France and England, and Italy, representing the historic Roman empire), with mechanical engineering, technological development, and classical antiquity. Maréchal's inclusion of Italy between the nations of the West paid tribute to the ancient Italian kingdoms, home to the arts and industries of Rome, Florence and Venice. 328

Each nation's attribute, as represented in the first window, was redistributed in the second window. So that, in Equity governing the increased exchanges amongst Nations, the Indian shawl was carried by England, who rested one hand on the Chinese vase. In return, India received the steam engine. China looked with curiosity at the dial of the electric telegraph, the shepherd raised a horn of plenty from which escaped the manufactured products of the Occident. France oversaw Arabia receiving the power loom, and received a scarf and weapons from Algeria. Italy, wrapped in seersucker, a popular material used for clothing in warm climates, revealed a pile of thread ending in the dial carried by China. The blacksmith seized a horn of plenty full of fruits and raw materials from the East. This exchange of natural resources and industrial products demonstrated the classification schemes' division into raw materials and manufactures, and the exhibitions' role in stimulating world trade.

A smaller allegorical stained glass window dedicated to la Science, l'Art et l'Industrie, which may have also been executed in Maréchal's studio, adorned the triumphal-arch shaped entrance to the Palais from the Avenue des Champs-Élysées. 329 It stood as a prominent reminder of the unifying aims of the French Expositions (Figs. 2.26 and 2.27). This window depicted the heroic, winged figure of France with a star halo holding a victory wreath in each hand for 'Art' and 'Industry', allegories of which were shown seated at either side of her feet leaning on the shield of the city of Paris. The windows decorating the Palais de l'Industrie should therefore be considered in relation to an extensive architectural decorative scheme, incorporating the sculptural group on the summit of the triumphal arch by Élias Robert, depicting France crowning Art and Industry, today in the Parc de Saint-Cloud (Fig. 2.28). Robert's sculpture used a similar triangular composition to Maréchal's windows with France

 ³²⁸ An "antique souveraine". Maréchal, 1854.
 329 The Critic (August 15, 1855): 409.

at the centre, her arms outstretched. On her right was the allegorical figure of 'Industry' with a hammer, and, on her left, 'Art' with a canvas. Directly beneath this sculptural group was a frieze in which supplicants in classical drapery presented gifts of art, agriculture and industry to a bust of Napoléon III (Fig. 2.29).

The prominence of Maréchal's windows, painted with enamels in a pictorial style, caused English commentators to refer to them as "horrid allegorical windows [...], dedicated to the glories of the Exhibition". Their introduction, according to Richard Redgrave, was "a mistake in taste". Harford Maréchal was the only stained glass exhibitor to be awarded a first-class medal at this Exhibition; and, as the jury report declared, "[t]he Palace of Industry is proof of the importance which stained glass windows can take in monumental decoration". Indeed, as we shall see, Maréchal's windows had an enormous impact upon the use of stained glass in later Exhibition buildings as well as its application to civil architecture more broadly. These windows remained in the Palais de l'Industrie for fifty years until demolition (Fig. 2.30). Now only remembered through engravings and photographs, they remind us how stained glass contributed to the visualisation of national, imperial and political ideals in the nineteenth century.

London, 1862: International Exhibition

The iron and brick construction with a stone facing that was erected for the International Exhibition of 1862 was nothing like its predecessor, the 'fairy-land' Crystal Palace.³³⁶ It was described by Augustus Sala as having equally "the aspect of a workhouse, a public bath and wash-house, and a gaol", ³³⁷ and dubbed a "wretched shed" by the *Art Journal* (Figs. 2.31 and

³³⁰ The Ecclesiologist, 1855: 285.

³³¹ Redgrave, 1856: 398. This comment should also be seen in light of ongoing debates over style, see Chapter 3. ³³² De Caumont, 1856: 955.

³³³ "[I]e Palais de l'Industrie est une preuve de l'importance que peuvent prendre les vitraux peints dans la décoration 'monumentale'". De Caumont, 1856: 954. This sentiment is repeated by Pillet, 2007: 52.

³³⁴ De Finance, 2003: 154; Ennès, 2006: 173.

³³⁵ The windows, weighing six and a half million pounds, were demolished in October 1897 by fifty men pulling cables attached to two powerful winches. As one article reported, "soudain l'immense vitrail s'incline lentement d'abord, puis tout d'une pièce s'abat sur le ciel au milieu d'un nuage de poussier et de graviers." [All of a sudden, the immense stained glass window tilts, slowly at first, then all of it sweeps down through the sky in a cloud of dust and gravel.] *Journal de la peinture sur verre* 19-20 (October 1897): 6.

³³⁶ Queen Victoria. Cited in Purbrick, 2001:128.

³³⁷ Sala, 1895, Vol. 1: 376.

2.32). 338 Designed by naval engineer Captain Francis Fowke, the building consisted of a nave cut across by two transepts with huge dodecagon domes at both intersections, and was erected in South Kensington on the site now occupied by the Natural History Museum and Science Museum.³³⁹

Glazing the Transepts

A number of British stained glass exhibits, both complete windows and individual lights, were installed into the north-facing external walls of the Exhibition building above the entrances to the western machinery annexe and the eastern annexe, housing displays of granite and the Railway Enquiry Office (Fig. 2.33). This architectural display of stained glass was not part of the architect's original brief. 340 The installation of several large stained glass windows in these spaces, each approximately 50ft wide, appears to have been a practical response to the need for display space.³⁴¹ Six months before the Exhibition opened *The Illustrated London News* reported there was a "large demand for space" for "ecclesiastical furniture and from the makers of stained glass". 342 As only the northern transepts were fitted with stained glass, it seems likely that the stained glass windows were installed here at the same time that the western and eastern annexes were added to the north side of the building. 343

A lecture, 'On the Decoration of the International Exhibition Building', delivered to the RSA by John Gregory Crace, the man responsible for the decoration of the building, on 11 April 1862 (a month before the opening of the Exhibition), sparked a discussion about the employment of stained glass in the exhibition building.³⁴⁴ Philip Palmer, a member of the Society, questioned why the clerestory windows had not been decorated with coloured glass. 345 Notes from the RSA meeting, after the lecture, reported:

³³⁸ Findling and Pelle, 1990: 25.

³³⁹ It was built by Charles and Thomas Lucas and Sir John Kelk on land purchased in South Kensington from the profits of the Great Exhibition. Shortly after the Exhibition, the building was demolished and materials were sold; some were used in the construction of Alexandra Palace. Sheppard, 1975.

There is no mention of fitting stained glass in the transepts in Some Account of the Buildings designed by

Francis Fowke (1861).

341 Measurements deduced from *Plan of the International Exhibition*, 1862. Maps Collection, British Library,

³⁴² *ILN* (November 16, 1861): 488.

The decision to construct an additional eastern annexe was announced in the ILN (October 19, 1861): 397. It was reported nearly complete in *ILN* (January 11, 1862): 42. ³⁴⁴ Crace, 1862.

³⁴⁵ Fowke rejected Frederick Sang's suggestion to colour the glass domes. Sheppard, 1975.

[The RSA] expected to see, not only from artists of this country, but from those abroad, some splendid works in the way of painted and stained glass, and therefore it had been a question with [Palmer] whether a greatly improved effect might not have been produced by some relief having been given to the plain glass along the immense range of the clerestory windows [...]. These windows might be greatly improved – not by distemper or stenciling – but by the introduction of blue, amber, or other coloured glass, as might be required.³⁴⁶

Crace responded by stating that the aggregate surface of the windows throughout the building was "so tremendous that any application of stained glass, except upon the voluntary principle, would be quite out of the question".³⁴⁷

A week later, an article in the *Illustrated London News* reported that the transept extremities had been "retraced in Gothic form, and filled in with stained glass supplied by Messrs. Hardman & Co". 348 amongst other successful well-known English stained glass firms, thus presenting an unambiguous national display. Significantly, all the stained glass exhibitors represented in the transepts (except Heaton, Butler & Bayne, for whom this exhibition marked their debut) had been critically acclaimed at the previous Great Exhibition. A writer for *The* Saturday Review remarked that "[e]very visitor must have observed the enormous windows" in the transepts.³⁴⁹ They were prominent features of the Exhibition building and feature in a number of interior views. One photograph from an album in the Henry Moore Institute, Leeds, shows the stained glass in the north-east transept behind a display of organs (Fig. 2.34). The enormous window in the centre is Hardman & Co.'s Life of Christ, exhibited in its entirety in London before being installed at the east end of Doncaster Minster (Fig. 2.35). 350 Flanking this window were others by Hardman & Co., and Robin Hood's Last Shot, a secular window by their local rival glass-making firm Chance Bros. of Smethwick, demonstrating that local and provincial paragones, displays and contexts were formed within national displays in this international environment (Fig. 2.36).

The windows in the north-western transept were mostly ecclesiastical subjects, and thus contributed to the cathedral-like appearance of the building, especially as they were displayed beneath Crace's painted inscription "Domini est terra et plentitudo ejus" ("the earth is the

³⁴⁷ Crace, 1862: 344.

³⁴⁶ Crace, 1862: 343.

³⁴⁸ ILN (April 19, 1862): 400.

³⁴⁹ *The Saturday Review* (October 18, 1862): 477.

³⁵⁰ This window was engraved by the *ILN* (September 27, 1862): 344.

Lord's and the fullness thereof'), one of a series of texts on religious and moral themes decorating the building (Fig. 2.37). Some aesthetic as well as practical considerations were undertaken in the display here, with exhibits arranged around a centre-piece, evocative of a contemporaneous 'Salon hang'. The upper section of Hardman's east window for Worcester Cathedral, another *Life of Christ*, was placed in the centre of this transept, with the central panel of the lower five lights below (the remaining lights were not exhibited) (Fig. 2.38). Some exhibits by Holland & Son of Warwick were placed to the left. The rectangular panel on the far right was the *Entombment Procession* by Heaton, Butler and Bayne, now the east window of St James' Church, Chilton Cantelo, Somerset, with their windows depicting the *Baptism of Christ and the Passage of the Red Sea* for St Albans Abbey, Hertfordshire, and the *Acts of Mercy* for Harpenden Church, also Hertfordshire, below (Fig. 2.39).

Following Maréchal's *tympana* windows at the 1855 Exposition, these displays presented stained glass within an architectural framework and used the medium as a form of monumental decoration. They also contributed to the ecclesiastical character of the building (Fig. 2.40). Religious terms such as 'nave' and 'transept' were frequently applied to Exhibition buildings. Grand opening ceremonies, prayers, organs, and sung hymns, enhanced the ecclesiastical atmosphere. The presence of stained glass, much of which depicted religious subjects, reaffirmed readings of the Exhibition buildings as para-Cathedrals. The 1851 stained glass gallery appeared like a clerestory, as we have already seen. The arrangement of stained glass in the transepts of the 1862 Exhibition, underneath painted biblical inscriptions and above a collection of organs, the predominant church instrument of the nineteenth-century Christian world, also had clear ecclesiastical associations.

The prominent presence of stained glass in the transepts of the 1862 Exhibition Building helped orientate visitors. Unlike the majority of stained glass exhibits, these windows were notable features of the Exhibition and could be seen from numerous vantage points and distances, as handbooks and guides pointed out.³⁵³ *The Illustrated Record of the International Exhibition* (1862) remarked:

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the eastern dome." Dublin University Magazine (August 1862): 136-37.

³⁵¹ Waters, 2012: 307.

³⁵² *The Illustrated Exhibitor* proclaimed the 1851 Crystal Palace "is like a cathedral in its vastness and solemnity". Cassell, 851: 346. The Archbishop of Canterbury also presided at the 1851 opening ceremony. ³⁵³ Another noted, "we may glance approvingly at the stained-glass windows displayed by British manufacturers. Those in the north-east transept will repay the inspection to which they invite you when first seeing them from

No visitor could fail to observe how much the effect of the whole costly display was enhanced by stained glass windows, which adorned the edifices in various places; sometimes serving the purpose of windows to the building; and, in other cases, placed in favourable positions for being seen, and enhancing the general effect.³⁵⁴

The stained glass windows in the transports transformed the exhibition space aesthetically and symbolically. This display imitated a genuine architectural context, but in juxtaposing several windows of different styles, size and subject matter, intended for various settings, formed a unique scheme and created new iconographic meanings.

However, as Sebastian Evans noted, "in a display of this kind we are in a great measure deprived of the means of arriving at a correct judgment, in consequence of the windows being placed in situations for which they were not intended". 355 Interestingly, a writer for the Illustrated London News also observed this, and cited Robin Hood's Last Shot, designed by Evans and exhibited by Chance Bros, as an example:

It should be added, in justice to the artist, that the window was painted for a south light; so that its position at the exhibition in a northern aspect, with the sunlight streaming in on it from the inside during most of the day, was singularly unfavourable, giving the flesh tints a purplish hue and otherwise disturbing the harmony of colour.³⁵⁶

Burges approved of the height at which the windows were placed, but he noted problems with lighting conditions, and wrote that "there is quite as much light in front of them as behind, and the consequence is, that the colour in nearly every instance is swallowed up". 357 Outside of their intended architectural settings, and in such a vast ephemeral display, it was difficult to control the direction and sources of light transmitted through the stained glass exhibits, and this remained a continual problem at later exhibitions too.

As well as displaying stained glass windows made for other monumental buildings, the 1862 building also provided new architectural commissions for stained glass. A reporter for *The* Dublin University Magazine noted, "looking down the nave from the eastern dome [...,] the vista is bounded by a fair sized Gothic window of many-coloured glass". 358 This was one of the axial 'rose' coloured glass windows at the east and western ends of the nave by James

³⁵⁴ Shaffner and Owen, 1862: 71.

³⁵⁵ Evans, 1862: 404.

³⁵⁶ *ILN* (November 8, 1862): 504. 357 Burges, (July 1862): 7.

³⁵⁸ Dublin University Magazine (August 1862): 133.

Hartley of Sunderland (Fig. 2.41). Beneath the eastern dome, Dent's 30ft-diameter clock was decorated with geometric-patterned, coloured glass (Fig. 2.42). In decorating this instrument of time, which transformed nineteenth-century public spaces such as the railway station, stained glass was again associated with modernity.³⁵⁹

Stained Glass Courts

The remaining British stained glass exhibits, and all the examples of foreign stained glass, were displayed in courts on the first floor by the central tower entrance on Cromwell Road (see Fig. 2.33). ³⁶⁰ Paradoxically, the placing of stained glass immediately behind the purpose-built central sculpture court and adjacent picture gallery, which stretched along the entire south side of the building, aligned stained glass with the fine arts of painting and sculpture through proximity, even though they were separated by official classification. Stained glass lined both sides of a screen erected in the southern gallery above wall level. One side overlooked the central south court and the other the refreshment gallery, a space 150-175ft. long and 12ft. wide in which the walls were painted red. ³⁶¹ In this position, stained glass was used to form a physical and decorative divide between the British and foreign paintings. *The Saturday Review* remarked, "no place could possibly have been chosen in the whole building more unfit for the display of painted glass". ³⁶²

Although much time had been spent designing the top-lit sculpture and picture galleries, little provision was made for displaying stained glass in these courts (Fig. 2.43). The poor light conditions, and the placement of stained glass by the refreshment courts, were among the many reasons that *The Examiner* reported the display was a 'mockery'.

The great screen of painted glass by the south gallery, at the break between the British and foreign picture galleries, placed where by no chance a ray of light can ever shine through a square inch of it, opposite to which people eat buns and ices with no reason to believe that there is anything before them but a great smeared wall, is the greatest mockery set up within the building, of which all the arrangements have pressed with peculiar hardship on the exhibitors of decorated window glass.³⁶³

³⁵⁹ Five years later, Coffetier exhibited his stained glass in a large *tympanum* under the clock in the 1867 Palais de l'Industrie. Bontemps and Boeswillwald, 1868: 93

³⁶⁰ Evans described the display as "scattered, ill-arranged", and "ill-seen". Evans, 1862: 403.

³⁶¹ McDermott, 1862: 48-49; Burges, (June 1862): 666.

³⁶² *The Saturday Review* (October 18, 1862): 477.

³⁶³ The Examiner (October 11, 1862): 648.

Although the placing of stained glass in the refreshment rooms might have seemed banal, it also signalled the increased application of stained glass, especially in screen form, to secular buildings such as hotels, cafés, restaurants, and public houses. As one reviewer remarked, here "without any trouble, you may feast both eye and palate-may allay the hungering alike of soul and body at one and the same moment". 364

In his review in the *Gentleman's Magazine*, Burges complained that the windows could not be viewed from an appropriate distance, and that the gallery was too narrow.³⁶⁵

[I]t is absolutely impossible to judge of the effect of any of the windows exhibited in the galleries, as the only thing that can be noticed, is the drawing, and this when a window is intended to be placed at twenty or thirty feet from the ground, is often obliged to be so modified, that, like the statue of Phidias, it is hardly right to judge of it when level with the spectator's eye. 366

Burges's comparison of viewing stained glass with classical sculptures by Phidias characterises stained glass as a monumental architectural art in a similar way to the statuary removed from the Parthenon and acquired by the British government in 1816.³⁶⁷ Just as the Parthenon sculptures were presented in new display contexts at the British Museum, visitors' perceptions of stained glass windows were altered by their presence at the Exhibitions. As Burges wrote of the replica panels of the east window from Waltham Abbey, designed by Burne-Jones and exhibited by Powell & Sons, "[t]his window, which in its place [at Waltham Abbey] looks exceedingly rich and jewel-like, is here simply a mass of confusion". ³⁶⁸

It is perhaps for these reasons that stained glass was excluded from the Ecclesiological Society's 1862 Medieval Court. 369 *The Ecclesiologist* stated:

We had offers of painted glass and cartoons for our own court, but we felt that its acceptance would involve us in difficulties of a material description, and we declined accordingly.³⁷⁰

³⁶⁴ Dublin University Magazine (August 1862): 136-37.

³⁶⁵ Burges, (July 1862): 7.

³⁶⁶ Burges, (June 1862): 666-67.

³⁶⁷ The Parthenon was also referred to in a discussion of the stained glass at the 1867 Exposition. See Gambier Parry, 1867: 276.

³⁶⁸ Burges, (July 1862): 9.

³⁶⁹ This venture, led by architects Burges and William Slater, was a 50 square-foot space on the north side of the nave opening directly into the eastern dome.

³⁷⁰ The Ecclesiologist (April 1862): 75.

Nonetheless, they remained critical of the displays, reporting that "the painted glass galleries are on the whole discouraging". Given their strong opinions and severe judgments on all matters pertaining to stained glass, it is surprising that the Ecclesiologists did not relish this opportunity to further promote and demonstrate their principles of stained glass design to the public. Yet the prominence of stained glass at the 1862 Exhibition certainly influenced the decision to hold an Exhibition of Stained and Painted Glass at the South Kensington Museum in 1864, organised by Thomas Gambier Parry and Richard Burchett, head of the South Kensington School of Design. The South Kensington School of Design.

Paris, 1867 Exposition Universelle

The Exposition Park in the Champs de Mars

At the second Paris Exposition, stained glass was disseminated across the Champ de Mars, an important site of military, revolutionary, imperial, republican, national and international displays and performances.³⁷³ Stained glass exhibits were displayed in the elliptical exhibition building, at several entrances to the Exposition site, and within buildings in the surrounding Park (Figs. 2.44 and 2.45).³⁷⁴ For the first time, upon invitation by the 1867 Commission, a number of small individual pavilions, both state and private, were erected within national zones in the Park, many of which contained stained glass exhibits or decoration.³⁷⁵ Once again, Maréchal took particular initiative and displayed his stained glass and photographs on glass in a specially constructed pavilion adjacent to a fountain just off the central Grande Avenue in the uppermost part of the French section. Next to Maréchal's pavilion was the Photosculpture pavilion,³⁷⁶ containing "small domestic windows in the style of Dutch and Flemish glass of the sixteenth and seventeenth centuries",³⁷⁷ and some photographs on glass

³⁷¹ The Ecclesiologist (April 1862): 172.

³⁷² See *Art Journal* (July 1864): 199; *Athenaeum* (June 4, 1864): 778-79. Gambier Parry and Burchett, 1864.

³⁷³ Weld, 1867: 405-406; Geppert, 2010: 69.

³⁷⁴ Several exhibitors showed stained glass in both the Palais and the park. Didron, 1868: 44-45.

³⁷⁵ Some recent Exhibitions in Paris have drawn attention to these pavilions. See Chalet-Bailhache, 2008; Demeulenaere-Douyère, 2010.

³⁷⁶ Photosculpture is a process by which three-dimensional sculptures are produced with the aid of a series of two-dimensional photographs taken from multiple angles.

³⁷⁷ Gambier-Parry, 1867: 275.

exhibited by Sophie Lafaye.³⁷⁸ The relationship between these two media is discussed in Chapter 5.

Lévêque's Chapel

Not far from these pavilions, visitors could pay fifty centimes to see an even more enterprising display of French stained glass and church furnishings in a full-sized gothic chapel. ³⁷⁹ *Bentley's Miscellany* reported that:

It blazes with the gold and colour of all manner of church decoration with which it is filled – stained glass, Madonnas, altars, vestments, crucifixes - it also contains statuary and other sculpture, and the tones of an organ add to the effect of the whole.³⁸⁰

Construction of the yellow-brick chapel, in the thirteenth-century gothic style, was the idea of Charles Lévêque, a glass-painter from Beauvais, and plans for the building were drawn by M. Brien, an architect from Le Havre.³⁸¹ The Chapel had an interior vaulted ceiling of wood and plaster supported by twenty-eight external buttresses and a great nave, two side aisles and a gallery, two large interior chapels and two small chapels at the apse end (Figs. 2.46 and 2.47). It displayed examples of relevant building materials, brick vaulting, mosaic tiling for floor and walls, slate and zinc roof tiling, as well as furnishings, and was thus a combined advertisement for the church architect, builder and craftsman.

As *Black's Guide to Paris* stated, Lévêque and Brien's "goal has been to put the offerings from French artists in suitable sites and in connection with the religious character of the products to be exhibited". Stained glass was seen here in context with religious furnishings such as altars (in wood, marble and stone), fonts (in cast iron and stone), lecterns, chasubles, cabinets, tapestries, embroidered altar-cloths and banners; sculpture (in polychrome and monochrome; wood, lead, bronze, wax, and stone); stations of the cross, decorative painting and ornaments; sanctuary lights and candles; organs and harmoniums; bookbinding; incense

³⁷⁸ Pillet, 2010: 158.

³⁷⁹ Gautier, 1867: 31.

³⁸⁰ Bentley's Miscellany (July 1867): 58.

Lévêque's chapel was "a construction in yellow bricks, covered with various samples of tiles, slates or zinc" ["la construction en briques jaunes, couverte de différents échantillons de tuilès, ardoises ou zinc"]. Ansted, 1867: 57

³⁸² "Leur [Lévêque and Brien's] but a été de mettre à la portée des artistes français des emplacements convenables et en rapport avec le caractère réligieux des produits à exposer". Ansted, 1867: 57.

and incensors (Fig. 2.48).³⁸³ One guide noted the building's suitability for the display of stained glass as an architectural decoration:

Let us add that this small building, unique in its genre, being isolated, will be bright in a perfect way, which is entirely appropriate for the stained glass: so that the visitor will be able to contemplate a canopy illuminated by the sun and appreciate at the same time the contrary effect of the opposing façade.³⁸⁴

By installing stained glass exhibits into conventional window openings within a genuine architectural frame this chapel provided a more effective display of multiple stained glass panels than Pugin's 1851 Medieval Court and the transepts in the 1862 Exhibition building. Lévêque's project appears to have also influenced later displays of stained glass at the Chicago Exposition of 1893, where Tiffany erected a Byzantine Chapel to show his wares, and the German Foreign Building featured a reproduction of a private chapel from a German castle displaying stained glass and other church art. 385

Nine French glass painters contributed stained glass windows to Lévêque's 1867 chapel. The windows were all fairly small in dimension due to the restricted size of the window openings. ³⁸⁶ Most exhibits were ecclesiastical, although British glass-painter Francis Kirchhoff remarked that the windows in this chapel were "more modern in their treatment than painted glass is usually executed for churches", suggesting that glass-painters took this opportunity to showcase new work. ³⁸⁷ The most prominent exhibitor was Lévêque; his ecclesiastical and ornamental grisaille windows were positioned in the principal west façade. Bazin's studio (Mesnil-Saint-Firmin) showed five ecclesiastical windows; that of Pagnon-Deschelettes of Lyon exhibited four ecclesiastical and ornamental windows, two of which depicted local venerated saint François de Sales, thus representing provincial devotion within a display of national Catholic art set in an international park. Antoine Lusson fils and François Höner each exhibited two ecclesiastical windows; Gaspard Gsell showed four small ecclesiastical windows in the *chevet* of the chapel; making his debut as an exhibitor of stained glass, M. Jacquier, a designer associated with Maurice Küchelbecker, showed one ecclesiastical window and one ornamental window; and Henri Ely exhibited a *Life of Christ*

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³⁸³ For a list of exhibits see *Exposition universelle de 1867 à Paris. Catalogue général*, 1867: 330-33.

³⁸⁴ "Ajoutons de plus que ce petit bâtiment, unique en son genre, étant isolé, sera éclair d'une façon parfait, ce qui convient tant aux vitraux: de sorte que le visiteur pourra contempler une verrière éclairée par le soleil et apprécier en meme temps l'effet contraire sur la façade opposé." Ansted, 1867: 57.

³⁸⁵ Truman, 1976 (1893): 511; Art Journal (December 1893): 30.

³⁸⁶ For a description of these works see Didron, 1868: 14-20.

³⁸⁷ Kirchhoff, 1867: 80.

window and another depicting four historical subjects relating to the virtue of charity for the Cathedral of the Immaculate Conception, Burlington, Vermont.³⁸⁸

In addition, the inclusion of two secular apartment windows executed by Ottin, a wheel of Fortune and a historical combat scene, demonstrated that the chapel space was neither entirely ecclesiastical nor 'French'. Nonetheless, most exhibits in the chapel evoked a traditional Catholic environment that would have inspired devotion in some, and Protestant opposition and mysterious curiosity in others. As one popular description, published prior to the opening of the Exposition, stated:

It is not known if this chapel will be free for worship; however it is necessary to believe that, if so, the divine service will be made early, in order to leave the exhibition free, and not to offend nor disturb the conscience of the visitors belonging to any other religion or other cult. 389

The compromises that the chapel underwent in order to give special consideration to visitors of other faiths remind us that it was erected as part of a temporary exhibition, rather than for a fixed community. We are left wondering if the chapel was ever consecrated and, if so, in what form did the 'divine service' take place? In such exhibition spaces, stained glass simultaneously became a commodity and sacralised the commercial. This dialectic was unique to modern environments such as the International Exhibitions, and raises important questions. As Elizabeth Emery and Laura Morowitz have asked, "[h]ow could one continue to view something – a stained-glass window, a tapestry, a cathedral, a pilgrimage - as sacred when confronted by the conflicting aesthetic or commercial use to which others put it?" We must apply such a question to our examination of stained glass at the exhibitions, for these environments were often worlds apart from the religious or private settings for which panels were usually intended.

Le Play's Elliptical Palais

Le Play's elliptical Palais was erected in the centre of the Champ de Mars, and, as previously mentioned, arranged exhibits according to their classification in a hierarchical system of

³⁸⁸ This Cathedral was razed in a fire on 13 March 1972. See Blow, 1968.

³⁸⁹ "On ne sait pas si cette chapelle sera livrée au culte; cependant il y a tout lieu de croire que, s'il en est ainsi, le service divin sera fait de bonne heure, de façon à laisser libre l'exposition, et à ne pas froisser ni troubler la conscience des visiteurs appartenant à toute autre religion ou à tout autre culte". Juquin and Masselin, 1866: 25.
³⁹⁰ It also applies to department stores. See Lewis, 1983; Emery and Morowitz, 2003: 111-12; Morowitz, 2011.

³⁹¹ Emery and Morowitz, 2003: 164.

concentric zones (see Fig. 1.3). However, stained glass was not displayed in the concentric band containing glass products, as the classification scheme predicated. Instead, several large stained glass windows were exhibited in the Grand Vestibule, the central passage that ran horizontally through the Palais from the Grande Avenue to the Jardin Central, dividing the exhibits of Great Britain and France (Fig. 2.49). Several engraved views of the Grand Vestibule show groups of visitors in this busy passage, which, "formed a functional and ideological narrative introduction" to the Exposition, providing access to the seven groups of exhibits, and national displays (Figs. 2.50 and 2.51).³⁹² The windows here were intended to play an important part in the decoration of the Grand Vestibule, and were installed in architectural bays at clerestory level, elevated 8-9m above the ground.³⁹³ The display placed French glass in physical opposition to its foreign counterparts (predominantly British) and invited comparisons.³⁹⁴ Yet Didron believed few people saw the glass due to its elevated height,³⁹⁵ and Gambier Parry lamented that the exhibits of France and Britain could not be properly compared because "when one side is light the other is dull", although, in many ways this replicated a natural architectural environment.³⁹⁶

Les vitraux dans les chemins-couverts

In addition to the Grand Vestibule, panels by approximately fifteen stained glass exhibitors were displayed in four of the *chemins-couverts*, or covered walkways, which, in a cloister-like fashion, united the lateral sides of Le Play's Palais and enclosed the Champ de Mars (see Fig. 2.44).³⁹⁷ Bontemps blamed the poor organisation of Exhibition Commissioners for the display of stained glass in these spaces, which he considered unsuitable.³⁹⁸ The windows were hung in a single line in wooden frames. Gaps between the frames enabled too much light to be emitted

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³⁹² Van Wesemael, 2001: 738, n.132.

³⁹³ Didron, 1868: 6.

³⁹⁴ Walking towards the Jardin Central, French exhibits were on the left-hand side of the vestibule, and foreign exhibits on the right.

³⁹⁵ Didron, 1868: 30; Bontemps and Boeswillwald, 1868: 91.

³⁹⁶ Gambier-Parry, 1867: 275.

³⁹⁷ Stained glass by Bitterlin and Oudinot could be seen along the covered walkway at the Porte Rapp entrance to the Exposition Park from Avenue de la Bourdonnaye, and another walkway from the Porte Saint-Dominique entrance. Here, stained glass by Bourrières, Erdmann and Kremer, Abbé Goussard, Guynon & Fils, and Nicod was installed. On the opposite side of the Palais, in the covered walkway stemming from the Portique Suffren, works by Bruin, Gesta, and Gsell were housed along the Porte Desaix, and the covered walkway at the entrance of the Rue d'Espagne from the Porte Kléber displayed stained glass by Lusson, Lorin, Lafaye, and Petit. Gambier Parry, 1867: 275-76; Didron, 1868: 21-30; Gambier-Parry, 1868: 384-87.

³⁹⁸ Bontemps and Boeswillwald, 1868: 91.

between the exhibits, making it difficult for visitors to see the windows,³⁹⁹ as it flooded light on the interior surface of the glass panels.⁴⁰⁰ In bad weather, these marginal spaces provided shelter from the rain when visitors were waiting for their carriages, but they were also noisy and windy.⁴⁰¹ This display enabled visitors to approach the medium at close-quarters and, unintentionally, encouraged an unusual tactile experience. As Didron noted, "[p]arts of some windows, placed near the end were broken by visitors", thus reminding us of the 'accidental', as well as the deliberate radical, breaking of glass identified by Armstrong.⁴⁰²

Philadelphia, 1876: Centennial Exhibition

Building on the previous Paris Exposition of 1867, exhibits at the Philadelphia Centennial Exhibition were housed in a variety of buildings and pavilions across the Exposition site in Fairmount Park (Fig. 2.52). As John Allwood has noted, this Exhibition was effectively "a small city of buildings within a planned and landscaped site", even more elaborate than the 1867 Exposition Park. The majority of stained glass exhibits were displayed in two of the principal buildings: the Main Exhibition Building (housing displays of Mining and metallurgy, Manufactures, Education and Science), and the Memorial Hall (Fine Art). Thus, stained glass was presented as an industrial medium in one building, and an artistic medium in another, emblematic of the divide between fine art and industry.

Memorial Hall

Although stained glass was classified as a fine art at the Philadelphia Exhibition with other vitreous and ceramic decorations, little appears to have been displayed in either the Memorial Hall or the temporary Art Annex (Fig. 2.53). 404 Magee's Guide stated that the provision for stained glass in this building included large window openings in each of the two pavilions, 12½ ft. by 34 ft.; eight of which were "used for the display of stained glass, glass paintings,

³⁹⁹ Didron, 1868: 20; Kirchhoff, 1867: 74.

⁴⁰⁰ Bontemps and Boeswillwald, 1868: 91.

⁴⁰¹ Didron, 1868: 20.

⁴⁰² "[d]es parties de certaines verrières, placées à portée de la main, ont été brisées par les visiteurs". Didron, 1868: 5.

⁴⁰³ Allwood, 1980: 454.

⁴⁰⁴ Collins & Autenrieth won the architectural competition for the permanent Memorial Hall but their plans were aborted. Henry J. Schwarzmann, who was in charge of the Centennial Exhibition layout, designed the accepted plans for both the Memorial and Horticultural Halls.

etc". ⁴⁰⁵ The Great Centennial Exhibition Critically Described and Illustrated noted that the stone building was well suited to the display of stained glass. The windows here "formed a pleasant relief in the hot summer days from the vertical light and heat of the galleries". ⁴⁰⁶ Yet the periodical press criticised the poor display of the decorative arts, including stained glass:

Illustrative and creative art declines an alliance with decorative and useful, and crowds it bodily out of these granite portals. Room is made for a few stained-glass windows, but those gay defiances of the command "let there be light" carry their rainbow hues to more congenial retreats. France devotes a building to them. Munich and Italy also compete for eminence in what exacting amateurs call a lost art. The exile of stained glass windows is shared by the photograph. 407

The writer refers to the increasing number of private ventures to display stained glass; the stained glass and ceramics pavilion constructed by France, and the private pavilion of French glass-painter Nicolas Lorin, who travelled from Chartres to Philadelphia for this exhibition. ⁴⁰⁸ Although photography was excluded from the Memorial Hall displays, the stained glass exhibits of F.X. Zettler of Munich in the German section of the Photographic Hall, once again, point to the relationship between these two mediums, discussed in more detail in Chapter 5. ⁴⁰⁹

Main Exhibition Building

A greater number of the stained glass exhibits were to be found in Pettit and Wilson's Main Exhibition Building on Lansdowne Plateau, west of the banks of the Schuylkill River. This building was a temporary structure of wood, iron and glass in the shape of a parallelogram, with a central nave and aisles (Fig. 2.54). Foreign nations occupied separate sections within the building, each constructing their own national court, some of which included stained glass. Surviving photographs reveal stained glass panels displayed amongst the glass objects of Austria (Figs. 2.55 and 2.56). Although most British exhibits were placed in the north end of the building, the British stained glass exhibits were found chiefly in the gallery at the south

⁴⁰⁶ Sandhurst et al., 1876: 23.

⁴⁰⁵ Magee, 1876: 120.

⁴⁰⁷ Lippincott's Magazine (October 1876): 413.

⁴⁰⁸ Lorin, 1878; Post, 1976: 179.

⁴⁰⁹ Catalogues do not give us any detailed information about Zettler's exhibits here, but, presumably, the displays were similar to those in Maréchal's pavilion and the Photosculpture Pavilion in 1867.

⁴¹⁰ Gardner, 1878; Ingram, 1876: 109

⁴¹¹ See Gilberti, 1876. Stained glass windows were shown on a high screen in Austro-Hungary's section. *Philadelphia 1876. A Collection of Newspaper Clippings*, 1876: 104.

end of the transept, in a manner that imitated the 1862 display (Fig. 2.57). ⁴¹² The *Official Report* acknowledged that:

The glass-stainers' art was well represented [in the art galleries]; but as a general rule the great bulk of the 'Art Applied' found place in the Main Building, because exhibitors preferred to keep their various objects together in one group rather than to separate and distribute them about in different localities in conformity with the strict order of classification. 413

Indeed, many exhibitors of stained glass exhibited other art objects including metalwork, ceramics, sculpture, and mosaics. 414 Cox & Sons, frequent exhibitors since the Great Exhibition of 1851, exhibited numerous ecclesiastical and domestic furnishings at the Philadelphia Exhibition, including a chimney piece, embroidered mantel board, and ebonised corner cupboard, some carved oak furniture, bronze ornament, and stained glass church windows, a wrought iron pulpit body, lecterns, church plate, brass work, art tiles and plaques. 415 Engravings of Cox & Sons' exhibits often illustrated these wares together. 416

James Powell & Son's Display

A photograph of Powell & Son's stand reveals that the firm showed an integrated decorative display of carpets and stained glass at the Philadelphia Exhibition (Fig. 2.58). 417 The exhibitor's name and address are clearly signposted amongst rows of decorative stained glass medallions and figurative panels. Amongst these are replica panels of a three-light window designed by Henry Holiday under Burges's direction for St Michael's Church, Mere, Wiltshire, depicting the Angel appearing to three women at Christ's tomb, Christ and Mary Magdalene in the Garden, and three women telling the Disciples of Christ's Resurrection (Fig. 2.59). 418 In 1876, the central panel of the Mere window, depicting Christ's appearance to Mary Magdalene, was paired with an unidentified light depicting the Baptism of Christ from another window. To its left, the remaining two lights from the Mere window were displayed in a reverse arrangement therefore confusing the biblical narrative. In addition, the harmony of the coloured backgrounds, intended as alternating blue and reds following many medieval glazing

⁴¹² McCabe, 1876: 371.

⁴¹³ United States Centennial Commission, 1879, Vol. 1: 140.

⁴¹⁴ Hardouin-Fugier, 1990: 210.

⁴¹⁵ United States Centennial Commission, 1876: 217; Mitchell, (October 1876): 896; Sweny, 1876: 28.

⁴¹⁶ For example, see Cassell, 1862: 52; *The Art Journal Illustrated Catalogue*, 1868: 178.

⁴¹⁷ Gross and Synder, 2005: 46.

⁴¹⁸ These replica panels had also formed part of the firm's display at Paris in 1867.

schemes, and the staggered elevation of the architectural canopies (higher in the central panel) were disrupted through this new arrangement. In this Exhibition display context then, the Mere replica encouraged alternative iconographic readings.

Powell & Son's display demonstrates the multimedia encounters Exhibition-goers experienced at the exhibitions. Beneath the Mere panels, small rugs were mounted on the wall, and large carpets adorned the space on the adjacent surfaces. Floor and wall surface decorations such as carpets, rugs, tapestries and stained glass were notoriously difficult to display in exhibition spaces. 419 Powell's 1876 display was cordoned off by railings, and appears part museum exhibit, part showroom. The rarity of such images, which reveal the diverse and eclectic interiors and 'shop fronts' created by many exhibitors have meant that they have been almost completely ignored by art historians, 420 despite contemporary realisations that "an international exhibition is an immense showroom [...] organised along the same principles as 'every shop window in the world' ".421

Paris, 1878: Exposition Universelle

Palais du Trocadéro

The wings of Gabriel Davioud's arc-shaped Palais du Trocadéro, built facing the Champ de Mars on the Chaillot Hill for the 1878 Paris Exposition, 422 were furnished with a series of more than a dozen stained glass windows illustrating the history of the industrial and applied arts in France and Europe (Fig. 2.60). 423 Davioud commissioned several French stained glass painters to create these windows, and their prominent place in the Trocadéro building further confirmed the applicability of the medium to monumental public exhibition buildings following the success of Maréchal's 1855 windows in the Palais de l'Industrie. The subjects of the Trocadéro windows reflected the fact that the building housed a retrospective exhibition of

⁴¹⁹ This was acknowledged by critics at the Paris Expositions of 1867 and 1878. See Weld, 1867: 414; *Magazine* of Art (January 1878): 190.
420 Gilberti draws attention to some of these displays. See Gilberti, 2002.

⁴²¹ The Art Journal Illustrated Catalogue, 1878: 7-8.

⁴²² The Palais du Trocadéro was demolished in 1935 and replaced by the current Palais de Chaillot for the 1937 Exposition Internationale.

For contemporary descriptions see Didron, 1880: 69-71; Exposition Universelle de 1878. Le Palais du Trocadéro, 1878: 71-73, 101-102, 109-12.

art at ground level, and of contemporary art and sculpture at gallery level, and thus the windows acted as monumental signposts. Furthermore, there was a clear hierarchy in the scheme of stained glass; with industrial arts represented in the windows placed by the staircases, the applied arts in the tall windows of the galleries, and fine arts and printing reserved for the more prominent pavilion windows along the façade of the building.

The staircase windows illustrated the history of musical instruments (by Gustave Bourgeois), the clock industry (Henri Crapoix), iron (Gsell-Laurent studio), and saddlery and coachbuilding (Julien-Stéphane Bazin). Those in the galleries depicted the history of furniture (Ottin) (Fig. 2.61), goldsmithery (Émile Hirsch) (Fig. 2.62), arms manufacture (Lafaye), and ceramics (Louis-Charles-Auguste Steinheil, Louis Bonnot and Charles-Ambrose Leprévost). The terminal walls of the two pavilions joined to the central rotunda (built facing the Seine), contained three windows showing the history of printing, engraving and binding (Lévêque), and another three windows depicting the history of the liberal arts: painting (Hirsch) (Fig. 2.63), the history of sculpture in France, Italy and Spain (Martin Philippe Queynoux), and architecture (Paul Nicod). Thus in the Trocadéro, stained glass was used to convey the subtle but distinct divisions between industrial workmanship, artistic design and invention.

As Elisabeth Hardouin-Fugier has noted, the contributors to this glazing scheme were a diverse group of provincial and Parisian studios, veterans of the archaeological Sainte-Chapelle glazing competition, and students of the sixteenth-century pictorial style. 424 Most had exhibited stained glass at previous Paris Expositions, although this venture marked the International Exhibition debut of Crapoix and Hirsch. The involvement of so many stained glass artists made it difficult to produce a coherent scheme. The windows placed on the stairs were intended to be in colour, and those in the galleries in grisaille, yet some glaziers did not adhere to these instructions. As Didron noted:

[T]he work of M. Steinheil was coloured, when the other stained glass windows of the same series, belonging to the family of grisaille, have between them quite considerable differences of tonality which break the general harmony and trouble the idea that one can make a decorative ensemble.⁴²⁵

424 Hardouin-Fugier, 1990: 208. Except for provincial glaziers, Lévêque (Beauvais) and Bazin (Mesnil Saint-Fermin), all the contributing artists were from Paris.

⁴²⁵ "[Q]ue l'œuvre de M. Steinheil est colorée, quand les autres vitraux de la même série, s'ils appartiennent à la famille des grisailles, ont entre eux des différences de tonalité assez considérables pour rompre l'harmonie générale et troubler les idées que l'on se peut faire d'un système décoratif d'ensemble." Didron, 1880: 70.

Although most of these windows appear to have been removed and destroyed during the 1937 reconstructions of the Palace, 426 the three main lights from the Ceramic arts window, after cartoons by Steinheil, Bonnot and Leprévost were recently discovered in the basement of the Musée des Monuments Français, Paris, and restored in 2005 (Fig. 2.64). 427

The Palais du Champ de Mars⁴²⁸

On the other side of the Seine, and connected to the Palais du Trocadéro by the Pont d'Iéna, the Palais du Champ de Mars, designed by Léopold Amédée Hardy, contained the bulk of the French and foreign stained glass exhibits (Fig. 2.65). Just outside the Palais, at the southeastern end of the Champ de Mars facing the Military School, the stained glass pavilions of Lorin, and Champigneulle and Maréchal were located on either side of Bartholdi's head of the Statue of Liberty (Fig. 2.66). Champigneulle and Maréchal's pavilion contained religious statues and stained glass, reminding us of the previous enterprising private displays led by Pugin in 1851 and Lévêque in 1867.

Paris, 1889: Exposition Universelle

Cathedral of Machines

At the 1889 Paris Exposition, the official space reserved for stained glass was in the Galerie des Machines, which housed steam engines, electro-dynamos and other machinery, and stood opposite the *clou* of the Exhibition, Gustave Eiffel's 984 foot-high iron tower (Figs. 2.67 and

⁴²⁶ Some photographs of other windows, c.1892 survive in the Maciet Collection (482.21), Bibliothèque des Arts Décoratifs, Paris.

⁴²⁷ See Dulau, 2004: 48-49; Baguelin, 2005; Luneau, 2006: 80-81.

The Palais du Champ de Mars was torn down and replaced by the Galerie des Machines for the following 1889 Exposition.

⁴²⁹ Magazine of Art (January 1878): 190.

⁴³⁰ Maréchal opened his studio in 1837 and handed over to Champigneulle in 1867. Brisac, 1986: 153. Hardouin-Fugier, 1990: 207.

⁴³¹ See Bergerat, 1878.

2.68). 432 This space was only allocated a month before the Exhibition opened, which may explain the dispersal of stained glass across the exhibition site, in national and colonial pavilions. In his review of stained glass at the 1889 Exposition, Champigneulle expressed his disappointment that Exhibition organisers had not made adequate provision for the display of stained glass sooner; he wrote, "one can only express the deepest astonishment that an art so brilliant and so well made for seducing has been so much abandoned". 433

However, the presence of stained glass in the Galerie des Machines, the largest iron and glass covered expanse at the time, further suggested the medium's strong associations with modernity and industrial development (Fig. 2.69). Elevator systems and overhead moving walkways gave visitors the opportunity to view windows from a distance, at an elevated height, and in motion, thus providing an emphatically modern means of viewing the medium (Fig. 2.70). Yet, the vast industrial space also triggered comparisons with religious spaces, and a large 'demi-rose' window depicting the Chariot of the Sun (from Lorin's studio), from Greek mythology, stood over the central bay in front of the military school (Fig. 2.71). 434

French novelist Joris-Karl Huysmans, believed that such decorations, when applied to an enormous iron and glass structure in which the sacred contents or 'jewels' were machines, was profane. He wrote:

[T]he central dome, lighted from within, has the air of a night lamp ornamented with imitation stained-glass windows of painted paper, but the irritating excesses of its decorations are stilled despite the strings of glimmering lights that run along the cupola, the dry and strident lustre of its bronzes, and its gold is extinguished, and one dreams, before this monumental entry and the gallery it commands, of a church consecrated to the cult of money, sanctified by an altar whose steps are being climbed to the sound of steam organs by the richest man in the world, the American pope, Jay Gould, who celebrates the yellow mass, and in front of the kneeling crowd, to the repeated peals of electric bells, raises the host, the bank check, detached from a checkbook!⁴³⁵

434 Champigneulle, 1891: 179.

⁴³² The Galerie des Machines was designed by Ferdinand Dutert (1845-1906), and executed by Victor Contamin (1840-93). See Stamper, 1989. The Galerie des Machines was used in the Exposition of 1900, although for this Exposition the building was altered and a huge rotunda, the Salle des Fêtes, was erected in the middle of the

space. It was demolished in 1910.

433 "on ne peut qu'exprimer le plus profond étonnement qu'un art si brillant et si bien fait pour séduire ait été tant délaissé". Champigneulle, 1891: 175.

⁴³⁵ Translated from Joris K. Huysmans 'Le Fer', *Certains* (Paris, 1889): 401-10. Quoted in Holt, 1988: 76.

Gould was a leading railway developer in the USA who remains one of the richest Americans in history. Huysmans saw the use of stained glass in this industrial setting as an abuse of the medium and its effects, especially given that it was illuminated "from within" rather then from the natural light outside. In this new age of Capitalism stained glass appeared as a cheap 'imitation' and a witness to sacrilege. Huysmans's description anticipates, in some ways, the satanic masses described in his novel $L\hat{a}$ -Bas (1891), and hints at his own conversion narrative, as also documented in En Route (1895) and La Cathédrale (1898).

Stained glass formed part of an elaborate and ambitious decorative scheme in the Galerie des Machines, as well as housing windows made for other buildings. As John Stamper has stated, "[t]he whole building was decorated with colored glass, mosaic work, paintings, and ceramic bricks, so that the great metal skeleton became essentially the frame of an enormous jewel box". 437 Under the central dome of the vestibule, six allegorical figures in stained glass represented *Le Céramique*, *L'Orfèvrerie*, *Le Verre*, *La Tapisserie*, *La Pierre* and *Le Bois*. 438 These subjects, designed by Champigneulle Fils, paid tribute to historic French artistic industries, and their Renaissance-style design suggested their rebirth and transformation at the hands of modern artists. Furthermore, the ceiling was filled with agricultural allegories, and thus this ensemble of stained glass decoration paid homage to modern commerce, from Agriculture and the Industrial Arts to modern machinery. 439

Chicago, 1893: World's Columbian Exposition

Manufactures and Liberal Arts Building

At the Chicago World's Columbian Exposition of 1893 (Fig. 2.72), the official, neoclassical Exhibition buildings appeared as an architectural and aesthetic unity, a 'White City' (Figs. 2.73 and 2.74). 440 Plans for the design and decoration of all state, non-official and foreign buildings and pavilions had to be submitted to the Designer-in-Chief, Charles Atwood, for approval, and two leading artists, the sculptor Augustus Saint-Gaudens and designer Francis

⁴³⁶ For Huysmans see Baldick, 2005.

⁴³⁷ Stamper, 1989: 337.

⁴³⁸ Champigneulle, 1891: 178. See Emery and Morowitz, 2003: 76.

⁴³⁹ Gautier, 1889: 29.

⁴⁴⁰ Allwood, 1980: 454. This classical style, fashioned after the Greeks and Romans, represented the Republican and Democratic spirit of America.

Millet, were placed in charge of the sculptural and painted decoration, respectively, in an attempt to reduce eclecticism. Significantly, Millet, past student of the *Ecole des Beaux Arts*, was one half of the Chicago stained glass firm Healy & Millet. Following classification as a manufacture, the displays of stained glass were widely dispersed across the Manufactures and Liberal Arts Building designed by George Post, the largest building in the world at the time of construction (Fig. 2.75). He American stained glass exhibits occupied part of the northeastern gallery (section F), while foreign stained glass exhibits were located in national pavilions within the building, the façade of which also required Atwood's approval (Figs. 2.76 and 2.77). As the *Art Journal* reported, the few British specimens of stained glass were "allotted space utterly unsuitable for their display", and consequently went "unnoticed by the vast majority of visitors".

Tiffany's Pavilion

One of the most significant displays of stained glass at this Exposition was to be found in Tiffany's Pavilion, located within the Manufactures and Liberal Arts Building at the angle of the central alley, facing the French section (section N1, see Fig. 2.76). Like the displays led by Pugin (1851) and Lévêque (1867), Tiffany separated his stained glass exhibits from those of other stained glass exhibitors in order to form an integrated display of exhibits from multiple categories of classification in one location, and this was one of the reasons for his success. Unlike these earlier projects, however, Tiffany dedicated different parts of his pavilion to secular and ecclesiastical exhibits, thus catering for all consumer groups. The pavilion included a Light Room and a Dark Room, both containing secular stained glass, and a Byzantine Chapel (Fig. 2.78), a 24ft-high, 37ft-long and 24ft-wide construction of iridescent glass and mosaic, built to display his ecclesiastical wares which included stained

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⁴⁴¹ Millet also worked with La Farge. See Yarnall, 1986.

⁴⁴² Findling, 1994: 18.

⁴⁴³ For a review of the stained glass exhibits see *The American Architect and Building News* (November 11, 1893): 74-75.

⁴⁴⁴ Art Journal (December 1893): 29.

⁴⁴⁵ For contemporary descriptions of the stained glass see *Chicago Daily Tribune* (June 3, 1894): 6.

⁴⁴⁶ For Tiffany's exhibit see Yarnall, 1997: 31; Long, 2002: 83-84. Tiffany secured this space through his father's jewellery company. See Sloan, 1997.

jewellery company. See Sloan, 1997.

447 The windows here included Woman Feeding Flamingoes (Morse Museum of American Art, U-D72) and Parakeets and Gold Fish Bowl (Museum of Fine Arts, Boston, 2008.1415). See Long, 2002: 77.

glass panels in the Byzantine, Northern Renaissance, Italian Renaissance and modern opalescent styles. 448

The chapel charmed visitors with its particular blend of modern theatrical invention and use of electric lighting. 449 As one American reporter noted:

Tiffany was the only firm that gave its glass any artistic setting. The ecclesiastical glass either for windows or lamps was placed in a Romanesque chapel so perfect in its appointments that it was not an uncommon sight to see men remove their hats upon entering the "sacred" precincts.⁴⁵⁰

The Byzantine style, noted for its use of colourful mosaics and lavish decorations, was highly appropriate for Tiffany's chapel, where the principal motif was the mosaic in the reredos depicting a peacock, symbol of the artist-alchemist and aestheticism, as well as eternal life and the Resurrection in the Christian church.⁴⁵¹

As J.B. Bullen has noted, "[t]he chapel was a huge national and international success, and its achievement in advertising Tiffany's business was considerable"; it was viewed by 1.4 million visitors. After the Chicago Exposition, the Tiffany Chapel returned to Tiffany & Co's New York showrooms. It was purchased in 1898 by Mrs Celia Whipple Wallace as a memorial to her son and then installed in the Episcopal Cathedral of St John the Divine, New York. Having been removed from the cathedral after water damage in 1916, the chapel was repaired by Tiffany and installed in a freestanding building at his estate, Laurelton Hall, where it remained until the mid-twentieth century. It has since been reconstructed for display at the Charles Hosmer Morse Museum of American Art, Florida (Figs. 2.79 and 2.80). The Tiffany Chapel is, therefore, a rare example of a surviving exhibition display integrating stained glass, although it has been reconfigured for several different settings since 1893.

⁴⁴⁸ Long, 2002: 71-85.

⁴⁴⁹ French painter and goldsmith, André Bouilhet rated the Chapel as "somewhat theatrical but a great success". Bouilhet, 1893-94: 65-79.

⁴⁵⁰ The American Architect and Building News (November 11, 1893): 74.

⁴⁵¹ Schuler, 1971: 37-53.

⁴⁵² Bullen, 2005: 397, n.50.

⁴⁵³ See De Kay, 1899.

⁴⁵⁴ The chapel was dismantled in 1949. In 1959 some of the windows were bought by the Morse Museum and the chapel was reassembled there in 1997-99. See Long, 2002.

Woman's Building

A number of stained glass designs, cartoons and completed windows made by female artists were exhibited in the 1893 Woman's Building (Fig. 2.81). 455 This display led Maud Howe Elliot, the author of Art and Handicraft in the Woman's Building (1893), to remark, "few are aware how much artistic labour is performed by women in the new directions of designing, cutting, leading, and painting of stained glass [...] and in many other directions absolutely new to women". 456 This was true across the world, but especially in the USA. Elliot continued, "[i]n the great American revival of stained glass, our women are doing much creditable work. Many of the best firms, including that of Tiffany, employ women designers, who have met with very great success". 457 Famously, in 1892, Tiffany established a Women's Glass Cutting Department after the New York Lead Glaziers and Glass Cutters' Union workers went on strike during preparation for the Chicago Exposition. 458 Tiffany noted that the women in this department, led by Clara Driscoll and known demeaningly as 'the Tiffany Girls', possessed "a more refined appreciation of the subtle differences between tone and tone and at the same time greater taste in their combination". 459 Some of the American exhibitors of stained glass whose work was represented in the Woman's Building included Marie Herndl of Chicago; 460 Margaret Armstrong; 461 and 'Tiffany Girls' Mary McDowell, Agnes Northrop, Anne Weston (née Van Derlip), and Mary Tillinghast of New York, 462 who held a partnership with La Farge 1882-83. 463 In addition to these American exhibitors, Mary Newill, from Edgbaston, Birmingham, exhibited stained glass cartoons, 464 and the Ladies' Committee in Stockholm, Sweden, collectively exhibited a window depicting St Bridget.

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⁴⁵⁵ The Philadelphia Centennial played host to the first Woman's Pavilion, which included some stained glass windows, see Rideing, 1876: 793; Trachtenberg, 1982: 52; Greenhalgh, 2011: 84. But stained glass featured more prominently in parlours, boardrooms and offices within the 1893 Pavilion. See Elliott, 1893; *The American Architect and Building News* (November 11, 1893): 75. A window by Marie Herndl of Chicago in the Board Room depicting *The Queen of the Elves* was "the object of much attention". This window also belongs to The Smith Museum of Stained Glass. See Garfinkle, 1996: 116, 120; Garfinkle, 2012.

⁴⁵⁶ Elliot, 1893: 61.

⁴⁵⁷ Elliot, 1893: 61.

⁴⁵⁸ Eidelberg et al., 2007: 99.

⁴⁵⁹ Tiffany, 1893: 627.

⁴⁶⁰ Herndl hailed from Munich and studied in Bavaria before moving to Milwaukee, Wisconsin. See Briggs, 1911.

 ⁴⁶¹ Armstrong, daughter of stained glass artist David Maitland Armstrong, was perhaps better known for her work as a bookbinder and author. Her sister also designed stained glass.
 ⁴⁶² One of Tillinghast's designs, which appears to illustrate the state of Kansas, was illustrated in Elliot, 1893: 15.

⁴⁶² One of Tillinghast's designs, which appears to illustrate the state of Kansas, was illustrated in Elliot, 1893: 1 ⁴⁶³ Tillinghast was a stained glass designer, established in New York from 1882. Previously she had studied in Paris under Carolus-Duran and Henner. Yarnall, 2012: 118.

⁴⁶⁴ Newill is known to have embroidered tapestries with May Morris and other pupils of Birmingham College of Art for Morris & Co.

Some windows in the Woman's Building were more prominent than others however. 465 The central window of three stained glass windows installed behind the stage at the east end of the Assembly Hall (see Fig. 3.2), used for musical performances, meetings and lectures, depicted Massachusetts Mothering the Coming Woman of Liberty, Progress and Light. 466 This window is now in The Smith Museum of Stained Glass, Navy Pier, Chicago (Fig. 2.82). Designed by Elizabeth Parsons, Edith Brown, and Ethel Brown, and made by Ford & Brooks of Boston, the window features a 7ft-high personification of Massachusetts joining hands with a younger woman wearing a liberty cap and holding a torch. These figures are surrounded by the names of famous progressive women from the seventeenth- to nineteenth-centuries. 467 The window can be interpreted as a symbol of the New Woman. Its subject matter and title refer to Liberty (or Freedom) and Light (Enlightenment), and it held a central position in the Woman's Building demonstrating how the International Exhibitions reveal the active role of women in nineteenth-century stained glass production, in spite of the fact that this is scarcely acknowledged in stained glass historiography. 468

Paris, 1900: Exposition Universelle

The Stained Glass Pavilion

As we have already seen, at the final exhibition that I consider in this study, Paris 1900, stained glass finally gained autonomous classification. Provision was made for the display of stained glass in a pavilion projecting from the Grand Palais de la Décoration et du Mobilier on the Esplanade des Invalides, yet this remained separated from the fine-art displays in the Grand and Petit Palais by the Pont Alexandre III (Fig. 2.83). 469 The first floor of the pavilion, reserved for the French stained glass exhibits, was a space 45m long and 18m wide with an

⁴⁶⁵ See Garfinkle, 1999; Garfinkle, 2012.

⁴⁶⁶ Elliot, 1893: 37; Garfinkle, 1996: 119-20. Another of the three windows, by Mary Crease Sears, depicted the *Seal of Boston* (Garfinkle, 2012: Pl. 13). The third window is unknown. ⁴⁶⁷ See Garfinkle, 2012: 37, n.13.

⁴⁶⁸ For further discussion, see Chapter 4. For women stained glass artists in Britain, see Binnall, 1979-80; Bowe, 1986: Cormack, 1985: Brown, 2006.

⁴⁶⁹ The pavilion was at the meeting point of rue de l'Université and rue de Constantine. Daumont-Tournel, 1902: 31.

interior hall and glass ceiling. 470 Foreign stained glass exhibits were, however, dispersed across the various foreign sections on the other side of the Esplanade des Invalides. 471

L'Exposition rétrospectif du vitrail

In a vestibule preceding the room of contemporary stained glass in the Grand Palais de la Décoration et du Mobilier, several examples of ancient French stained glass from the twelfthto nineteenth-centuries were displayed with the intention of instructing contemporary glass painters and others in medieval art and reflecting upon modern progress. 472 This retrospective exhibition occupied a quarter of the total space allocated to the display of French stained glass. 473 As government architect Lucien Magne's official report stated, the display demonstrated that stained glass was "essentially a French art". 474 An entire committee of French glass painters, together with Magne, assembled the display from the private collections of glass-painters and collectors as well as government collections in the Service de Monuments Historique and the Direction des Cultes. ⁴⁷⁵ The panels (all French) were arranged chronologically by region, alongside watercolours and designs showing the entire windows, thus presenting the fragmented exhibits as part of an architectural whole, collated with the purpose of demonstrating the national and historical development of stained glass in France.⁴⁷⁶ This also gave viewers and critics a more comprehensive exhibition of the art of stained glass, from conception of the design to execution in glass, lead and paint.

Most exhibits were medieval. Only a few fragments from the seventeenth- to early nineteenthcenturies were shown, thus perpetuating the myth that this period marked the decline of stained glass. 477 The contemporary nineteenth-century displays began with the products of the Royal Manufactory of Sèvres, emphasizing the history of royal patronage leading up to the Third Republic. A nineteenth-century pastiche in imitation of the twelfth- and thirteenthcentury stained glass at Chartres executed by Nicolas Coffetier was also selected for display, demonstrating an eclectic medievalism that characterised much of the stained glass exhibited,

⁴⁷⁰ Didron complained that this space was poorly lit. Didron (September 1900): 269.

⁴⁷¹ Daumont-Tournel, 1902: 32.

⁴⁷² See Moliner et al., 1901.

⁴⁷³ Daumont-Tournel, 1902: 32.

^{474 &}quot;essentiellement un art français". Magne, 1902: 34.

⁴⁷⁵ French glass-painters Henri Babonneau, Marcel Delon and Lucien Begulé contributed some stained glass panels and designs from their own private collections to the display, as did the Fouques-Duparc family.

476 Didron drew attention to the instructive value of this archaeological display. Didron (September, 1900): 269.

⁴⁷⁷ Magne, 1902: 31.

as we shall discover in Chapter 5. More recent panels by French glass painters Charles Lebayle (to the designs of François-Émile Ehrmann), Leprévost and Tournel, along with designs and maquettes by Merson and Ehrmann, were also displayed.

This retrospective display pre-empted the educational aims, taxonomic logic, and aesthetic of modern museum displays of stained glass, perhaps more than any other International Exhibition display. It did so, firstly, by prioritising a close-up viewing of the fragmented detail/panel over the entire window and its architectural context. Secondly, it combined historic interest with concerns for public education and future restoration and heritage. Daumont-Tournel described the technical and educational benefits of the display and pressed for the collection to be permanently displayed in the Musée des Arts Décoratifs or Musée de Trocadéro for the benefit of both the public and modern glass-painters. His report also recommended that temporary exhibitions of panels in the process of restoration, displayed alongside the resources available to the stained glass restorer, copies, monographs, documents and photographs, would be of further educational use. Horizontal aims, taxonomic logic, and aesthetic of modern glass-up in the fragmented actional approach to the fragmented actional aims, taxonomic logic, and aesthetic of modern glass-up in the fragmented detail/panel over the fr

Le Vieux Paris

Elsewhere, the medieval past was presented in a more theatrical fashion. Vieux Paris, or 'old Paris', a reconstruction of Paris circa 1500, was one of many architectural ensembles constructed along the Seine, which united medieval history with modern scenery and mock-medieval buildings and streets, complete with actors in medieval costume (Fig. 2.84). The recreated thirteenth-century medieval church of Saint-Julien-des-Ménestriers, the church of the brotherhood of jugglers and minstrels of Paris, formed part of this complex (Figs. 2.85 and 2.86). The reconstructed church was furnished with a set of modern stained glass windows designed by Albert Robida and executed by Monsieur Richard, as published in Robida's *Le Vieux Paris*, *études et dessins* (1901). The windows recalled the history of the foundation of the church and its particular relationship to art and music. They depicted minstrels serenading

⁴⁷⁸ Daumont-Tournel, 1902: 33.

⁴⁷⁹ This hints at more rigorous documentation of conservation, which has been more fully implemented in the twentieth century through guidelines published by the CVMA.

⁴⁸⁰ However, stylistically, Vieux Paris was actually an eclectic mix of 15th-, 17th- and 18th-century architecture. It was based on the success of the Bruxelles-Kermesse which had featured at the 1897 Brussels Exposition.

⁴⁸¹ Antoine Vidal published a history of the church as part of a series on *Les vielles Corporations de Paris*, which appears to have inspired Robida, as his illustrations are based on one of Frédéric Hillemacher's plates. See Vidal, 1878: frontispiece.

a statue of the Virgin Mary with prayer and music; Saint Cecelia and angel musicians; and the history of the chapel's foundation as a hospice for injured minstrels (Figs 2.87, 2.88 and 2.89). At the 1900 Exposition, the reconstructed church was used for concerts of medieval religious music, and thus the subjects of the stained glass windows adopted even greater significance and formed part of a multisensory experience. The church of Saint-Julien-des-Ménestriers reconnected stained glass (albeit in a modern guise) with the medieval period, and, as with many previous Paris Expositions, placed the medium within an architectural framework, demonstrating its monumental function.

Bing's Art Nouveau Pavilion

In addition, the Esplanade des Invalides housed a number of official and private pavilions devoted to decorative arts in which contemporary stained glass exhibits were displayed. French decorative art was organised according to provincial areas and took up the west side of the Esplanade, with foreign decorative art on the east side. Amongst the buildings on the French side, between the Seine and the Gare d'Orsay under the trees and close to the Breton village, was Bing's Art Nouveau Pavilion (Fig. 2.90). This pavilion marked a departure from previous private displays initiated by architects and artists like Pugin, Lévêque and Tiffany, because it was organised by a German-born ceramics dealer and patron of the Art Nouveau movement, Siegfried Bing, and thus signalled the rise of commercial art dealers and galleries. Bing's Pavilion served as an extended advertisement for his Parisian gallery, *Maison Bing* or *L'Art Nouveau*, 484 which opened in 1895 and displayed the works of a range of artists such as Aubrey Beardsley, Auguste Rodin, Camille Pissaro, Henri de Toulouse-Lautrec, Walter Crane, Charles Rennie Mackintosh, Emile Gallé, and Tiffany. 485

Bing's pavilion at the Paris 1900 Exposition was the culmination of his artistic vision. Designed by recent architecture graduate, André Louis Arfvidson, the pavilion was fashioned as a private house with a series of fully-furnished decorated interiors. Glass was a key feature of the pavilion. Skylights and stained glass windows illuminated several of the rooms, and the

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⁴⁸² Robida, 1901.

⁴⁸³ Siegfried Bing (often erroneously called Samuel) relocated to Paris in 1854 and became a naturalised French citizen in 1876. His family imported French porcelain and glass to Hamburg. See Weisberg, 1986.

⁴⁸⁴ The term *Art Nouveau* derives from the name of Bing's shop at 22 Rue des Provence, Paris.

⁴⁸⁵ When this gallery opened, some stained glass panels, designed by a number of young French artists and executed by Tiffany, were installed into the shop. Bing had a successful business relationship with Tiffany. See Weisberg, 1986; Eidelberg, 2005.

curved wall of the passage to the bedroom was formed entirely by stained glass designed by Georges de Feure (see also Chapter 5). Bing invested half a million francs in the Pavilion, and his return was international acclaim. His Pavilion came to be viewed as representative of the Art Nouveau style in the same way that Pugin's Medieval Court represented the Victorian Gothic style in 1851. Both were innovative and collaborative displays that featured stained glass as part of an integrated interior, and Bing may have learned from Pugin's successful display. The International Exhibitions provided many different settings for the display of stained glass, and demonstrated a variety of ways of displaying the medium, even within a single exhibition. Furthermore, at the 1900 Exposition, stained glass was presented in both 'medieval' and 'nouveau' contexts, reflecting the complicated relationship between medieval tradition and modern innovation, as we shall explore in more detail through an analysis of exhibits in Chapter 5.

Conclusion

In spite of attempts to arrange stained glass by material classification and national provenance, most displays responded to both the practical requirements of displaying stained glass and plain old contingency. The lack of forward planning and poor provision of space resulted in eclectic modes of display and the dispersal of stained glass exhibits across exhibition sites, making a comprehensive survey impossible, both then and now. Yet, this chapter has identified ways in which the Exhibitions displayed stained glass, more or less successfully, for organising authorities, exhibitors and dealers, as well as visitors.

The first stained glass gallery at the Great Exhibition of 1851 set a standard for future exhibitions such as the display of stained glass in the Grand Vestibule at the 1867 Exposition and influenced future museum displays of the medium. International Exhibitions also played a key role in advocating the modern application of stained glass. Exhibition buildings, such as the Crystal Palace, Palais de l'Industrie, and Galerie des Machines, set precedents for the medium's use in modern iron and glass constructions. The placing of stained glass windows in

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⁴⁸⁶ Mourey, (September 1900): 278. Although many rooms were furnished with Tiffany's glassware and lamps, Tiffany's stained glass exhibits were shown in his own pavilion in the American section.

⁴⁸⁷ Items from Pugin's court were purchased by the South Kensington Museum after being shown at the Great Exhibition, and a number of Bing's exhibits were purchased by museums after the Paris Exposition of 1900. Including the Danish Kunstindustrimuseum; Nordenfjeldske Kunstindustrimuseum in Trondheim, Norway; London's South Kensington Museum; and the Musée des Arts Décoratifs, Paris. Weisberg, 1986: 218-19; 229.

restaurants (1862), covered walkways (1867), machinery halls (1889), and in theatrical reconstructions such as the church of Saint-Julien-des-Ménestriers (1900), provided new and unusual settings for the medium, in addition to the more 'traditional' displays that imitated domestic or ecclesiastical spaces.

When placed within the architectural framework of exhibition buildings, in the prominent and strategic displays in the tympana of the 1855 Palais de l'Industrie, transepts of Fowke's 1862 exhibition building, window openings in the Palais du Trocadéro in 1878, and the Galerie des Machines of 1889, stained glass was effectively displayed as a monumental architectural decoration. These settings provided architectural frames that permitted natural light to be transmitted through the glass, therefore enabling better viewing conditions. Many of these exhibition buildings stimulated new commissions for stained glass as well as providing display space for windows made for other destinations, further reminding us of the ways in which the Exhibitions created new applications and iconographies for the medium.

The inadequate provision for stained glass in exhibition spaces designated by officials led to the rise of more innovative and commercially driven displays organised by glass-painters and their patrons, which placed stained glass within a wider decorative context in private pavilions and chapels. As Day noted in 1878, the "stained glass exhibited in the separate houses has a better chance of appreciation". Pugin's Medieval Court (1851), Lévêque's chapel (1867), and the private pavilions erected by Lorin (1876 and 1878), Champigneulle and Maréchal (1867 and 1878), Tiffany (1893), and Bing (1900) integrated stained glass with other interior furnishings in a more homogenous manner, given that, in such pavilions, stained glass panels were seen "in their natural environment, and benefitted from an overall decoration".

There was no holistic experience of viewing stained glass at the International Exhibitions. The spatial, visual and relational contexts between surrounding exhibits and the architectural environment changed from one display, and one exhibition, to the next, and over time. The way in which W.S. Gilbert, in his article on the 1862 Exhibition in *Bentley's Miscellany*, moved from a discussion of stained glass to the handicraft of fabrics, reminds us of this.⁴⁹⁰

⁴⁸⁸ Day, 1878: 4.

⁴⁸⁹ "ils étaient ainsi présentés dans leur cadre naturel, et bénéficiaient d'une décoration d'ensemble". Daumont-Tournel, 1902: 32.

⁴⁹⁰ "The stained glass has been, for the most part, placed in such unsuitable situations, that it is perhaps hardly fair to judge of its merits, so, from this hasty glance at productions of the arts which decorate our homes, we pass to the fabrics employed for dress". W.S.G., 1862: 153. W.S.G. is likely W.S. Gilbert of Gillbert and Sullivan.

Furthermore, depending on the lighting conditions, size of the exhibited panel or window, its height, and one's distance from it, different kinds of views of the stained glass exhibits were possible. Exhibitions enabled different kinds of encounters with stained glass, with regards to proximity and distance, for most displays prioritised a close-up viewing of the medium, a 'part', over one from an appropriate distance, the 'whole'. Viewing stained glass panels in restricted spaces such as the narrow galleries of 1851 and 1862, or the covered passageways of 1867, provided an up-close experience and eye-level viewing that privileged a 'part' view, revealing the materiality of each piece of glass, lead, and its painting techniques, but this was often at the expense of viewing the 'whole'. One might comprehend a view of whole windows from afar, such as those in the transepts of the 1862 exhibition building, gaining an overall impression of the window's tracery design and the intense coloured patches of glass and painted detail but not necessarily the window's overall iconographic scheme.

Here the exhibition of the exhibition on the exhibition of the exhibition building, gaining an overall painted detail but not necessarily the window's overall iconographic scheme.

Maréchal's 1855 allegories for the Palais de l'Industrie provide an exception. Surviving photographs of these windows show that he conceived them as a monumental form of painting, as demonstrated by the large-scale figures (see Fig. 2.25). In this sense, stained glass is more akin to those decorative arts that embellish large architectural surfaces such as frescoes, mosaics, ceramics, and tapestries, and, as we have seen, many contemporaries recognised this. Although, crucially, none of these art forms have the additional role of admitting light into a building as stained glass does. At the International Exhibitions, stained glass windows cast their mysterious coloured light onto the surrounding exhibits and into the Exhibition space, creating a dynamic kaleidoscopic spectacle. These unique effects, and their wider significance, both within these spectacular environments and in relation to other media, are explored in the next chapter.

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⁴⁹¹ Interestingly, illustrations of the windows tended to prioritise views of an entire window over a detail. See Chapter 4.

⁴⁹² The 'patch' is a zone of coloured intensity that "leaps into view". Didi-Huberman, 2005: 267-68.

⁴⁹³ Eastlake compared stained glass with frescoes, acknowledging that both depended on "simplicity, magnitude and distinctness". Both are essentially translucent media dependent upon broad flat areas of colour which begin with a cartoon. See Rush, 2003: 61. See also Didron, 1880: 60.

CHAPTER 3

THE SPECTACLE OF STAINED GLASS

Introduction

The lightness, purity, and sheer beauty of glass and its powers of reflecting and refracting bright light fascinated the nineteenth century.

Displays of stained glass at the International Exhibitions in the second half of the nineteenth century shared in the broader material, magical and optical fascination with glass and formed part of the exhibition spectacle. By 'spectacle', I mean a mass public show, characterised by a profusion of light and colour, a sensual feast for spectators' eves. 495 This chapter reclaims the significant role played by the art of stained glass at the International Exhibitions, and in nineteenth-century culture more broadly, by considering stained glass in relation to the taste for spectacle, exploring parallels and continuities with popular theatrical, illusory, and illuminated spectacles involving glass transparencies from the eighteenth to the nineteenth centuries. It explores the aesthetic possibilities, symbolism, and effects of light transmitted through stained glass, and considers how the spectacular characteristics of the medium might have affected display environments and individual's perceptions and experiences of stained glass at the International Exhibitions.

I begin by exploring the reflections and refractions of plain, coloured and stained glass within glassed exhibition buildings. I then compare the kaleidoscopic effects of the spectacular transmission and refraction of light through stained glass, with contemporaneous sensational spectacles, phantasmagoria and popular forms of entertainment involving light, paint, and coloured glass. In doing so, I consider how exhibitions of the painted glass 'transparency', which triggered comparisons between enamel painting on glass and oil painting on canvas, set a precedent for the ways in which stained glass was viewed and discussed at later International Exhibitions held in London and Paris between 1851 and 1862. The next section draws attention to a number of 'para-stained glass novelties'; objects which were intended to recreate

 $^{^{494}}$ Booth, 1981: 5. 495 My definition of 'spectacle' draws upon the *OED* definition and that of the theatrical spectacle. See Booth, 1981: 1-29.

the appearance or effects of stained glass in other forms, thus revealing the widespread appeal of stained glass in both genuine and imitative forms. The final section returns to the materiality of glass by exploring the impact of new opalescent glasses and techniques from the 1870s upon the visual effects of stained glass. I conclude by pulling together theories formed in these sections to explain the significance of stained glass as a translucent spectacle, dispelling Armstrong's hypothesis that "stained glass was intended as a rebuke to glass culture". 496

Reflection and Refraction

From the outside, as we have seen, the nineteenth-century glassed exhibition building presented a glimmering panorama of the world contained within transparent walls of mouth-blown sheet glass. Inside these glass constructions, the visual experience was intensified since glass was used for display cabinets, and show-stopping exhibits from glass factories included pyramidal displays of enamelled glass articles and fountains of crystal-cut glass (Fig. 3.1). As such, glass products were self-consciously enchanting objects created by the magical transformation of sand, soda ash and limestone, as they passed through the furnace, the glassblower's breath, and the hands of the cutter, engraver and stainer, to became amorphous solid, transparent, lustrous and brittle products.⁴⁹⁷

The Crystal Palace was, of course, the *apogée* of this transformation, a technical accomplishment to be marvelled at.⁴⁹⁸ Upon her second visit, Charlotte Brontë wrote to Elizabeth Gaskell:

Its grandeur does not consist in *one* thing, but in the unique assemblage of all things [...]. It seems as if magic only could have gathered this mass of wealth from all ends of the earth [...,] as if none but supernatural hands could have arranged it thus, with such a blaze and contrast of colours and marvellous powers of effect. 499

⁴⁹⁶ Armstrong, 2008: 154.

⁴⁹⁷ One publication exclaimed the components of glass "are flint, sea-sand, and the rust of the metals!" Cassell, 851: 377.

⁴⁹⁸ A number of contemporaneous articles recounted visits to glass factories and the processes of glass manufacture, such as Harriet Martineau's visit to the Chance Brothers manufactory, published in *Household Words* in 1852 and *Leisure Hour*, 1853. See Inglis, 2007; Armstrong, 2008: 42. On 13 February 1856 Henry Chance delivered a lecture to the Society of Arts 'On the Manufacture of Crown and Sheet Glass' in relation to the Crystal Palace panels. See Chance, 1856.

⁴⁹⁹ Shorter, 1908, Vol. I: 214.

No doubt the blaze of colours was even more prominent during Brontë's last visit to the Exhibition, when the inventor of the kaleidoscope, David Brewster, accompanied her. ⁵⁰⁰ Besides the displays of stained and painted glass windows, coloured glass was used for:

[T]ableware; vases; shades for gas, oil and electric light; for signalling; for shades and light-filters in photography; for imitating gems; for jewellery; for medical tests; for spectacles; and if opaque glass be included, for covering floors, walls and ceilings with mosaic. ⁵⁰¹

Vitreous products vied for the sun's rays and visitor's gaze, producing stunning optical effects which simultaneously fascinated, seduced, compelled and repelled visitors, as a number of reviews and personal accounts testify. 502

The very term 'crystal' associated with the Great Exhibition building suggested a prismatic structure, and therefore conveyed the possibilities of reflection and refraction. Such effects were enhanced and exploited at later Exhibitions by the addition of mirrors, water features, and gas and electric lighting. The author of a short article entitled 'Early Morning in the Crystal Palace' observed the effects of the sunlight filtering through the glass roof and onto Osler's crystal fountain: "[w]e look around, and find the light reflected in glass and silver and bubbling water". Similarly, the 17ft-high crystal fountain exhibited by the Washington Glass Co. of Massachusetts, in the Main Building of the Philadelphia Centennial Exhibition, was "built entirely of prisms of cut crystal glass, which reflected the changing light, and decomposed it into all the colours of the rainbow". The refraction of light through coloured glass also transformed the exhibition environment, sometimes altering the perceptions of objects and people within it. For example, according to writer Teresa Dean, in the Woman's Building at the Chicago Exposition of 1893, "the stained glass windows at the back of the platform in the assembly-room [...] smashed to smithereens the beauty of face and toilet of every woman on the stage as viewed from the front" (Fig. 3.2).

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⁵⁰⁰ Lloyd, 1951: 566. The kaleidoscope was patented in 1817.

⁵⁰¹ Powell, 1923: 112.

⁵⁰² For instance, see Hunt, 1851; Cassell, 1851.

⁵⁰³ Armstrong, 2008: 151. The term 'Crystal Palace' was coined by *Punch* (November 2, 1850). Osler's crystal fountain and the Koh-i-noor diamond were two of the most popular crystalline exhibits. The Koh-i-noor diamond was lit from underneath by artificial gas-lighting. Pearson, 2001: 187.

⁵⁰⁴ Cassell, 1851: 346.

⁵⁰⁵ Ingram, 1876: 283.

⁵⁰⁶ Quoted in Garfinkle, 1996: 125.

The use of gas and electric lighting made it possible to view exhibits at night as well as during the day, and created more complex viewing environments for the medium of stained glass. For, in the words of Philippe Hamon, "darkness transforms the stained-glass window, normally a beautiful narrative object visible only from the inside, into a spectacle visible to those on the outside gazing upon this window which is lit from within". As Brian Thomas has stated, "no other branch of painting offers a more clearly defined technical line of future development than stained glass in relation to artificial light". As early as 1851, prompted by the recent illumination of the chamber of the House of Lords, *The Ecclesiologist* published a short article on the illumination of stained glass by gas lighting, declaring it a "very successful" experiment, which produced an "almost unearthly effect". The author suggested it be "taken up and improved upon for the honour of Almighty God in his churches". Indeed, the use of gas and electric lighting transformed both ecclesiastical and secular interiors, and impacted the viewing of artworks in this period.

At the International Exhibitions, artificial lighting was employed to demonstrate technological progress and for spectacular effects. The Galerie des Machines at the Paris Exposition of 1889, which contained a number of stained glass exhibits, was the first Exhibition building to be fully lit by electricity. ⁵¹¹ However, the glass environment of this building presented difficulties for the display of stained glass. ⁵¹² Some American panels were said to be "lost in an inextricable tangle of rays of light, which between them, were thwarted, annihilated". ⁵¹³ This indicates the power of stained glass to both illuminate and destroy an image, especially within glass exhibition spaces. Electric lighting was also used at the Melbourne Exhibition of 1888-89, the first international Exhibition to be opened at night, and the Chicago World's Columbian of 1893, where Tiffany illuminated his chapel. ⁵¹⁴ At the Paris Exposition of 1900, spectacular effects were observed in the Palais d'Électricité, where Alex Thompson remarked that, "[a]ll the forms, aspects, and prisms of which glass is capable have been utilised in the

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⁵⁰⁷ See Hamon, 1992: 39, 199-200. In his sections on 'Mirrors' and 'Modes of Lighting', Benjamin also noted the spectacle of illuminated interiors transmitting light inside during the day and outside at night. See Benjamin, 1927-40 (1999): 465 and 541.

⁵⁰⁸ Thomas, 1982: 18.

⁵⁰⁹ *The Ecclesiologist*, 1851: 90-91.

⁵¹⁰ The Ecclesiologist, 1851: 90-91.

⁵¹¹ See Nyer, 1994: 146.

⁵¹² "il entrait plus de lumière par le plafond du hall que par les baies ouvertes sur le promenoir circulaire". ["it entreats more light by the ceiling of the hall than by the open bays on the circular covered walkway".] Champigneulle, 1891: 175.

⁵¹³ "perdus dans un enchevêtrement inextricable de rayons lumineux, qui, se contrariant, s'annihilaient entre eux". Champigneulle, 1891: 177.

⁵¹⁴ Williams, 1888; Bouilhet, 1893-94: 65-70; Adams, 1995.

design of this unique edifice, and its effect is crowned by a pretty cascade". 515 Elsewhere. in the German pavilion, electric lighting illuminated an opalescent glass ceiling depicting the sun and the signs of the zodiac.⁵¹⁶

Kaleidoscopic Displays: Stained Glass and the Moving Popular Spectacle

The spectacle of stained glass was not a uniquely modern phenomenon. In the Middle Ages, coloured glass and precious stones formed part of a visual spectacle in ecclesiastical spaces which encouraged beholders to transcend from the material to the immaterial, an experience brought about through the play of light and colour. 517 Bontemps described medieval stained glass as having "kaleidoscopic effects". 518 and, after the 1878 Exposition, Didron remarked, "English glass shows a dominant preoccupation to obtain a play of light producing an effect as similar as possible to that of the glass of the Middle Ages". 519 Indeed, the displays of stained glass at the International Exhibitions were more in line with medieval aims than one might at first think. The galleries of stained glass that lined the brick, iron and glass Exhibition buildings achieved the medieval architect's aim of creating an entire wall of glass and a dappled array of refracted light. As one commentary on the 1851 Great Exhibition observed, in the stained glass gallery, "the light permeating the modern windows [...] falls upon the floor in well-defined colour, and the outline of the design can be easily traced", thus projecting coloured light into the gallery space and upon its visitors, revealing their role as active participants in the exhibition spectacle. 520

Elements of these displays also shared characteristics with forms of popular entertainment, where glass transparencies were frequently employed and manipulated by optical devices, new materials, and the moving picture to produce a visual culture that scholars have associated with a 'modern' era. For instance, in a thought-provoking article which highlights the intervening role that stained glass 'transparencies' played in the development of optical toys, John Plunkett argued that, "[t]ransparencies were one of the earliest forms of popular optical

⁵¹⁵ Alex M. Thompson *Dangle's Guide to Paris and the Exhibition* (London, 1900). Quoted in Greenhalgh, 1988:

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&</sup>lt;sup>516</sup> Daumont-Tournel, 1902: 66. 517 See Abbot Suger's famous description of aesthetic experience at St.-Denis, recorded in *De Administratione* (c.1144-50) and De Consecratione (c.1144-47). Panofsky, 1979: 21-22.

^{518 &}quot;des effets kaléidoscopiques". Bontemps, 1851: 48-49.

⁵¹⁹ "le verre anglais accuse la préoccupation dominante d'obtenir un jeu de lumière produisant un effet aussi semblable que possible à celui du verre du moyen âge". Didron, 1880: 83. ⁵²⁰ Tallis, 1851-52: 83.

recreation and provided the basis for the development of subsequent screen media like the phantasmagoria, cosmorama and diorama", not to mention later developments in photography and cinematography. Significantly, as we shall see, contemporary exhibition reviews frequently use the term 'transparencies' when referring to enamel-painted glass (known in England as pictorial glass, and in France as *vitrail-tableau*), associating them directly to the painted glass slide transparencies used in devices for optical recreation and education.

The revival of stained glass occurred simultaneously with the development of these forms of visual entertainment, lighting effects in theatre, ⁵²² and optical exhibitions like the Eidophusikon (from 1781), ⁵²³ panorama (1791), phantasmagoria (1802), and the diorama (1823). ⁵²⁴ Each of these relied on translucency and glass in one form or another for their effects, although uniquely the translucent medium of stained glass functions without the aid of any mechanical device, just the natural movement of light. As Arscott has acknowledged, in stained glass "the light and colour are the kinetic aspect of the artwork". ⁵²⁵ On a bright day, the soft diffusion of sunlight through the coloured glass in a stained glass window is interrupted by the lead lines, causing the refraction of light beyond the surface plane of the leaded panels into the surrounding space and producing a dynamic kaleidoscopic spectacle, which changes over time and alters perceptions of an architectural interior (Fig. 3.3). ⁵²⁶ This spectacular movement of light and its colourful effects upon the environment are comparable to a number of popular optical recreations.

Popular from the late eighteenth century, the magic lantern was an optical device that projected enlarged scenes from painted small glass slides onto a wall whilst the audience was in darkness. The glass slides projected by the lantern were tinted or painted with transparent

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⁵²¹ Plunkett, 2005: 176. For "the glasses of the phantasmagoria" and photography see Henisch and Henisch, 1996: 27.

The theatrical spectacle involved a number of 'special effects' created by lighting, sound, scene painting, transparencies, cutout scenery, models, lanterns, projections and dioramas. See Booth, 1981.

The Eidophusikon, created by Philippe Jacques de Loutherbourg, imitated natural phenomena through moving pictures. This radical theatre employed a unique visual technology involving controlled lighting, clockwork automata, three-dimensional models, and an accompanying soundscape. See Altick, 1978: 117-28.

⁵²⁴ Louis Jacques Mandé Daguerre invented the diorama, another theatrical experience created by scenes painted on translucent canvas illuminated from above and behind and changed in quick succession. See Hyde, 1988:112; Altick, 1978: 163-73.

⁵²⁵ Arscott, 2004: 40.

⁵²⁶ 'Kaleidoscopic' was first used as an adjective in the 1840s; the use of the term 'kaleidoscope' as a verb from the 1890s represented the increasing colourful movement of modernity.

colours, although the paint was not fixed to the glass through firing (Fig. 3.4). ⁵²⁷ Guides were published for amateurs instructing them how to paint on glass slides and cloth, and recommending which paints and colours to use. ⁵²⁸ The painted glass slide, used in the magic lantern, links medieval stained glass to the modern photographic, and projected cinematic, image. In *Swann's Way* (1913), Marcel Proust compared the effects of the magic lantern to medieval stained glass:

[I]n the manner of the master-builders and glass-painters of gothic days, it substituted for the opaqueness of my walls an impalpable iridescence, supernatural phenomena of many colours, in which legends were depicted, as on a shifting and transitory window. 529

For Proust, both the magic lantern and stained glass windows evoked a dream-like personal memory and experience, through a series of moving colourful images, or patterns; a sort of cinematic medievalism.⁵³⁰

Philippe de Loutherbourg's Eidophusikon was another device, which presented a spectacle of motion with the aid of lights, gauzes, coloured glass, and smoke (Fig. 3.5).⁵³¹ Light was projected through rotating chips of coloured glass - yellow, red, green, purple and blue - which were changed and mixed over the duration of the performance to represent different atmospheric conditions.⁵³² Such effects must have been enhanced by the small pieces of coloured glass, for, as one contemporary article noted, "when coloured glass is cut, the brilliancy of the effect is heightened, and the soft floating character of the lights is broken up into a thousand scintillations".⁵³³ The effects of moving coloured light created by such devices might be compared to those that occur naturally in translucent stained glass windows.

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⁵²⁷ Various types of glass slides were used, including the printed image on glass, the transparent positive image of a photograph, and the 'Rackwork' slide (a printed double-layered glass).

⁵²⁸ See Rintoul, 1871. This publication also advertised specimens for subjects and included sections on 'How to Use the Magic Lantern', 'Phantasmagoria' and 'Dissolving Views'.

⁵²⁹ From 'Overture' the first chapter of *Swann's Way* (1913). Proust, 1954: 16. This text forms part of the narrator's reminiscences of struggling to get to sleep as a child. In Proust's dreams time and memory flow together, shifting sensory experience and his perceptions of dream and reality.

For these images of vision, see Pardee, 1965.

Loutherbourg used transparencies when he was a scene painter for Drury Lane Theatre. The Eidophusikon was exhibited alongside Loutherbourg's own stained glass and transparent paintings. See Altick, 1978: 120-21 and Plunkett, 2005: 176-77.

532 Altick, 1978: 123.

⁵³³ Illustrated Exhibitor and Magazine of Art, I (1852): 106-107.

From Georgian Transparencies to the Penny-Peep Show

A fascination with the translucency of painted glass persisted throughout the late-eighteenth and early-nineteenth centuries. For example, the Eidophusikon is thought to have inspired Thomas Gainsborough's Showbox, a one-foot-square miniature theatre for the display of his painted glass transparencies accompanied by lighting and music, designed in the early 1780s (Figs. 3.6 and 3.7).⁵³⁴ In Jane Austen's *Mansfield Park* (1814), Fanny Price describes a window in the East Room of the novel's eponymous building, the lower panes of which were filled with three scenes "made in a rage for transparencies".⁵³⁵ Painted glass transparencies also appeared in the form of Chinese box lamps, or lanterns, like those decorating the Prince Regent's Brighton Pavilion (part of Frederick Crace's decoration of 1815-1822), or in the children's room at the 3rd Marquess of Bute's residence at Cardiff Castle (after 1868) (Fig. 3.8).⁵³⁶

Again, several instruction manuals were available to amateurs who wanted to paint transparencies on glass or other materials, including Rudolf Ackermann's *Instructions for Painting on Transparencies* (1799 and several editions thereafter); Edward Orme's *An Essay on Transparent Prints, and on Transparencies in General* (1807); Nathaniel Whittock's *Decorative Painters and Glaziers Guide* (1827); and Edward Groom's *The Art of Transparent Painting on Glass* (1855). In these guides, and at a number of exhibitions of stained glass held during this period, stained and painted glass co-existed in the realms of fine art and popular entertainment to instruct, delight, amuse, and amaze.⁵³⁷

In *The Shows of London* (1978), Richard Altick alludes to the eighteenth-century exhibitions of stained glass in London which were popular attractions for the fashionable upper classes. He quotes from Samuel Foote's play *The Cozeners* (which premiered in 1774 at the Haymarket Theatre, and was first published in 1776):

⁵³⁴ Wilson, 2007: 60-62; Plunkett, 2005: 176-77. Gainsborough painted transparencies for the decoration of Bach and Abel's concert rooms in Hanover Square, London for 1775. It is believed that he was also inspired by Thomas Jervais' exhibitions of painted glass.

Austen, 1814: 318. The transparencies depicted a cave in Italy, Tintern Abbey, and a moonlit lake in Cumberland.

⁵³⁶ For Brighton pavilion see Morley, 2003 and Beevers, 2009. For Burges' work at Cardiff Castle see Mordaunt-Crook, 1981.

⁵³⁷ Knowles, 1924. Although London played host to a wealth of these exhibitions, they occurred internationally. See Allen, 2012: n.45.

I promised precisely at twelve to call on Lady Frolic, to take a turn in Kensington Gardens, to see both the [art] exhibitions, the stain'd glass, dwarf, giant, and Cox's museum. 538

The inclusion of stained glass in this diverse assortment of London exhibits and curiosities, such as freak-shows and James Cox's mechanical toys, points to an alternative historical trajectory to more standard accounts of the gothic revival, one in which stained glass is closely connected to a culture of the popular, secular spectacle. Altick has argued that such exhibitions of stained glass "dramatized the spectacular possibilities of light flowing through a painted, translucent medium"; a proposition I develop more fully in what follows. Exhibitions of stained glass 'transparencies', which primarily involved painting with coloured enamels onto large pieces of white glass, triggered many comparisons with canvas and fresco painting, revealing precedents for the medium's subsequent display, reception and interpretation at the nineteenth-century International Exhibitions.

A number of significant Georgian glass-painters exhibited paintings-on-glass depicting still life, history paintings, landscapes, and contemporary portraiture in the city. For example, Thomas Jervais' exhibition at Exeter 'Change in May, 1772 featured fifteen specimens of glass-painting including reproductions of David Teniers's painting *Smokers* and *Boys Blowing up a Bladder*.⁵⁴² Jervais also exhibited panels representing the Christian Virtues from his windows for New College Chapel, Oxford (1779) after Reynolds' cartoons (Fig. 3.9). Horace Walpole admired the display, and commented that "Jarvais's [*sic*] window from Sir Joshua's Nativity is glorious". "The room being darkened [...] and the sun shining through the transparencies, realises the illumination that is supposed to be diffused from the glory, and has a magic effect". S43 Walpole's statement demonstrates the key attraction of such exhibits – the effects of the light filtering through the translucent glass.

Husband and wife team of glass painters James and Eglington Margaret Pearson were also regular exhibitors of transparencies; showing works at the Pantheon in 1779, the Society of Arts' former rooms in the Strand in 1780, and their house in Great Newport Street, Long Acre

⁵³⁸ Altick, 1978: 111.

⁵³⁹ See also Cobb, 2011.

⁵⁴⁰ Altick, 1978: 119.

⁵⁴¹ On the history of the development of the enamel method see Knowles, 1926: 26-35.

This exhibition was accompanied by a handwritten catalogue. Knowles, 1924: 374.

⁵⁴³ Walpole, XXIX: 301. Quoted in Altick, 1978: 111.

in 1790. ⁵⁴⁴ The glass transparency also cropped up at exhibitions of ancient glass. Comyn's Pall Mall exhibition in 1815 showed a number of ancient glass panels which had been in store in Norwich (presumably by John Christopher Hampp, ⁵⁴⁵ well-known importer of stained glass) alongside a contemporary transparency by Pearson depicting a full-size (8ft by 5ft) portrait of *King George III in Coronation Robes*, after Reynolds, which is now in the collection of The Stained Glass Museum, Ely (Fig. 3.10). ⁵⁴⁶ Academic and antiquarian taste for the medieval was thus accompanied by a modern taste for the popular spectacle; the one enhancing the effect of the other. In such exhibition spaces then, like the later International Exhibitions, little distinction was made between medieval and modern glass, or ecclesiastical and secular windows, all of which held spectacular appeal.

Exhibitions of painted glass transparencies formed part of London's popular entertainment scene around Oxford Street, Covent Garden and The Strand, thus inhabiting the same spaces and drawing the same crowds as attractions and spectacles like the Eidophusikon and Diorama, both of which were front or back-lit. Benjamin Read's print, *Winter Fashions, 1833, A View in the Queen's Bazaar* (1833), shows a gathering of fashionable *dilettanti* in the rebuilt Queen's Bazaar on Oxford Street (Fig. 3.11). Behind the crowd is an entrance to the diorama on the left, and, on the opposite side of the hall, pasted onto the wall, is a small advertisement for a dioramic painting of John Martin's famous painting *Belshazzar's Feast* (1820) (Fig. 3.12). Martin started his artistic career in the studio of glass painter William Collins, whose premises were at 227 Strand, near Temple Bar. His early work with the medium was not forgotten. It is telling that, according to Samuel Taylor Coleridge, "Martin never looked at Nature except through bits of stained glass". So A copy of Martin's *Belshazzar's Feast* was painted on plate-glass around 1832 and displayed at an 'Exhibition of

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⁵⁴⁴ Knowles, 1924: 375.

⁵⁴⁵ For Hampp, see Kent, 1937.

Knowles speculated that this glass-painting may have been by Pearson. The window at The Stained Glass Museum, Ely (Acc. No. L1992.6), is of the same dimensions, and is signed and dated by Pearson (1793). See also Harrison, 2003: 107-17.

⁵⁴⁸ The original oil painting *Belshazzar's Feast* was first exhibited at the British Institution in February 1821. Balston, 1947: 55. Martin did not paint the dioramic painting advertised in Read's print. It was an unauthorised copy that Martin applied for an injunction against. *Belshazzar's Feast* remained in the public eye through engravings. The original painting was later exhibited at the London International Exhibition of 1862. See Balston, 1947: 61-62.

⁵⁴⁹ Martin went to London in 1806 to work with the son of Boniface Musso (his drawing tutor), Charles Muss, in a china-painting establishment. When this firm went bankrupt Martin accompanied Muss to Collins' studio in 1809, where they both obtained employment. Balston, 1947: 27. See also, Myrone, 2011.

⁵⁵⁰ In *Specimens of the Table Talk of the Late Samuel Taylor Coleridge* (London, 1835): 31 May 1830. Cited in Harrison, 2003: 111

paintings in Enamel Colours on Glass' organised by William Collins which opened on 28 March 1832 at 357 Strand (Fig. 3.13).⁵⁵¹ The glass painting appears to have been purchased by Collins and later served as an advertisement in his shop, set into a wall alongside the original oil painting.⁵⁵²

A further copy on glass, painted by George Hoadley and Anthony Oldfield, was exhibited at the 'Exhibition of Pictures in the Ancient Art of Painting on Glass' held at 209 Regent Street in 1837, and reviewed in the *Athenaeum*.⁵⁵³ The critique began by claiming that the art of stained glass needed reviving, and then disdainfully commented that "Messrs. Hoadley and Oldfield must have viewed their own invention through a very bright-coloured glass if they imagine they have done so".⁵⁵⁴ In particular, the reviewer disapproved of the colouring, and remarked there was "a silver glare to the flesh tints, perhaps from being seen through magnifiers".⁵⁵⁵ In fact, the painted glass transparencies on show were so small they had to be viewed through a magnifying glass, causing another reporter to comment that the whole exhibition "was on the lines of a regular penny-peep".⁵⁵⁶

Sublime scenes of nature illuminated by moonlight, sunbursts and fire were particularly suited to the translucent qualities of stained glass transparencies. The catalogue to an 1817 'Exhibition of Paintings on Glass representing Natural Scenery with a New and Unparalleled Effect' at the Western Exchange, Old Bond Street by a Frenchman, Mr Dihl, claimed that the exhibits "may be compared to the first burstings of light upon the new created world". Harrison has described John Martin's ethereal paintings, some of which were back-lit, as "the

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⁵⁵¹ Balston believes this glass copy was at least executed under Martin's supervision, if not the work of his own hand. The stained glass window in Syon House, Brentford, is cited by Balston as "the only identified glass-work work by Martin", but it may be a copy by Hoadley and Oldfield. See Balston, 1947: 58, 112, 144
⁵⁵² When Collins installed the original painting at 343 Strand, thousands of people paid to see it. He printed an

⁵⁵² When Collins installed the original painting at 343 Strand, thousands of people paid to see it. He printed ar accompanying pamphlet *Description of the Picture, Belshazzar's Feast, etc.*, which could be purchased for sixpence. Balston, 1947: 57-61, Appendix 1; Altick, 1978: 415.

⁵⁵³ George Hoadley was a pupil of Charles Muss, and would have therefore come into contact with Martin and his works. He gained a silver medal for stained glass at the Great Exhibition. One of Hoadley & Oldfield's copies of Martin's *Belshazzar's Feast* in glass enamels was also exhibited at 202 Broadway, New York in 1834. See *The Family Magazine*, 1834-35: Section XXVII: 288.

⁵⁵⁴ The Athenaeum (March 11, 1837). Knowles, 1924: 377.

⁵⁵⁵ Knowles, 1924: 377.

⁵⁵⁶ The Morning Post, 1837. Quoted in Knowles, 1924: 377. This was fairly common; in 1827 a magnifying glass was sold with a painted window by Jervais. See Wynne, 1982: 59.

was sold with a painted window by Jervais. See Wynne, 1982: 59.

557 A good surviving example of these effects can be seen in the east window of St Andrew's church, Redbourne, Lincolnshire, painted by William Collins in 1830. It is a copy of a painting in the National Gallery of Ireland by Irish artist Francis Danby depicting the *Opening of the Sixth Seal* (1828) as described in the Book of Revelation, 6: 12-17.

⁵⁵⁸ British Lady's Magazine (August 1817): 142-43. See also Knowles, 1924: 376.

nearest approach to the sublime in stained glass".⁵⁵⁹ Stained glass was an art valued by Martin, who told the government's Select Committee on Arts and their Connection with Manufacture in 1836 that:

[G]lass-painting must have surpassed all other branches of art in splendour, as it is capable of producing the most splendid and beautiful effects, far superior to oil-painting or water-colours, for by the transparency we have the means of bringing in real light and have the full scale of nature as to light and as to shadow, as well as to the richness of colour which we have not in oil-painting nor in water-colour.⁵⁶⁰

Thus Martin viewed the glass transparency as more effective than oil painting primarily because it brought in 'real light' and was therefore a closer imitation of nature.

In the early nineteenth century, easel paintings were frequently copied on glass, affirming the strong relationship between the glass transparency and oil painting. Joseph C. Backler's exhibition in Newman Street, Oxford Street in 1817 featured a copy of Raphael's *Transfiguration* painted on glass for the east window of St James' Piccadilly, which was "inspected by many persons of the first distinction and honoured with their approbation". ⁵⁶¹ Thomas Wilmshurst's *Field of the Cloth of Gold* (a large glass painting measuring 18 by 24 feet), also exhibited on Oxford Street after 1830, included around forty life-size figures all borrowed from Holbein. ⁵⁶² As late as June 1839, Messrs. Hancock, Nixon and Dunt (later to become Ward and Nixon) advertised an exhibition of a window representing the *Descent from the Cross* after Spagnoletto at Charles Street, Berkeley Square for one-shilling admittance. ⁵⁶³ For the same price, one could attend the Great Exhibition in 1851 on certain 'Shilling Days' and view an entire gallery of modern stained glass. Thus the International Exhibitions drew upon, and democratised further, the viewing of spectacular stained glass in a popular exhibition setting.

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⁵⁵⁹ Harrison, 2003: 111

⁵⁶⁰ Altick, 1978: 414.

⁵⁶¹ Literary Gazette (June 21, 1821): 347. Knowles, 1924: 376. This window was reportedly 35 feet high by 20 feet wide and cost the enormous sum of £2500.

⁵⁶² Wilmshurst's window was destroyed by fire in 1832, along with all the preparatory drawings, but it was continually cited as a landmark production in stained glass. See *The Mirror of Literature* (1830): 247; *Gentleman's Magazine* (1830): 348-49; *The Crayon* (November 1860): 316-19.

⁵⁶³ After Nixon's death in 1857, Henry Hughes became a partner and the firm became known as Ward and Hughes and exhibited stained glass at London (1862), Philadelphia (1876), and Paris, (1867 and 1878). See Appendix 3.

Painting on Glass, Painting on Canvas, and the Popular Spectacle

Like stained glass which, as we have seen in Chapter 1, was frequently classed as a 'manufacture' rather than a 'fine art' at the International Exhibitions, theatrical, illusory and illuminated spectacles were difficult to classify. In spite of the high level of technical skill and artistic vision involved in their execution, they blended popular entertainment with the educational, creating topographical depictions and historical re-enactments through pictorial and theatrical devices. Whilst stained glass shared some similar aims, techniques and exhibition spaces with popular coloured-glass spectacles in this period, it also maintained a close relationship with the more prestigious art of painting on canvas. Sir Joshua Reynolds, President of the Royal Academy 1768-92, was reportedly "a prodigious admirer of the invention and striking effect of the Panorama in Leicester-fields", and many of his designs were turned into stained glass windows. ⁵⁶⁴ Reynolds' successor Benjamin West also contributed designs for glass paintings and admired such spectacles. ⁵⁶⁵

Continuing Georgian traditions, one mode of stained glass that made a particular impression at the early International Exhibitions, and was at the centre of debates surrounding the artistic merits and development of nineteenth-century stained glass, was pictorial glass, the *vitrailtableau* or 'transparency', which, contrary to its name, actually obscured the transmission of light through the glass by the application of enamel paint. The popularity of pictorial glass at the Great Exhibition caused *The Ecclesiologist* to comment, "[w]e should think the novelty of this process would never wear of". Following the traditions of Georgian and early-Victorian glass painters, around 10-15% of the windows exhibited at the Great Exhibition were enamel painted-on-glass copies of well-known oil paintings. John Toms copied a picture by Timoteo Viti on glass, and George Hoadley exhibited paintings on glass including *The Offering of the Wise Men* after Rubens, and a *Madonna and Child* after Correggio. Foreign exhibitors also sent enamel paintings on glass. The Burkhardt Brothers from Munich exhibited a *Madonna* and a *Holy Family*, both after Raphael, a *Holy Family* after Van Dyck and a *Madonna* after Murillo; and C.J. Wetzel of Stuttgart, Wurtemberg, exhibited paintings on

⁵⁶⁴ James Northcote. *The Life of Sir Joshua Reynolds*, Vol. 2 (London, 1818): 42. Quoted in Hyde, 1988: 25.

⁵⁶⁵ West saw *The Storming of Seringapatam*, a panorama painting by Robert Ker Porter (1777-1842), at the Lyceum Theatre, London sometime between 17 April 1800 and 10 January 1801 and remarked "A WONDER OF THE WORLD! - I never saw anything like it!" See Altick, 1978: 135.

⁵⁶⁶ See Bouchon and Brisac, 1993: 224-43.

⁵⁶⁷ *The Ecclesiologist*, 1851: 184.

⁵⁶⁸ Yapp, 1851: 128.

glass after Begas and Murillo.⁵⁶⁹ This practice was criticised by the Ecclesiologists who insisted that copying oil paintings in stained glass was altogether "wrong" and highlighted the distinctions between the two mediums – a window is seen by transmitted light, a picture by reflected light. 570

Although painted glass transparencies remained popular with the public and some were awarded medals by the Exhibition juries of 1851, at later International Exhibitions, when the gothic revival was in full swing and the moral, liturgical and theological principles of the Ecclesiological movement had been put forth, modern stained glass transparencies were declared to be utterly 'deceptive', in contrast to the preferred mosaic system of the Middle Ages.⁵⁷¹ Members of the outspoken Ecclesiological Society, a group of staunch proponents of the gothic revival in the Anglican Church who were influenced by John Henry Newman's Tracts for the Times (1833-41) and the subsequent Oxford Movement, played an important role in reviving stained glass. 572 But, as Armstrong has noted, the society was "committed to the revival of ecclesiastical stained glass and its theological meaning, not to mass-produced transparency outrageously imitating theological forms". 573 They advocated fidelity to gothic models in stained glass (the vitrail-archéologique) as well as in architecture, and modern windows which contravened these guidelines were considered a moral deception and subject to vehement criticism.

Such prejudices have continued to hold sway, which is why this chapter is an important intervention in scholarship, for it challenges the denunciation and exclusion of popular transparencies and pictorial windows. As Cheshire has acknowledged, "Ecclesiological descriptions of this style of glass frequently resort to images of the visual entertainments and phantasmagoria of Georgian fairgrounds". 574 For example, at the 1855 Exposition Universelle in Paris, The Ecclesiologist criticised one of Ballantine & Allan's allegorical stained glass windows depicting the union of St Denis and St George for being "quite equal to a Regent

⁵⁶⁹ Yapp, 1851: Part II: 1095 and 1120. Interestingly, these copies reflect nineteenth-century tastes for paintings by Northern and Italian Renaissance painters, seventeenth-century Spanish, and early nineteenth-century German

⁵⁷⁰ G.R.F., 1857: 80-81.

⁵⁷¹ By the 1860s, ecclesiological principles were generally adopted by those reviewing stained glass at the Exhibitions. For example, see Pellatt, 1863; and Didron, 1868.

⁵⁷² For the Ecclesiological Society, see Webster and Elliot, 2000. ⁵⁷³ Armstrong, 2008: 153.

⁵⁷⁴ Cheshire, 2004: 12.

Street transparency", in an attempt to reduce its artistic significance and to identify it with more 'vulgar' forms of popular spectacle. 575

Interestingly, in the previous year, *The Ecclesiologist* had compared the effects of viewing Bertini's stained glass window (Fig. 3.14), which, as we have seen, was exhibited in the foreign nave at the Great Exhibition three years earlier, with the popular diorama:

If a window were merely a transparency, which you went into the dark to see, like the Diorama, (or as you were to look at the window by Bertini, of Milan, in the Crystal Palace) you might apply to it the ordinary principles of pictorial effect; you might use opaque surfaces, breadth and strong contrasts [...;] logically a window is a transparency; really, much that would give its effect as a transparency must be sacrificed, from a respect for its nature and use. Its object is to give light, and all unnecessary shading and blackness must be avoided, because they are destructive of light. ⁵⁷⁶

The Ecclesiologist had earlier acknowledged that Bertini's *Il Trionfo di Dante* was "clever and pretty in its way [...,] calculated to win the applauses of the many; though in truth mainly transparent painting, and not the genuine treatment of its material". ⁵⁷⁷ *The Illustrated Exhibitor* described Bertini's technique: "by occasionally substituting portions of opaque instead of translucent glass [...,] the effect attained is equal, if not superior to an oil painting". ⁵⁷⁸ Another review commented that, "[t]hough there was much merit in this work, the fine effect produced was mainly attributable to the complete obscurity which surrounded the spectators. It had too much the character of painting about it". ⁵⁷⁹ Visitors entered a tent-like structure to view the stained glass window in complete darkness (see Fig. 2.17). This created a new viewing experience that did not mimic an architectural environment, but was more akin to the manner of viewing popular spectacles such as the Diorama, Eidophusikon or peep-show. ⁵⁸⁰ Bertini's window was thus indicative of the fusion of high and popular art that characterised many eighteenth and nineteenth-century public exhibitions.

One of the popular criticisms of pictorial windows was that they did not transmit enough light, due to the layers of enamel paint. Thus *Dickinson's* review of Edward Baillie's portrait of

⁵⁷⁵ *The Ecclesiologist*, 1855: 286. This derision appears to be due to the odd symbolism and allusion to Queen Victoria and Emperor Napoléon. For a detailed analysis of this window, see Chapter 6.

⁵⁷⁶ The Ecclesiologist, 1854: 34-35.

⁵⁷⁷ *The Ecclesiologist*, 1851: 183.

⁵⁷⁸ Cassell, 1851: 383.

⁵⁷⁹ *Dickinson's*, 1852, Vol. II: Text accompanying Plate XIII.

⁵⁸⁰ See Bermingham, 2001: 132.

Shakespeare Reading to Queen Elizabeth, exhibited in 1851, remarked, "[t]he only fault was, that to be properly seen, the painting required the concentration of all the available light behind it, leaving the spectator in perfect obscurity" (Fig. 3.15). 581 The battle between proponents of the *vitrail-tableau* and *vitrail-archéologique*, their different techniques and effects upon the transmission of light, became more prolific as the century progressed. As Luneau has demonstrated, this was "the dilemma of nineteenth-century stained glass". 582 The main difference between these two modes, as glass-painter Oliphant noted, was the role of glass as "a vehicle of light and colour". 583 Although around 25% of stained glass windows exhibited at the Great Exhibition were 'pictorial' in style, by the International Exhibition of 1862, pictorial windows were almost absent in the British sections of stained glass and rarely to be seen amongst the foreign exhibits. The Ecclesiologists had won.

The Official Report for the 1862 International Exhibition made a stand that all windows should allow a suitable degree of light to pass through the glass, to enable it to be seen, stating that "when a large portion of the glass is so opaque as almost wholly to preclude the transmission of the rays, an essential condition is infringed". 584 Another Record of the International Exhibition (1862) remarked, "a ficticious surface and tone is obtained by enamel painting, which, while it reduces the glare of modern work, produces too much dulness [sic] instead of the subdued tone of the antique", which, as we shall see in Chapter 5, was the sought-after ideal. 585 Yet some artists, particularly the aforementioned Maréchal of Metz continued to produce enamel-painted pictorial glass in this manner. The stained glass windows exhibited by Maréchal and Champigneulle in 1878 were criticised by Didron because a large part of the light that fell on the windows was absorbed by the painted surface, rather than transmitted through the glass. 586 Such opinions were consistently articulated throughout the International Exhibitions; Daumont-Tournel's International Jury report for the 1900 Paris Exposition again referred to the heavy modelling of Maréchal and other pictorial artists, which "stunned with colour and took away its transparency". 587 Both artists and critics alike were preoccupied with obtaining appropriate and effective levels of transparency in contemporary

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⁵⁸¹ *Dickinson's*, 1852, Vol. II: Text accompanying Plate XIII. Interestingly, Shakespeare and Queen Elizabeth II were two of the most represented figures in London's National Portrait gallery around this time too. See Stein, 2007: 115-16.

⁵⁸² 'le dilemme du vitrail du XIX^e siècle'. Luneau, 1999: 67.

⁵⁸³ The Ecclesiologist, 1855: 160.

⁵⁸⁴ Medals and Honourable Mentions Awarded by the International Juries, 1862: 3.

⁵⁸⁵ Shaffner and Owen, 1862: 71-72.

⁵⁸⁶ Didron, 1880: 73.

^{587 &}quot;assommait sa couleur et lui enlevait sa transparence". Daumont-Tournel, 1902: 33-34.

stained glass, and this effected the type of coloured glass material artists used, and the manner in which they painted.

The highly naturalistic effects achieved by glass painters, with their brushes and enamel colours, encouraged further comparisons with the art of oil painting. The Illustrated Exhibitor singled out the "life-like effects" of Baillie's portrait of Shakespeare Reading to Queen Elizabeth and the naturalistic treatment of the dress, and claimed "different materials are represented so faithfully, the velvet and satin textures appearing as though you could distinguish them by touch". 588 Maréchal's painted glass also excited admiration for its painterly effects. 589 The Illustrated Exhibitor described his Portrait du Bourgmestre, exhibited at the Great Exhibition, as "an able performance", a judgment that, in many ways, identified his skill as both artistic and theatrical.⁵⁹⁰ The International Exhibitions provided venues for glass-painters to produce spectacular pictorial works which attracted visitors' attention, as Gambier Parry admitted in 1867, "[h]ighly wrought realistic pictures are intolerable in glass, except possibly in a cabinet or an exhibition specimen". 591

At the London International Exhibition of 1862 and the 1867 Paris Exposition, Maréchal exhibited two versions of a self-portrait in stained glass entitled L'Artiste, which showed him creating his portrait at the age of 25, with a portfolio of designs in one hand and a paintbrush in the other. The first window was designed and made for an Exposition in Metz in 1861, when Maréchal was sixty years old, and re-exhibited in London the following year (Fig. 3.16). 592 An article in *The Athenaeum*, like many other reviews, objected to the pictorial style and the use of enamel paint in this window, the journalist acknowledged that L'Artiste was an "imposing piece", and described the window's subject: "a man in a black broad hat, looking with melo-dramatic expression straight at the spectator, as if attitudinizing before beginning his portrait in the folio one hand holds". 593 These self-portraits, painted on glass, asserted Maréchal's own artistic identity and status as a court painter, in a similar vein to the selfportraits in oil paint executed by seventeenth-century painters Van Dyck and Rembrandt, with

⁵⁸⁸ Cassell, 1851: 383-84.

⁵⁸⁹ *Dickinson's*, 1852, Vol. II: Text accompanying Plate XIII.

⁵⁹⁰ Cassell, 1851: 381.

⁵⁹¹ T.G.P., 1867: 301.

⁵⁹² This first version was acquired by the town of Metz for 5000 francs and is now in the Musée d'Art et d'Histoire de Metz.

⁵⁹³ *The Athenaeum* (August 16, 1862): 215.

whom he elicited comparison. Maréchal's windows thus celebrated painting on glass as a fine rather than a decorative art.⁵⁹⁴

Furthermore, the velvet and satin clothes depicted in *L'Artiste*, a second version of which was exhibited by Maréchal at the Paris Exposition Universelle of 1867 (Fig. 3.17),⁵⁹⁵ are a *tour de force*, demonstrating a meticulous rendering of the luminous materials equalling that of seventeenth-century Dutch realist painter Gerard ter Borch. Maréchal's extraordinary imitation of material fabrics using enamel paints on glass caused Édouard Didron, French glass painter and juror for the Exposition, to make the ironic comment that "Maréchal misuses the velvet, due to the perfection with which he imitates it". ⁵⁹⁶ In his report on the following Paris Exposition Universelle of 1878, Didron continued his praise for the glass painter's proficiency at imitating life, stating that Maréchal was "likely to combine all the elements of the seduction of oil painting and to fulfill the same role of imitation of reality". ⁵⁹⁷ Like John Martin forty years earlier, Didron recognised that the capabilities of the art of painting on glass equalled, if not exceeded, those of painting on canvas.

Many late-nineteenth and twentieth-century viewers despised the brilliant tones of early to mid nineteenth-century stained glass, a change in taste that often led to the removal of such windows in favour of quieter tones and patterns.⁵⁹⁸ In 1870, Ruskin remarked in a lecture to Oxford University: "a picture in coloured glass is one of the most vulgar of barbarisms, and only fit to be ranked with the gauze transparencies and chemical illuminations of the sensational stage".⁵⁹⁹ Such comparisons suggest that the similarities between stained glass and the popular spectacle centred on the visual event - not just an act of looking, but a spatial and sensory experience too. Stained glass artists may not have been deliberately seeking to imitate the popular spectacle, but the nature of their work, which involved 'painting on light', and depended upon the translucency of glass, resembled the manipulation of light and painted

⁵⁹⁴ See *Art Journal Illustrated Catalogue*, 1862: 63; *ILN* (November 15, 1862): 536; Evans, 1862: 403; Didron, 1868: 11-12; Gambier-Parry, 1868: 380.

⁵⁹⁵ This window was purchased by Napoléon III for the sum of 5000 francs. His monogram was added before it was installed in the Château de Fontainebleau in 1869, where it remains.

⁵⁹⁶ "M. Maréchal abuse du velours, en raison de la perfection avec laquelle il l'imite". Didron, 1868: 45.

⁵⁹⁷ "[Maréchal] est susceptible de réunir tous les éléments de seduction de la peinture à l'huile et de remplir le même rôle d'imitation de la réalité". Didron, 1880: 71.

⁵⁹⁸ For the later-nineteenth century destruction and replacement of High Victorian stained glass windows see Harrison, 1980: 11-12.

⁵⁹⁹ Ruskin, 1870, Lecture VII: 185-86. Delivered before the University of Oxford in Hilary term.

glass that occurred in such forms of entertainment, as well as drawing comparisons with painting on canvas.

Imitation Stained Glass, Stained Glass Novelties

Novelty is a quality which does not depend on the use-value of the commodity. [...]. It is the quintessence of false consciousness, of which fashion is the tireless agent. ⁶⁰⁰

Stained glass and the popular spectacle also shared elements of novelty and mimesis during this period, with both involving the manipulation of materials and light to create images that imitated or represented historic events or natural effects. ⁶⁰¹ As we have seen, some authorities on stained glass objected to pictorial windows that used enamel paint to 'imitate' oil paintings, but amateur commentators and the public at large evidently delighted in material imitation. ⁶⁰² Indeed, the craze for stained glass during the nineteenth century existed in a number of novel forms, as some of the more bizarre exhibits at the Great Exhibition demonstrate. For example, included amongst the 600 exhibits sent from America were a collection of "transparent soaps [...] intended to represent stained glass", and a model of a floating church from Philadelphia in the gothic style, with stained glass windows (Fig. 3.18). ⁶⁰³ Rather than dismissing these objects as trivial eccentricities, as the ecclesiological history of stained glass has to date, we should consider them more democratically and open-mindedly in relation to the art they sought to emulate and as a sign of the widespread popularity and spectacular presence of stained glass in this period both within and beyond the church.

Various methods were employed to imitate the effect of glass transparencies and stained glass windows in the absence of, and alongside, the genuine article. For example, at St George's Chapel, Windsor, the side windows were retouched with oil paint in order to add to the effect of Benjamin West's *Resurrection* (1785) in the east window. 604 And the York-based glass

⁶⁰⁰ Benjamin, 1997: 172.

Gainsborough's Showbox, as cited earlier, is an excellent example of the two mediums coming together. He is thought to have painted numerous transparencies, but only ten survive. See Wilson, 2007-2008.

⁶⁰² There was a wide culture of imitation at the Great Exhibition: "Materials perversely imitate other materials [...] or new materials such as papier mâché, india rubber, and gutta-percha are invoked as substitutions". Armstrong, 2008: 199-201.

⁶⁰³ Yapp, 1851: Part V: 1453, 1457. The Floating Church of the Redeemer was a full-size wooden church built for the Churchman's Missionary Association of Philadelphia, a branch of the Episcopal Church. Built by New York architect Clement L. Dennington for the seamen of the port of Philadelphia, it was dedicated on 11 January 1849 and seated 600 people. It was subsumed by fire 25 December 1870. See Allen, 2012: n.91.

⁶⁰⁴ Knowles, 1924: 375. This window was removed in 1862. See Baylis, 2005.

painter John Alder Knowles recounted that, in order "to give an effect like some exhibition transparency" to the east window of Lichfield Cathedral, in 1801, the Dean and Chapter had "darkened all the surrounding ones". 605 Some of the most striking imitation stained glass windows were not made from glass at all, but canvas or fabric. 606 In early nineteenth-century America "transparencies painted on linen or muslin" were fixed inside the windows of gothic revival churches. 607 An elaborate, c.1830 gothic design printed on cotton, now in the Metropolitan Museum of Art, New York, is a rare surviving example of this type, and was probably used as a window blind (Fig. 3.19). In Sydney, Australia, the windows of several churches, and St Andrew's Cathedral, were painted with coloured "stripes" intended as an "imitation of stained glass'. 608 These may have been attempts to control the heat and light entering buildings in the southern hemisphere. But they also aimed to reproduce the fashionable visual effects of stained glass. Of course, as new settlements, neither America nor Australia had an extant medieval tradition of stained glass windows from which to copy, except through books and the experience of settlers. 609 The absence of ancient examples of stained glass in the colonies made stained glass, a medium synonymous with medieval Europe and Christianity, even more desirable, in both genuine and imitative forms.

The large number of stained glass imitations at the Great Exhibition demonstrated their widespread employment in order to recreate the effect of coloured, stained and painted glass. For example, Mr. Noel of Camden and Mr Lee of Holborn exhibited "transparent window blinds, in imitation of stained glass" in the Furniture department. A reviewer in *The Illustrated Exhibitor* complained that another exhibitor, a "M. Gaunt has played the practical joke of exhibiting among the glass what is not glass at all; but a transparency of muslin". Predictably, the Ecclesiologists deplored such attempts to imitate stained glass. At the 1855 Paris Exposition, *The Ecclesiologist* reported disparagingly that a "staircase in this department is dedicated to painted window-blinds in imitation of glass: some of which is intended for

Writing a century later, Knowles criticised such attempts to imitate stained glass by stating the use of such attempts in churches sacrilegiously transformed their edifices "into a penny peep". Knowles, 1924: 375.

Manuals survive for these too, for example, Williams, 1855.

⁶⁰⁷ Hopkins, J.H. *Essay on Gothic Architecture, with Various Plans and Drawings for Churches*. Burlington, Vermont, 1836: 13. Cited in Clark, 1979: 32-53.

⁶⁰⁸ South Wales Magazine (October 1843): 540. Cited in Kerr, 1977: 20. See also Walsh, 1851: 254. For St Andrew's Cathedral, see Lewis, 1996: 7; Donovan and Donovan, 1986: 14.

⁶⁰⁹ Besides from a handful of privately-imported fragments of medieval glass. See Kerr, 1977.

⁶¹⁰ Yapp, 1851: 137.

⁶¹¹ Cassell, 1851: 380.

ecclesiastical purposes". ⁶¹² The Ecclesiologists objected to the use of these supposedly deceptive, ugly and cheap methods of decorating windows in the sacred space of the church, and were scathing of windows that diverted from traditional methods and used modern technology; they proclaimed, "certain windows *printed* in lithography and afterwards painted, but not burnt, are scarcely worth the trouble of condemning". ⁶¹³ Although the Ecclesiologists successfully promoted the employment of stained glass following medieval principles to their members, their influence did not affect the public at large, who continued to ornament their homes and churches with translucent decorations intended to imitate the effects of stained glass. ⁶¹⁴

Indeed, by 1857, one could decorate windows, as well as lamp-shades, screens, conservatories and lanterns to resemble stained glass through processes known as 'Vitrauphanie' or 'Diaphanie'; whereby translucent coloured prints on paper were purchased from a print shop and fixed to glass by adhesive or starch and then varnished to make them more translucent. Other variations of diaphanie included painting on ground-glass with varnish by tracing and then painting a design; and painting on glass with watercolours. According to the *National Magazine*, in 1857, diaphanous prints could be purchased at nearly every print shop in London. Examples of diaphanie were shown amongst the stained and painted glass exhibited at the 1862 International Exhibition, and they appear to have been used in both the church and the home. Evans, writing for Mackenzie's *Record of the International Exhibition*, declared such paper transparencies were "shams' of art".

Architect, designer and taste reformer, Charles Eastlake spoke of the hideousness of "diaphanous paper of recent invention" in *Hints on Household Taste* (1868), commenting that it was popular with a "large class of the British public who are indifferent to art of any kind,

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⁶¹² The Ecclesiologist, 1855: 285.

⁶¹³ *The Ecclesiologist*, 1855: 285. The journal refers to Messrs. Chance Bros' specimens of their transfer process from lithographic stones. Wallis, 1855: XIV.

⁶¹⁴ From the late-eighteenth century, coloured and patterned paper was used to imitate stained glass. See Muthesius, 2009: 65.

⁶¹⁵ National Magazine (August 1857): 272; Bow Bells (September 5, 1866): 141.

⁶¹⁶ Sixpenny Magazine (March 1865): 389-90; All Year Round (May 29, 1880): 61-62.

⁶¹⁷ National Magazine (August 1857): 272.

⁶¹⁸ The Ecclesiologist, (April 1862): 173.

⁶¹⁹ Very few examples of diaphanie are known to survive, although Martin Harrison informs me there are some at Snibston Church, Leicestershire. The east window of Longhorsey old church, Northumberland (now ruined), once featured transparencies "designed and executed in diaphanie by the late Sarah Elizabeth Ames of Linden in this parish who died on the 29th of February 1868". See *Northumberland, England's Farthest North*, 1953.

⁶²⁰ Evans, 1862: 405-406.

and who only care to secure 'novelties' (which may be as remarkable for ugliness as beauty) in furnishing their homes". 621 This remark echoed the derision of a public who "prefers pleasure to principle" by Gambier Parry, author of an article on stained glass at the 1867 Paris Exposition, published in the *Illustrated London News*:

Another leading glass-painter, confessing with regret how few of his art were worthy of being called artists, allowed that the modern pictorial treatment was bad, but commercially inevitable for a public which had but little knowledge or care for the proprieties of the art or discrimination of its merits. It is a pity, indeed, that an art of such power and beauty should be sacrificed to such considerations. No doubt "the public" is, en masse, an animal which prefers pleasure to principle – and little wonder! In an age when old truths are regarded as little else than the scales which fell from the eyes of the blinded Apostle. 622

Yet, despite the sway of such opinions, these novel stained glass imitations appeared at International Exhibitions throughout the nineteenth century and remained popular not just in Britain, but across the world. At the Melbourne International Exhibition of 1880-81, exhibitors from Prahan, Victoria, to Cape Town, South Africa, showed 'vitremanie', alongside the genuine stained glass exhibits. 623

These products were widely advertised as a suitable parlour occupation or decorative art for ladies and marketed as an affordable 'Stained Glass Substitute'. An article with this title, published in an American periodical in June 1890, advocated the use of sheets of linen paper intended "to give the effects of the opaque leads and richly coloured glasses closely enough to defy anything but the closest inspection to determine the imitation from the real". Let went on to say that the paper was available in a variety of designs and was adaptable "for use in houses, churches, stores and public buildings, to represent the effects of the most beautiful stained glass, at comparatively trifling cost". In France, the Sèvres workshop provided transfer-printed borders to less wealthy clients, and as Elizabeth Emery and Laura Morowitz have discovered:

[W]hile the wealthy had real stained glass, the less affluent also had access to medieval-style products (albeit in inexpensive and far less labor-intensive materials). Companies such as *Les Vitraux Français* sold translucent sheets with stained-glass patterns — advertising as 'imitating old stained-glass

⁶²¹ Eastlake, 1969 (1868): 64-65, xxii, preface.

⁶²² Gambier Parry, 1867: 275.

⁶²³ Melbourne International Exhibition, 1880. The Official Catalogue of Exhibits (1880).

⁶²⁴ The Manufacturer and Builder (June 1890): 140.

⁶²⁵ The Manufacturer and Builder (June 1890): 140.

windows' – that could be stuck on windows to provide a vaguely château-like flavor 626

Many UK manufacturers, such as McCaw, Stephenson & Orr of Belfast, produced *Glacier Window Decoration*, and advertised their products to an international market (Fig. 3.20).⁶²⁷ Miles Lewis has also noted the popularity of the 'Glacier' print in the former British colony of Victoria, Australia.⁶²⁸

In a French advertisement, bourgeois women are shown putting up a popular *Vitraux Glacier* decoration to mask the industrial view outside their window (Fig. 3.21). Another advertisement for M. Levens of Paris shows a middle-class woman decorating her window with *vitraux adhesifs* (Fig. 3.22). This practice appears to have been common during the nineteenth century, for both imitations and genuine examples of stained glass, as we shall see in Chapter 5. Such advertisements are noticeably targeted at women as domestic consumers, revealing the market for stained glass in the home. In other advertisements, hand-painted prints present stock designs of Parisian firm Revon & Cie's *Vitraux Glacier* in situ and surrounded by draped curtains, to demonstrate their effect in the domestic interior (Fig. 3.23). These advertisements reveal a broad geographical market for stained glass imitations in Europe, America and in the British colonies, and their widespread popular consumption in the home and the church, surely formed part and parcel of the spectacle of nineteenth-century stained glass.

Light and Materiality: A Translucent Spectacle

In addition to the development of imitation stained glass products, this period witnessed vast changes in the glass industry. New techniques and materials were showcased at the International Exhibitions. As the quality of coloured glass produced by glassworks such as Bontemps' factory at Choisy-le-Roi and Powell & Sons of Whitefriars improved, experimentation with different types of glass ensued, transforming the production of stained glass as well as glass objects. Automated tools aided the diverse working of glass, the brilliant

⁶²⁶ Emery and Morowitz, 2003: 79-80.

⁶²⁷ McCaw, Stephenson & Orr's Glacier decorations were certainly advertised in France. Maciet Collection (482.21), Bibliothèque des Arts Décoratifs, Paris.

⁶²⁸ Printed transfers survive in windows at 'Woodlands' House, Essendon (dated 1889) in the suburbs of Melbourne. See Lewis, 2008 and Lewis, 1996.

⁶²⁹ Maciet Collection (482.21), Bibliothèque des Arts Décoratifs, Paris.

deep cutting, engraving, acid etching, intaglio engraving, and the creation of new glasses, from spun crown glass to sheet glass.⁶³⁰ Powell & Sons of Whitefriars exhibited their patented 'stamped quarries', formed by press moulds, at the Great Exhibition and at exhibitions in Australia.⁶³¹ Powell & Sons, Lloyd of Birmingham, and Hartley of Sunderland exhibited samples of new 'antique' muff, or cylinder glass, at the 1862 International Exhibition.⁶³² These glasses were created through one of the medieval techniques of glass production, whereby molten glass is gathered onto a blowing iron and blown into a cylinder, which is then scored, reheated and flattened to produce a sheet.⁶³³

In the 1870s, two of the most renowned innovators in nineteenth-century stained glass, Tiffany and La Farge, established their studios in America and revolutionised late nineteenth-century stained glass design with their opalescent glasses. In particular, these glasses increased demand for secular stained glass. Having filed a patent for his opalescent glass in November 1879, which was granted in October 1880, La Farge first exhibited his opalescent stained glass to an international public at the 1889 Paris Exposition, by which time there was an extensive commercial supply of opalescent sheet glasses. Critic William Cosmo Monkhouse wrote:

[La Farge] has a true sense of the qualities and conditions of his material, and knows how to make the most of them. [...] Unlike a great deal of modern work of this kind, the light does not strike through his panels and dazzle the eye with patches of crudely-coloured light, but is held, as it were, in rich and jewelly suspension. Often, indeed, he obtains that effect of inward flame which is so observable in oriental glass. 636

In his official report of stained glass at the 1889 Exposition, Charles Champigneulle also recognised the beauty of opalescent glass, writing that "its opacities and its transparencies [...] seem to spout out gold, jasper and onyx of the light by their fantastic collisions, so full of surprises and harmonies". ⁶³⁷ These semi-transparent opalescent glasses of variable thickness

⁶³⁰ Armstrong, 2009: 120

⁶³¹ See Bontemps, 1851: 55; Giedraityte, 1983: 12. Powell's quarries were shipped to Australia where they were displayed at the Industrial and Art Exhibition at Sydney in 1861 by J. Cooper of Woolloomooloo. ⁶³² Shaffner and Owen, 1862.

⁶³³ For 'antique' glass see Bontemps, 1856: 393; Powell, 1946; Salmond, 1972-73; Shepherd, 1997; Cheshire, 2004: 173-74; Benyon, 2005.

⁶³⁴ See Yarnall, 1997. Between 1880 and 1883 there was an enormous demand for secular stained glass in the USA. Yarnall, 2012: 112.

⁶³⁵ Sloan and Yarnall, 1992: 19-24; Yarnall, 2012: 158.

⁶³⁶ Monkhouse, 1889: 384.

^{637 &}quot;ses opacities et ses transparences qui semblent faire jaillir l'or, le jaspe et l'onyx de la lumière par leurs heurtements fantastiques, si remplis d'imprévus et d'harmonies". Champigneulle, 1891: 177.

and texture came in tones of mixed colours with flows and stripes, and manipulated light in new ways.

One of La Farge's 1889 exhibits, the 'Watson Memorial Window' depicting *The Sealing of* the Twelve Tribes (Fig. 3.24), now in the memorial chapel at Trinity Church, Buffalo, New York, provides us with an opportunity to explore how La Farge used opalescent glass to produce a spectacular interplay of light and colour. 638 The window takes its subject from Revelation 7 where angels place a seal upon God's chosen people. Rather than depict four angels and representatives of each of the twelve tribes of Israel, however, La Farge represented a single angel placing a seal upon the forehead of a woman, with two other figures ascending into heaven above. The hands, arms, neck and heads of the figures are the only parts that are painted; 639 they are heavily modelled in the manner of many earlier glass transparencies including Jervais' windows at New College, Oxford. In contrast to these however, La Farge has employed hundreds of pieces of glass, in an array of green, red and violet of both dark and light tones, for the robes of the figures and wings of the angel. A strong tonal contrast in these parts has been obtained by using glass with varying levels of transparency. The more transparent pieces of glass appear white in bright light, and the thicker, more opaque, glass appears almost black in places. Together with the dynamic lead lines, the arrangement of the pieces of glass, and their tonal contrasts, emphasise the upward movement of the figures. As La Farge's biographer, James Yarnall, has acknowledged, "the effect was electric, imparting a kinetic quality". 640 The success of La Farge's 1889 exhibition established his international reputation.

Tiffany visited the Paris Exposition of 1889, but did not exhibit any stained glass at an International Exhibition until the Chicago World's Columbian Exposition of 1893 where his reputation superseded that of his main artistic and business rival La Farge, who was absent from this exhibition. An article by Tiffany, entitled 'American Art Supreme in Colored Glass' and published in *Forum* in 1893, the same year he exhibited in Chicago, described how opalescent glass was created; the molten glass was forced into folds and creases to achieve the

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⁶³⁸ The memorial chapel was created in memory of Mrs Charlotte Sherman Watson's mother and aunt. See also Chapter 4.

⁶³⁹ The features of these figures bear resemblances to Juliette Hanson, Bancel La Farge and Mary Whitney. See Yarnall, 2012: 160.

⁶⁴⁰ Yarnall, 2012: 160.

effect of light and shade in draperies without using paint or lead lines. ⁶⁴¹ Consequently, the act of painting on glass with pigment or enamel was diminished to the extent that opalescent windows displayed relied solely on the colour and texture of the glass and leads of varying thickness to bring the design to life. Enamel pigments were predominantly used for painting flesh, hands, and faces. ⁶⁴² This is evident upon looking at *Woman Feeding Flamingoes*, one of the secular windows exhibited by Tiffany in 1893, where the only painted areas of the design are the woman's face, hands and hair (Fig. 3.25).

Having been showcased and acclaimed at the International Exhibitions, which brought together stained glass makers from across the world, by the end of the nineteenth century, La Farge and Tiffany's windows were imitated across America and Europe by converts to "the cult of special glass". Their followers embraced the material qualities of the glass, over and above its painted surface. As the International Jury Report for the Exposition in Paris, 1900 commented, "[a]ll is subordinate to this precious material", and the role of the glass-painter is transformed; he is at the mercy of his unique material. 644

According to Didron, the stained glass makers who used these opalescent glasses wanted "to surprise the eyes, without caring too much about the charms of the magic of the colour and natural light of the glass". However, Didron disliked the opacity of these opalescent windows. He stated:

[I]n a general way, one has substituted ordinary glass, transparent and luminous, for this devitrified material, blocked, brown, a little translucid, often almost opaque and, in this case, characterised by the appearance of porcelain or alabaster, of a sad aspect and mysterious allure, which has lost the qualities of radiant splendour of the primitive stained glass. 646

641 Tiffany, 1893: 624.

⁶⁴² Tiffany, 1893: 625.

⁶⁴³ "le culte des verres spéciaux". Didron, 1900: 315. The use of American glass in Germany increased notably after the Chicago Exposition. See Daumont-Tournel, 1902: 66.

^{644 &}quot;Tout est surbordonné à cette matière précieuse". Daumont-Tournel, 1902: 37.

^{645 &}quot;surprendre les yeux, sans trop se soucier de les charmer par la magie de la couleur et l'éclat naturel du verre". Didron, 1900: 270.

⁶⁴⁶ "[D]'une façon générale, on a substituté au verre ordinaire, transparent et lumineux, cette matière dévitrifiée, grippée, rissole, peu translucide, souvent même presque opaque et, en ce cas, se caractérisant par des appearances de porcelain ou d'albâtre, d'aspect triste et d'allure mystérieuse qui a perdu les qualitiés de splendour rayonnante du vitrail primitif". Didron, 1900: 271.

Tiffany denied that glass should always permit light to filter through, favouring translucency over transparency. 647 Thus, although this period witnessed enormous changes in material innovation, the early-nineteenth century appeal of the painted glass 'transparency' was in many ways revived a century later through opalescent glass. Through their opacity, these windows obscured the light filtering through, like a *vitrail-tableau*, except the glass itself was the opaque barrier not the paint.

The relationship between painting on glass and painting on paper or canvas remained important in thinking about these opalescent windows too, since both La Farge and Tiffany were painters before they were stained glass artists.⁶⁴⁸ Tiffany recognised that the opalescent glass material used in the late-nineteenth century "rivalled the painter's palette", and that plating glass windows achieved the same result as "glazing in oil-painting".⁶⁴⁹ La Farge defined stained glass as an art that involves "painting in air with a material varying coloured light".⁶⁵⁰ Furthermore, Yarnall has argued that, through the medium of watercolour, La Farge approximated the translucency of coloured glass to develop his window designs, and that his experience with plating stained glass may have also influenced the layering of colour in his watercolour paintings.⁶⁵¹ In order to understand the uniqueness of stained glass then, and its critical discussion in the nineteenth century, we need to further conceptualise and interpret the medium in relation to other artistic media and popular spectacles.

Conclusion

By considering the late-eighteenth and early-nineteenth century exhibition of stained glass in relation to contemporaneous spectacles, we have discovered interesting parallels and precedents for its later spectacular display at International Exhibitions. Nineteenth-century stained glass represented a modern visuality shaped by the recent Georgian past, and refashioned after, but not simply duplicating, the medieval. The involvement of several high-profile artists in glass-painting confirms an important crossover between stained glass and oil painting, one that sheds light on stained glass practice from the late eighteenth to late nineteenth-centuries, and further dispels the myth that the fine arts and decorative arts were

⁶⁴⁷ Eidelberg et al., 2007: 25.

⁶⁴⁸ Tiffany contributed three oil paintings and six watercolour paintings to the Philadelphia Centennial of 1876. La Farge exhibited paintings in the fine art section at the 1878 Paris Exposition.

⁶⁴⁹ Tiffany, 1893: 623.

⁶⁵⁰ La Farge, 'Window, Part III', in Russell Sturgis, *A Dictionary of Architecture and Building* (London and New York, 1902): 1080. Cited in Sloan and Yarnall, 1992: 5.

distinct from one another. 652 As such, it should encourage greater dialogue between stained glass historians and fine and decorative art historians, as well as historians of popular visual culture.

In addition, the displays of stained glass at the first International Exhibitions demonstrate that nineteenth-century stained glass existed in a number of different guises. Until recently, scholarship on stained glass has been more concerned with elite art-historical and ecclesiological issues rather than questions of mass consumption. Yet, as we have seen, the history of nineteenth-century stained glass is closely intertwined with, and can be understood in dialectic relation to, the culture of popular spectacle. Both genuine and imitative forms of stained glass were produced and consumed in this period across the world, and used in the home as well as the church. Furthermore, analysis of reviews of stained glass exhibits reveals a contemporary awareness of modern optical devices and forms of entertainment involving the transmission and manipulation of light through translucent glass. The knowledge and experience of such spectacles appears to have influenced critics' and visitors' perceptions of stained glass at the Exhibitions. Further examination of the use of coloured glass in optical toys and entertainment shows might help us better to interpret visual and textual records of displays of stained glass in similar spectacular environments.

To return to Armstrong's Glassworlds, stained and painted glass is "set apart" from ordinary plain and crystal glass, but at the International Exhibitions it was an integral part of the same modern culture of spectacle. Exhibitors exploited these environments, and the effects of their medium, to attract visitor's attention. For instance, a book on Exhibitions and the Art of Display (1925) by Laurence Weaver, who organised the British Empire Exhibition 1924-25, advised exhibitors to organise their displays in order to "minister to the appetites of the visitors, who would be impressed by playful light and movement, [...] activity and development". 653 Such strategies acknowledge the broader commercial motives for participating in Exhibitions, the impact of Exhibitions upon professional reputations, and the logistics of exhibiting stained glass, which form the subject of our next chapter.

⁶⁵² See also Hart, 2010; O'Neill, 2010.653 Weaver, 1925: 79.

CHAPTER 4

STAINED GLASS EXHIBITORS: PARTICIPATION, REPRESENTATION, COMPETITION

Introduction

The International Exhibitions made visible material, commercial, trade and social links between peoples, nations and goods, ⁶⁵⁴ and offer important perspectives upon the internationalised production, exportation, and importation of stained glass. Yvette Vanden Bemden acknowledged the need for an international approach to the medium, in 2000:

[H]ow is one to study nineteenth- and early twentieth-century stained glass by remaining closed in one's own country? Glass and stained glass windows were exported and imported, large firms set up trading posts abroad and sent their representatives over there, glass makers moved around, models were circulated [...]. The production of stained glass became internationalised and it is evident that the more famous studios' participation in the large international exhibitions favoured this globalisation of production, competition and exchange. 655

This chapter responds to these issues by addressing exhibitors' participation in the competitive International Exhibition environments, and considering their impact upon the rapidly expanding global market for stained glass.

It begins by exploring the demographic of stained glass exhibitors, and analysing patterns of participation in the International Exhibitions. Who exhibited stained glass, why did they participate, when and where, and how did they select which specimens to exhibit? I examine collaborative networks, question whether the International Exhibitions were a microcosm of the global stained glass industry, and reveal the ways in which Exhibitions were used to gain publicity and seek clientele both at home and abroad. After the ephemeral exhibitions ended, written reports and visual records provided further modes for the dissemination of stained glass exhibits across the world. The second part of this chapter discusses how official reports, unofficial reviews and jury awards measured exhibitors' success and affected their reputations,

655 Vanden Bemden, 2000: 21.

⁶⁵⁴ Hoffenberg, 2001: 18.

and how stained glass exhibits were discussed and circulated during, and after, the events through text and image.

Part I Exhibitors and their Networks

Networks and Collaboration

Although official catalogue entries often list a single exhibitor (most often the manufacturing firm), displays of stained glass depended, as we have seen, on the collaboration and cooperation of many individuals within a stained glass studio, as well as freelance designers, patrons and clients, exhibition organisers, agents, and workmen responsible for installing the glass on arrival. The complex organisational, artistic, commercial, and patronage networks surrounding exhibitons are often ignored by art historians, and involve painstaking archival work, but are crucial to our understanding of nineteenth-century stained glass artist's networks. As we have seen, the International Exhibitions often reveal collaborations between several individuals in the design and execution of stained glass windows, as well as in the organisation of displays. For instance, French artist Delalande designed windows for no fewer than three stained glass firms (those of Bégule, Gaudin and Hucher) at the 1900 Paris Exposition, where Merson also designed windows for both Marcel Delon and Gaudin. Exposition, where Merson also designed windows for both Marcel Delon and Gaudin.

The few published studies of nineteenth-century stained glass point to, but don't reflect on, many examples of artists designing for more than one firm at a time and, during the course of their careers, working for several studios, of which I will cite just a few and draw out the significance of this evidence. For example, regional glazier Joseph Bell of Bristol completed commissions for the Bristol-based firm Hall and Sons (who also had a branch in London) as well as those for his own successful studio. Before Clayton & Bell became partners, Clayton had designed for Ward & Hughes, and Bell for Lavers & Barraud, and even after their partnership was formed, both Clayton and Bell separately supplied designs for Powells from 1856. Barraud also worked for Powells in 1849-50. Clement Heaton and James Butler both worked for Holland & Sons before establishing Heaton & Butler.

⁶⁵⁶ See Levy, 2012.

⁶⁵⁷ See Exposition Universelle de 1900. Catalogue général official, 1900.

⁶⁵⁸ Cheshire, 2004: 110-11.

⁶⁵⁹ Harrison, 1980: 30; Larkworthy, 1984; Waters, 2012: 248.

⁶⁶⁰ Waters, 2012: 137.

⁶⁶¹ Harrison, 1980: 32; Galicki, 2001; Waters, 2012: 72.

exhibited at the 1862 International Exhibition, revealing complex collaborative networks that appear to characterise the industry.

In France, Prosper Lafaye had a brief association with Joseph Veissière before establishing his own studio, and later accused Lafaye of deception, after both artists exhibited independently at the 1855 Exposition. 662 Lobin's studio (based in Tours) collaborated with Gesta (Toulouse), and Parisian glaziers Didron, Gsell, Émile Thibaud, Alexandre Mauvernay and Hirsch. 663 In addition, the glass manufacturers who produced and supplied glass relied on international networks. It is well known that the British glass industry was indebted to Frenchmen George Bontemps and Adolphe Thibaudeau, who came to Chance Bros in the 1830s. 664 Tiffany's glass-blowing department at the Corona glassworks in Queens, New York (established 1893), was run by Arthur J. Nash, from Stourbridge, England. 665 In the second half of the nineteenth century, these networks became even more cosmopolitan and imperial, and the International Exhibitions played an important part in this.

Several firms had commercial branches or offices in cities at home and overseas from which to sell and export their products, reminding us of the cosmopolitan character of stained glass production. Hardman's of Birmingham opened a branch in Dublin in 1853. 666 London firm Lavers & Barraud opened an office and showroom in central Manchester in the 1860s, enabling them to supply the north of England. Mayer of Munich had branches overseas by the 1860s, in New York, London and Paris, and Zettler Studios, also of Munich, opened a branch in New York in 1888. Cottier opened branches of his furnishings and decorating company in New York and Sydney in 1873, the latter in partnership with Lyon. Commissions were often sought through intermediary agents, and thus cosmopolitan trade and internationalism operated at different levels, not merely at the transnational and the national, but also at the local.

⁶⁶² Pillet, 2010: 138-39.

⁶⁶³ Irlandes, 1994: 26. For Mauvernay, see Dalzotto, 1992.

⁶⁶⁴ See Powell, 1923: 117-18; Armstrong, 2008: 47.

⁶⁶⁵ Eidelberg et al., 2007: 16, n.20.

⁶⁶⁶ Interestingly, this was the same year as the first Dublin International Exhibition, where Hardman's contributed stained glass to a medieval court similar to that of 1851. See Fisher, 2008: 135.

⁶⁶⁷ Waters, 2012: 156.

⁶⁶⁸ 'Munich Pictorial Style Stained Glass Windows in Western New York', http://buffaloah.com/a/DCTNRY/stained/munich.html (accessed 9 January 2013).

⁶⁶⁹ Harrison, 1980: 56. An advertisement for the firm included both the London and Sydney addresses. *Australian Churchman* (October 3, 1874): 8. Cited in Giedraiyte, 1983: 263. ⁶⁷⁰ Geyer and Paulmann, 2001: 20.

As well as contributing exhibits, many stained glass makers also visited Exhibitions. These events provided a unique opportunity to view and compare stained glass windows by their regional, national, and international competitors. During their brief association, Henry Holiday and William Gualbert Saunders stopped off at the 1867 Paris Exhibition on their way to Italy to study church decoration, and, two years later, Saunders formed his own stained glass firm. ⁶⁷¹ Francis Kirchhoff, a glass painter who specialised in figure painting, ⁶⁷² was one of the artisans chosen by the Council of the Society of Arts to visit the Paris Expositions of 1867 and 1878 and write reports on stained glass for the British Commission. 673 He valued this experience, describing the 1867 Exhibition as "more improving, perhaps than several years of study; it must necessarily enlarge one's ideas, and suggest a greater range in the treatment of the work". 674 Similarly, in 1893, Tiffany acknowledged the significance of exhibitions for networking and artistic comparison: "exhibitions are of great use; the artist comes face to face with his fellow artists, and patrons are better able to judge of the merits of the work of each". 675 The inspiration, experience and opportunities presented to nineteenth-century artists by International Exhibitions, including travel, new contacts and networks, are difficult to unravel, yet were essential to these international stained glassworlds.

International Exhibitions and the Global Stained Glass Industry

As events driven by economics and politics, as well as by art and culture, the Exhibitions and the interactions that took place within them, should be seen in terms of a nineteenth-century internationalism that coexisted in both national and cosmopolitan discourse. But to what extent were the Exhibitions really 'international'? After all, the 'International' often stood for 'European', not 'global', and should be considered within a wider political, economic and cultural context, in terms of inclusion and exclusion, participation and representation. Of course, a list of those who exhibited stained glass at the International Exhibitions incorporated in this study (see Appendix 3) is not fully representative of the nineteenth-century stained glass industry. Luneau's analysis of the participation of French glass-painters at the Paris

⁶⁷¹ Harrison, 1980: 46.

⁶⁷² Kirchhoff was a figure painter for London firms Gibbs & Moore and Ward & Hughes. Correspondence with Tony Benyon, December 2012.

⁶⁷³ See Kirchhoff, 1867; Kirchhoff, 1879.

⁶⁷⁴ Kirchhoff, 1867: 83.

⁶⁷⁵ Cited in Garfinkle, 1996: 105.

⁶⁷⁶ For nineteenth-century internationalism, see Geyer and Paulmann, 2001.

Expositions Universelles, reveals that only 18% to 37% of French stained glass studios participated at each of these events. Participation varied from exhibition to exhibition. Many designers and manufacturers did not exhibit at all, and, exhibitors were more likely to participate in Exhibitions held in their own country than abroad. But, as we shall see, these events do give us a good idea of the size and scale of the stained glass industry, and reveal its major players.

We can, however, observe that the dominant exhibitors of stained glass in this period followed global economic trends. Britain and France led the way between 1851 and 1867. The 1870s witnessed an increase in German exhibitors, reflecting the unification of Germany (in 1871) and its subsequent expansion, while the end of the century, 1889 to 1900, was marked by a significant rise in exhibitors from the USA. Participation was also affected by changing political climates and international relations. For instance, after the Franco-Prussian War (1870-71), the German Reich did not officially participate in the Paris Expositions of 1878 and 1889, although several German exhibitors were present. Between 1851 and 1900 France and Britain were the most prolific national exhibitors of stained glass, closely followed by the German states, the USA, Belgium and Austria. Yet exhibitors were also present from Switzerland, Italy, the Netherlands, Sweden, Denmark, Spain, Luxembourg, Hungary, Russia, Egypt, French colony of New Caledonia, and the British colonies in Australia, Canada and South Africa.

In the early-nineteenth century, stained glass was predominantly associated with European civilisation in spite of its presence in the Islamic world,⁶⁷⁹ and almost exclusively produced in the United Kingdom, France, Belgium, the Netherlands, Switzerland and Germanic regions; but, by the 1850s, new world America,⁶⁸⁰ and the British settler colonies in Australia and

⁶⁷⁷ See Luneau, 2012: 245.

⁶⁷⁸ The 1889 Paris Exposition marked the centenary of the French Revolution and consequently many European countries with monarchies abstained from official participation, although they were economically obliged to encourage industries to participate independently. Ageorges, 2006: 13; Geppert, 2010: 16. See also Forster-Hahn, 1996.

⁶⁷⁹ For the use of stained glass in the Islamic world, see Hillenbrand, 1994; Blair and Bloom, 1995. This is further discussed in Chapter 6.

⁶⁸⁰ The founding of American stained glass studios can be traced to a handful of Englishmen. Jean Farnsworth's study of Philadelphia's stained glass commissions have revealed that 36% of extant stained glass windows in the city between 1849 and 1930 were imported. See Farnsworth, 1997: 15; Raguin, 1997.

Canada had also begun producing stained glass, as well as importing windows.⁶⁸¹ As the Official Catalogue to the 1867 Paris Exposition acknowledged, "the stained glass industry is developing more and more on all the points of the Empire".⁶⁸² John C. Spence, one of the first stained glass artists active in Montreal, exhibited stained glass at the Paris Expositions of 1855 and 1867, Philadelphia Centennial of 1876, and Chicago Columbian of 1893.⁶⁸³ Under the forces of Imperialism, a cosmopolitan and imperial marketplace for stained glass emerged and effected the migration of skilled labourers to the British colonies, the exportation of materials required to manufacture stained glass, and the shipping of European-manufactured stained glass windows abroad.⁶⁸⁴ Kirchhoff's report on the stained glass at the 1878 Paris Exposition emphasised that he had "personally assisted on glass for America, India, Cape of Good Hope, Algiers, Australia, and New Zealand" but never for France or Germany, revealing the growing significance of colonial markets.⁶⁸⁵

British immigrants carried the art of stained glass to the colonies in many ways, through glaziers, architects, patrons, pattern books and the printed image, but also through International Exhibitions. From my analysis of the British studios that exported stained glass to Australia in the nineteenth century, it is significant to note that more than 70% exhibited stained glass at one or more of the International Exhibitions (Fig. 4.1). The Australian stained glass industry was founded entirely by British immigrants, most of whom had completed apprenticeships in British stained glass studios before emigrating, after which they trained a new generation of Australian artists. For example, Melbourne firm Ferguson & Urie was established in 1853 by two Scotsmen, James Ferguson and James Urie. Edward Brooks learnt the stained glass trade in England before arriving in South Australia in 1839, and opening a studio in Adelaide in 1855. South Falconer set up the first professional stained

⁶⁸¹ The British colonies emerged as an important market for international stained glass. For stained glass in Australia and New Zealand, see Zimmer, 1984; Donovan and Donovan, 1986; Sherry, 1991; Ciaran, 1998. For stained glass in Canada, see Stevens 1961 (1967); Pepall, 1981.

⁶⁸² "l'industrie des vitraux se développe de plus en plus sur tous les points de l'Empire". *Catalogue officiel des exposants*, 1867: 17.

⁶⁸³ Spence was the only Canadian representative of glassmaking at the 1855 Exposition where he exhibited both stained glass and table glass. See Stevens, 1967 (1961): 111-15; Pepall, 1981: 49.

⁶⁸⁴ Barringer has noted the circulation of goods and increase of trade was a primary underlying motivation for imperial expansion. Barringer and Flynn, 1998: 3.

⁶⁸⁵ Kirchhoff, 1879: 157-58.

⁶⁸⁶ See Down, 1975; Giedraiyte, 1983; Donovan, 1986; Sherry, 1991.

⁶⁸⁷ I am grateful to Ray Brown and Noelle Nathan, descendants of Ferguson, and Urie, for providing me with information on the history of this firm.

⁶⁸⁸ Donovan and Donovan, 1983.

glass studio in Sydney in 1863, having emigrated from Glasgow in 1856.⁶⁸⁹ John Lamb Lyon and Daniel Cottier formed Sydney's second workshop, Lyon & Cottier, in 1873.⁶⁹⁰ Lyon ran the business from Sydney, and Cottier supplied Lyon with assistants, artists, and craftsman from the UK.⁶⁹¹ These personal connections were important, and as Giedraiyte has noted, "when live contact between the local firms in Sydney and Britain ceased, glass painting in Sydney rapidly declined – with only a few exceptions".⁶⁹² Along with Melbourne's leading stained glass firm (Ferguson & Urie), Lyon & Cottier of Sydney were the first Australian stained glass studio to participate in an International Exhibition in Philadelphia, 1876.⁶⁹³

Stained Glass Exhibitors

The total number of exhibitors of stained glass at the exhibitions included in this study, a figure well over 400 (see Appendix 3), demonstrates the enormous scale of the stained glass industry in this period, and reveals that exhibitors were of different experience, nationality and gender. The number would be even larger if we included the names of designers as well as manufacturers, but for the most part, it was the manufacturing firms that were listed in the Official Catalogues. In spite of their current status amongst art historians, the names of Morris & Co., La Farge, and Tiffany were not amongst the most prolific exhibitors. Instead, the International Exhibitions highlight other firms that have received considerably less scholarly attention, as well a number of studios that are already familiar to stained glass historians.

⁶⁸⁹ Falconer had trained in the English studios of Gibbs, and Warrington. See Giedraiyte, 1983: 130; Sherry, 1991: 15. Frederick Ashwin, a British immigrant from Birmingham, joined Falconer's studio in 1875.

for Both Lyon and Cottier completed apprenticeships with a Glasgow glass-painting firm in the 1850s and '60s. The *ADB* lists this firm as Kearney & Co, but Lyon appears to have worked for Glasgow firms Keir & Co, and then Cairney & Co. Afterwards, Lyon worked for London firm Ward & Hughes before emigrating to Melbourne in 1861, where he joined Ferguson & Urie. Cottier is known to have designed for Ballantine & Allan and Field & Allan in Edinburgh from 1862 until 1865, when he started his own firm in Glasgow. He gained an Honourable Mention at Paris, 1867. Andrew Wells joined the firm *c*.1887 and left by 1895. His name was dropped from Lyon, Wells, Cottier & Co in 1897. Giedraiyte, 1983: 259.

⁶⁹¹ Lyon's obituary in the Australian press noted that he made at least three trips to the "old country" to recruit artists and craftsmen for the firm. Giedraiyte, 1983: 274, App. Item 21.
⁶⁹² Giedraiyte, 1983: 122.

⁶⁹³ Having received several awards at the Melbourne 1875 Intercolonial Exhibition both firms were selected to represent the Australian Colonies in Philadelphia the following year. See *The Builder* (September 2, 1876): 853; Down, 1975: 64; Sherry, 1991: 41.

⁶⁹⁴ It is impossible to gain an exact number of participants as stained glass exhibitors appear in several classes, and catalogues sometimes contain errors and omissions.

⁶⁹⁵ As Martin Harrison notes, "nearly all other Victorian stained glass has been assessed in a completely unrealistic relationship with Morris's work." Harrison, 1980: 9. Morris, Marshall, Faulkner & Co.'s 1862 stained glass exhibits were heavily criticised by the press (see Chapter 5) but their participation as Morris & Co. at the Boston 1883-84 Exhibition was particularly important. See Wardle, 1883.

There is not room in this thesis to provide a detailed analysis of the participation of stained glass firms at every exhibition in this study, but it is useful to highlight some interesting cases.

By far the most prominent exhibitor was Hardman & Co. of Birmingham, who participated at seven of the Exhibitions in this study; followed by Chance Bros. (Birmingham), Gsell-Laurent (Paris), and Carl Geyling of Vienna, who exhibited at six. French exhibitors Lorin (Chartres), Auguste Bruin, Paul Bitterlin, Lafaye, Maréchal, Nicod, and Oudinot (all based in Paris), each participated in five exhibitions. British firms Baillie, Clayton & Bell, Heaton, Butler & Bayne, Powell & Sons, Ward & Hughes (all of London); Canadian stained glass artist John C. Spence (Montreal); Belgian makers Pluys (Mechlin), and Capronnier (Brussels); and French studios Bazin (Mesnil-Saint-Firmin), Champigneulle (Bar-le-Duc), Vincent (Troyes), Bourgeois, Coffetier, Didron, Lusson, and Vantillard (all Paris) were present at four. The most prevalent British exhibitors tally with the dominant stained glass firms in the comprehensive surveys of nineteenth-century stained glass undertaken by Birkin Haward in the counties of Norfolk and Suffolk, England, revealing some major international players in the supply (and exhibition of) stained glass.

Statistically, only 10% of the stained glass exhibitors in Appendix 3 participated at three or more exhibitions in this study, including several studios that are today little known, such as British firms Claudet & Houghton (London), Forrest & Bromley (Liverpool), and the aforementioned Canadian form J. C. Spence & Sons (Montreal). A large majority (80%) participated in only one exhibition, suggesting that, for most these were one-off events. But we should be wary of relying on such statistics. These exhibitions occurred over a fifty-year period, and, only a handful of the studios founded prior to the Great Exhibition continued to produce stained glass for the entire period between 1851 and 1900, including Hardman's, Mayer & Co., Carl Geyling, and Gsell-Laurent. 697

The vast majority of these exhibitors were based in national or international metropolitan centres of stained glass production, identified by Geoffrey Down as London, Birmingham,

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⁶⁹⁶ Besides the small local studios, Haward's studies list the most prominent British studios as Ward & Hughes; William Wailes; Heaton, Butler & Bayne; Powell & Sons; Clayton & Bell; Hardman & Co.; Kempe & Co.; Lavers, Barraud & Westlake; Warrington; O'Connor; Cox & Sons; Gibbs; and Thomas Willement. All of these except Kempe and Willement exhibited at the Exhibitions. Similarly, of the international firms whose work is to be found in either Norfolk or Suffolk (Mayer, Oliphant, Didron, Gerente, Oudinot, Lusson, De la Roche, Lobin and Zettler) all except De la Roche were exhibitors. See Haward, 1984: 132; Haward, 1989: 149.

⁶⁹⁷ For Billard-Laurent-Gsell see Cabezas, 1996a.

Munich, Brussels, and Paris. ⁶⁹⁸ However, Appendix 3 also reveals the significance of colonial metropolises such as Montreal, Toronto, Sydney and Melbourne, and the emergence of North American cities, New York and Chicago, in the late-nineteenth century. Stephen Slack, an English immigrant who arrived in the USA around 1860, set up a stained glass studio in Orange, New Jersey, and exhibited stained glass at the 1876 Philadelphia Centennial Exhibition. ⁶⁹⁹

Furthermore, Appendix 3 highlights the production of stained glass in numerous regional towns and cities across the UK and France. Indeed, a surprisingly large number of local, regional and provincial exhibitors participated in the Exhibitions. Over a third of the stained glass exhibitors from the UK and France were based outside the capitals of London, Edinburgh and Paris. A number of these have since dropped into obscurity, despite their prominence in the period and associations with well-known artists, architects and critics of the time. For example, Plymouth firm Fouracre & Watson exhibited at the Paris 1878 and Melbourne 1880 Exhibitions, but the work of this firm is today little known. Their participation in the Melbourne Exhibition suggests they were seeking to establish a reputation in the colonies. The presence of the equally unknown Cambridge firm W.H. Constable & Co. at the 1876 Philadelphia Exhibition may have been due to Constable's connections with William Jay Bolton, the first stained glass manufacturer in America.

Although the nineteenth-century stained glass industry remained dominated by men, our list of stained glass exhibitors includes several women, drawing attention to the largely overlooked yet important role of women in the design and manufacture of nineteenth-century stained glass. A few of these were the spouses of stained glass artists. Pillet's study of the maintenance and restoration of historic glass in Paris lists a number of husband-wife teams of glaziers and glass-painters, the most prominent being Prosper and Sophie Lafaye (née Copée), who exhibited in 1867.⁷⁰² Both Veuve Lorin and Veuve Champigneulle, exhibited stained glass at the 1889 Paris Exposition on behalf of their recently deceased husbands. However, as we have already noted, the presence of independent American women exhibitors was

⁶⁹⁸ Down, 1975: 115.

⁶⁹⁹ Slack is thought to have had an association with Clayton & Bell. Waters, 2012: 218.

⁷⁰⁰ John Fouracre formed a partnership with his son John c.1866, and the earliest reference to 'Fouracre and Watson' is in 1875. Correspondence with Graham Naylor, December 2012.

⁷⁰¹ Bolton, a native of England, set up a kiln in New York in 1842 and later established a studio in Cambridge in 1845 which Constable, one of Bolton's shop assistants took over in 1853. Clark, 1992: 14.
⁷⁰² Pillet, 2010: 157.

particularly noticeable during the late nineteenth century. This progressive characteristic of the American stained glass industry is indicative of the fact that American studios, and the production of opalescent glass, opened up more avenues for women as they were less restrained by artistic tradition. Both La Farge and Tiffany employed women from the 1880s, and Tiffany's Women's Glass Cutting Department executed the rose window for Tiffany's Chapel at the 1893 Chicago Exposition, and the *Four Seasons* window, exhibited at Paris in 1900 (Figs. 4.2 and 4.3). In 1900, Juliette Milési, a pupil of Grasset and Merson at the École Guérin, Paris, also exhibited a *Four Seasons* panel after illustrations by the English children's book illustrator Kate Greenaway.

Participation

Although stained glass exhibitors chose to participate in the International Exhibitions, national committees such as the Royal Commission in the United Kingdom were responsible for encouraging exhibitors to participate in, and prepare exhibits for, foreign Exhibitions, thus revealing the important role played by bureaucratic networks in organising these displays, on both a local and national level. A letter in the Hardman Archives from the British Secretary and Executive Commissioner, Henry Cole, dated 7 August 1866, politely urged the firm to participate in the forthcoming Paris Exposition of 1867 (Fig. 4.4).

Many studios chose not to participate in the International Exhibitions at all. For example, two of the fathers of the nineteenth-century British stained glass industry, Willement and Warrington, were notably absent from the Great Exhibition. However, Warrington appears to have regretted this, as he and his sons exhibited several specimens at the second London 1862 International Exhibition. The absence of high-profile British stained glass firms Burlison & Grylls, and Charles Eamer Kempe is also notable, and may be explained by their conservatism. As Waters has observed, these two firms expressed "the sentiments of an

⁷⁰³ See MacDowell, 1986.

⁷⁰⁴ As Tiffany noted: "Those of us in America who began to experiment in glass were untrammelled by tradition, and were moved solely by a desire to produce a thing of beauty, irrespective of any rule, doctrine, or theory beyond that governing good taste and true artistic judgment". Tiffany, 1893: 623.

⁷⁰⁵ La Farge's favourite glass-painter was a woman (Juliette Hanson). Yarnall, 2012: 115.

⁷⁰⁶ Eidelberg et al., 2007: 32-34. Portions of this window survive in the Charles Hosmer Morse Museum of American Art.

⁷⁰⁷ Daumont-Tournel, 1902: 63. For Milési see Luneau, 2006: 389-91.

⁷⁰⁸ MS 175A/11/2/2/2 Part I, Hardman Collection, Birmingham Archives.

unprogressive section of society" and represented "an alternative, traditional line of designers who continued with an antiquated interpretation of religious imagery". 709

Practical difficulties may have deterred some from exhibiting. Making panels for exhibition, or finding available ones (those not yet installed into an architectural frame) took time and relied upon the agreement of patrons or clients. Stained glass panels were often also large, heavy, costly to move and, as we have seen, difficult to display in an ephemeral environment. In an article on the 1878 Exposition in the *British Architect*, Day, who began his decorative career as a stained glass designer for Lavers & Barraud, ⁷¹⁰ speculated that the poor provision of display space and inadequate lighting conditions affected stained glass artists' decisions as to whether to participate in an exhibition or not. He wrote:

Stained glass scarcely stands a chance at an exhibition. It would be the simplest thing in the world to construct a shed for it in which it could be seen to advantage – but it is invariably exposed in situations where there is almost as much light reflected on it as is transmitted through it – and, probably for this reason, manufacturers abstain from exhibiting.⁷¹¹

Day noted that neither Clayton & Bell nor Heaton, Butler & Bayne exhibited at the Paris Exposition of 1878, and Kirchhoff accounted for this by stating, British firms "have no expectation of receiving orders or commissions for painted windows to be erected in France or Germany". 712

Exhibitors were clearly commercially motivated yet selective in their participation at Exhibitions. As Dennis Hadley has noted, the exhibition of the stained glass window designed by Henry Holiday for Powell & Sons at the 1876 Philadelphia Centennial caught the attention of influential Philadelphia architect Frank Furness and appears to have launched Holiday's career in the USA. Kirchhoff also noted the significance of this Exhibition for British stained glass firms in general; he stated that "[h]undreds of church windows have been executed in England for America within the last few years". Only a handful of foreign stained glass exhibitors showed stained glass at the Melbourne Exhibitions of 1880-81 and

⁷⁰⁹ Waters, 2012: 11.

⁷¹⁰ Hansen, 2007: 20.

⁷¹¹ Day, 1878: 4.

⁷¹² Kirchhoff, 1879: 157.

⁷¹³ Hadley, 1994: 22-23.

⁷¹⁴ Kirchhoff, 1879: 157.

1888-89, and for many it was their first and last time at an International Exhibition.⁷¹⁵ Those who did participate saw it as "a chance to capture a new and potentially important market" – the developing colonies.⁷¹⁶ Archbishop Goold purchased two windows exhibited by Mayer & Co. at the first Melbourne Exhibition for St Patrick's Roman Catholic Cathedral, Melbourne.⁷¹⁷ These windows, which depict *King Melchizedek* (Genesis XIV: 18), and *The Last Supper*, are located in the Blessed Sacrament Chapel on the northern side of the apse (Figs. 4.5 and 4.6), and stand out as the only windows made by Mayer in the Cathedral.⁷¹⁸

Few Australian stained glass studios took part in Exhibitions beyond Australasia, partly because Australian Commissioners responded to requests from the UK to send natural exhibits, like flora, fauna, animals, and raw materials such as gold and timber, which they deemed 'representative' of Australasia as a group of agricultural colonies lacking in technology, but with commercial export value. However, the two international exhibitions held in Melbourne in the 1880s enabled Australian stained glass artists to demonstrate their capabilities to both their fellow countrymen and to international visitors. In 1887, the *Australian Builder and Contractors' News* declared that, "there is no doubt that the Melbourne firms are able to produce stained glass equal in quality to any imported goods". By the Melbourne Centennial Exhibition of 1888-89, stained glass studios were established in all the major Australian states, and the importation of windows from Europe began to decline, dropping considerably after the 1890s. One of the arguments for employing Australia's "own School of Glass-painting" instead of European firms, made in 1888, the year of the Melbourne Centennial Exhibition, was, that local artists were "able to grapple with the differences of our climate from that of European countries", and manipulate the light "to

⁷¹⁵ For example in 1888, stained glass exhibitors included Frenchmen Haudecoeur et Colpaert (Lille) and Hubert, and Belgian L. Mondran (Lodelinsart); Peartree & Co. (Berlin); Victor von der Först (Münster); E. Pratt & Co. (London); J.C. & O.C. Hawkes (Birmingham). See also Appendix 3.

⁷¹⁶ Parris and Shaw, 1980: 247.

⁷¹⁷ Goold's decision to purchase these windows may have been influenced by George Folingsby, an Irish-born painter and art educator who resided in Munich for over twenty years before arriving in Melbourne in 1879, where he was patronised by Redmond Barry. In 1882 Follingsby became Director of the National Gallery of Art and Master in the School of Painting and taught Munich methods to a generation of Australian artists. Zubans, 1972; Galbally, 2004: 15; Hoffenberg, 2001: 42.

⁷¹⁸ The remaining windows in the apse, by Hardman and Powell, were installed later. Zimmer, 1984: 77.

⁷¹⁹ See Hoffenberg, 2001; Darian-Smith et al., 2008.

⁷²⁰ ABCN (September 17, 1887): 300. Quoted in Sherry, 1991: 33. Similar statements had been made in America in 1857. See Farnsworth, 1997: 15.

⁷²¹ Sherry, 1991: 13.

⁷²² Giedraiyte, 1983: 419.

⁷²³ ABCN (June 2, 1888): 371. Quoted in Sherry, 1991: 34.

suit the high lights of our colonies".⁷²⁴ This was a problem that many European studios had to face when designing stained glass for colonies in the southern hemisphere.⁷²⁵

Exhibitions increased international reputations and helped gain commissions at home and abroad. They provided environments for exhibitors to advertise their wares to potential clients. As Henry Chardon wrote in an article on the forthcoming 1900 Exposition in *Revue de Paris*, 1 February 1896:

Expositions secure for the manufacturer, for the businessman, the most striking publicity. In one day they will bring before his machine, his display, his shop windows, more people than he would see in a lifetime in his factory or store. They seek out clients in all parts of the world, bring them at a set time, so that everything is ready to receive them and seduce them. That is why the number of exhibitions increased daily.⁷²⁶

Many scholars have explored the International Exhibitions as marketplaces, sites of consumption where exhibitors advertised their products to potential consumers, both public and official.⁷²⁷ This was certainly the main underlying motive for participation, although the extent to which commissions or commercial transactions took place in these environments is very difficult to assess, given that evidence is scarce.

Selecting Exhibits

Once exhibitors had decided to participate, how did they select their exhibits? From the available evidence, stained glass exhibits appear to fall into three categories. Firstly, windows which formed part of the architectural decoration of Exhibition buildings and pavilions; secondly, panels that had been commissioned for other architectural settings but not yet installed, and therefore available for exhibition; thirdly, smaller panels made especially for exhibition or competition purposes. The second type appears to have formed the majority of exhibits, being readily available for exhibition. My research has revealed that many exhibited windows were subsequently installed in churches, homes, town halls, and other public and private buildings across the world.

⁷²⁴ BEJ (May 9, 1891): 179. Quoted in Sherry, 1991: 34.

Many of Hardman & Co.'s first windows for St Mary's Cathedral Sydney, executed between 1881-86, were sent back to be 'darkened'. Similarly, Clayton & Bell's windows for St Paul's Cathedral, Melbourne, ordered by William Butterfield, 1887-91, were subject to changes because of the intense Australian light. See Giedraiyte, 1983: 70-74. For the difficulties of the strong light in Bombay, India, see Holliday, 2012: 14.

⁷²⁶ Quoted in Williams, 1982: 59 and Greenhalgh, 1988: 48.

Surviving correspondence from Pugin to Hardman & Co. in the years preceding the Great Exhibition reveal some of the practical problems Pugin faced when choosing works to exhibit in the 1851 Medieval Court. He advised Hardman that "we ought to have something of each kind", exhibits representing all the gothic styles.⁷²⁸ But, ever business-minded, he stated it would be most cost-effective if "you will only show windows ordered [which are not yet made or installed] and which will be paid for".⁷²⁹ This limited the display of stained glass Pugin could exhibit and draws attention to the complicated but significant role of patrons and clients.

The 'Early style' (defined by Pugin as *c*.1190-1300), was not represented in the Medieval Court because Hereford Cathedral refused to lend a light from their east window, which they were anxious to have in place as soon as possible. Pugin encountered objections from other clients too. He wished to display some panels demonstrating the 'late style' (*c*.1390-1540) intended for the south chancel of Jesus College, Cambridge, but the Chaplain and College also refused to let the panels leave Hardman's studio.⁷³⁰ A letter from James Stewart Gammell, an undergraduate of the College and one of the window's donors, explained:

The result is that I regret I cannot accede your request to allow them to be sent to the approaching exposition [...]. Tho' the reasons are various in the minds of the different subscribers[,] the conclusion they draw from them is the same – Many are unwilling that these windows executed especially for a church & so in a manner already consecrated shd. be made objects of exhibition among a collection & in a manner so purely secular. Others object to the time that would elapse before they could be placed in the chapel & some even speak of withdrawing their subscriptions if they are not to see the first of them before they leave College. 731

Studies of patronage are important to our understanding of the workings of the Exhibitions. As a recent article by Raymond Jonas' on sacred art and popular culture in late-nineteenth century France acknowledges, church archives (and private correspondence) "describe a world very different from that of Parisian galleries and Salons". Private correspondence also draws our attention, once again, to the difficulties with exhibiting religious furnishings in a secular exhibition environment.

 $^{^{728}}$ HLRO 304, letter no. 159, c.February 1851, and letter no. 693. Quoted in Shepherd, 2009: 89.

⁷²⁹ Quoted in Shepherd, 2009: 89.

⁷³⁰ These windows no longer survive, having been replaced by Morris glass in the early twentieth century. See Shepherd. 2009: 198.

⁷³¹ Letter from J.S. Gammell to Hardman, 14 December 1851. Quoted in Shepherd, 2009: 201.

⁷³² Jonas, 2005: 202.

Just before the 1889 Paris Exposition, La Farge wrote to the donors of the *Watson Window* (*The Sealing of the Twelve Tribes*), for Trinity Episcopalian Church, Buffalo, requesting to exhibit their window in Paris (See Fig. 3.24). He offered the donors, Mrs Charlotte Sherman Watson and her daughter Gertrude, a reduction in price, but encountered problems when Gertrude responded, saying "[n]ow we are very uncertain and unhappy about that, for we feel that you will make something louder and less refined than you would make just for us, to go straight to our church". The donor clearly perceived a difference in a window designed with propriety for a church, and one designed to attract the public's attention at a large exhibition. La Farge, heavily in debt, did not have the capital to make another exhibition piece, and wrote back defiantly, stating that, "the design pleases me. It seems to me one of my happiest, and unless I can send it to Paris I could not consent to build this window for you at any price". La Farge's stubborn approach secured the window for the Exposition and it was exhibited with much success. In addition to receiving a first-class exhibition medal, the French government awarded La Farge the Légion d'honneur and offered to buy the window, but Mrs Watson refused. The security of the propriety of the propriety of the propriety of the propriety of the window, but Mrs Watson refused.

Some windows appear to have been selected for display due to their geographical proximity to the hosting city of an exhibition. For instance, numerous windows executed for churches in Central and Greater London were exhibited at the 1862 International Exhibition in South Kensington. Where possible, foreign exhibitors showed windows destined for the country in which the exhibition was taking place, so as to avoid extra transportation costs and inconvenience. Gérente's sole exhibit for the Great Exhibition was a window for Ely Cathedral, and Capronnier's only exhibit at the 1862 Exhibition was the west window for Howden Minster, Yorkshire. The in also exhibited some windows for St Patrick's Cathedral, New York, at the Philadelphia Centennial of 1876, and at the 1878 Paris Exposition. At least one of the windows in the German Building at the 1893 World's Columbian Exposition

⁷³³ Yarnall, 2012: 159.

⁷³⁴ Yarnall, 2012: 159.

⁷³⁵ Yarnall, 2012: 160-61.

⁷³⁶ Such as those for All Saints' Church, Kensington Park (Ballantine); St Anne's Church, Soho (Ward & Hughes); Wimbledon Church (Cox & Son); St Stephen's Crypt, Westminster (Hardman); St Philip's Church, Earl's Court, Kensington (Heaton, Butler & Bayne); S. Matthias Church, Stoke Newington (O'Connor); St Paul's Church, Bow Common (Powells). See Whiting, 1862.

⁷³⁷ Bontemps, 1851: 57; Pellatt, 1863: 3.

⁷³⁸ McCabe, 1876: 611; *The American Architect and Building News* (January 19, 1878), 20-25. Farnsworth, 1997: 17.

was destined for the USA: a memorial window by Mayer & Co. for the chapel of the U.S. Naval Academy in Annapolis, Maryland. 739

Others used the exhibitions to showcase foreign or prestigious commissions. For example, at the 1867 Exposition, Austrian stained glass artist Carl Geyling of Vienna exhibited several windows that demonstrated his high-profile international patrons, who included members of the Austrian court, French Emperor Napoléon III, and other noble French families in the Lorraine region. One of these windows depicted the patron saints and arms of the Austrian Emperor, Franz Joseph I, and his Empress Elisabeth of Bavaria and was destined for the church of Saint-Epvre, Nancy, which was partly financed by the Austrian Emperor, a descendant of the house of Lorraine. 740 Geyling also exhibited three windows for the choir of the church of Saint-Joseph-Artisan, Paris, 741 an important site that further highlighted the Austrian Emperor's ties to France. 742 The central window depicts St Joseph, with the arms of Austria-Hungary below; the left window shows Francis of Assisi, and the right, St Elisabeth of Hungary (Fig. 4.7).

The third type of stained glass exhibit included panels or windows made especially for exhibition or competition purposes. Several French glaziers exhibited unsuccessful competition entries for the Ste-Chapelle restoration competition of 1846, including Lusson (in 1851), Lafaye and Veissière (both 1855). 743 Grasset also exhibited some unsuccessful maguettes for the 'Joan of Arc' glazing competition at Orléans Cathedral. 744 To save time and money, some exhibitors showed stock designs and samples of decorative panels, and many created replicas of previously commissioned windows that were sold afterwards, or returned to

⁷³⁹ In memory of soldiers who had lost their lives in the Samoan hurricane. Truman, 1976 (1893): 511; Art Journal (December 1893): 30.

⁷⁴⁰ Kirchhoff, 1867: 79; Bontemps et Bæswillwald, 1868: 95; Didron, 1868: 49-50; Gambier Parry, 1868: 382. The window was displayed in the Grand Vestibule of Le Play's Palais and was noted by several reviewers.

⁷⁴¹ Founded by Jesuits in 1851 as part of a German Mission led by Father Jean-Joseph Chable, the church became known as Saint-Joseph pro Germanis in 1856. Between 1865 and 1866 it was rebuilt in the neo-gothic style by Lucien Douillard and financed by collections taken in Germany and Austria. The windows were broken during bombardments in 1871 during the Franco-Prussian War, but have since been restored.

⁷⁴² Masses were held at the church for the marriage of the Austrian Emperor in 1854 and the birth of Archduke Rodolphe in 1858. A funeral service for Maximilian I of Mexico (Austrian Ferdinand Maximilian Joseph, Emperor of Mexico, 1864-67) also took place in the church after his capture and execution at the end of the Franco-Mexican War (1861-67). Gatouillat, 2004: 28-29.

⁷⁴³ See Yapp, 1851 and *Catalogue Officiel*, 1855.

⁷⁴⁴ Daumont-Tournel, 1902: 47. The competition for the Orléans windows was launched in 1893 and controversially won by master glassmaker Esprit Gibelin and the glass-painter Jacques Galland. See Didron, 1893-94; Bouchon, 1986c.

the studio to be re-exhibited.⁷⁴⁵ Exhibition pieces saved time and did not inconvenience clients. They could also be made to a scale and size suitable for display in such ephemeral environments. Such exhibits gave exhibitors more control over the articulation of themes and the display of their stained glass than in the usual "demand-driven relationship wherein patrons and pastors, who commissioned the works for specific installations, exercised a powerful influence on the selection of window topics and themes".⁷⁴⁶ Maréchal's self-portraits on glass, which we have already discussed, are a good example of this.

As we have already seen, exhibition pieces were often re-displayed at successive exhibitions or Salons. The Ecclesiologist suspected that many exhibitors had re-exhibited objects seen in London four years earlier. They wrote:

Sufficient time has not elapsed for an entirely new set of objects, and it would be too much to suppose that a tradesman or artist who has been at considerable expense in arranging his wares for London, would not avail himself of a second chance for advertising himself and his heavy stock [...]. The very first aspect of the French Exhibition then is, that it is a collection of familiar and rather tedious shop fronts.⁷⁴⁸

Prosper Lafaye certainly exhibited the same window at London in 1851 and Paris in 1855.⁷⁴⁹ This practice became increasingly common. Powell & Sons exhibited a replica of the centre light from the Tree of Jesse window in Waltham Abbey, designed by Burne-Jones, in London 1862, Paris 1867 and Philadelphia 1876 (Fig. 4.8). Between exhibitions, the window returned to Powell's showroom and, like many exhibition pieces, ended up in a museum.⁷⁵⁰ The surviving Order and Window Cash Books for this firm, held in the V&A's National Archive of Art and Design, further emphasise the economic considerations involved in selecting exhibits. The Cash Book for March 1862 lists the cost of production (divided into materials and labour) and selling prices for this exhibit, 60s. per ft.⁷⁵¹

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⁷⁴⁵ Many 'exhibition pieces' ended up in museum collections including the BMAG and V&A.

⁷⁴⁶ Jonas, 2005: 202.

⁷⁴⁷ Although stained glass was excluded from the French Academy, it was exhibited at the Parisian Salons from 1891. Luneau, 2012: 253. Félix Gaudin re-exhibited panels at the Expositions Universelles and Salons. See Luneau, 2006: 179-83, 204-14.

⁷⁴⁸ The Ecclesiologist, 1855: 264.

⁷⁴⁹ A watercolour of the panel can be seen in Pillet, 2007: fig. 3.

⁷⁵⁰ See Harrison, 1972-73. The panel was purchased by BMAG with assistance from the Art Fund in 1976.

⁷⁵¹ I am grateful to Dennis Hadley for sharing his notes from the Powell's Order Books. Hadley, 2009. Powell's Cash Book, March 1862, folio 31.

The pressure of getting exhibits together and finishing windows in time for display sometimes resulted in exhibits arriving late or unfinished. French glazier Henri Chabin's exhibits arrived late to Philadelphia in 1876.⁷⁵² Late arrivals could jeopardise one's eligibility for prizes. In 1889, Michel Hubert was excluded from the jury competition because his stained glass exhibit was not on show until six weeks after the opening of the Exposition. 753 Daumont-Tournel noted that fellow Frenchman Henri Coulier's window Le Poète, which was exhibited on the stairs of the Galerie des Machines at the 1900 Exposition, was unfinished and displayed without a border. 754

Transporting Exhibits

Once acquired and selected, stained glass panels were packed and transported via carriage, rail, and steamboat, depending on their destination. Exhibition Commissioners often set procedures to ease the shipping process and the unpacking of exhibits. In 1855, goods were received at Dunkerque and taken by railway to Paris where they were carted to Exhibition buildings. In 1867, however, the French Imperial Commissioners left it to exhibitors to cost and transport their goods. In this instance, the British Commission sent transit labels to exhibitors to place on their crated packages, so that exhibits could be easily identified before. during, and after transportation to Paris. 755 Some unused transit labels remain in the Hardman archives as physical reminders of these processes. 756 The labels clearly state the British origin of the package, date, recipient and destination, along with the specific Exhibition building or class with which they were to be displayed (Fig. 4.9).

Hardman & Co. appear to have sent only one exhibit to Paris in 1867: a four-light window depicting the Adoration of the Magi destined for St Mary the Virgin's Church, St Neot's, Cambridgeshire, and commissioned by Charles Perceval Rowley, of Wintringham Hall as part of the family's refurbishment of the church (Fig. 4.10). A letter from Hardman to Rowley, penned more than two months after the close of the Paris Exposition, informing him that the

⁷⁵² Lorin, 1878: 64.

⁷⁵³ Champigneulle, 1891: 182.

⁷⁵⁴ Daumount-Tournel, 1902: 58.

⁷⁵⁵ A similar system was used for the Philadelphia Exhibition 1876. *Art Journal* (June 1876): 186-87.

⁷⁵⁶ MS175A/11/2/2/3, Hardman Collection, Birmingham Archives.

⁷⁵⁷ Rowley commissioned at least seven of the nineteenth-century windows in the church, the others being commissioned by his elder brother George Dawson Rowley.

window had returned to the UK and been sent on to St Neot's, reminds us of the practicalities of transporting windows to an exhibition. 758 Assuming that the window arrived in Paris in time for the opening of the Exposition, it must have been out of the country for at least nine months. Hardman clearly had a good rapport with Rowley, as three of the windows destined for St. Neot's were exhibited at International Exhibitions prior to installation: the aforementioned Adoration of the Magi (Paris 1867), the Anointing of Christ's feet (Philadelphia 1876) (Fig. 4.11), and the Woman of Samaria (Paris 1878) (Fig. 4.12). Presumably, Rowley took pride in the fact that his windows were displayed to an international public at these events.

In his PhD thesis on stained glass in Melbourne, Geoffrey Down described the way in which exported windows were packaged for transportation overseas:

After completion in the studio a window was dismantled and crated, packed in straw. The degree of disassemblage varied from complete panels, which could easily be reconstructed, to complete fragmentation into individual pieces of glass which had to be entirely remade on arrival from the cutline which was packed with them.⁷⁵⁹

Of course, accidents happened. 760 A painted glass panel depicting Raphael's Madonna and Child sent from the Russian Imperial Porcelain Factory to the 1862 Exhibition was broken on arrival and remained fractured in store at the Hermitage Museum, St Petersburg in 2010 (Fig. 4.13). This was perhaps inevitable since stained glass panels made multiple voyages and travelled long distances. Australian exhibits travelling to Philadelphia for the 1876 Centennial Exhibition required four transhipments.⁷⁶² During the voyage from Melbourne to New York, which lasted forty-nine days longer than anticipated, a number of exhibits from South Australia and Victoria were damaged when the vessel sprang a leak. ⁷⁶³

Walter Crane's Map of the World Showing the British Empire, printed as a supplement to The Graphic on 24 July 1886, gives us an idea of the lengthy routes that stained glass panels

⁷⁵⁸ Letter from Hardman to C.P. Rowley Esq., 16 December 1867. Hardman Collection, Birmingham Archives. ⁷⁵⁹ Down, 1975: 119.

⁷⁶⁰ Jude Holliday describes how Wailes' west window for St John the Evangelist Church, Bombay was lost at sea in the early 1850s. Many other stained glass panels were broken or damaged en route from the UK to India. Holliday, 2012: 23.

⁷⁶¹ Information communicated to me via Peter Martin after a visit to the Hermitage Museum, St Petersburg,

⁷⁶² Rothenberg and Hoffenberg, 1990: 57.

⁷⁶³ Rothenberg and Hoffenberg, 1990: 57. £1000 was spent on restoring the items but some were beyond repair.

travelled from Britain to Australia by boat (Fig. 4.14). The outward route was between 11,000 and 12,000 miles, most often leaving from Liverpool, Southampton or London and voyaging to Sydney. The route either went via Gibraltar through the Mediterranean and then the Red Sea before making its way across the Indian Ocean to Sydney, or around the west coast of Africa via Cape Town and across the South Atlantic and South Ocean to the Australian mainland. Upon arrival, stained glass, like other exhibits, was often subject to import duties as well as the costs of packing, insurance, wharfage, and freight (by carriage, rail and ship). Analysis of Hardman's Glass Day [Sales] Books (which survive from November 1845 to January 1854, and January 1863 to June 1895) reveal that these costs could range between 6 to 20% of the total cost of an order, depending on the commission and its destination. ⁷⁶⁴ The costs and risks of these long voyages reveal the lengths that Exhibitors would go to in order to send and show their wares across the world, in the hope of gaining awards and positive reviews that would build their international reputation.

Part II **Measuring Exhibitors' Success**

Objects on display do not provide their own narrative. Displayed objects must be textualized, and, therefore, require verbal and written explication in the form of signs, guides, and catalogues. 765

As Carol Breckenridge has recognised, in her seminal essay on the display of Indian objects at International Exhibitions, during and after these events, exhibits were described, interpreted and disseminated via textual discourse and visual reproductions. We cannot assume that everyone saw, or expressed an interest in the stained glass displays. In fact, Didron believed that the poor provision made for the displays of stained glass at the 1867 Paris Exposition, meant that, "the windows were not seen by anyone, not even, at least we think, the critics charged with reporting for newspapers and magazines". 766 Yet, written reports, jury awards and visual records of exhibits shaped public perception of exhibitors and their exhibits, and provided a lasting record of the stained glass displays. They have, in turn, shaped my own perceptions and historical understanding of these events.

⁷⁶⁴ MS 175/35, Hardman Collection, Birmingham Archives.

⁷⁶⁵ Breckenridge, 1989: 205.

^{766 &}quot;les vitraux n'ont été vus de personne, pas même, du moins on le croirait, des critiques chargés des comptes rendus pour les journaux et revues." Didron, 1868: 6.

Reviews of Stained Glass Exhibits

Stained glass featured in numerous articles written by amateurs and enthusiasts in the popular periodical press prior to the Exhibitions. Yet the public displays of stained glass at the Exhibitions, more than any other nineteenth-century events, generated the critical discussion and evaluation of modern stained glass by both the art expert and amateur in ways in which British scholars have thus far almost entirely overlooked, as they tend to focus on the writings of the Ecclesiologists, or seminal studies such as those by Winston or glass-painter Nathaniel H. J. Westlake. 767 A number of written reviews, commentaries and articles on stained glass were sparked by the displays at the International Exhibitions, and these sources raise a number of questions. How did this type of Exhibition journalism differ from earlier commentaries of stained glass? Who were the stained glass reporters and how did they develop public knowledge, and influence public opinions of, stained glass?

Exhibition reviewers were given the task of summarising the exhibits and providing judgment (often according to their own principles or standards) on the successes and failures of the displays, in order to inform and educate readers on the progress of the art of stained glass across the world. Exhibition reviews, as well as jury awards, impacted an exhibitor's reputation. For instance, the poor reviews of British glass at the Great Exhibition were partly responsible for the commission for glazing Glasgow Cathedral going to a Munich firm. ⁷⁶⁸ Reviews might also serve as advertisements, like the article praising Warrington's display illustrating the development of gothic stained glass at the 1862 Exhibition in the Art Journal. 769 Although these reports and reviews are often partial and unreliable, they represent important sources for researchers, and as we shall see in the next chapter, they give new insights into the productions of this period.

The main contributors to stained glass journalism at the Exhibitions were stained glass artists themselves. Some were allocated the task of writing official reports on the medium for government organisations, while others recorded their own visits, observations and expectations in the periodical press (many of which were anonymous), or privately. 'Official' reports of stained glass at the main British and French exhibitions were written by English

⁷⁶⁷ Winston, 1847; Winston, 1865; Westlake, 1879-94.

⁷⁶⁸ See Fawcett, 2003. ⁷⁶⁹ Art Journal (August 1862): 174.

lawyer and antiquarian Charles Winston (1851); by Arcisse de Caumont, the aforementioned French archaeologist who had published extensively on French religious and civil architecture of the Middle Ages (1855); by English glass manufacturer Apsley Pellatt (1862); by French glass manufacturer Bontemps (1867); and by French stained glass artists Didron (1878), Champigneulle (1889) and Daumont-Tournel (1900).⁷⁷⁰ Kirchhoff's reviews on the 1867 and 1878 Paris Expositions, written for the Society of Arts, form another branch of 'official' report.

In addition, Bontemps wrote independent reports on stained glass at the 1851 Great Exhibition and 1855 Exposition, as did Didron for the 1867 and 1889 Expositions.⁷⁷¹ Other important reviews of the medium, published in various periodicals (see Appendix 4), include those written by manager of the art department at Chance Bros., Sebastian Evans,⁷⁷² architect William Burges (1862), and decorative artists Thomas Gambier Parry (1867), and Lewis Day (1878 and 1900). Many of these generated a historical canon which was perpetuated through the repetition, reuse, and recycling of fact and opinion in multiple articles and reports. For instance, Gambier-Parry's report on the stained glass at the 1867 Exposition first appeared in the *Illustrated London News*, and was later reprinted in its entirety in a volume of official reports (1868), while large sections were again quoted in *The Ecclesiologist* (1868).⁷⁷³

Some more unusual accounts provide a unique perspective or narrative, invaluable to the researcher. For example, Elisabeth Pillet has uncovered the written exchanges between Charles de Montluisant and a number of French glass painters who participated in the Exposition Universelle of 1855.⁷⁷⁴ Montluisant, a Captain of the Artillery and later Minister of War, sent circular letters to French exhibitors of stained glass prior to the Exposition asking for information on their intended exhibits in preparation for his series of articles on the event published in the Catholic journal *L'Univers* in August 1855. Montluisant received a number of responses from French exhibitors, including Maréchal, Didron aîné (A.-N. Didron), Lavergne, Veissière, and Lafaye. After publishing two columns on stained glass, he maintained his

⁷⁷⁰ Winston, 1852; De Caumont, 1856; Pellatt, 1863; Bontemps and Bœswillwald, 1868; Didron, 1880; Champigneulle, 1891; and Daumont-Tournel, 1902.

⁷⁷¹ Bontemps, 1852; Didron, 1868; Didron, 1889-90.

Evans was a friend of Burne-Jones, a conservative politician and anti-Catholic journalist. After Chance Bros' art department closed down he became editor of the *Birmingham Daily Gazette*, 1867-70 and of conservative newspaper *The People* from 1878. He exhibited at the RA in 1881. See Arscott, 2008: 218 n.44.

⁷⁷³ See Gambier Parry, 1867 and Gambier Parry, 1868.

⁷⁷⁴ See Pillet, 2007: 52; Pillet, 2010: 210-11.

correspondence, enquiring meticulously of their progress, and in the process formed a friendship with Didron.

Kirchhoff's 1867 report for the Society of Art informs us that, during his official visit to the Paris Exposition, he also visited the Parisian studios of French glass-painters Oudinot, and Lusson. 775 His accounts of these visits are important documents for the comparison of nineteenth-century studio practice in France and Britain. He observed that, in France, a needlepoint was more common than a brush to remove colour, and that the paint, line and tone were frequently damaged by the unusual practice of painting the glass while it was held in the lead matrix, before dismantling the pieces to burn in the kiln, prior to leading them up permanently. 776 Kirchhoff also noted that the lead-making machine in the French studio had been made in London and that Lusson imported ruby glass from England, as well as from Salviati of Venice. This snapshot of the purchase of glass materials and tools further reminds us that nineteenth-century stained glass cannot be seen in isolation, regionally or nationally, and must be viewed internationally.

Nicolas Lorin combined his visit to the Philadelphia Centennial in 1876 with a trip to Renwick's St Patrick's Cathedral, New York, for which he was furnishing stained glass. Upon his return to France, he published a record of his travels, De la peinture sur verre: à propos de l'exposition de Philadelphie (1878), which gives us an idea of his experience. The journey from France to New York took twelve days, with a further three-hour train journey to Philadelphia. 777 On arrival in Philadelphia, Lorin stayed at the Exhibition Hotel adjacent to Fairmount Park. Like many commentators on stained glass at the Exhibitions, Lorin used this opportunity to reflect on the historical development and character of the medium, making extensive comments on the role of the glass painter and styles available to him. He also included some critical reception of his own exhibits, so that, on his return, the self-funded publication served as an advertisement of his success as well as a record of his travels. 778

Writing reviews was an arduous task given the number of exhibitors and the dispersal of stained glass within buildings and over multiple sites. The dissemination of the medium at the Philadelphia Centennial Exhibition of 1876 may explain why Lorin's self-published notes list

<sup>During this time he also visited the Louvre, and Musée de Cluny. Kirchhoff, 1867.
Kirchhoff, 1867: 71.
Lorin, 1878: 5.</sup>

⁷⁷⁸ For other publications-cum-advertisements see Bitterlin, 1878; Tiffany, 1900.

only twenty-three exhibitors of stained glass in the Main Exhibition Building when there was actually double this number. Similarly, Didron noted that the scattering of the stained glass exhibits across the 1878 Exposition site in Paris made comparative study of the medium difficult, and perhaps this is why his report is not very comprehensive. Discussion of the French exhibits dominated Didron's report, he discussed a handful of exhibits from England, Austria and Belgium, but made no mention of the stained glass dispersed across national and foreign pavilions.

Official reviewers, always residents of the hosting country, were also often fuelled by national pride, and concerned with the comparative progress and success of their own nation. As such, they should be approached with a degree of caution, for they contain national bias and reveal international prejudice. For instance, in his published notes on the 1876 Exhibition, Lorin praised the French as the best exhibitors, and, following the Franco-Prussian war, revealed his prejudice towards the Germans when he remarked on the sad aspect of the Palais des Beaux-Arts, emphasising that it had been constructed by a 'Prussian'. ⁷⁸¹

International Competition: Jury Boards and Awards

Exhibitors not only sought the attention of visitors and reviewers, but the approval of the international awarding juries.⁷⁸² Jury awards were seen as a mark of quality by consumers and carried commercial value for the exhibitor who sought after and widely advertised them. In the words of Richard Mandell:

The awards (or lack of them) could make or break an artist, craftsman, or inventor who offered his unique skills for judgement by the international juries. The expositions launched or ended careers, made or destroyed fortunes, and established or weakened the reputations of great firms. In all the large universal expositions nations too joined in expensive and earnest, though bloodless, battles for prestige. 783

It is not surprising, therefore, that the distribution of awards caused disputes, as well as the allocation of display space. After Hardman & Co. received a prize medal for their display in Pugin's Medieval Court at the Great Exhibition, fellow stained glass exhibitor Edward Baillie

⁷⁸⁰ Didron, 1880: 52-53.

⁷⁷⁹ Lorin, 1878: 61.

⁷⁸¹ Lorin, 1878: 20.

⁷⁸² From 1801 the industrial national exhibitions held in Paris had juries, and awards were first distributed at the 1802 Exposition. Greenhalgh, 2011: 20.

lodged an official complaint with the Commissioners, as Pugin, who had active involvement with the firm, was on the jury for that section.⁷⁸⁴

International Juries were formed of representatives from several nations, but always included a larger proportion of representatives from the hosting country. Exhibitors who were members of juries, and committees of admissions and installation, were *hors concours* and exempt from awards. However, few stained glass artists are to be found amongst the jury members for the classes in which stained glass exhibitors were judged. Although stained glass artists were occasionally to be found on Fine Arts juries, for instance, John Richard Clayton (of Clayton & Bell), sat on the Fine Arts Jury for the 1862 Exhibition, and La Farge sat on the Fine Arts Jury for the 1893 Chicago Exposition, the juries for stained glass did not include stained glass artists until the Paris Exposition of 1878. Instead, following the classification schemes that grouped stained glass with general glass products, these juries featured a number of glassmakers, including Bontemps (on the juries for 1855, 1862, 1867), Eugène-Melchior Péligot (1867), Henry Chance (1867), Ludwig Lobmeyr (1878), Louis-Joseph Maës (1878), Harry James Powell (1889), and Léon Appert (1889). The widespread presence of glassmakers also highlights the fact that the development of stained glass was dependent upon the glass supplied by glassmakers.

In contrast, stained glass artists sat on the awarding juries for stained glass at all the Paris Expositions from 1878; including Didron (1878), Oudinot (1889), Champigneulle (1889 and 1900), Daumont-Tournel (1900), Delon (1900), and Delalande (1900). This seems to reflect the increased seriousness with which the French government viewed stained glass, and may have also responded to increased competition from American exhibitors. Similarly, the composition of the committee of installation for the 1900 Exposition, led by Lucien Magne, Daumont-Tournel, Henri Denis and Auguste Bruin, included ten other French glass painters and two architects. ⁷⁸⁸

⁷⁸⁴ Leapman, 2001: 260.

⁷⁸⁵ Daumont-Tournel, 1902: 31.

⁷⁸⁶ Clayton's presence is explained by his prolific artistic career as an architect, sculptor, painter and stained glass artist and confirms his importance within wider artistic circles. See Waters, 2012: 12, 22, and 60. ⁷⁸⁷ Yarnall, 2012: 223.

⁷⁸⁸ This prompts us to ask, more generally, what was the involvement of nineteenth-century glass-painters in wider bureaucratic organisations? For example, Adolphe-Napoléon Didron was secretary of the Comité des Arts et Monuments. Pillet, 2010: 73.

Rewards require care in their assessment by art historians. Every exhibition had a different award system. Some had none at all, and juries varied in their composition and approach to the task. Comparison of these awards is not, therefore, a fair measure of the success of stained glass artists in this period. For example, although the number of exhibitors in 1889 had decreased since the previous Paris Exposition of 1878, the percentage of those who received an award increased from 39% to 96%. According to Champigneulle's jury report, the reason for this dramatic increase was that the jury wanted to show goodwill towards those glasspainters who exhibited in unfavourable display conditions. ⁷⁹⁰

Exhibition organisers, exhibitors, visitors and critics were aware of the competition for awards. Reviewers asked to whom they should "assign the prize" for stained glass.⁷⁹¹ In his essay on 'The Artistic, Industrial, and Commercial Results of the Universal Exposition of 1855', published in *The Art Journal*, George Wallis questioned the use of such rhetoric:

The claim of any country or any people to an exclusive right in the pursuits of industry, or supreme intelligence in its application, is quite as doubtful as the claim of any individual to universal knowledge, or the undisputed possession for all times of any invention or discovery.⁷⁹²

Nonetheless, jury awards were counted, and individuals and nations were compared against one another, in written reviews and statistical tables, which were often placed adjacent to data showing commercial imports and exports in an attempt to align the results of the Exhibitions with the industrial and economic progress of individual nations.

Long after the events, jury awards continued to have an impact in seeking clientele and gaining commissions, and exhibitors frequently advertised their awards to the public in the press and in their showrooms. A number of medals awarded to Chance Bros. remain in the firm's archives in Smethwick, Birmingham as a lasting legacy of their achievements in glass production (Fig. 4.15). Hardman & Co. also recorded their awards for posterity and commemorated their success at the International Exhibitions in a series of decorative stained glass panels that remained in their studio (Fig. 4.16).

⁷⁸⁹ According to Champigneulle there were 79 exhibitors of stained glass in 1878, and only 46 in 1889. Percentages calculated from figures in Champigneulle, 1891: 176.

⁷⁹⁰ Champigneulle, 1891: 176.

⁷⁹¹ *The Ecclesiologist*, 1855: 297-98.

⁷⁹² Wallis, 1855: i.

Visual Records

Besides the legacy of written reports and jury awards, images of stained glass exhibits provided another means of comparing, assessing and disseminating stained glass both during and after the International Exhibitions. In his report on the 1867 Exposition, Kirchhoff recalled that he "intended to have made sketches, to give the general plan of some of the more striking windows", He had "commenced to make sketches", when he was "told by the police it was against rules, and therefore not allowed". This incident demonstrates how Exhibition officials controlled visual records of the event.

Sketches, engravings, chromolithographs and photographs of exhibits are the main visual records of the ephemeral Exhibitions. These provided an alternative means of viewing stained glass (usually seen in an architectural frame) through much smaller, flat, two-dimensional images, seen by reflected light. By far the most common visual record of stained glass during this period was the engraving. High-quality black and white engravings, such as those produced for the *Illustrated London News* and the *Art Journal*, convey the design and composition of a stained glass window, and give us a good idea of the patterns of lead. However, they do not help us understand the arrangement of colour, painting techniques, or the ways in which stained glass manipulated and responded to light.

Different techniques of representation were used in these engravings, as demonstrated by some illustrations of the British stained glass exhibits at the International Exhibition of 1862. Some, such as the illustration of a light from Lavers & Barraud's west window at St Peter and St Paul's Church, Lavenham, in *The Art Journal Illustrated Catalogue*, isolated the window from its architectural context entirely, treating the light as a separate entity (Fig. 4.17). Others illustrated windows within an architectural setting, showing the tracery, and the effects of light and shade on the stonework; for example the *Illustrated London News*' illustration of a Ballantine & Sons window (Fig. 4.18), and *Cassell's Illustrated Exhibitor*'s depiction of Heaton, Butler & Bayne's *Act of Mercy* window for Harpenden Church (Fig. 4.19). Like the exhibition displays, these different approaches reveal uncertainties in the representation of stained glass, as a 'picture' or an architectural 'window'.

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⁷⁹³ Kirchhoff, 1867: 82.

⁷⁹⁴ Presumably such regulations protected exhibitors' copyright. See Purbrick, 1997.

Another illustration in *Cassell's Illustrated Exhibitor* shows Cox & Sons' stained glass as part of an integrated display of church furnishings, set within an ecclesiastical gothic interior (Fig. 4.20). In this engraving, our eye is led through a solid wooden door with wrought ironwork hinges, which has been left ajar, to appreciate the carefully arranged ecclesiastical wares. Every space is decorated. The wall is painted, the floors are tiled, and a stained glass window can be seen in the wall above the altar. The religious inscriptions and architectural decoration appear as an advertisement for the gothic style and Anglo-Catholicism, as well as the exhibitor's wares. Elsewhere, *Cassell's Illustrated Exhibitor* made use of photography by producing engraved views of the interior of the Crystal Palace, after daguerreotypes.⁷⁹⁵ Thus, some publishers employed a variety of types of illustrations within a single publication.

As we have already noted, the chromolithograph was an important visual record, and the rise of chromolithography coincided with the revival of stained glass. Both media were shaped by modern technologies, and required artistic and technical expertise to produce a polychromatic image. In contrast to the black and white engraving, chromolithographs give us an impression of the tones, depth and arrangement of colour, and, sometimes, painting techniques. The different effects created by a black and white engraving and the chromolithograph can be seen by comparing two illustrations of *Robin Hood's Last Shot*, exhibited by Chance Bros. in 1862 (compare Figs. 2.36 and 4.21). The high-quality chromolithograph, published in J.B. Waring's *Masterpieces of the Industrial Exhibition* (1868) is the only colour record of the exhibit, the fate of which is unknown, and is therefore an invaluable resource.

Stereoscope views and photographic views provide another important visual record. These were often available for visitors to purchase, and one could obtain a hand-tinted stereoscope or photograph for a higher price. Stereoscopic and photographic records of exhibitions provide a different type of image in which the stained glass exhibit is usually visible in the background of a busy interior amongst a collection of exhibits (see Figs. 2.34 and 4.22). The Stereoscopic views, which provided an impression of three-dimensional depth from the parallel viewing of a pair of two-dimensional photographs, give us a better sense of scale and object relation in these spaces. Furthermore, the act of viewing through a stereoscope is similar to viewing a stained glass window, as the juxtaposition of blue and red (the most common colours in both medieval and mid nineteenth-century stained glass) created stereoscopic optical effects that

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⁷⁹⁵ Hamber, 1996: 265, n.36.

⁷⁹⁶ On the stereoscope, see Armstrong, 2008: 339-42.

make the blue seem to recede and the red seem to jump forward.⁷⁹⁷ It is difficult to identify windows in stereographic or photographic views without other visual or written records to compare them with, but they do give a unique sense of the scale of some of these stained glass exhibits, and provide important visual evidence of the internal arrangement of exhibits and modes of display in these eclectic environments.

The limitations of photography in the early days of its development meant that photographing stained glass was difficult, due to the uncontrollable light transmitted through the glass. 798 This is one of the reasons why stained glass is invariably overexposed in photographic images. Although nineteenth-century photographs provided an excellent record of lead lines, they had limited ability to reproduce polychromy. Black and white monochromatic photographs presented an inaccurate tonal relationship between different colour hues. 799 The photographic process was particularly over-sensitive to reds, yellows and deep greens, which appeared black or dark grey, while blues were rendered white. 800 In a medium such as stained glass, in which blue and reds were dominant, and green and vellows common, it is clear that this presented a problem. Although photographs appeared in printed publications from the 1870s, it was not until 1900 that photographs of individual stained glass exhibits accompanied an International Exhibition review. Photographs were used to illustrate articles on glass at the 1900 Paris Exposition by Didron and Day, in Revue des Arts Décoratifs (1900), and the Art Journal (1901) respectively, as well as Lucien Magne's report on the retrospective exhibition of stained glass (1902) (Fig. 4.23). 801

Conclusion

In the nineteenth century, the recently revived medium of stained glass represented a growing art form characterised by international and imperial networks of stained glass practitioners, architects and patrons. This thesis draws upon the limited published source material available, but there is still much more biographical and archival work to be done before we can grasp the full scope and extent of these networks, which extended far beyond European centres of cosmopolitanism, and new world America, to the colonial world. International Exhibitions participated in, and enhanced, global competition and exchange. These events highlight the

⁷⁹⁷ Thomas, 1982: 15.

⁷⁹⁸ For photography see Roberts, 1995; Hamber, 1996. ⁷⁹⁹ Hamber, 1996: 82.

⁸⁰⁰ Hamber, 1996: 84.

⁸⁰¹ Didron, (September 1900); Didron (October 1900); Day, 1901; Magne, 1902.

local, provincial, regional, national, cosmopolitan, international, imperial and transnational networks of nineteenth-century stained glass firms. By participating in the Exhibitions, stained glass artists represented both their locality and nation state in an international competition.

The exhibitions provided venues for exhibitors to showcase their work to a broad international public in the hope of gaining new clientele, publicity (through awards, jury reports and critical reviews) and an international reputation. The main reason for exhibitors to participate in these events was certainly commercial. The International Exhibitions occurred at a key moment in the secularisation and commercialisation of stained glass. As Cheshire has noted, the Great Exhibition was significant in establishing stained glass as a commodity. Road But, as demonstrated, other reasons for participating, such as the opportunities for artistic comparison and networking, and the desire to gain proper recognition of stained glass as an art, should not be overlooked. The next chapter examines how these International Exhibitions, and the networks formed at them, influenced the global stylistic development and consumption of stained glass, for both ecclesiastical and secular markets.

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⁸⁰² Cheshire, 2004: 158.

CHAPTER 5

ECLECTIC DISPLAYS: MEDIEVAL TRADITION AMD MODERN INNOVATION

Introduction

The influence of the Medieval Revival on the resurgence of interest in stained glass in the nineteenth century is well documented. However, little scholarship points to the significant role that stained glass played in the complex relationship between medievalism and modernity at this time. How As German politician and Ecclesiologist August Reichensperger observed, at the Great Exhibition, the stained glass exhibits denoted an "unsteady wavering between the Antique and the Modern. How In the nineteenth century, the medium was significantly influenced by the past, but encompassed modern materials, techniques, ideas and iconographies, and relied upon new communication and transport systems. Artists followed ancient traditions, but also responded to pleas for a living art that represented the aims, tastes and culture of their own age.

Rachel Teukolsky's examination of art criticism at the Great Exhibition has demonstrated that Exhibition journalism often produces "an alternative critical narrative" of stylistic development. His chapter addresses the ways in which the stained glass exhibits and the discourses surrounding them demonstrate pluralistic attitudes towards style, technique, function, and taste. Like the eclecticism of stained glass in these environments, this chapter is eclectic in its content, but aims to open up different perspectives on the medium by considering the rapid expansion of the secular market alongside the ecclesiological, and demonstrating how new applications and settings for the medium developed at the International Exhibitions. Medieval styles may have served as an inspiration for some modern imitations, mutations and expressions in stained glass; but they were also combined with a modern taste for Japonisme, new opalescent glasses, styles such as Aestheticism and Art

⁸⁰³ For example, Morris, 1990; Raguin, 1990; Cheshire, 2004; Rush, 2006.

⁸⁰⁴ We must remember that nineteenth-century modernity is characteristically and aesthetically different to twentieth-century modernity. See Armstrong, 2008: 13.

⁸⁰⁵ Reichensperger, 1851: 387.

⁸⁰⁶ Teukolsky, 2007: 97.

Nouveau. Although the medieval remained the preferred style for most artists and critics, nineteenth-century stained glass was characteristically *eclectic* in style. 807

Medievalism and Eclecticism

Renewed interest in gothic culture provided both the impetus and traction for the revival of stained glass in the first half of the nineteenth century. The restoration of medieval monuments enabled stylistic and scientific analysis of surviving medieval glass, and increased glass-painters' and glaziers' knowledge of medieval iconography and techniques. Bob Deeply influenced by Puginian and Ecclesiological arguments for the ecclesiastical gothic style, stained glass artists looked to the productions of the Middle Ages, and examples of medieval glazing were hailed as exemplary of the "true principles" of stained glass. Por example, in an influential 1848 publication on stained glass, William Warrington proclaimed that the "true and only standard of excellence is the medieval style of art", and he encouraged fellow glass painters to imitate medieval glass.

Throughout the International Exhibitions, especially those held in Britain and France, stained glass was widely discussed as an ancient art, a product of "our forefathers, who left us precious models". Stain Official reports and periodicals narrated the history of glass production and its extensive use in medieval civilisation. In selecting medieval styles as the best of the historical canon, and drawing upon a diverse European heritage of surviving medieval stained glass (in spite of the Reformation), the revival of medieval styles and techniques had both nationalistic and religious connotations. In perpetuating the belief that the medieval period was the zenith of the medium's production, and that "the old painters on glass produced beautiful and harmonious results, which have never since been equalled", critics established a position in which modern glass was continually defined and evaluated in relation to the medieval.

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⁸⁰⁷ As Raguin acknowledges, in a climate of architectural multiplicity, stained glass "eclecticism was absolutely normative." Raguin, 1994: 1.

For the restoration of medieval glazing schemes in the nineteenth-century stained glass studio, see especially Caviness, 1982; Raguin, 1990; Bouchon and Brisac, 1993; Jordan, 1998; Pillet, 2010; Jordan, 2011.

⁸⁰⁹ See Winston, 1847; Warrington, 1848.

⁸¹⁰ Warrington, 1848, preface, iii.

^{811 &}quot;nos pères nous ont laissé de si précieux modèles". Bontemps et Bœswillwald, 1868: 89.

For example, Bontemps, 1851; Pellatt, 1852.

^{813 &#}x27;Stained Glass Gallery', Dickinson's, 1852, Vol. II: Text accompanying Pl. XIII.

In 1868, however, the Ecclesiological Society, dedicated to preserving the art of stained glass for the decoration of ecclesiastical architecture in the medieval style, disbanded. After almost thirty years of influence upon the design of stained glass in Britain, continental Europe and the British colonies, the final issue of *The Ecclesiologist* declared that, "we have the satisfaction of retiring from the field victors. Our mission has from the first had an ecclesiastical and also an artistic side". ⁸¹⁴ In promoting medieval gothic styles for stained glass, the Ecclesiologists had made a lasting impression. As stained glass designer Henry Holiday noted, in *Stained Glass as an Art* (1896), there was a general consensus, even at the end of the century, that stained glass should be "mediaeval". ⁸¹⁵ Yet, in spite of its predominance in the scholarship, we must be cautious of assumptions that the Ecclesiological Society was the only driving force on matters of stained glass and style.

The International Exhibitions and their accompanying discourses demonstrate that stained glass was produced and consumed in a variety of styles and applied to a broad range of settings in this period. Indeed, the Exhibitions represented a significant opportunity for nineteenth-century stained glass artists to demonstrate their knowledge, and to display the various styles of stained glass available to the consuming public, including Byzantine, Roman, Greek, a variety of Gothic styles, Renaissance, Cinquecento, Louis Quatorze and the modern *vitrail-tableau* window. The Exhibitions also reveal nineteenth-century stained glass artists drawing inspiration from a wealth of visual sources, including medieval Christian iconography, the paintings of the Old Masters and their contemporaries, and prints of both ancient and Renaissance motifs. As Ralph Nicholson Wornum declared, in an 1851 lecture to the Central School of Design, "the first business of every designer is to make himself master of the elements of all established styles, not only for the sake of knowing these styles but to enable him [sic] to effect any intelligible ornamental expression whatever". But the stable of the elements of all established styles ornamental expression whatever.

The International Exhibitions, which brought together panels of stained glass from all over the world for comparative display, repeatedly demonstrate this eclecticism. For instance, at the Great Exhibition of 1851 John Gibson of Newcastle advertised "richly enamelled windows in Byzantine, Anglo-Norman, Early English, Decorated, Perpendicular, Greek, and Italian styles

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⁸¹⁴ *The Ecclesiologist*, 1868: 315-16.

⁸¹⁵ Holiday, 1896: 2.

⁸¹⁶ A number of nineteenth-century windows derive their compositions from paintings by Rubens, Raphael, Dürer, and Millais. Both the Königliche Glasmalereianstalt and British stained glass artists used the Bilderbibel (1851, published in Britain in 1860) as an iconographic source. See Rush, 2001: 93.

carefully executed" (Fig. 5.1). ⁸¹⁸ Prosper Lafaye showed a window at both the Great Exhibition and the 1855 Paris Exposition, which the *Art Journal* described as "a curious but effective combination of the architectonic, pictorial, and mosaic effects". ⁸¹⁹ This window included copies of early medieval glass at Chartres and the Sainte-Chapelle in the upper panels, and designs derivative of the sixteenth-century Swiss-style in the middle, demonstrating Lafaye's ability to select and reproduce examples of celebrated medieval and early modern glazing schemes (Fig. 5.2). In addition, the lower parts of this eclectic window featured, in Lafaye's modern style, a panel commemorating the marriage of the Duke of Montpensier, Louis-Philippe's youngest son, and Infanta Luisa Fernanda of Spain, the daughter of Ferdinand VII of Spain, which took place in 1846 (Fig. 5.3). ⁸²⁰ Lafaye's exhibit thus placed his own contemporary work within an international historical canon.

The Ecclesiologists, notorious medieval purists, abhorred eclecticism, and described Lafaye's window as "a sort of chronological glazier's pattern card". 821 They also denounced another chronological survey of stained glass exhibited at the 1855 Paris Exposition by Auguste Bruin featuring, "specimens of nine different schools of glass painting, ranging from the most archaic style of all to the most modern, including landscapes done in enamel, and a representation of aerial perspective with a highly-coloured balloon soaring among clouds", as a "monstrous window". 822 Such exhibits demonstrate the eclecticism of individual exhibited panels, as well as the diversity of styles represented by multiple exhibitors.

Undeterred, however, many stained glass artists continued to demonstrate their proficiency in a number of styles. For example, a writer for the *Illustrated London News* reported that, at the 1862 London Exhibition, Messrs. Warrington & Sons exhibited:

[S]pecimens of windows in almost every known style, including [...] the Early English, Decorated and Perpendicular Gothic, the Italian, Cinque Cento, Palatial, and Geometric. We very much commend this manner of showing to the public different styles and dates of workmanship, with the names of the styles so legibly attached. 823

^{818 &#}x27;Exhibition Official Catalogue Advertiser', 1851: 13.

⁸¹⁹ Wallis, 1855: xv.

⁸²⁰ Pillet, 2010: 142-43.

⁸²¹ The Ecclesiologist, 1855: 284.

⁸²² The Ecclesiologist, 1855: 282.

⁸²³ *ILN* (November 8, 1862): 503.

Warrington's display thus demonstrated the variety of styles available to the public in a comprehendible comparative form, which served as both educational exhibits and as advertisements. Research At the 1867 Exposition, Maréchal's collection of stained glass exhibits showed "the range of art from the earliest style of the 13th century to the most modern glass photograph". Thus Maréchal was seen to embrace both medieval tradition and modern inventions. So too, in 1878, did Bitterlin fils, who exhibited an eclectic range of stained glass windows in Egyptian, Arabesque, Russian, medieval and Renaissance styles. His exhibits also demonstrated a range of techniques, such as engraving, painting, and enamelling.

French glass-painter Champigneulle explained that, in selecting his stained glass exhibits for the 1889 Exposition that he:

[E]specially wanted to prove to the public that in making art one can profess absolute eclecticism, and if the imitations of the 13th century that I have shown prove enough that I want to respect and follow the ancients, the newer windows in my exhibition proclaim that I intend to be at the highest level of the aspirations and the ideas of my age, to cultivate lessons of the past, the scientific processes of today's progress and at the same time to see into the future as far as possible. 827

In doing so, Champigneulle defined his age in terms of a positive eclecticism, which simultaneously revered the medieval past, represented the present, and looked to the future. Champigneulle's exhibits complement Teukolsky's examination of Great Exhibition art criticism which has demonstrated that the Exhibitions reveal a prevailing "intelligent and rational eclecticism", involving the "judicious selection" of styles. But if the medieval style was just one of many historicist and modern styles in which stained glass was present in this period, as we shall see, it was certainly the most prevalent.

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⁸²⁴ See also Art Journal (August 1862): 174.

⁸²⁵ Gambier Parry, 1868: 379.

⁸²⁶ Bitterlin, 1878.

⁸²⁷ "j'ai voulu surtout prouver au public qu'en fait d'art on peut professer l'éclectisme le plus absolu, et si les imitations du XIII^e siècle que j'ai montrées prouvent assez que je veux respecter et suivre les anciens, les verrières plus nouvelles de mon exposition disent bien haut que j'entends être au niveau des aspirations et des idées de mon siècle, cultiver à la fois les leçons du passé et voir dans l'avenir aussi loin que le permettent les procédés scientifiques des progrès d'aujourd'hui". Champigneulle, 1891: 178.

Modern Imitations of the Medieval

The imitation of medieval glass was a much-debated issue at the International Exhibitions. On the one hand, artists were expected to equal the productions of their medieval ancestors. As John Tallis remarked, before examining the 1851 stained glass exhibits:

In proceeding to notice the works in this department displayed in the Great Exhibition, we would premise that we are not amongst the devotees to this mode of decoration as a vehicle for high art; and consequently, must be prepared to view the various candidates as copyists of the art as developed at the early period when it was in vogue. The following observations therefore will be considered to be written with a feeling for 'medievalism'. 829

Yet, some contemporaries were critical of the glass-painters' over-reliance on medieval precedents, and expected artists to study and select historical examples carefully.

For example, Winston, Associate Juror for stained glass at the Great Exhibition, remarked that ancient imitations should be judged "with reference to the standard which its author has himself chosen". 830 He praised Alfred Gérente's Romanesque light for Ely Cathedral, depicting scenes from the history of Sampson, for the way in which "the style of the period is rendered with extraordinary mastery and truth", suggesting both Gérente's skill and the authenticity of his methods (Fig. 5.4). But Redgrave reported that, "in adopting the just principles of design[,] the faults of the age have been adopted also, which must be objected to". 832 Gérente's figure of Samson fighting a lion was designed in a bold grotesque manner akin to medieval manuscript illuminations, such as those in a Franco-Flemish bestiary, *c*.1270 (Fig. 5.5). It thus disregarded modern anatomical knowledge of the human figure and reproduced historic inaccuracies. This practice, akin to the simultaneous painterly vogue for Pre-Raphaelitism in Britain, appears to have been fairly common in the 1850s. As one popular publication declared after the 1855 Exposition:

The obvious fault [...] that prevails in many of the specimens exhibited is the stiff, formal, and often incorrect drawing of the figures and emblems [...] in imitation, as it were, of the worst part of those which have come down to us from antiquity.⁸³⁴

⁸²⁹ Tallis, 1851-52, Vol.1: 97.

⁸³⁰ Winston, 1852a: 534.

⁸³¹ Winston, 1852a: 702. Alfred Gérente took over his brother Henri's studio upon his death in 1849.

⁸³² Redgrave, 1852: 715.

⁸³³ 'The Old Testament in Medieval Manuscript Illuminations', Getty Center, LA, 2010 www.getty.edu/art/exhibitions/old testament/ (accessed 26 January 2012).

⁸³⁴ A Walk Through the Universal Exhibition, 1855: 176-77.

The Ecclesiologist also lamented that A.-N. Didron appeared "content with mere imitation of the older styles, including their defects". ⁸³⁵ Critics believed that stained glass artists should use their discretion and judgment in selecting elements to imitate, and should not reproduce damaged or disfigured parts which could be improved by modern hands.

At the Great Exhibition, *The Illustrated Exhibitor* questioned the validity of imitations, commenting, "[w]e are not quite sure [...] how far mere imitations of existing old glass deserve admission into the exhibition". Safe Yet Kellner received a Prize Medal for his small-scale copies of some panels from the late-medieval 'Volkhamer Window' in the St Lorenzkirche, Nuremberg (Fig. 5.6). The *Art Journal* engraved four of these panels, and reported that they were "as faithful as possible, both in drawing and colour" (Fig. 5.7). Similarly, Winston declared "the colours and every detail of the original picture are faithfully rendered".

Although Kellner's panels were discussed as faithful imitations of the fifteenth-century originals, two identical panels depicting *The Mystic Marriage of St Catherine of Alexandria* and *The Virgin and Child*, acquired for the South Kensington School of Art in 1843, and now in the V&A, suggest that Kellner actually employed a mixture of ancient and modern techniques (Figs. 5.8 and 5.9). The red and green sections of St. Catherine's dress are made from traditional 'pot-metal' glass, the medieval method of making coloured glass by adding different metallic oxides to molten glass, which was revived in the early to mid-nineteenth century. The yellow areas are formed of clear, or white, glass, which, have been painted with a silver-based stain and then fired, turning the painted parts yellow-orange, after a method introduced to medieval glass-painting in the early fourteenth century. ⁸⁴⁰ The flashed ruby glass used for the Virgin's cloak has been acid-etched (a technique developed and widely used in the nineteenth century) in some areas to reveal the middle layer of white glass, and afterwards painted with silver stain. The cobalt-blue background, which was painted with blue enamel paint on the reverse of the glass, also employed modern techniques. Its peculiar surface finish

⁸³⁵ The Ecclesiologist, 1855: 283.

⁸³⁶ Cassell, 1851: 380.

⁸³⁷ It is thought that the Jesse Tree window was made in the studio of Strasbourg master glass painter Peter Hemmel von Andlau after 1480. The dimensions of the Volkhamer window are 30 feet by 12 feet. Viebig, 1971.

⁸³⁸ Cassell, 1851: 381; Art Journal Illustrated Catalogue, 1851: 7.

⁸³⁹ Winston, 1852a; 699.

⁸⁴⁰ Brown and O'Connor, 1991: 4.

suggests that it was not applied with a brush but a roller, a technique unusual to stained-glass production.⁸⁴¹

The official jury report and awards for stained glass at the Paris Exposition of 1855 reveal the prevalence of modern imitations of medieval glass. De Caumont announced that Vessières produced a "very good imitation of ancient glass" and he was awarded a medal. His was a copy of a window from the Sainte-Chapelle, a thirteenth-century reliquary chapel built to house the Passion relics. But *The Ecclesiologist* commented that "[t]here is really no merit in this style, which every-one seems able to reproduce with equal success and effect". Was Several glaziers copied the Sainte-Chapelle glass during the prestigious competition of 1846 to restore the glass. As part of the competition brief, the twelve entrants each executed a copy of one of the thirteenth-century panels and produced a subject of their own composition. He Bontemps noted the influence of the Sainte-Chapelle restoration on the development of modern glass in his report on the 1855 Exposition. Lusson, who took over the restoration of the Sainte-Chapelle glazing upon Henri Gérente's death in 1849, gained honourable mention at the Great Exhibition for his copy of its lancet window. He Redgrave criticised the fact that "dust and time, and the corrosion of the glass" had been too closely imitated.

At the 1862 Exhibition, Evans, in Mackenzie's *Record of the International Exhibition*, similarly remarked that the exhibits of French stained glass artists Lusson, Coffetier, Oudinot, Höner, and above all Didron aîné, "set up a standard for imitation"; and that "[e]very peculiarity, every beauty, every defect of early work, is preserved with an almost superstitious accuracy". The use of the word 'superstitious' here reflects the common fear that medieval revival objects, such as stained glass, were indicative of Romanising tendencies. Evans went so far as to state that these specimens could be mistaken for genuine examples of medieval glazing:

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http://collections.vam.ac.uk/item/O77502/panel-st-catherine-of-alexandria-mystic/ (accessed 12 January 2012)

^{842 &}quot;très-bonne imitation des vitraux anciens". De Caumont, 1856: 954.

⁸⁴³ The Ecclesiologist, 1855: 283.

⁸⁴⁴ See Perrot, 1980a; Jordan, 1998: 193.

⁸⁴⁵ Bontemps, 1856: 394.

⁸⁴⁶ Hunt, 1851: 882.

⁸⁴⁷ Winston, 1852a: 702.

⁸⁴⁸ Redgrave, 1852: 715.

⁸⁴⁹ Evans, 1862: 403.

⁸⁵⁰ For fear of Rome see Chadwick, 1987 (1966).

Some of these windows, indeed, look like real medieval glass just cleaned for the occasion, and might be set up side by side with some of the windows of Bourges or Chartres, without striking the eye as merely reproductions in the same style. 851

Indeed, the precision with which nineteenth-century glaziers could imitate medieval glass by the 1860s means that, even today, viewed from a distance, some period facsimiles may be mistaken for genuine examples of medieval glazing.

Many glass-painters developed their own techniques to 'antiquate' modern glass in order to make it appear medieval. Common methods included applying a patina, or flicking glass paint on the reverse side of the glass. 852 Warrington achieved this effect with the temporary application of black boot polish, and Willement aged his glass with a film of white enamel. 853 *The Ecclesiologist* spoke against such practices of antiquating glass as early as 1844:

The process of *antiquating*, that is, of giving an artificial appearance of dirt, corrosion, and decay to new glass, so as to make it closely resemble the real works of antiquity in their present state, is one which we think of very questionable expediency, and likely to produce the most dangerous results.⁸⁵⁴

The following year, Ballantine repeated these sentiments in his treatise.⁸⁵⁵ Winston also decried the common practice of "smudging" or "antiquating" smooth-surfaced glass with pigments in his *Jury Reports* for the Great Exhibition, stating that it produced a "pernicious effect".⁸⁵⁶ Similarly, after the 1855 Exposition, *The Ecclesiologist* expressed disappointment that Gérente, another medallist, artificially "dirtied" his glass.⁸⁵⁷ The International Exhibitions and their writings thus give us an insight into the ways in which medieval windows and their effects were copied and 'imitated'.

Colour, Pre-Raphaelitism and Innovation

In spite of artists' attempts to make modern stained glass imitate medieval glass, the material quality, texture, and tone of modern glass differed greatly from medieval examples. Maréchal

⁸⁵¹ Evans, 1862: 403.

⁸⁵² Pillet cites an early example of antiquating by Brother Pierre Régnier at the Abbey of Saint-Denis in 1774. Pillet, 2010: 29. Lafaye employed a patina in many of his restorations. Pillet, 2010: 195.

⁸⁵³ Sewter, 1974: I, 7.

⁸⁵⁴ The Ecclesiologist, 1844: 18.

⁸⁵⁵ Ballantine, 1845: 2; Harrison, 1980: 21.

⁸⁵⁶ Winston, 1852b: 243. Winston extended these comments in his later publication *Memoirs*. See Winston, 1865: 181.

⁸⁵⁷ The Ecclesiologist, 1855: 283.

and Gugnon's use of scarlet tones for the cardinal's robe in their window *St Charles Borromeo Administering the Communion to the Plague-Stricken*, which was displayed at the Great Exhibition, reportedly gave the whole window a "hot and glaring effect". ⁸⁵⁸ Redgrave described the window in his jury report on design:

[I]nstead of that general and harmonious effect of sobered light, which is so desirable in stained glass for the windows of a religious edifice, the effect is painful to the eye from its extreme brightness, and the window would irresistibly obtrude itself upon the attention of the spectator, and rather distract his thoughts than induce that solemn repose of mind which is so consistent with the place.⁸⁵⁹

Redgrave's comments reasserted the ecclesiological role of stained glass and criticised the brilliant tones of modern stained glass windows, which were, on the whole, considered to be inferior to the more subdued tones of the medieval period.

Between the London Exhibitions of 1851 and 1862, frequent allusions were made to the brightness of modern glass and the ill-arranged colours of modern windows, in contrast to medieval glass. Mrs Merrifield's essay, 'The Harmony of Colours as Exemplified in the Exhibition', alerted her readers to the fact that, in the 1851 Stained Glass Gallery, there was "some contrasts of colour, which might have been avoided by a better knowledge of principles by which the harmony of colours is regulated". Reyntied in 1851 and now in the south nave of windows such as J.G. Howe's *Tower of Babel*, exhibited in 1851 and now in the south nave of Ely Cathedral, were clearly derived from study of thirteenth-century windows, such as those in the basilica of Saint-Denis and Canterbury Cathedral, but the nineteenth-century glass was significantly brighter than its medieval precedents; the blues were more violet in tone and the murrey glass more pink (Fig. 5.10). Indeed, contemporary stained glass artist Patrick Reyntiens has described this window as "a series of dazzling pin-table machines with different colour combinations". Reyntiens has described this window as "a series of dazzling pin-table machines with different colour combinations".

⁸⁵⁸ Redgrave, 1852: 716.

⁸⁵⁹ Redgrave, 1852: 715.

⁸⁶⁰ Merrifield, 1851: viii.

⁸⁶¹ Reyntiens, 1990: 118.

Burges, speaking of the stained glass exhibited in 1862, remarked upon the "horrible juxtapositions of colours" and the "sharp and glaring tints". 862 Pellatt's *Jury Report* also spoke of the brilliance of modern windows, which:

Being charged with bright colour at a higher key, transmit too readily through the glass the bright rays of different colours antagonistic to each other, which fatigue the eye and form an unpleasant contrast to ancient glass. 863

The "boiled-sweet colours" of modern windows did not fit critics' conceptions of what stained glass should look like. Het, exhibits such as O'Connor's west window for Aylesbury Church, which was awarded a medal in 1862, clearly still appealed to the jurors. This six-light window, depicting Old Testament scenes which prefigure Christ's ultimate Sacrifice and the atonement of sins (the Expulsion of Adam and Eve, Moses, and Abraham's Sacrifice), contains an assortment of brightly-coloured glasses, in which each tone of turquoise, hot pink, salmon, orange-red, deep-hued purple, and grass green, vies for the eye's attention (Fig. 5.11). Such windows are evidence of the range of coloured glass manufactured in mid-nineteenth century Britain, and demonstrate the vibrancy and colour of the period's stained glassworlds as showcased and rewarded (and therefore also endorsed) at the Exhibitions.

Keeping such windows in mind, the fact that Armstrong's single analysis of stained glass in *Victorian Glassworlds* (2008) is, as we have seen, indirectly applied to a painted representation of some medieval stained glass in Millais' *Mariana* (1851) invites us to reflect further upon the relationship between stained glass and Pre-Raphaelite painting in the midnineteenth century. As Tim Barringer has demonstrated, Pre-Raphaelitism was a movement that "was simultaneously medieval and modern, revivalist and realist". It is unsurprising then, that painted depictions of stained glass appear in numerous Pre-Raphaelite paintings of the mid-nineteenth century, for stained glass, as a recently-revived medium associated with medieval Christianity, which was increasingly applied to modern settings and ideas, represented an ideal medium for the Pre-Raphaelites.

⁸⁶² The Ecclesiologist, 1862: 338.

⁸⁶³ Pellatt, 1863: 2.

⁸⁶⁴ Arscott, 2004: 44.

⁸⁶⁵ See Armstrong, 2008: 123-24.

⁸⁶⁶ Barringer, 2010: 19.

⁸⁶⁷ Waters labels the stained glass produced by a number of British firms between 1855 and 1868 as 'Pre-Raphaelite'. Waters, 2012: 66.

Burges recognised that both the Ecclesiological Society and the Pre-Raphaelites aimed to return to a "pure system of colouring"; this was perhaps best exemplified in stained glass.⁸⁶⁸ The brilliant, hot tones of modern stained glass also reflected, and potentially influenced, the vibrant use of colour in Pre-Raphaelite paintings. ⁸⁶⁹ Contemporaries spoke of the overpowering effect of these paintings, caused by the application of pure pigments on top of a white ground to form pictures of more intense colouration. ⁸⁷⁰ As Elizabeth Prettejohn has observed, the white ground "shone through the translucent paint layers so as to enhance their brightness". ⁸⁷¹ Therefore, the translucent qualities of Pre-Raphaelite paintings with white backgrounds achieved an effect of illumination similar to that of stained glass windows.

Furthermore, critics responded to both the extreme brightness of Pre-Raphaelite paintings and contemporaneous stained glass windows in a similar manner. Pre-Raphaelite painter Madox Brown, who also designed stained glass for Morris & Co., remarked that Millais and Holman Hunt's paintings at the RA Exhibition in 1851 "killed" the more subdued pictures around them. Significantly, the overwhelming visual effect of stained glass had been described in similar terms by *The Ecclesiologist*, in 1844: "a perfectly new stained window will appear very bright and glaring to the eye, and that in our present naked and colourless churches it may seem to kill instead of harmonising with every other object". Madox Brown spoke again of the effects of brightly coloured modern glass in an 1865 catalogue of 'Cartoons for Stained Glass' by Morris & Co.:

In an age that has become disused to colour, the irritation produced on the retina by the discordance of bright colour, is taken as an evidence of the so coveted brightness itself. The result of this is, that the manufacturers, goaded on by their clients, and the 'fatal facility' of the material (for all coloured glass is bright) produce too frequently kaleidoscopic effects of the most painful description.⁸⁷⁴

This remark reminds us again of the ways in which viewing stained glass might be considered in relation to optical devices such as the kaleidoscope.

⁸⁶⁸ The Ecclesiologist, 1860: 246.

⁸⁶⁹ See Waters, 2012: 12, 37, and 51.

⁸⁷⁰ For Pre-Raphaelite painting techniques see Townsend et al., 2004.

⁸⁷¹ Prettejohn, 2000: 163.

⁸⁷² Ford Madox Brown. *The Diary of Ford Madox Brown* (1981). Cited in Prettejohn, 2000: 150.

⁸⁷³ The Ecclesiologist, 1844: 109.

⁸⁷⁴ Destree, 1896: 83.

In response to the high demand for glass of a texture, thickness and colour more akin to medieval glass, Winston, in collaboration with Powell & Sons, developed the modern 'antique' glass we have already referred to. The development of these antique glasses, some coloured samples of which were shown at the 1862 Exhibition, led to subtler colour combinations being used, and gradually, windows with more dulcet tones replaced bright mid-Victorian examples. Pellatt reported that modern antique glass "rivals the ancient in rich colour and low tone, and has a crispness and shellac appearance, so well calculated to absorb the rays, and retain the richness and beauty of the ancient colours". 875

One of the firms that used Powell & Sons' new antique glass, and that was instrumental in introducing the shift from the hot polychromatic colouring of mid-Victorian stained glass to a more muted palette, was Morris & Co. Revolutionised both ecclesiastical and secular stained glass through their interventions in colour and design. The stained glass windows produced by this firm were more akin to medieval windows in their use of colour, a muted palette of golden yellows, whites, deep blues and luscious greens, based on stained glass of the fourteenth and fifteenth centuries. They boldly moved away from replicating architectural canopies and large decorative borders, instead alternating colour narrative panels with square quarries of white glass ornamented with silver stain, enclosed by narrow borders of coloured glass. The increased use of white glass, which mirrored the aesthetic changes that took place in mid-thirteenth century Europe, increased the legibility of the figurative panels and the amount of light that entered buildings.

The public debut of Morris, Marshall, Faulkner & Co. (as they were known until 1875) at the International Exhibition of 1862 marked the firm's arrival as a major producer of stained glass and artistic furnishings for both the home and church. Given the status that Morris & Co. has today, it is perhaps surprising that their 1862 stained glass exhibits were not a resounding success. *The Ecclesiologist* wrote that "[o]f the two firms who exhibit the worst glass here – Messrs. Claudet and Houghton, and Messrs Morris, Marshall, and Co. – the last is the worst,

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⁸⁷⁵ Pellatt, 1863: 2.

⁸⁷⁶ Sewter, 1974: 18; Harrison, 1980: 40.

⁸⁷⁷ Cheshire, 2004; Waters, 2012.

⁸⁷⁸ Harrison, 1980: 43.

⁸⁷⁹ Gage, 1993: 70, 73.

⁸⁸⁰ The firm was founded in 1861. Their display of furniture in the Medieval Court was seen to represent "the emergence of a new mediaeval style of secular inspiration". Gloag, 1962: 150.

because the design is pseudo-grotesque".⁸⁸¹ In making this remark, the author placed the firm's exhibits in the same bracket as those of Claudet & Houghton, thus decrying their modern medievalism as equally unsuited to stained glass as pictorialism. However, in another article in the same journal, the more sympathetic Street defended Morris & Co.'s exhibits, stating that "[t]here were faults in it; but it had very high merits, and evidenced original study".⁸⁸²

In order to understand these divided opinions, we should turn to some of the glass exhibited by the Firm in 1862. The *Parable of the Vineyard* panels designed by Pre-Raphaelite artist Dante Gabriel Rossetti, formed part of the Firm's ecclesiastical exhibits.⁸⁸³ These panels are now in the east window of St. Martin-on-the-Hill Church, Scarborough, where they were integrated into a scheme after attracting the attention of architect George Frederick Bodley at the International Exhibition (Fig. 5.12). 884 The panels were awarded a medal, an act that baffled Evans, who believed they were "remarkable as a bold defiance of popular taste". 885 These narrative panels are brimming with figures, and the haphazard arrangement of lead lines renders the scenes fairly illegible. As David O Connor has observed, Rossetti, who had little regard for the medium, had not fully considered the translation of his designs into glass and lead. Under Morris's supervision, the glass was replaced, repainted and trimmed down. 886 Contemporary reviews interpreted these idiosyncrasies in relation to the jumbled appearance of medieval glass. The *Illustrated London News* noted that "[e]verything seems to have been done to make the window look as old and rich as possible – mere oddity we do not at all consider desirable". 887 Some exhibitors are also said to have complained that the Parable panels were actually touched-up panels of medieval glass.⁸⁸⁸

Displays of stained glass at the Exhibitions, then, raised questions of medievalism and modernity with regards to style and development. After the 1862 Exhibition, Apsley Pellatt asked "does the grotesque style of the past age harmonize with our present mode of

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⁸⁸¹ The Ecclesiologist, 1862: 173.

⁸⁸² The Ecclesiologist, 1862: 236.

⁸⁸³ A *Baptism of Christ* panel now in the V&A (C.440-1940) was also exhibited.

⁸⁸⁴ For Scarborough see Destree, 1896; Joe, 2008: 55-58.

⁸⁸⁵ Evans, 1862: 405.

⁸⁸⁶ O'Connor, 1984: 42.

⁸⁸⁷ *ILN* (November 15, 1862): 538. Burges wrote a more positive review, see Burges (July 1862): 9. Dante Gabriel's brother William Michael Rossetti also praised the firm's stained glass as showing "an originality and an artistic excellence true at once to decoration and to high art in design of figure-subject". Rossetti, 1862: 199.
⁸⁸⁸ Henderson, 1973: 93.

thought?"⁸⁸⁹ and Evans, of Chance Bros. urged glaziers to break the "system of servile mediævalism, which has so long hindered real progress".⁸⁹⁰ He suggested that, in trying to obtain the quality of medieval stained glass, artistic independence and development had been compromised. In an extended analogy, which compared the futile attempt to revive medieval art to that of bringing back the 'megatherium' from extinction. ⁸⁹¹ The passage is worth quoting in full:

The latter half of the 19th century, however, differs widely in taste and sentiment, knowledge and appliances, from any period in the 'mid-ages of faith,' and these literal reproductions of medieval art impress the general mind with feelings akin to those produced by the restored megatherium at the Crystal Palace. They belong to an extinct race, extinct even beyond the powers of galvanism. The needs of life require a living art, only let it be *living*, and we care not for the form. The living congeners of the megatherium differ considerably both in size and shape from their fossil ancestor. These grotesque figures, with their splay mouths and limbs, and impossible convolutions of drapery, belong to an age which can never be restored; and though the originals are well worthy of careful scientific study, we cannot accept the imitations, however successful as imitations, as by any means adapted to the requirements of the present. As evidences of a careful study of archaeology, these windows are deserving of high praise; as specimens of a living art, they are absolutely worthless.⁸⁹²

This passage should be considered in light of the rise of geology, the debate between Creationism and evolution, and the gradual acceptance of Darwin's theories of natural selection in which extinction was a natural consequence. Such attitudes questioned the relevance and role of historical revivalism in an evolving, modern age. As Lewis Day proclaimed in 1886, in an article in the *British Architect*, in order for stained glass to develop, artists should learn from a variety of styles, and with this knowledge, produce something new. The remainder of this chapter demonstrates how the Exhibitions showcased and encouraged the development of new techniques, new applications for, and new styles of stained glass.

⁸⁸⁹ Pellatt, 1863: 3.

⁸⁹⁰ Evans, 1862: 403.

⁸⁹¹ The 'megatherium', loosely translated as 'the great beast', was an extinct prehistoric animal belonging to the family of sloths. Rauch, 2007: 215, 217.

⁸⁹² Evans, 1862: 403.

⁸⁹³ For 'Genesis and Geology' see Chadwick, 1966: 558-73. The Victorians' interest in extinct species was evident in the prehistoric sculptures erected at the Sydenham Crystal Palace. See McCarthy and Gilbert, 1994. ⁸⁹⁴ Day, 1886: 161.

Stained Glass and Photography

The use of photography in stained glass design was another way in which nineteenth-century stained glass, constantly referred to as a revived medieval craft, incorporated and embraced modern artistic practice. In his introduction to *Stained Glass and the Victorian Gothic Revival* (2004), Cheshire asked, "[w]hat was the relationship between photography and stained glass?" but made little attempt to answer this important question. ⁸⁹⁵ The nineteenth-century revival of stained glass occurred alongside the development of photography, as we have already had cause to note. Photography was another destination for the glass 'transparency'. ⁸⁹⁶ Furthermore, both mediums rely on light and glass to project/expose an image and the subsequent fixing of the image through chemicals or the heat of the furnace. Many stained glass artists experimented with photography over this period, from Thomas Willement to John La Farge. ⁸⁹⁷ The role of photography in the documentation and dissemination of stained glass has yet to be fully explained, although Rev. J.G. Joyce's *The Fairford Windows, a Monograph*, published by the Arundel Society in 1872, is an important example of its significance. ⁸⁹⁸

Moreover, the phenomenon of *photo-vitrail* was a significant element of nineteenth-century stained-glass culture, ⁸⁹⁹ much of which is now under threat. ⁹⁰⁰ A number of contemporary articles shed further light on these processes. ⁹⁰¹ Invented between 1850 and 1865, and used extensively until *c*.1920, the *vitrail-photographique* was in its heyday during the Exhibition era, although experiments with photography on glass were being made prior to this. ⁹⁰² French photographer and engraver Ferdinand-Jean de la Ferté Joubert patented a method that directly transferred photographs onto glass to be fired in vitrifiable colours, and some examples were shown at the International Exhibition of 1862. ⁹⁰³ Powell & Sons of London and Baillie & Co.

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⁸⁹⁵ Cheshire, 2004: xi. The relationship between Pre-Raphaelite painting and photography has been recently highlighted by Waggoner et al., 2010.

⁸⁹⁶ The use of the glass negative, first achieved in 1822 by Joseph-Nicéphore Nièpce and developed in 1839 by John Herschel, was an important development in photography. See Hamber, 1996: 52, 78-79.

⁸⁹⁷ For Willement see Brown, 2005. La Farge was taught to use glass-plate photography by photographer Maurice Stadtfeld. Yarnall, 2012: 17, 60.

⁸⁹⁸ This publication contained thirty-eight Autotype Collotypes (thirty-six in colour) of Fairford's fifteenth and sixteenth-century windows. Hamber, 1996: 312-13, 470. Henisch and Henisch, 1996: 13.

⁸⁹⁹ Hardouin-Fugier, 1990: 209-210; De Finance and Hervier, 2003: 148.

⁹⁰⁰ Tessier, 2000; Tessier, 2006; Vincent-Petit and Loisel, 2007.

⁹⁰¹ See, for instance, Gravier, 1892: 507-508.

⁹⁰² See Malone, 1850: 261; *The Athenaeum* (June 1, 1850): 589.

⁹⁰³ These received a medal under Class XIV, No. 3105.

At the international exhibitions, several stained glass exhibitors displayed stained glass and photography alongside one another. Antoine-François Claudet was the first photographer to purchase a license from Daguerre, and his firm Claudet & Houghton exhibited both stained glass and photographic equipment at the Great Exhibition (Fig. 5.13). 905 Interestingly, Claudet also played a significant role in research into the limited spectral sensitivity of photographic emulsion, 906 and the application of painted colour to photographic images. 907 Both Powell & Sons, and Maréchal of Metz exhibited transparent photographs on glass, coloured with enamels, alongside their stained glass at the 1867 Exposition. 908 Besides Maréchal, Prosper and Sophie Lafaye exhibited photographs on glass at the exposition of Photosculpture in 1867. 909 Didron suggested that such transparent photographs were of little practical interest, but, in doing so, underestimated their importance. 910 As another critic observed, "[t]his appears to be a branch of industry which is rapidly rising in public estimation". 911 Indeed, some of the Smithsonian Institution exhibits within the Government Building at the 1876 Philadelphia Centennial Exhibition included:

[A] large window whose panes are beautiful photographs, on glass, of our wild, far Western scenery. These are the tremendous heights, depths, flats, and contortions of Colorado and Arizona; the plains, ravines, ridges, and peaks amid which nature has indulged in so many Titanic freaks that the phenomena of all lands seem to meet together there. 912

This window reminds us of the continuing popularity of spectacular 'landscape-o-ramas' through the eighteenth- and nineteenth- centuries. 913

⁹⁰⁴ See Kerney, 2007: 81, n.72.

⁹⁰⁵ Cheshire, 2004: 104, n.11; 158.

⁹⁰⁶ Hamber, 1996: 83.

⁹⁰⁷ Claudet employed miniature painters to tint photographs. See Machado, 2010; Henisch and Henisch, 1996. 908 Didron, 1868: 14; Gambier Parry, 1868: 379; De Finance, 2004: 30-31. The entry for 'Photography' in The Tenth Edition of the Encyclopaedia Britannica (1902-03) acknowledges Cyprien Marc Tessié-du-Motay and Charles-Raphaël Maréchal (Charles-Laurent Maréchal's son), in the development of photo-mechanical printing processes; stating they were the first to produce half-tones from gelatine films by means of greasy ink in 1865. Cassell's Cyclopedia of Photography (1911) has an entry for Maréchal's collotype Process 'Phototypie' (invented 1865) recording it as the earliest collotype process worked out after Poitevin's 1856 experiments in Paris. This invention is also attributed to them in Schnauss, 1889: Chapter I; Gravier, 1892: 507.

⁹⁰⁹ Gambier Parry, 1867: 275; Pillet, 2010: 158.

⁹¹⁰ Didron, 1868: 14.

⁹¹¹ Diamond, 1868: 174.

⁹¹² The Atlantic Monthly (December 1876): 497.

⁹¹³ See Bermingham, 2001.

Memorial Windows

One of the applications for the *photo-vitrail* was the modern memorial window. 914 Although memorial windows were part of a wider culture of commemoration in the period, they are notably absent from scholarship on Victorian death and mourning. 915 This section seeks to return stained glass to centre stage within this growing field of study. Memorial windows most frequently commemorated individuals, although some paid tribute to broader personal, social, or institutional groups such as families, regiments and the monarchy. 916 James Heywood Markland proposed the use of stained glass windows as an alternative to sepulchral monuments in 1840. 917 Initially, this idea was criticised by the Ecclesiologists, who thought memorial windows were little more than signs of human affectation, and represented "the desire for making the most show with a little money". 918 Ruskin echoed these sentiments in The Seven Lamps of Architecture (1849):

The peculiar manner of selfish and impious ostentation, provoked by the glassmakers, for a stimulus to trade, of putting up painted windows to be records of private affection, instead of universal religion, is one of the worst, because most plausible and proud, hypocrisies of our dav. 919

Ruskin's concern that memorial windows were evidence of the modern craftsmen's submission to economic impetus was not completely unfounded. The memorial window rapidly became a commodity. A large proportion of windows erected between 1840 and 1914 in parish churches, cathedrals and private chapels across Britain were memorial. 920

The strong presence of memorial windows in the international commercial displays of the Exhibitions demonstrated their economic value to nineteenth-century stained glass studios and their popularity with the public. 921 Three of the five stained glass windows exhibited by Cox & Sons at the 1862 International Exhibition were memorial windows. One of these, now in

⁹¹⁴ On the evolution of the Victorian memorial window from 1840 see Kerney, 2007: 66. For funerary glass in France see De Finance, 2003: 144-51.

⁹¹⁵ For example, Curl, 2000.

⁹¹⁶ Besides memorial windows to the deceased, a vast number of commemorative windows celebrating a wide variety of national, historic and personal events were also erected during this period. Of especial note are the windows erected for Queen Victoria's silver and golden Jubilees, which merit an entire separate study.

⁹¹⁷ In a lecture delivered to the Oxford Society for Promoting the Study of Gothic Architecture. Markland, 1840: 29.
918 *The Ecclesiologist*, 1843: 109. Kerney believes the author of this article was Beresford Hope.

⁹¹⁹ Ruskin, 1880 (1849): 10.

⁹²⁰ See Kerney, 2007: 79. In France, stained glass windows also commonly adorn private monuments in the cemeteries. See Tessier, 2006.

⁹²¹ Short notices on 'memorial windows' appear in a number of periodicals, revealing the vast popularity of, and interest in, their erection.

Christ Church, Worthing, demonstrates the combined theological, symbolic and personal role of memorial windows (Figs. 5.14 and 5.15). It shows St John listening to the voice of an angel, from Revelations 14:13, holding a scroll bearing the inscription "Write, blessed are the dead which die in the Lord". As the *Illustrated London News* reported:

The face of the angel was, we believe, copied from a portrait of the lady to whose memory the window has just been fixed in Christchurch, Worthing. We trust we shall not be thought to touch upon a matter of only a personal and family interest by mentioning that the work was executed for Mr. R.P. Daniell, of Bond-street, as a memorial of the late Mrs. Daniell. 922

Although Waters has recently described such windows with contemporary portraits as "farcical", revealing his own bias towards traditional techniques, the use of portraits, copied from paintings or photographs, were an important modern intervention in nineteenth-century stained glass. 923

Furthermore, memorial windows met both the ecclesiological demands of furnishing churches and the secular desire to commemorate individuals and events. These windows often contained personalised inscriptions, iconography, heraldry, monograms and sometimes portraits, and were, therefore, dependent upon the tastes and patronage of both the public and the church. 924 Both memorial windows and the photographic processes employed by stained glass makers demonstrate ways in which nineteenth-century stained glass incorporated modern iconographies and technologies and conflated ecclesiastical and secular worlds.

The Secularisation of Stained Glass

The Exhibitions played a key role in promoting the secular application of stained glass. As Cheshire acknowledged of the Great Exhibition display, "the fact that this famous event was beyond the control of the church makes it particularly significant". 925 Indeed, Wornum, in his article on taste at the Great Exhibition, challenged assumptions that stained glass was an ecclesiastical art:

The too prevalent notion that glass-painting is peculiarly an ecclesiastical province of decoration, unless shortly exploded, promises to be fatal to the

⁹²² *ILN* (November 29, 1862): 583.

⁹²³ Waters, 2012: 154.

⁹²⁴ As such they are important historical and biographical documents of nineteenth-century society, which need to be properly recorded. See Hubbuck 1978-79; Hubbuck, 1979-80; Hubbuck, 1980-81. ⁹²⁵ Cheshire, 2004: 155.

Art, under the very restricted development which ecclesiological prejudices are disposed to allow it in this country. ⁹²⁶

Although the Ecclesiological Society had played a significant role in the development and application of stained glass as an ecclesiastical decoration, they could do little to stave off the rapid secular appeal for, and eclectic production, of stained glass, and this was one of the major ways in which stained glass was transformed into a modern art at the Exhibitions and beyond. 927

In his report of stained glass at the 1862 International Exhibition, Evans expressed his belief that the perfection of the medium should be primarily reached through its "application to domestic, and not ecclesiastical purposes". As Vanden Bemden has acknowledged, "the art of stained glass transformed itself under the pressure of the middle classes which attributed an essentially decorative and illuminating role to stained glass whether it be for public or private buildings". Advertisements and catalogues demonstrate that, gradually, stained glass emerged as a product for the growing middle classes, who were becoming increasingly accustomed to consumer choice and competitive pricing, under the forces of mid-century capitalism.

Questions of economics and the stained glass market have been raised by Cheshire, who noted that, in the 1840s, prior to the Exhibitions and a boom in the demand for stained glass, prices of windows varied quite dramatically, and consumption of stained glass remained with an aristocratic, often antiquarian-minded or ecclesiological elite. ⁹³¹ However, following guidelines published by *The Ecclesiologist* in 1844, which recommended glass-painters charge between 30 shillings and £2 per square foot for the best glass and 10 shillings per square foot for quarry glass, prices became more standardised. ⁹³² In addition, the repeal of the glass tax in 1850, and window tax in 1851, made plain glazed, coloured, and stained glass windows more affordable to the expanding middle-classes and less affluent congregations, particularly in

⁹²⁶ Wornum, 1851: xviii.

⁹²⁷ Pillet notes the gradual increase in glazier's secular work from the eighteenth-century onwards. Pillet, 2010:

^{21. 928} Evans, 1862: 406.

⁹²⁹ Vanden Bemden, 2000: 22.

⁹³⁰ Cheshire, 2004: 163-68.

⁹³¹ Cheshire, 2004: 64.

⁹³² *The Ecclesiologist*, 1844. In 1851, Hardman's prices were just within these parameters. Shepherd, 2009: 66; Cheshire, 2004: 44.

urban and manufacturing areas. ⁹³³ Windows were costed by area and type of glass used. This rate increased according to the style and complexity of design. For example, plain leaded and ornamental decorative glass was cheaper than figurative stained glass. ⁹³⁴ There was, therefore, a base value of materials and scale, and an added and flexible value of artistic design, enabling variety and choice in the stained glass market. Windows could be made or adapted from preexisting designs and cartoons in stock, or new designs could be conceived, depending upon the consumer's preference and budget.

Although the majority of exhibits at the Great Exhibition were windows for churches, reflecting the fact that the early nineteenth century witnessed the revival of stained glass primarily as an ecclesiastical art form, several secular windows were present. Nash's chromolithograph of the 1851 Stained Glass Gallery in the Crystal Palace demonstrates how ecclesiastical panels were displayed alongside their secular counterparts, and admired by a diverse public at these events. Amongst the figures depicted in the gallery are a middle-class family, and a woman accompanied by an Anglican clergyman in a top hat and clerical collar (Fig. 5.16). The woman holds out her parasol in an active gesticulation towards some small panels of ornamental and decorative glass. In addition to the better-documented ecclesiological market for stained glass (represented by the clergymen), her act suggests an additional bourgeois and patriarchal social ordering in which the taste for and consumption of stained glass within the home are, at least partly, gendered feminine. 935

Stained Glass in the Home

The Illustrated Exhibitor printed an engraving of a floral ornamental window exhibited at the Great Exhibition by Hall & Sons of Bristol, and commented that "we understand that several families of distinction have had windows of the new ornamental glass fitted up in their houses" (Fig. 5.17). Such reviews demonstrated the applicability of modern decorative glass for home embellishment. Certainly, in the nineteenth century, the presence of stained glass in such interiors was an exciting possibility. As one guide to the 1855 Exposition proclaimed:

933 Kerney, 2007: 77.

⁹³⁴ Heaton, Butler & Bayne, 1870. French stained glass was also costed by area (sq m); see Bouchon and Brisac, 1993: 245.

⁹³⁵ For female consumption at the Great Exhibition, see Walton, 1992: 49-69. Women also performed roles as donors, makers, and exhibitors at the Exhibitions. See Chapter 4.

⁹³⁶ Cassell, 1851: 380.

Today the art of stained glass enters our ordinary homes, and at prices low enough that the trade will soon establish its new opportunities: salons, boudoirs present to the dazzled eye the thousand brilliant hues that the sun once made to shine exclusively in the vastness of our Gothic monuments. ⁹³⁷

During this period, stained and coloured glass windows were installed in entrance halls, bay windows, skylights, staircase windows, libraries and dining rooms within the home. Such examples of secular stained glass for domestic settings present many challenges to the researcher. They are rarely documented, invariably less accessible and more susceptible to alterations and destruction than churches. However, further engagement with these types of decoration will transform our understanding of the role of stained glass in the nineteenth-century interior, particularly in relation to developments in gas and electric lighting, as we have seen. Such as the stained glass in the nineteenth-century interior, particularly in relation to developments in gas and electric lighting, as we have seen.

The design of secular, and especially domestic, stained glass depended upon "the caprice and taste" of the individual for whom it was commissioned. ⁹⁴⁰ House decoration was an increasingly important expression of individuality in the nineteenth-century home, and stained glass windows were often personalised through selected styles and iconography, monograms, portraits and depictions of family lineage through heraldry, crests and mottoes. One domestic lancet window executed for the entrance hall of Glenormiston estate, in Peebleshire, Scotland, and exhibited at the Great Exhibition by Ballantine & Allan, demonstrated the combined personal and nationalistic role that stained glass could play in the aristocratic home (Fig. 5.18). The window, which no longer survives, commemorated a local tradition that, on the festival of St John, the proprietor of the estate should present a red rose to the sovereign. ⁹⁴¹

Ballantine's window depicted the last time this event was thought to have occurred in 1529, when a rose was presented to James V of Scotland. The scene was set in a medallion with

⁹³⁷ "Aujourd'hui l'art des vitraux peints pénètre dans nos habitations ordinaires, et les prix assez bas auxquels le commerce les établit lui donneront bientôt des débouchés nouveau: les salons, les boudoirs présenteront à l'œil ébloui ces mille teintes éclatantes que le soleil faisait rayonner exclusivement autrefois dans l'immensité de nos monuments gothiques". Pascal, 1855: 252.

⁹³⁸ For the prevalence of stained glass in the middle class home, see Girouard, 1971; Gere, 1989; Muthesius, 2009: 184.

⁹³⁹ Although there are some examples of gas lighting in houses from the late eighteenth century, gas was not chiefly employed in towns and suburban villas until 1835. In the 1880s the more economic incandescent gas mantle was developed. Gas lighting appeared at houses at Tortworth and Abney Hall c.1849-50. The first electric-lit country house was Cragside, at end of 1880 and then Hatfield, 1882. Stained glass windows adorned all of these aforementioned houses. See Girouard, 1971.

⁹⁴⁰ Kirchhoff, 1879: 158.

⁹⁴¹ Art-Journal Illustrated Catalogue, 1851: 207; The Stirling Observor (February 13, 1851).

Elizabethan-style ornament against a background of pale-blue, diamond-shaped quarries stencilled with the national emblems of the rose, shamrock and thistle, the whole surrounded by a regal border of ruby and gold. At the top of the window, the monogram of William Chambers, who purchased the estate in 1846, was painted beneath the Scottish proverb "He That Tholes Overcomes" (He That Suffers Overcomes), with the date '1850' at the bottom of the window. Chambers, as the new owner, thus placed himself firmly within the lineage of this estate, and the previous family that had owned it. By presenting continuity with the past, this window gave legitimacy to Chambers' new role as lord of the manor, and demonstrated a broader chivalric revival in which medieval forms, purposes, and heraldry were adapted for use by families of 'new' money as well as the established aristocracy. ⁹⁴²

At the 1862 London Exhibition, Ballantine & Sons (as they were known after 1860) exhibited another domestic window for the hall of South Bantaskine, where the Battle of Falkirk Muir was fought in 1715. John Wilson, a Coal Master who bought the South Bantaskine estate in 1854, commissioned this window for his new mansion, erected in 1860. After the Second World War, the house was demolished but this window was salvaged by Falkirk Council and is now on display in the Howgate Shopping Centre, Falkirk (Fig. 5.19). It celebrates three leading figures in the Battle of Falkirk Muir: Lord George Murray, Prince Charles Edward Stuart and Lord John Drummond. Each figure is accompanied by a heraldic shield and emblem, and commemorated with a poetic inscription celebrating their role in the rebellion (Fig. 5.20). The window held specific local civic and personal resonance, as Wilson's family had played their part in the Jacobite risings; this has also presumably been a key factor in its survival and continued display.

In the aesthetic domestic interior, coloured, ornamental and stained glass had a slightly different practical and an aesthetic function and was part of the concept of the overall designed, art-manufactured or arts and craft interior. As an American newspaper stated, "the great aesthetic wave, which has carried taste and beauty into the adornment of the modern home, has borne coloured glass upon its crest". Has was evident at the Philadelphia Centennial Exhibition, as Donald Mitchell stated in an article published in *Scribner's Monthly*, the stained glass exhibits were intended "to give color to the poetic aspects of every day

⁹⁴² For a discussion of nineteenth-century mania for both medieval and modern castles see Girouard, 1971.

⁹⁴³ See Edwards and Hart, 2009; Hart, 2010; Hart, 2011.

⁹⁴⁴ Boston Herald (undated). Cited in Frelinghuysen, 1986: 177.

life". As we have seen, exhibitors such as Powell & Sons demonstrated these effects by placing stained glass within an integrated display of furnishings, both ecclesiastical and domestic at these events.

From the 1870s, a number of household manuals appeared and developed public education in matters of taste in the arrangement and decoration of the modern home. 946 Rhoda and Agnes Garrett's 'Suggestions for House Decoration in Painting, Woodwork and Furniture' (1877), published as part of the Art At Home series, was typical in mentioning the beauty of stained glass in transforming windows, controlling the light and bringing colour into rooms. 947 In A Plea for Art in the House (1876), the first of the popular Art At Home series, Reverend W. J. Loftie demonstrated that stained glass served a dual purpose, as a translucent filter to illuminate and colour interiors, and as an opaque barrier or decorative partition, to fill internal architectural apertures, block unsightly external views and prevent outsiders from looking in. 948 This idea was again articulated in an 1879 Art Amateur article entitled 'Hints for Home Furnishing', which recommended the use of stained glass to enliven the "dull and depressing outlook of street windows", but stated that it should be selected with care to harmonise with the interior decorative scheme, as "the light through the coloured glass may ruin the effect of other colours in the room, as well as the lines of the furniture". 949 As we have seen, cheaper 'imitations' of the medium that could be used to this effect were also advertised at the International Exhibitions.

Thus, stained glass played a key role in the creation of an Englishman's 'castle', not only in articulating a heraldic lineage with the past, but also in creating privacy. The use of embossed, engraved and stained glass in Victorian public houses, to prevent people from looking in, and to create snugs within the interior, is another way in which decorative window glass was used to separate space and 'restrict the gaze'. The use of stained glass in these contexts reminds us of Armstrong's discussion of the 'perspectives of the glass panel', which focuses almost entirely on transparent glass, but observes that, "to enable the collective seeing which is its purpose, the glass-painted window had to negotiate the hazards of the very opacity conferred

⁹⁴⁵ Mitchell (October 1876): 896.

⁹⁴⁶ Neiswander, 2008.

⁹⁴⁷ Garrett and Garrett, 1877: 38.

⁹⁴⁸ Loftie, 1876: 87-88.

⁹⁴⁹ The Art Amateur (July 1879): 34.

⁹⁵⁰ For the extensive use of decorative embossed, engraved and stained glass in Victorian pubs, see Girouard, 1975: Chapter VII.

by colour itself. It can empower seeing and disempower it". ⁹⁵¹ This "struggle between transparency and occlusion", already alluded to in Chapter 3, appears to be another aspect of nineteenth-century modernity in which stained glass, as well as transparent glass, played an important part. ⁹⁵²

Modern Secular Subjects and Settings

During this period, stained glass was fitted into homes, public houses, theatres and popular music halls, hotels and restaurants, banks, railway stations. 953 commercial offices and shops. as well as new public buildings erected with a civic or educational purpose, such as museums, art galleries, libraries, schools, and town halls. The dissemination of stained glass beyond traditional ecclesiastical and domestic settings, to diverse secular buildings with recreational public, civic, educational and commercial purposes, stimulated modern subject matter and settings, as several stained glass exhibits at the 1862 International Exhibition demonstrated. Amongst these were some stained glass panels designed by J. M. Allen, made and exhibited by Lavers & Barraud, illustrating Tennyson's narrative poems *The Idylls of the King*. These windows were made for the half-landing of the stairway of E.W. Godwin's Northampton Town Hall (1861-64), built in the gothic style (Fig. 5.21). Other exhibits in this genre include Chance Bros.' Robin Hood's Last Shot, which we have previously discussed and which, as the Illustrated London News exclaimed, demonstrated "the applicability of stained glass to domestic as well as to ecclesiastical subjects" and showed "that our old ballads supply innumerable subjects of interest which can be appropriately treated in this manner". 954 This popular window depicted Robin drawing his last arrow, moments before his death, and thus, like many nineteenth-century history paintings, exploited dramatic narrative to heighten its effect.

In 1862, Ballantine & Sons also exhibited a window for the National Bank of Scotland, Glasgow, which depicted three allegorical female figures of Commerce, Mechanics, and Agriculture, each accompanied by an illustrative scene below: cherubs engaged in weighing bales, shipbuilding, the ploughing of fields and gathering of corn. Above these panels were

⁹⁵¹ Armstrong, 2008: 121. This is in response to Charles Winston's claim that stained glass has a power of transmitting light like no other "species of painting". Winston, 1847, Vol. 1: 247.

⁹⁵² Pettitt, 2009: 109. Twentieth century modernism favoured transparency, however. See Robbins, 2009: 113.

⁹⁵³ A significant collection of stained and etched glass panels, salvaged from waiting and refreshment rooms, station boardrooms and offices, and railway carriages can be seen at the National Railway Museum, York. ⁹⁵⁴ *ILN* (November 8, 1862): 504.

Mercury's caduceus, a symbol of commerce and negotiation, the Scottish lion and thistle with the national motto "Nemo me impune lacessit" ("no one attacks me with impunity") and bouquets of fruits and flowers to symbolise Abundance. These exhibits reflected the importance of modern commerce and banking, subjects entirely relevant to the International Exhibitions, which were perhaps anticipated by the windows designed by Maréchal for the Palais de l'Industrie in 1855.

Such allegorical windows, which held a prominent position at International Exhibitions, may have influenced other important public schemes that promoted the use of stained glass in new environments, such as the windows designed for the South Kensington Museum in the 1860s. One of these windows, destined for the foot of the northern staircase of the South Kensington Museum, was exhibited at the 1867 Paris Exposition. This window was removed c.1912 under Cecil Smith's direction and therefore escaped destruction by bombing in the Second World War. Designed by Francis Wollaston Moody and manufactured by Powell & Sons, the window represents the union of art and science, a subject appropriate for both the South Kensington Museum, and for display at the International Exhibitions (Fig. 5.22). The top compartment of Moody's window depicts Wisdom sitting on clouds holding a book and a flaming torch. Beneath Wisdom, Science, carrying a sceptre, is depicted shaking hands with Art, crowned with laurels. At the bottom of the window are small panels representing Fictile Art, Architecture, and the Art of Working in Metal. A biblical inscription about Wisdom, in Latin, runs around the window's border.

By abandoning gothic forms and ornament in favour of the Renaissance style, Moody and his peers at the School of Art identified themselves with a broad lineage of historical figures, thinkers, artists and modern inventors, and thus reflected the aims and ambitions of the South Kensington institution and the Great Exhibition which was its ultimate source. By the mid-late

⁹⁵⁵ See *ILN* (November 15, 1862): 536.

⁹⁵⁶ Didron, 1868: 52.

⁹⁵⁷ Correspondence with Sherrie Eatman and Terry Bloxham, V&A Museum.

⁹⁵⁸ Moody was one of Godfrey Sykes' assistants along with Reuben Townroe and James Gamble. See Barringer, 2005: 222-35.

⁹⁵⁹ For reviews of the window see Kirchhoff, 1867: 82; Didron, 1868: 56; Gambier Parry, 1868: 382; and *ILN* (October 17, 1868): 383.

⁹⁶⁰ The Latin inscription collates several biblical passages from Proverbs 8, arranged out of sequence, which

translate: "I, wisdom, dwell in counsel, and I am inside learned thoughts" (8:12); "Through me, kings reign and legislators decree just conditions" (8:15); "Through me, princes rule and the powerful decree justice" (8:16); "Therefore, sons, hear me now. Blessed are those who preserve my ways" (8:32); "I love those who love me. And those who stand watch for me until morning shall discover me" (8:17).

1860s, as we have already seen, artists and critics were beginning to challenge the gothic as the one and only historicist style for stained glass. ⁹⁶¹ The revived renaissance style had an important impact upon decorative arts such as stained glass, as well the arts of painting and sculpture. ⁹⁶²

Walter Pater's essay on the sixteenth-century French poet Joachim du Bellay, in his *Studies in the History of the Renaissance* (1873), ⁹⁶³ acknowledged Renaissance developments in glass painting. Pater noted that:

[I]t was characteristic of these painters that they were most successful in painting on glass, that art so essentially mediæval. Taking it up where the middle age had left it, they found their whole work among the last subtleties of colour and line; and keeping within the true limits of their material they got quite a new order of effects from it, and felt their way to refinements on colour never dreamed of by those older workmen, the glass-painters of Chartres or Lemans. 964

Perhaps with the examples of stained glass he had seen at the South Kensington Museum in mind, Pater's work attempted to describe the spirit of the Renaissance as a series of sensibilities unfolding from the late Middle Ages through to the contemporary. Pater was not alone in this view. In 1877, Reverend Frederick Heathcote Sutton, an amateur stained glass designer whose windows were executed by Charles Eamer Kempe, delivered a paper on Renaissance Glass' to the Lincoln Archaeological Society. A review of this paper reported that "Mr. Sutton observed that if, in this nineteenth century, we are to have a style of glass painting of our own, it seems not unlikely that it will be found in some modification of the Renaissance style, perhaps a Renaissance of the Renaissance and Cinquecento stained glass as developments of the medieval gothic style. Day urged glass-painters to look to styles beyond the gothic, and proclaimed that, "there are qualities in later styles which are worth our admiration and respect [...]. We shall not reach the highest level in our art –

⁹⁶¹ Winston was a key advocate of alternative styles; he favoured the pictorial cinquecento and renaissance styles over the gothic.

⁹⁶² For the Renaissance revival upon stained glass see Harrison, 1980: 49. For the Renaissance revival, see Fraser, 1992; Pavoni, 1997.

⁹⁶³ Pater's text challenged contemporary perceptions of the Renaissance through a series of essays on influential artistic and poetic figures from the twelfth to eighteenth century.

⁹⁶⁴ Pater, 1873: 123-124.

⁹⁶⁵ The South Kensington Museum purchased examples of High Renaissance art in the 1850s and 1860s, see Levi, 2005; Fraser, 1992: 63-66.

⁹⁶⁶ Sutton, 1877, 52-56. For Sutton, see Cheshire, 2012: 65-69.

⁹⁶⁷ Leicestershire Architectural Society, 1877: Vol. XIV: Part I: 52-56.

⁹⁶⁸ See Day, 1885 (various)

architecture, glass-painting, or whatever it may be – without having learned something from all of them". 969

In a speech given to l'Union des arts décoratifs in 1898, Didron acknowledged that the increased secular demand for stained glass resulted in a historic eclecticism. Yet, as an ardent advocate of the archaeological medieval style, he believed that the secularisation of stained glass was a misapplication of the art:

If stained glass had retained its place of honour in our churches, if it employs a considerable number of artists and artisans, its introduction to the decoration of some windows of public government buildings, in the most comfortable homes and in certain meeting places such as restaurants and brasseries, has provided much more work, in the last few years, for our specialised workshops. The *bon marché*, child of fashion, has vulgarized the stained glass windows we now see everywhere. At the end of this nineteenth century, bastardized Gothic and mutant Renaissance howl at being mated with the old-fashioned windows of cabarets and a few boutiques. ⁹⁷⁰

Didron's ideal vision of glass-painting, like that of the majority of stained glass historians since, was a spiritual one, in which stained glass, as a sacred object, remained tied to the church, not subject to the idiosyncrasies of public consumption and commerce. Yet the application of stained glass to such varied secular settings, and its presence in the modern environment of the exhibitions, represents a crucial stylistic diversification, democratisation and internationalisation of the medium, which created new iconographies and encouraged artists, and their subsequent commentators, to experiment with and provide research upon other historic, geographic and modern styles, as evident at the International Exhibitions.

Stained Glass and the Avant-Garde

The productive tension between medieval and Renaissance precedents and modern innovation, characteristic of the mid- to late-nineteenth-century revival, increasingly gave way to a broader array of fashionable, cosmopolitan modern styles from the 1870s. For example, as Ottin noted in *Les Vitraux* (1896), Japanese art began to impact the design of stained glass in

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⁹⁶⁹ Day, 1886: 161.

⁹⁷⁰ "Si le vitrail est resté en honneur dans nos églises, s'il occupe un nombre assez considérable d'artistes et d'artisans, son introduction dans la décoration des fenêtres de quelques édifices publics de l'ordre civil, des habitations les plus confortables et de certains lieux de réunion, telles que les restaurants et les brasseries, a procuré beaucoup plus de travail encore, en ces dernières années, à nos ateliers spéciaux. Le bon marché, fils de la mode, a vulgarisé le vitrail que l'on voit partout maintenant. Gothique bâtard et Renaissance avachie hurlent d'être accouplés aux vitrines viéllotes des cabarets et de quelques boutiques, en cette fin de XIXe siècle.' Didron, 1898: 9. Pevsner's critique of the Great Exhibition echoes Didron's sentiments when he speaks of 'bastardizations of form and style". Pevsner, 1951.

the last quarter of the nineteenth century. 971 Interest in Japanese culture more broadly represented a "tension between the pull of modernisation and the antiquity of native traditions". 972 The increasing influence of Japanese art in the West responded to contemporary political events as well as aesthetic preferences. 973 Following more than two centuries of isolation, a number of treaties with western countries, and the Meiji Restoration of 1868, Japan was finally opened up to trade with Europe and the USA. The Japanese Court at the 1862 International Exhibition, organised by Rutherford Alcock, the British Ambassador to Japan, amassed the largest collection of Japanese art in Europe up to that point, and at later International Exhibitions Japanese goods and the Japanese style took the European and imperial worlds by storm. ⁹⁷⁴ The stained glass exhibited at these Exhibitions also demonstrates how western artists adopted Japanese conventions of linear design, flatness, and patterned surfaces in designs for stained glass as well as furniture and other decorative arts. 975

For example, the Prince of Wales pavilion at the 1878 Exposition was described in the contemporary press as being in the 'Japanese' style. 976 The actual building was neo-Elizabethan, but incorporated Anglo-Japanese furniture, an embroidered Japanese frieze and stained glass. 977 Powell & Sons provided the stained glass for the interior, including a skylight "throwing a mellow tinge on the dining-table beneath" and two windows in the vestibule designed by Selwyn Image, one depicting the Four Seasons surrounding Mother Earth, and the other showing the signs of the Zodiac. 978 Day decided that the windows had a "Japanese character". 979 An examination of the design for 'Aestas', or 'Summer', sheds light on the aesthetic characteristics of these windows; and provides an example of the variety of innovative stained glass inspired by Japonisme produced during the Aesthetic movement (Fig.

⁹⁷¹ "Le goût de l'art japonais s'étant répandu, on fait des vitraux dans le genre japonais." ["The taste of Japanese art is being spread, there is stained glass in the Japanese genre"]. Ottin, 1896: 98. ⁹⁷² Harris, 1990a: 29.

⁹⁷³ For Japanese Art, see Gonse, 2003 (1883); Schaap, 1987.

⁹⁷⁴ For Japan at the Exhibitions, see Burges, 1862; Harris, 1990a; Greenhalgh, 1988: 148; Conant, 1991; Sigur, 2008.

975 For Japonisme, see Sato and Watanabe, 1991 Lambourne, 2005; Sigur, 2008

⁹⁷⁶ Art Journal (January 1878): 196.

⁹⁷⁷ York Herald (April 30, 1878): 6. Aslin, 1969: 83-84.

⁹⁷⁸ Once a Week (August 1, 1878): 62; Day, 1878: 4-5.

⁹⁷⁹ "The figures, birds, &c., in the panels are adapted to glazing without losing any of their Japanese character". Day, 1878: 4.

5.23). 980 It thus challenges the international historical canon of stained glass, which invariably moves from Morris to Tiffany, rarely acknowledging the range of work in between.

Powell & Son's window contains no traditional architectural ornamentation or borders. Instead, it presents us with a cropped view of a single female figure against a background of composite elements from nature. The artist has not followed drapery conventions in his representation of the dress. Instead, the floral pattern has been applied in a flat decorative manner that does not match the heavy lines indicating the folds of the dress, and this contributes to the flattening of the image. The cropped, linear design, its asymmetry, lack of shading and perspective, all point to the potential influence of Japanese prints. A few months after the Paris Exposition of 1878 had opened, an article on stained glass in the British Architect by Henry Taylor remarked:

With few exceptions, Japanese work contains the principle which should guide stained glass artists. There is breadth of treatment, and sustained interest, both in form and colouring. The work is thoroughly flat, and in the drawings there is an acknowledgement that anything like a perfect representation of nature is not attempted, and there is an entire absence of vulgarity and pretence. 981

Taylor then went on to cite Morris & Co.'s windows at St Martin-on-the-Hill Church, Scarborough (some of which were exhibited in 1862 and discussed earlier - see Fig. 5.12), as exemplary of "Japanese work", containing a "ruggedness of drawing", "vigorous form and good colouring", and, in doing so, acknowledged the Firm's role in defining a modern aesthetic, through characteristics which were no longer defined by medievalism alone. 982 Thus, while Morris' stained glass had appeared 'medieval' to the audience at the 1862 International Exhibition, fifteen years later the Firm's work were hailed as modern examples of Japonisme.

The taste for Japanese design had much influence upon the subject matter and style of European and American stained glass. 983 Of course, the medium of stained glass was very suited to the flat graphic qualities of Japanese design evident in ukiyo-e prints (Japanese woodcuts), which in turn affected poster design and fin-de-siècle painting. A short article by

^{980 &}quot;No one previously attempted to describe any stained glass of the 1870s and 1880s as 'Aesthetic', and there are indeed problems in trying to justify such a classification". Harrison, 1980: 51.

⁹⁸¹ Taylor, 1878: 219.

⁹⁸² Taylor, 1878: 219.

⁹⁸³ Brisac, 1986: 157; Reyntiens, 1990: 128.

English-born American artist Louis J. Rhead, entitled 'Stained Glass and the Decorative Poster' (1895), acknowledged the connection between these various media; when he argued that the "influence of modern stained glass may be traced in every department of modern decoration, and it is likely that we owe to it the artistic poster with its flat tints, its strong colour, and its decided outlines". ⁹⁸⁴ Rhead was right. These three media share characteristics of black lines between blocks of flat colour, and it is important to recognise that artists like Henri de Toulouse-Lautrec, Alfonse Mucha, Walter Crane, Grasset, and Day, designed both stained glass and posters.

Combined with the influence of Japanese woodcuts and printed posters, the development of opalescent glass led to more modern innovations and greater levels of abstraction in stained glass. 985 Even opalescent windows had their basis in medieval traditions, however. La Farge had studied medieval glass during his trips to Europe in 1856 and 1873. 986 Tiffany had also studied medieval glass carefully, purchasing a window on his travels in order to take it apart and analyse it. 987 In 1893, the year of the Chicago Exposition, he boasted that Americans were capable of producing windows "superior to the best mediæval windows", by recreating the effect of dust and corrosion with glass that was smooth in the centre and thicker at the edge, thus varying the tones accordingly. 988 As one review proclaimed, when praising the display of American stained glass at this Exposition, "we have drawn our inspiration" from early Gothic work and "use the leads with much more boldness and greater artistic effect than do the other nations". 989

The stained glass exhibited at the Paris Salons in the 1890s, the Columbian Exposition of 1893, and the Paris Exposition Universelle of 1900, further emphasise how these new types of glass brought about changes in subject matter as well as techniques. ⁹⁹⁰ One window, which formed part of Tiffany's Byzantine chapel at the 1893 Chicago Exposition, depicted parakeets resting in a blossoming fruit tree, with a gold fish bowl hanging from one of the branches (Fig. 5.24). As Tiffany proclaimed, "the effect produced is most realistic, and has been obtained

⁹⁸⁴ Rhead, 1895: 59.

⁹⁸⁵ See *Magazine of Art* (January 1897): 334-36.

⁹⁸⁶ Yarnall, 2012: 29 and 97.

⁹⁸⁷ Potter and Jackson, 1998: 56.

⁹⁸⁸ Tiffany, 1893: 623.

⁹⁸⁹ The American Architect and Building News (November 11, 1893): 75.

⁹⁹⁰ For the Salon of 1893 see Simil, 1893-94.

without the assistance of paints or enamels, solely by using opalescent glass". ⁹⁹¹ Each piece of glass was carefully selected for its tonal variation and patterns of colour, texture, and patina, cut to a particular shape, and arranged in a manner that the glass material, aided by the lead contours, produced both image and subject, without pigment and a paintbrush. Thus, the green glass used for the background is mottled and has the effect of dappled sunlight upon blades of grass, while the flurries of white colour in the blue glass forming the sky are suggestive of cloud formations. A more opaque milky opalescent glass was used for the parts of the goldfish bowl containing water, in order to differentiate between the transparent glass bowl and its murky contents. Here, glass represented glass, and in order to appear more 'glassy', pieces of glass were selected to demonstrate the multiple effects of glass material, both transparency and translucency, reflection and distortion. These meta-glass thematics, which emphasised recursivity and reflexivity, were eminently modernist.

The broader Art Nouveau movement also exploited the fluidity of form and colour found in fin-de-siècle glasses to achieve new expressions in stained glass. The elegant curved lines so characteristic of Art Nouveau have a "tense naturalism", symbolising a metamorphosis, a stylistic evolution that expressed both the positive and negative aspects of the modern urban environment by combining naturalism with abstraction. 992 Stained glass was an ideal medium for such expressions. Patterns of lead lines are contained within their architectural framework, yet they suggest a development beyond this restricted space. As early as 1889, many years before the term 'Art Nouveau' had been coined, the style was pre-empted by the arabesque designs and motifs in the stained glass exhibited by Chicago-based firm Healy & Millet, for which they were awarded a silver medal at the 1889 Paris Exposition. 993 Several of these exhibits were subsequently purchased by the Musée des Arts Décoratifs, and are now in the collection of the Musée d'Orsay (Figs. 5.25). 994 In these panels, curved forms interlock with one another. These webs of curved forms are propelled against lead lines running along horizontal and vertical axes, the lead lines seem to attract and repel, contract and retract. The effect is one of vitality, expressed through ornamental leading, rather than through paint and picture, making such windows suitable to a variety of secular settings.

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⁹⁹¹ Spillman, 1986: 44.

⁹⁹² Greenhalgh, 2005: 206-209.

⁹⁹³ Along with La Farge and Tiffany, Healy & Millet were responsible for the introduction of American glass to Europe. Schaefer, 1962: 311.

⁹⁹⁴ Schaefer, 1962: 311; Basou et al., 1988; Luneau, 2006: 146.

One venue in which stained glass in this new style could be seen at the following Paris Exposition in 1900 was in the curved wall of a passage within the interior of Bing's Art Nouveau pavilion. 995 One of these modern stained panels, by De Feure, depicted a woman, with her head cocked slightly, adjusting the feathers in her hat, and therefore engaged with both contemporary subject matter and dress (Fig. 5.26). Another panel, now in the Virginia Museum of Fine Arts, Richmond, depicted a woman leaning on a wall (Fig. 5.27). Once again, her dress is the main feature; its forms appear to have organically sprung from the ground and the flowers decorating her dress mimic the plants by the wall. In addition, she dons a modern hairstyle, appears to be wearing lipstick, and looks directly at the viewer. The pale secondary colours of this window are notably different to the bright tones of mid-nineteenth century windows.

Floral designs and figures of women also decorated the exterior of Bing's pavilion. Weisberg has interpreted these figures as "icons of the modern woman", visual evidence for the new era of women as patrons of the arts in the modern home, as well as subjects and artists. But, together with the stained glass panels, one can also view them as portrayals of modern women, which, in subject and style, are closely akin to the *fin-de-siècle* prints, and posters of Grasset and Toulouse-Lautrec. The flatness of the designs, the emphasis on women, costume, decoration and nature bear many similarities with modern French posters, and, like much of this graphic art, these designs appear cropped and without a border.

Critics remained divided on these modern stained glass panels. Daumont-Tournel wrote of the elegance of De Feure's figures. Ever the Puginian, however, Didron was unimpressed, and commented, "art nouveau' is not very attractive; we doubt its future", a judgment which, as a devout follower of the gothic school, demonstrated his wariness of new developments in stained glass design. In spite of modern innovations in glass manufacture, and the international dissemination of styles via the International Exhibitions, at the end of the

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⁹⁹⁵ "La paroi cintrée de ce passage est formée tout entière par des vitraux". ["The curved wall of the passage is formed entirely by stained glass".] Mourey, (September 1900): 278.

⁹⁹⁶ Wesiberg, 2005b. On female allegories at the Exhibitions, see Sear, 2001: 21.

⁹⁹⁷ Daumont-Tournel, 1902: 64.

⁹⁹⁸ "le vitrail de M. de Feure procède d'un principe vrai pour aboutir à un résultat médiocre, grâce à l'intransigeance du procédé". Didron (September 1900): 274.

century, the medieval style remained, for some, the paradigmatic form of stained glass, even though the majority of exhibits in 1900 were not 'gothic' in style. 999

Conclusion

At the Exhibitions, international displays of stained glass were characterised by a modern eclecticism. Yet, in spite of the hybridity of such exhibits, contemporary discourse on stained glass continued to define the medium in relation to medievalism. Even at the end of the century, modern styles and modern art forms such the poster were inspired and galvanised by renewed interest in medieval art forms like stained glass. The stained glass displays at the International Exhibitions revealed contemporary attitudes towards the past, and showcased modern developments in materials, technologies, and international styles. Modern life, and the International Exhibitions, also created new venues and shaped iconographies of the medium. As Raguin has acknowledged, in the nineteenth century, stained glass was "recreated for a modern context". 1000

To take one final emblematic case study, a window designed by Grasset and executed by Gaudin, which was displayed in the pavilion of the Chamber of Commerce of Paris at the Paris Exposition of 1900, was a frank celebration of nineteenth-century industrialism, technological and imperial progress, modern themes that were pertinent to the International Exhibitions staged during this era. Le Travail, par l'Industrie et le Commerce, enrichit l'Humanité was commissioned by the municipal government for the Chamber of Commerce building in Paris, where it remains in situ today (Fig. 5.28). Three large figures, each representing Work, Industry and Commerce, form the main focus of the composition. 'Commerce' is depicted as a female figure, seated in a golden chair and dressed in gold, with pearls in her hair. Behind her, 'Work', here depicted as a blacksmith, stands at his anvil, with a hammer in hand. 'Industry' wears a blue dress decorated with meticulously painted mechanical cogs, and, with one hand on a pulley mechanism, she presents a transparent globe to 'Commerce'. Instead of being framed by architectural canopies in the manner of medieval windows, the trio are surrounded by a modern industrial landscape with cranes, steam engines,

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^{999 &}quot; 'l'art nouveau' n'est pas fort séduisant; nous doutons de son avenir". Didron (September 1900): 274.

¹⁰⁰⁰ Raguin, 1990: 310.

¹⁰⁰¹ Bouchon, 1986; Luneau, 2006: 209, 370.

and factories with smoking chimneys. The clouds of billowing smoke are formed by unpainted pieces of white, grey, yellow, orange and red antique glass of different textures.

A wide border containing six smaller allegorical female figures with long red hair wearing classical drapery, surrounds this group. Each figure represents a modern technological invention or advancement in transportation and communication, and is depicted against a decorative foliage background representing natural products, or fruits of the empire, as identified by painted inscriptions. The figures along the side borders should be read horizontally; with the inventions of electric lighting, set amongst wheat sheaves (grain), olive branches and cannabis leaves, and gas lighting, against a backdrop of cotton plants and medicinal herbs, at the top. Beneath these figures are two key developments in modern communication: the telegraph, sitting amongst coffee beans; and the telephone, against a backdrop of tea leaves. Below, are two figures representing modern transportation networks; the railway, against a background of sugar beet; and navigation, shown advancing with a rudder and ship wheel, amongst cocoa beans. These developments in transportation networks enabled the carriage and shipping of exotic produce, as well as stained glass, throughout the empire, as we saw in Chapter 4.

Four further allegorical figures representing characteristics of the French Empire are shown seated along the bottom border: Force, Riches, Independence, and Prosperity. In the left-hand corner, the naked primitive figure of 'Force' is shown amongst vines wearing a tiger-skin hat and holding a wooden club. A globe divides the figures of 'Riches' and 'Independence'. 'Riches' is adorned with jewellery. She reclines, holding a crown in one hand while resting the other upon a basket of gold coins, surrounded by oranges. 'Independence' sits up; her sceptre pointing downwards and her foot resting on a jewelled crown, with fig trees in the background. In the right-hand corner, a more elegant figure seated amongst apple trees representing 'Prosperity' has one hand on her cornucopia, and the other on a wheel. The window adopted the Exposition's retrospective theme, and made reference to France's natural and industrial riches, and the prosperity gained from the technological advances and colonial possessions of an independent Republic, as showcased at the Expositions Universelles.

In its formal elements, however, the window is a modern re-envisaging of a medieval stained glass window. The main figurative subjects are depicted in the centre, and are surrounded by a border with smaller figures arranged in a hierarchical manner, against an ornamental

background. Each figure is accompanied by attributes and identified by *tituli*. Yet the subject matter is eminently modernist. Daumont-Tournel praised Grasset's talent and ingenuity, commenting that "[t]he work is curious for its title, and also for its modernism". Indeed, this may well be the first depiction of a telephone in stained glass (Fig. 5.29), and it seems entirely appropriate that such inventions were celebrated in stained glass in Paris at the final Exposition of the century, for not only might we identify telegraph wires with lead lines, but both the medium of stained glass and the International Exhibitions had their roots in the Middle Ages, and underwent a significant revival and transformation in the nineteenth-century. The final chapter develops these ideas further by considering how stained glass was used to express other themes pertinent to the Exhibitions, focussing on the articulation of national, imperial and racial identities.

¹⁰⁰² "L'oeuvre est curieuse à ce titre, et aussi par son modernisme". Daumont-Tournel, 1902: 53.

CHAPTER 6

STAINED GLASS AS PROPAGANDA: NATIONALISM, IMPERIALISM, AND RACE

Introduction: Stained Glass as an Ideological Medium

This chapter proposes that we might consider stained glass, which was exhibited at all the major International Exhibitions in the nineteenth century, as an ideal medium for visualising complex national, international and imperial identities. After all, its physical structure and composition, consisting of individual pieces of glass held together in a lead matrix, holds many parts in one whole. But the whole also has a 'fractured logic', 1003 in which pieces of glass can be removed, replaced and the whole reassembled, just as nations and empires are formed of several, often dislocated, states and peoples, which are assembled and reassembled into different federations and commonwealths (Fig. 6.1). Nineteenth-century maps of the world also resemble stained glass windows in some ways. Black contours demarcate geographical and political boundaries whilst holding in place the coloured fragments of states and regions. The malleable qualities of lead, meanwhile, remind us of shifting geographical boundaries and political borders, which, when weakened or broken, make the whole national or imperial structure fragile (Fig. 6.2). What better medium than stained glass, then, for us to examine the unifying ambitions and territorial fragility of nations and empires?

Stained glass rarely appears in the secondary literature on nationalism, ¹⁰⁰⁴ imperialism or race, yet it played an important role in shaping national consciousness, acting as propaganda for political and imperial regimes, and visualising racial identities in an increasingly global nineteenth-century society. The first part of this chapter discusses nationalism in relation to the ideas and aims of individual nations within the international arenas of the Exhibitions, where stained glass was used to demarcate the space allocated to a particular nation or colony and to affirm the political presence and territory of ruling oligarchies. The second part considers the use of stained glass in an imperial context in and around the Exhibition sites, focusing on the two largest and most dominant empires of the era, Britain and France. ¹⁰⁰⁵ The final section

¹⁰⁰³ This term is offered up as an alternative to Arscott's "sculptural logic". Arscott, 2004: 40.

Some recent exceptions include Jonas, 2005; Wintle, 2009.

¹⁰⁰⁵ Spain, Germany, Russia and Austria did not participate in large-scale imperial displays in this period. Greenhalgh, 2011: 115.

explores the more speculative role of stained glass exhibits in the expression of racial and ethnic stereotypes.

Part I Nationalism

As Greenhalgh has stated, nineteenth century International Exhibitions "gained legitimacy as a medium of national expression". 1006 Which is to say, they were significant nationalising arenas, where individuals, groups and nations participated in the self-fashioning of national identities whist remaining self-consciously aware, intrigued and anxious about the presentation of those identities. Alison Yarrington has suggested that we view the Exhibitions as "theatres of displays", sites "where national identities were performed, paraded, confused, and inevitably judged one against the other". 1007 Of course, studies of national identity pose many problems. At these events, British identity was often interchangeable with English, leaving Welsh, Irish and Scottish populations underrepresented. 1008 The ideologies and conceptualisation of nationalism in British settlement colonies such as Australia presented additional difficulties. 1009 For instance, in his report on the 1900 Exposition, Daumont-Tournel described a window depicting *The Good Shepherd*, exhibited by an anonymous Australian exhibitor, as "very British". 1010

It is perhaps impossible to discuss nationalism without engaging with international relations, for international competition, warfare and colonial ambition, as well as cosmopolitan aspiration, built and divided international communities. As Martin Geyer and Johannes Paulmann have argued, internationalism is not in opposition to national interests; these are "closely interlinked concepts". ¹⁰¹¹ Internationalism suggests a cross-national dissemination of people, commodities and culture; and, in the environment of the nineteenth-century Exhibitions, this involved attempts to make clear distinctions between national identities, products and cultures within a national display, in order for multiple nations to be compared against one another. ¹⁰¹²

¹⁰⁰⁶ Greenhalgh, 2011: 12-13.

¹⁰⁰⁷ Yarrington, 2008: 76.

¹⁰⁰⁸ For Ireland at the Great Exhibition see Purbrick, 2008.

¹⁰⁰⁹ See Cole, 1971.

^{1010 &}quot;très britannique". Daumont-Tournel, 1902: 72.

¹⁰¹¹ Gever and Paulmann, 2001: 7.

¹⁰¹² Anderson, 1983; Hobsbawn, 1990.

As Volker Barth has stated, and as we saw in Chapters 1 and 2, for stained glass, the nation was the "leading concept of every Universal Exhibition's classification. The objects were arranged according to nations, and nations were the official participants". ¹⁰¹³ National distinctions were made on both a micro and macrocosmic level. Exhibition buildings were divided into separate national territories, and within these, flags, armorial bearings, trophies, banners, and signs marked individual courts. ¹⁰¹⁴ Along with allegorical frescoes, painted inscriptions, and architectural sculpture, stained glass played an important role in signposting these national displays. For example, at the 1900 Paris Exposition, along the rue des nations, stained glass windows by Tiffany both decorated and signposted the entrances to sections within the U.S. Pavilion (Fig. 6.3). Similarly, a large stained glass window representing an allegorical landscape with the arms of Ecuador dominated the façade of the Republic of Ecuador Pavilion (Fig. 6.4). Just as stained glass might be considered a unifying medium with a 'fractured logic', then, the Exhibitions were unifying events that ideologically brought together exhibits from all over the world in one place, but divided them into fragmented national displays.

Stained Glass and National Terminologies

The nationalising nature of the displays invited both the public and reviewers to make international comparisons of exhibits. As one reviewer of the stained glass at the 1893 Chicago Exposition noted, "[t]o compare the different schools and see wherein the qualities which lift our own work so much above that of other nations is very interesting". Nationalist terminology was also frequently applied to the form, colour, subject, and painting techniques, in order to cast aesthetic and moral judgement upon the stained glass exhibits. *The Illustrated Exhibitor* for 1851 wrote that Mr Gibson "affects chiefly the German type of face and form; especially in a figure of the Virgin, seated, and engaged in reading". The same review remarked that the stained glass exhibits of Capronnier of Brussels "fairly represent the state of glass-staining in Belgium". Such comments recur throughout Exhibition reviews

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¹⁰¹³ Barth, 2001: 13.

¹⁰¹⁴ Stoklund, 1994: 38.

The American Architect and Building News (November 11, 1893): 74.

¹⁰¹⁶ Cassell, 1851: 380.

¹⁰¹⁷ Cassell, 1851: 381.

and should be seen, partly, as the effects of "burgeoning nationalism in the nineteenth century". 1018

Nationalising comments could also involve colour: the prevailing green or yellow hues of French glass, and the hot red hue present, "sometimes to a painful extent", in Parisian pictorial glass; ¹⁰¹⁹ or a stylistic preference; for example, the use of the renaissance style by Belgian glass-painters, and the archaeological medieval style by French exhibitors. ¹⁰²⁰ In his jury report for the Paris Exposition of 1889, Champigneulle identified specific characteristics as national traits; attributing success of materials to the Americans, finesse of execution to the English, and taste to France. ¹⁰²¹ These examples reflect the nineteenth-century concern for categorising an eclectic world of stained glass into styles based on national difference, and demonstrate still contemporary art-historical tendencies to create national schools and to define styles by geographical and political boundaries.

Yarrington has recently complicated national and racial constructs at the International Exhibition of 1862, by emphasising the hybridity of nineteenth-century sculptors, but these issues remain to be explored for stained glass, despite their prevalence. 1022 For instance, from 1879 opalescent glass was frequently referred to as 'American glass', 1023 or "verre américain"), 1024 despite the fact that its inventor, La Farge, was of French descent, as Champigneulle and others pointed out. 1025 Similarly, in nineteenth-century discussions of stained glass, the term 'Munich school' simultaneously or separately referred to: a school influenced by the Nazarene painters; stained glass produced in Munich or elsewhere in Germany; or stained glass in the pictorial style. 1026 The conflation of nationalism and style, and the general contempt for 'foreign' stained glass culminated in the 1857 'Munich-controversy'. 1027 The committee's unpopular decision to assign the glazing of Glasgow Cathedral to the Royal Bavarian stained glass Manufactory at Munich followed the advice of

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¹⁰¹⁸ Wintle, 2009: 349-50.

¹⁰¹⁹ Redgrave, 1852: 716.

¹⁰²⁰ The Ecclesiologist, 1855: 286

¹⁰²¹ Champigneulle, 1891: 177.

¹⁰²² Yarrington, 2008: 94.

Roger Riordan first used the term 'American Glass' in *American Art Review*, 1881. Yarnall, 2012: 103, n.52.

¹⁰²⁴ For La Farge and Tiffany see Sloan, 1997; Raguin, 2000; Yarnall, 2012.

¹⁰²⁵ "M. John Lafarge, de New-York, est plutôt Français qu'Américain". ["John Lafarge, of New York, is more French than American".] Champigneulle, 1891: 179.

¹⁰²⁶ The Ecclesiologist, 1855: 286.

¹⁰²⁷ See *Athenaeum* (January 9, 1864): 58; Winston, 1865; Rush, 2001; Fawcett, 2003; Rush, 2006; and Macnair, 2009.

Winston, and caused national outrage, because local Scottish glaziers were refused the commission, and because of the Munich firm's pictorial mode. 1028

Nineteenth-century artists and critics also tended to define eastern influences upon western art in terms of 'Orientalism', ¹⁰²⁹ demonstrating their distinct lack of awareness of the different artistic styles and cultural productions of these different, more distant foreign nations. For instance, in his review of the stained glass at the 1878 Exposition, Didron referred to some panels exhibited by French glass-painter Oudinot as in the "Japanese and Persian style", thus conflating two separate empires with distinct artistic and cultural traditions. ¹⁰³⁰ Elsewhere, Didron exhibited some panels that were described by Roger Fenwick as being in the "Japanese" and "Indo-Chinese" style at the Palais de l'Industrie in 1878. ¹⁰³¹ Another stained glass panel depicting a dragon, exhibited by the Californian Art Glass Works at the 1900 Exposition, was similarly described by some critics as "Japanese", and by others, as "Chinese". ¹⁰³²

Contemporary discussions of Art Nouveau reveal further complexities and contradictions inherent in applying national terms to styles, and remind us of the political and often racist motives underlying them. As Emery and Morowitz have demonstrated, the nineteenth-century embracing of medieval art forms like stained glass was, in part, nationalistic. Anxieties over 'foreignness', and particularly 'Jewishness', were evident in contemporary writings on stained glass, as in the decorative arts more broadly. After the opening of Maison Bing in 1895, French critics launched a strong nationalist and racist diatribe against Bing's venture. Arsène Alexandre wrote in *Le Figaro* of an international invasion that threatened France: "[a]ll this is confused, incoherent, almost unhealthy. It all smacks of the vicious Englishman, the Jewess addicted to morphine, or the Belgian spiv, or a good mixture of these three poisons". Bing was presented as a mercenary, and his German-Jewish heritage was cited as a reason for his 'failure' to understand medieval French stained glass traditions. Such attitudes should be

¹⁰²⁸ The Munich windows were installed between 1859 and 1864, and replaced 1935-36. As we have seen in Chapter 3, this was partly due to the debate between the *vitrail-tableau* and *vitrail-archéologique*.

¹⁰²⁹ For the standard text on Orientalism, see Said, 1978. For Orientalism within Art History, see Nochlin, 1991. For a revisionist account of these texts, see MacKenzie, 1995.

¹⁰³⁰ Didron, 1880: 74-75.

¹⁰³¹ Fenwick, 1885: 23.

¹⁰³² Didron (September 1900): 272; Daumont-Tournel, 1902: 71.

¹⁰³³ Emery and Morowitz, 2003.

¹⁰³⁴ See Silverman, 1989: Chapter 14. 'L'Art Nouveau', *Le Figaro* (December 28, 1895). Reprinted in Champier, 1896: 4-32.

¹⁰³⁵ Emery and Morowitz, 2003: 140-41.

considered against the backdrop of the Dreyfus Affair, which exposed the fact that anti-Semitism was rife in *fin-de-siècle* France. The last chapter of Ottin's 1896 publication, *Le vitrail*, also contains anti-Semitic remarks that are part of this wider phenomenon. Ottin subscribed to an all-too-familiar anti-Semitic ideology conceived in economic terms in his discussion of amateur practitioners of stained glass; "the Jew has eyes only for lead, that is to say the money - because he was eager to change the metal [into cash] before the end of the day". 1037

Four years later, critics struggled to define Bing's 1900 Art Nouveau Pavilion, a collaborative project involving international artists such as Dutch-born Georges de Feure, Frenchman Eugène Gaillard and German-born Edward Colonna. Art critic Gabriel Mourey described Art Nouveau as an inherently French style, "truly an expression of the sensibility of our race and not an adaptation of foreign principles". Yet Louis de Fourcaud, professor of aesthetics and art history at the École des Beaux-Arts, believed Art Nouveau had negative implications for French art, and discussed the movement in racially-prejudiced terms of being contaminated by the 'foreign' other:

The style, very composite, is a mixture of gothic and Japanese, of rustic and super-refined, which came from England having passed through Belgium [...]. It was already modified and muted; one could not see, in spite of everything, that it responded to our needs, to our social temperament [...]. Simple and complicated at the same time, it contains, contradictorily, light open-work and a structure of a strange weight, an unfortunate rigidity, bad proportion and a pretence of convenience which is in reality inconvenience. I'd ignore all this if in the future, by a series of transformation, it would achieve a French appearance. 1039

Like Alexandre, Fourcaud felt that Frenchness was threatened by the influx of a composite international style, and this reflected the rising estimation of arts produced in Germany, Japan, and the USA at this time.

Ottin also wrote of the "famous American glass that threatens to invade us"; a statement which recognised the economic threat that America posed for Europe at the time, and demonstrated

1037 "le juif n'ayant d'yeux que pour le plomb, c'est-à-dire l'argent – car il s'empressait de procéder à la transmutation immédiate au cours du jour". Ottin, 1896: 361.

¹⁰³⁶ The 'Dreyfus Affair' was an enormous scandal. The signing of Dreyfus' decree of pardon is thought to have saved the 1900 Exposition. Wilson, 1982: 33-34.

¹⁰³⁸ "vraiment l'expression de la sensibilité de notre race, et non une adaptation de forules étrangères". Mourey (August 1900): 262.

¹⁰³⁹ Louis de Fourcaud, in *L'Art à l'Exposition Universelle de 1900* (Paris, 1900). Quoted in Greenhalgh, 1988: 162.

his fear of modern development and the internationalisation of the stained glass industry. ¹⁰⁴⁰ These examples suggest how artistic styles and movements were defined and perceived in terms of the 'national' and 'international', 'domestic' and 'foreign'. The remainder of this section explores, through two case studies, how the iconography and structure of stained glass was used to present complex visualisations of national identity, political relations and colonial allegiance at the Exhibitions.

A Political Assemblage of Anglo-Franco Relations, 1855

The first Exposition Universelle of 1855 marked the dawn of Napoléon III's reign as Emperor and became a crucial stage for the performing of French nationalism to an international audience. ¹⁰⁴¹ The Exposition was the centre of expressions of a diplomatic alliance between Britain and France, allies (with Turkey and Sardinia) in the on-going Crimean Campaign against Russia between 1853 and 1856. One of the 1855 stained glass exhibits, a window designed by architect-sculptor John Thomas and exhibited by Ballantine & Allan, ¹⁰⁴² celebrated the political alliance and friendly rivalry between Britain and France (Fig. 6.5). ¹⁰⁴³ As we shall discover, the window also revealed the aims and ambitions of its patron, Sir Samuel Morton Peto. ¹⁰⁴⁴

Remarkably, this window survives today in the Council Chamber of the Town Hall of Lowestoft, Suffolk, a harbour town developed into a leading port and seaside resort by Peto. 1045 It is unlikely that the window was intended for this destination, however, as the Town Hall was not built until 1860. 1046 Rather, the unique iconography of the window suggests it was commissioned especially for the Exposition Universelle of 1855. Peto was no stranger to International Exhibitions. He was a significant guarantor for the Crystal Palace building, and a Royal Commissioner for the Great Exhibition of 1851, acting as treasurer of the Finance

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^{1040 &}quot;ce fameux verre américain qui menace de nous envahir". Ottin, 1896:100-101.

¹⁰⁴¹ Ageorges, 2006: 13.

¹⁰⁴² For Thomas' obituary, see *Gentleman's Magazine* (May 1862): 649-50.

¹⁰⁴³ Although the window depicted an alliance between Britain and France, it was displayed with the British exhibits in the south-eastern pavilion of the Palais de l'Industrie, and separated from its French counterparts, in line with the general arrangement of stained glass.

¹⁰⁴⁴ Peto was MP for Norwich (1847-54), Finsbury (1859-65) and Bristol (1865-1868).

¹⁰⁴⁵ The press referred to Peto as the founder of Lowestoft. He purchased the harbour works and built a modern town with a railway, pier, hotels, lodging houses, and church. See *Sunday at Home* (June 4, 1870): 347.

¹⁰⁴⁶ The window might have been installed in Peto's home at Somerleyton Hall, purchased in 1844, as several other windows were made by Ballantine & Sons for this property in the years 1854-55, although there is no evidence of its installment here. See *ILN* (January 10, 1857), 24-26.

Committee. 1047 This window, therefore, gives us an opportunity to consider the role of nineteenth-century stained glass patrons and artists as agents of nationalism and internationalism; and to demonstrate the ways in which International Exhibitions lent themselves to artistic depictions of national prowess, international rivalry, and imperial alliances.

In the central panel of this brightly coloured window are the two large standing figures of St Denis and St George, respective patron saints of France and England, presented as the "Guardians of Europe". They are set on small Renaissance-style pedestals in traditional architectural niches decorated with scallop shells and surrounded by Renaissance ornament with the inscription "Hail Happy Union" above. In between the two saints is a depiction of the tournament of the Field of the Cloth of Gold to which we will return in a moment. 1048 Directly above this scene, at the top of the window, the words "Forever United" are written on a scroll. A winged cherub holds a crown over two double cameo portraits of Queen Victoria and Prince Albert on the right, and Emperor Napoléon and Empress Eugénie on the left. The cameo portraits, enclosed in laurel wreaths, are each supported by a cherub holding a cornucopia with symbols of art, music, and industry, reflecting the aims and ideas of the International Exhibitions (Fig. 6.6). In the lower register, the French and British flags, accompanied by a fleur-de-lys sceptre and sword, are crossed in friendship, surmounted by a crown and set against olive branches, symbolic of peace. On either side of these flags are the heraldic arms of Napoléon and Victoria. The borders of the window are decorated with fleur-de-lys and Tudor roses, the respective royal symbols of France and England.

The tournament of the Field of the Cloth of Gold, depicted in an oval-shaped frame at the centre of the window, was a significant event in the history of Anglo-French relations (Fig. 6.7). Taking place in June 1520 in a valley near Calais now known as the Valley d'Or (then English territory), the meeting between Henry VIII, King of England, and Francis I, King of France, lasted seventeen days and involved competitive jousting, feasting and dancing. Elaborate and expensive temporary quarters were erected for the kings and their entourages;

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¹⁰⁴⁷ Peto is depicted in Henry Courtney Selous' painting *The Opening of the Great Exhibition by Queen Victoria* on 1 May 1851 (1851-52), V&A 329-1889.

¹⁰⁴⁸ Or 'le champ du drap d'or'. 'Champ' originally meant tiltyard, an enclosed field for jousting.

the sumptuous materials providing the name with which we now remember the event. ¹⁰⁴⁹ The young kings met to affirm two agreements following the Treaty of London in 1518: firstly a treaty of 'perpetual friendship', and secondly a marriage alliance between the two year old infant Dauphin Francis, heir to the French throne, and the four year old Princess Mary. However, the meeting was a diplomatic failure. After the event, Anglo-Franco relations quickly became hostile; Henry broke off the engagement in 1521 after Francis invaded Navarre and the Low Countries. The following year the nations were at war. ¹⁰⁵⁰

The scale and painting technique of the central medallion depicting the Field of the Cloth of Gold differentiate it from the rest of the window. It is constructed entirely from white glass painted with enamels, whereas the rest of the window is part-mosaic, part-enamel painted. The scene appears as a window on the past. We look straight into the action of two jousting knights on horseback, the one on the left with his lance outstretched, the other just visible behind the wall of reeds. This is, perhaps, the moment before a decisive victory over his component. The rapid movement of this knight causes another horse in the foreground, bearing a courtier, to move in fright. Crowds of men, women, courtiers and monks, all in Renaissance costume, watch the action from either side. There is a simple linear attempt at perspective in this arrangement, exaggerated by the horizontal lead lines that break up the picture.

The immediacy of the scene, and its prominence in the window, reminds us that the International Exhibitions were the nineteenth-century equivalents to medieval tournaments. Both were sites of international competition in which nations jostled for success and prowess in an environment filled with pomp and ceremony, symbolic displays of nationalism and international peace. The comparison did not go unnoticed in the nineteenth century. During the Exposition Universelle of 1855, *The Athenaeum* used the tournament as an analogy for the challenge that the French display of Fine Arts presented to English artists, by proclaiming that France was "calling every nation to run a tilt with her in this new 'field of the cloth of gold'". The Field of the Cloth of Gold also became newly resonant during the nineteenth-

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¹⁰⁴⁹ Six thousand men from England and Flanders constructed a palace set on brickwork foundations, with a timber framework, walls and roof of painted canvas, windows of real glass and a facade adorned with sculpture. Lloyd and Thurley, 1990: 53.

¹⁰⁵⁰ The Italian War, 1521-26, saw Francis I of France and the Republic of Venice fight against the Holy Roman Emperor Charles V, Henry VIII, and the Papal States.

¹⁰⁵¹One magazine commented upon the opening of the Great Exhibition, in terms of splendour, "the Exhibition should be another Field of the Cloth of Gold". *New Monthly Magazine and Humorist* (May 1851): 105. ¹⁰⁵² *The Athenaeum*, (October 20, 1855): 1217.

century gothic revival in which depictions of medieval chivalry were abundant. The subject played an important role in the development of stained glass in this period too, when Thomas Wilmshurst achieved fame in 1830 by exhibiting a stained glass window depicting the tournament. Total

However, the presence of the tournament in Peto's window alluded to the British monarchy's more recent relations with the French monarchy. Victoria and Albert's visit to France in 1843 under Louis-Philippe was the first time a reigning British monarch had visited France since Henry VIII's tournament in 1520. 1055 A few years later, Louis-Philippe spent periods of exile in Great Britain during a tumultuous period leading up to the 1848 Revolution. After Napoléon III's successful *coup d'état* in 1851 and the re-establishment of the French empire, the relationship between the English and French monarchs blossomed. Several more royal visits took place, culminating in a series of extended visits in 1855, the year of the first Paris Exposition, as suggested by the cameo presence of both monarchs in the window. During Napoléon's visit to London in April 1855, Victoria and Albert took Napoléon and Eugénie to the recently resurrected Crystal Palace at Sydenham. They also attended the Royal Italian Opera, as commemorated in a lithograph, which, interestingly, is also entitled 'Hail Happy Union' (Fig. 6.8). The following August, meanwhile, Victoria and Albert visited Paris for ten days in Paris, two of which were spent looking around the Exposition Universelle, amongst other sites. 1056

Punch took a satirical approach to the developing friendship when it published a caricature entitled 'La Belle Alliance' on 1 September 1855, which showed Victoria petting the French Eagle seated on his perch while Eugenie pets the muzzle of the British Lion, and Albert lights Napoléon's cigar (Fig. 6.9). By contrast, Peto's stained glass window more straightforwardly commemorated the strategic alliance. As one review of the exposition noted, Ballantine's exhibit was an "a propos production [...] intended to perpetuate the amity and friendship of two states at the head of modern civilisation and refinement". The window paid tribute to the two grand 'occidental' empires of Britain and France and their shared ideologies of royal

¹⁰⁵³ For the Eglington Tournament of 1839; see Alexander, 2007.

Harrison, 1980: 36. The window, after a sketch by Robert Trewick Bone, reportedly contained 350 pieces of glass and more than 100 life-size figures, after figures by Holbein. *Gentleman's Magazine* (April 1830): 348-49. Victoria and Albert visited France upon the invitation of Louis-Philippe from 2 until 7 September 1843.

¹⁰⁵⁶ An exhibition held at the Musée national du châteaux de Compiègne, 2008-2009, has highlighted the importance of these meetings. See Starcky, 2008.

¹⁰⁵⁷ A Walk Through the Universal Exhibition of 1855: 1855: 177.

and parliamentary power, imperial rule, and economic and industrial development, but the depiction of the two monarchs $t\hat{e}te$ \hat{a} $t\hat{e}te$, and the tilting knights also reminds us of the competition between the two nations.

The window's association with Victorian entrepreneur Sir Samuel Morton Peto enables us to further break down this 'Happy Union' into its individual parts, and to examine its production as a more explicit reference to the status and commercial interests of an enterprising individual. Peto was an extraordinary businessman who made his millions from the construction industry as a partner in the contracting firm Grissell and Peto, who managed construction of the Houses of Parliament from 1840, amongst other notable London buildings. It was probably at Westminster that Peto came into contact with John Thomas and Edinburgh stained glass artist, James Ballantine, whose stained glass firm Ballantine & Allan won the competition to design the stained glass windows for the House of Lords. Peto enlisted Thomas and Ballantine for the rebuilding of his home at Somerleyton Hall, and both were involved in the design and manufacture of the window exhibited in Paris.

Around 1840, Peto saw the potential in railway construction, so that by the end of that decade, Grissell and Peto had the largest number of domestic railways in the United Kingdom. In the 1850s, the firm began building railways abroad. One of the most significant of these was the Grand Crimean Central Railway, built upon Peto's suggestion and at cost price in cooperation with main rivals Thomas Brassey and Edward Betts, to assist the campaign in the Crimea. This was the first railway built solely for military purposes and it was a major factor in the success of the Siege of Sevastopol; an event which encouraged the new Tsar to open peace negotiations, resulting in the 1856 Treaty of Paris.

In this context, then, the presence of Peto's window at the 1855 Paris Exposition reminded visitors of the imperial alliance underlying the on-going Crimean campaign without addressing the brutal reality of the bloody battles and losses of soldiers. The imagery and

¹⁰⁵⁸ Including the Lyceum (1831-34), St James' Theatre (1835), Reform Club (1836), and Nelson's Column (1843)

Thomas was a prolific sculptor and architect who designed pottery and metalwork for leading Victorian firms; but as far as I know this is the only stained glass window that has been attributed to him. See Blatchford, 2011.

¹⁰⁶⁰ Peto wrote to the War Office on 30 March 1854 offering to build a railway at cost price. When his offer was accepted, he resigned as MP for Norwich. See Cooke, 1990. Marsh, 2000.

¹⁰⁶¹ The railway was used to transport ammunition, coal, tents, clothing, food, books and medical supplies to troops at the front line, and also carried the first hospital train.

inscriptions, "Hail Happy Union", "Forever United", and "Guardians of Europe" presented an idealised depiction of this Anglo-Franco alliance that was further pronounced by its presence in the Palais de l'Industrie, which Napoléon had christened "the temple of peace". The projection of such ideologies through stained glass, a medium dependent upon light and still heavily associated with the church, further validated these campaigns.

Peto relied on British and French imperial rule to expand his own railway empire, notably in the British colonies of Canada (1853) and Australia (1859-63), and the French colony of Algeria (1860), where Peto accompanied Napoléon III to the opening of the line. We are reminded of the economic motives and financial rewards of the Anglo-French alliance by the inclusion of portraits of the British and French monarchs in this window in the form of cameo busts, a form valued since antiquity but in the modern era commonly associated with the economic and exhibition currencies of coins and medals. Underpinning, or perhaps holding together, the symbolic image of a "Happy Union", then, were the business interests of a successful and opportunistic entrepreneur, whose income relied on industrial innovation and development of international trade, railway transport and communications.

Peto used the Exposition Universelle as an opportunity to show his allegiance to the British and French monarchs and to celebrate his involvement in the Crimean campaign by building the railway, for which he was forced to step down from Parliament. It is fitting that he chose stained glass as the medium in which to express these propagandist sentiments, as, whilst the monumental medium came with powerful medieval associations, Peto's own fortune, like the revival of stained glass more broadly in the nineteenth century, depended upon the emphatically modern technologies of iron and glass also characteristic of Victorian railways and architecture. As such, Peto's window tells us much about the modern inflections of historicist stained glass, the status of Victorian industrial entrepreneurs, and the development of international trade and politics. It also reminds us of the ways in which these themes shaped the iconography and inflected the materiality of nineteenth-century stained glass, and the national, political and imperial motives behind the displays at the International Exhibitions.

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¹⁰⁶² Catalogue Officiel, 1855: 4. At the opening of the Exposition, the Emperor proclaimed, "J'ouvre avec bonheur ce temple de la paix qui convie tous les peuples à la concorde" ["I happily open this temple of peace which invites all people to harmony."] Bloch and Delort, 1980: 15.

¹⁰⁶³ As some compensation, Peto was awarded a Baronetcy just three months before the opening of the Exposition.

The Battle of Bouvines

As we have seen, the resurrection of historic events in nineteenth-century stained glass was used to strengthen and validate more recent campaigns. Some stained glass windows commemorating the historic Battle of Bouvines, commissioned for Saint-Pierre church, Bouvines, were exhibited in the ogival bays of the Galerie des Machines at the Paris Exposition of 1889, where they served as both a local and national symbol of French victory in times of adversity. 1064 The Battle of Bouvines (27 July 1214), which marked the end of a twelve-year war when Pope Innocent III supported by King John of England and Philip Augustus of France defeated Otto IV of Germany and Count Ferrand of Flanders, had particular historic resonance in the late nineteenth century after the Franco-Prussian war. As Axel Rüth has stated, the French defeat led to a "rediscovery of that event, and to a renewed reflection on it, since a German emperor was the opponent of France once before". 1065 Bouvines became a model of victory to the French people that was exacerbated in the events leading up to, and culminating in, the First World War. Indeed, in a short report on the Bouvines windows presented to the Catholic Assembly by Count Waziers, the battle was described as "one of our most beautiful victories", "a moral victory", "an episcopal victory, where the Christian sentiment of right, of justice", enabled the French to defeat their opponents. 1066

The eleven windows exhibited in 1889 were part of a series of twenty-one, designed by Pierre Fritel and painted by Emmanuel Champigneulle (Fig. 6.10). They were installed as part of a monumental scheme in the sanctuary of Saint-Pierre church, Bouvines, during reconstruction of the church under the auspices of Félix Dehau, mayor of Bouvines, 1880-86. Each window contained a scene from the Battle according to the chronicle of Guillaume Le Breton, eyewitness and chaplain to King Philippe-Auguste, beginning with the War Council at Valenciennes and ending in the triumphant return of the army to Paris. In this sense, the windows were influenced by medieval glazing campaigns based on written chronicles with

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¹⁰⁶⁴ See Waziers, 1889; Bouchon and Brisac, 1993: 243.

¹⁰⁶⁵ See Rüth and Holland, 2001: 837.

^{1066 &}quot;une de nos plus belles victoires"; "victoire morale"; "une victoire épiscopale, où le sentiment chrétien du droit, de la justice". Waziers, 1889: 3-4.

¹⁰⁶⁷ It is not known which eleven windows were displayed along the Avenue de Suffren side of the *Galerie des Machines* in 1889. The last window of the series was installed in 1906. Waziers, 1889: 6.

¹⁰⁶⁸ The church was designed by architect Auguste Normand in the thirteenth-century gothic style, and consecrated on 21 July 1910. The stained glass windows have been listed as a *Monument Historique* since 1981. ¹⁰⁶⁹ See also Delcour, 1995.

local significance, such as the Becket windows at Canterbury Cathedral and the St William of York window at York Minster. The significance of these windows as nationalistic propaganda at the 1889 Exposition was enhanced by the official absence of the recently-defeated German states and the symbolic absence of Berlin from the painted panels of world capitals in the decoration of the *Galerie des Machines*. Three windows from this scheme appear to have also been displayed at the later Paris Exposition of 1900, where another window for a church at Montmorency, depicting the exploits of Matthew of Montmorency at the Battle of the Bouvines, designed by Grasset, was exhibited by Gaudin (Fig. 6.11).¹⁰⁷⁰ At the International Exhibitions, the national significance of such windows was enhanced through their display to an international audience.

Part II Imperialism

Just as stained glass can help us better understand nineteenth-century nationalism, the medium also has the potential to offer up alternative and new definitions of Empire. The translucency of glass and the refraction of light through a stained glass window remind us of its ability to illuminate ideas and disperse information. We have already alluded to the ways in which the structure of stained glass resembled nineteenth-century maps, and both maps and stained glass were important means of conveying imperial messages. At the Exhibitions, colonies were represented and disseminated through cartographic maps and plans, the printed, painted and sculpted image, photographs, architectural pastiches and reconstructions, and stained glass. In 1900, Gustave Dupin from Versailles exhibited a painted glass window, after a cartoon by De Mondésir, depicting a landscape scene of Madagascar, which had been annexed by France in 1896. Daumont-Tournel described this window in some detail, clearly captivated by the exotic plants and colours of the vegetation. Through these vehicles for modes of knowledge, familiarity with empires became feasible.

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¹⁰⁷⁰ Daumont-Tournel, 1902: 51-52.

¹⁰⁷¹ This was likely Jean Frédéric Lucien Piarron de Mondésir, who had a long career in the French military. He was assigned to an engineer regiment in Madagascar between 1897 and 1899 and won a colonial medal for his service there.

¹⁰⁷² Daumont-Tournel, 1902: 59.

Commemorating the Sutlej Campaign

According to MacKenzie, International Exhibitions were "the most striking examples of both conscious and unconscious approaches to imperial propaganda". 1073 Greenhalgh has further demonstrated how the growth of imperial displays at these global events served to celebrate imperial achievement. 1074 In Hoffenberg's words, Exhibitions "invited participants to share an imagined and envisioned nation and empire". 1075 But these accounts focus on the organisation of these exhibitions, rather than individual exhibits. This section demonstrates ways in which many of the stained glass exhibits displayed in these environments also served to "simultaneously glorify and domesticate empire". 1076 For example, one stained glass window exhibited by O'Connor at the Great Exhibition, and afterwards installed in the south-east transept of Salisbury Cathedral, demonstrates how imperialism affected the subject matter and iconography of stained glass at 'home' as well as in the colonies. 1077 The window commemorates officers and men from the 62nd (Wiltshire) Line Infantry Regiment who died in the Sutlei Campaign of 1845-46. 1078

The inter-relation of biblical subject matter and contemporary military events in this memorial window evoke themes of military leadership and religious conversion. In depicting events from the life of the Roman Centurion Cornelius, the first gentile to be converted to Christianity as described in the Acts of the Apostles, the window drew parallels between the role of military leaders in the Roman Empire and the Wiltshire Regiment's campaigns in British India. A medallion at the top of the window depicts Archangel Michael slaying a dragon. Cornelius is presented as a role model for the Christian officers; three medallions below focus on his conversion, and illustrate his baptism, receiving the Holy Spirit, and being raised by an angel. The final medallion depicts St George in armour slaying the dragon, surrounded by a border with eight sets of initials set in smaller medallions, corresponding to the number of officer casualties (Fig. 6.12). An inscription at the bottom of the window

¹⁰⁷³ MacKenzie, 1984: 97.

¹⁰⁷⁴ Greenhalgh, 1988; Greenhalgh, 2011. Imperial gains were also displayed by France at their National Exhibitions of 1839, 1844 and 1849.

¹⁰⁷⁵ Hoffenberg, 2001: 97.

¹⁰⁷⁶ Greenhalgh, 1988: 54; Greenhalgh, 2011: 101. 1077 White, 1898: 93; Spring, 1979.

¹⁰⁷⁸ The Ecclesiologist, 1851: 183. The Sutlej Campaign, also known as the First Sikh War, was a colonial campaign in which the 62nd Regiment fought alongside the East India Company Bengal Army against the Sikhs of the Punjab along the River Sutlej, which runs through the historic region of Punjab in northern India and Pakistan.

commemorates the seven officers and 107 non-commissioned officers and rank and file who perished in the attack at Ferozesah, and an eighth officer and twelve non-commissioned officers slain at the battles of Alliwal and Sobaron. ¹⁰⁷⁹ The window demonstrates the significance of memorial windows. It is, effectively, a sermon in glass demonstrating the righteousness of these Christian soldiers in their recent campaigns against rebellious Sikhs, calling upon the congregation to pray for their lost comrades and 'heathen' enemies, and offering solace in the Christian belief in resurrection.

Celebrating the Australian Centennial, 1888

If, at International Exhibitions, official and unofficial ideas of colonial and national identities were consumed and created, questioned and authorised, the question of defining Australian culture became an urgent matter in the separately administered colonies in the late 1880s as they prepared for a number of events marking the centenary of white settlement in Australia, including the 1888 Centennial Exhibition in Melbourne. After colonisation and the suppression of the indigenous population, the vast majority of the remaining Australian population were immigrants, and thus the artistic imaging of a 'white Australian' culture and national identity was born in the nineteenth century. Allegorical devices were borrowed from Europe, while symbols of British rule were employed to show the colonies' dependence upon their mother country. The changing relationships between the mother country and her colonies, and complex attitudes towards, and expressions of, imperial property, exploitation, pride, and political and social responsibility were reflected in the stained glass exhibits, as well as the organisation and display of Exhibitions. 1082

A stained glass window exhibited at the Melbourne Centennial Exhibition of 1888, and afterwards given to the state of Victoria by the Austrian Commissioner on behalf of the *Tiroler Glasmalerei*, an Austrian glass firm established in 1861, provides an interesting example of how stained glass could be a symbol of international bureaucratic cooperation as

¹⁰⁸² For displays of Australia at the International Exhibitions, see Hoffenberg, 2001; Orr, 2006; Douglas, 2008.

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¹⁰⁷⁹ A few years later, O'Connor executed another military memorial window, dedicated to members of the Wiltshire Regiment who had fallen in the Crimean War of 1854-55, which was installed in the Cathedral alongside the Sutlej window. This window employs similar devices and inscriptions to commemorate the fallen soldiers, and depicts the history of Joshua, who led the Israelites into battle.

¹⁰⁸⁰ Stephen. 2001: 66.

The French émigré Lucien Henry played an important role in visually articulating 'Australian' identity. See, for example, the two triptych staircase windows (1889) in Sydney Town Hall, commissioned to celebrate the Australian Centennial. See Betteridge, 2000; Sherry, 1991; Stephen, 2001.

exemplified by the International Exhibitions. An inscription commemorates the gift: "PRESENTED BY THE AUSTRIAN COMMISSIONER AT THE MELBOURNE CENTENNIAL INTERNATIONAL EXHIBITION 1888 ON BEHALF OF THE TYROLER GLASMALERIE VON NEUHAUSER INNSBRUCK". Today, the window is in the Old Council Chamber of Melbourne Town Hall (Fig. 6.13). Melbourne newspaper *The Argus* reported in 1889:

Herr Katzmayr, executive commissioner for Austria at the International Exhibition, presented [...] a stained glass panel representing the centenary of Victoria to the council as a souvenir of the Exhibition and the hospitality of the Mayor and councillors. The present was accepted with hearty thanks. ¹⁰⁸³

The window celebrates the colony of Victoria, who is represented as an allegorical white female figure set against a night sky with a southern cross constellation. She is shown standing on top of a globe with the coastline of the Australian mainland visible.

A contemporary report observed that "Victoria has her foot on the Gulf of Carpentaria", the shallow sea enclosed on three sides by northern Australia. On closer inspection however, this foot obscures almost all of the northern territory, or the aboriginal outback, the last part of Australia to be colonised. With this in mind, and given that the Victorian colony is synonymous with its namesake and imperial ruler, Queen Victoria, the figure might be interpreted as Imperial Britain 'stamping on' or 'stamping out' the Australian aboriginal population. 'Victoria' wears the Southern Cross star on a headdress, and, in her left hand, holds a book inscribed "Centennial of the Colony of Victoria 1888". The coat of arms of the city of Melbourne, a red cross with Royal crown, quartered with fleece hanging from a red ring, wheat sheaf, whale and three-masted ship in sail appear at the top of the window.

A rectangular border surrounding the figure of 'Victoria' is interspersed with scrolls, which, although not in chronological order, each record a significant event in the history of the foundation of Australia and development of the colony of Victoria. "A. Tasman 1642" refers to Abel Janszoon Tasman, a Netherlandish mariner who discovered Van Dieman's Land (now Tasmania) and New Zealand. "Discovery 1606" marks the discovery of the Australian mainland, attributed to the Dutch. "J. Cook 1777" commemorates the year that James Cook's *A Voyage round the World* was published, as well as the year he arrived at New Zealand, the Christmas Islands and Sandwich Islands. "Phillip 1788" celebrates the landing of the first Governor of New South Wales, Admiral Arthur Phillip at Sydney Cove. "W. Melbourne

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¹⁰⁸³ The Argus (March 26, 1889): 9.

¹⁰⁸⁴ The Argus (November 6, 1888): 67.

1835" refers to the foundation of Melbourne by settlers from Van Diemen's Land, named in honour of William Lamb, 2nd Viscount Melbourne. "J. Batman 1839" celebrates John Batman, the man who established the first settlement in Melbourne. "Legislature 1852" seems to celebrate the establishment of the Supreme Court of Victoria by Victorian legislation in January 1852. It is unclear what "University 1857" refers to, as the University of Sydney was founded in 1850 and the University of Melbourne in 1853. However, the Melbourne Law School was founded in 1857. "McD. Stuart 1860" commemorates John McDouall Stuart, one of Australia's most famous inland explorers who located the centre of Australia in 1860 and attempted to traverse the mainland, from south to north and back. These inscriptions thus celebrated the European 'discovery' of Victoria, white settlement, and the subsequent development of 'western' civilisation through the foundation of an educational institution and the establishment of law and order in the state capital, all of which were popular themes in Australian stained glass. 1085

As The Argus noted, the window had "evidently been prepared as a compliment to the colony". 1086 It also served as an effective advertisement for the Tiroler Glasmalerei firm, who participated in Exhibitions in Europe, Australia and the USA in the nineteenth century. In the twentieth century, however, the window played a different part in history, becoming a site of political anxiety following the First World War. In 1923, *The Argus* reported that the Austrianmanufactured window had caused many complaints, "[d]uring the war more than one effort was made by patriotic citizens to have this window "abolished." And unless a strong stand had been made it would have been removed". 1087 Just like the radical glass breaking recorded in Armstrong's Glassworlds, stained glass windows carried cultural associations and political meaning which led to threats of iconoclasm.

Glorification and Appropriation: National and Colonial Pavilions

Stained glass also played an important role in European imperialist appropriations of non-European cultures and colonies. For example, the 1878 Algerian pavilion, designed by French architect Jacques Drévet, was a Moorish pastiche combining architectural replicas of "types of

See Sherry and Baglin, 2000.
 The Argus (November 6, 1888): 67.

¹⁰⁸⁷ The Argus (January 18, 1923): 8.

Moorish art of the most remarkable heritage left to us in Algeria". ¹⁰⁸⁸ Zeynep Çelik has discussed the significance of this pavilion as a political symbol, one in which local architecture was appropriated by a colonial power. ¹⁰⁸⁹ The fact that the most important room of the pavilion, a rotunda-shaped reception room for the French marshal, was, "lighted dramatically by spherical stained glass windows", only serves to emphasise this. ¹⁰⁹⁰

To take another example, at the 1889 Paris Exposition, a large stained glass window entitled *La République Argentine reçue à l'Exposition par la Ville de Paris* was placed on the staircase leading to the first level of the Argentine pavilion (Figs. 6.14 and 6.15). Although this pavilion represented the independent Argentine Republic, Albert Ballu, a Frenchman, designed it. The stained glass windows, visible from the façade, were also designed by a Frenchman, Raoul Toché, and executed by the Parisian studio of Ader and Loubens. The window's iconography celebrated the relationship between the two Republics and glorified the Exhibition. France was depicted seated on a throne in front of the newly-erected Eiffel Tower. Argentina was depicted in front of cultivated fields, flocks of sheep and sheaths of wheat, holding a shield engraved with two clasped hands, symbolising the technological and architectural exchange between the two nations.

At the following Paris Exposition of 1900, two large stained-glass windows illuminated the Hall of Honour inside the Persian pavilion, built for Shah Mozaffar ad-Din. One depicted a Persian lion, and thus symbolised Persian national identity and power, and the other included a long inscription glorifying France and Paris. ¹⁰⁹⁴

The government of His Highness the Shah erected this pavilion in honour of the 1900 Universal Exposition. The palaces it contains will call to mind the art of lost centuries as well as testifying to the progress of the present one. The whole world stands breathless with admiration before the gigantic work to which France gathered all the nations by a gracious act of hospitality. If the Persian pavilion displays only a small portion of the products of Persia, it bears in itself a precious treasury: the warm wishes that [Persia] has for the prosperity and glory of France. The poet Zaka el Molk was happy to write

 ¹⁰⁸⁸ Çelik, 1992: 134. "types de ce que l'art mauresque nous a laissé de plus remarquable en Algérie." *Journal Officiel de la République Française* (October 3, 1877). Archives Nationales, F 12 3227: 'Exposition Universelle de 1878: Pavillons Coloniaux.' Cited in West, n.d.
 1089 Celik, 1992: 127.

¹⁰⁹⁰ L'Illustration (August 10, 1878). Quoted in Çelik, 1992: 127.

¹⁰⁹¹ Appert, and Henrivaux, 1890: 373; Champigneulle, 1891: 177; Ottin, 1896: 100.

¹⁰⁹² Ottin, 1896: 100.

The scene was also minted into a medal. Beezeley and Curcio-Nagy, 2000: 72 and 96.

¹⁰⁹⁴ L'Illustration (June 16, 1900). Cited in Çelik, 1992: 122.

these lines in Teheran and sign them in honour of this beautiful city of Paris, the land which nourishes all sciences and all arts. 1095

Inscriptions were to be seen on the walls, tiles, and stained glass of the Persian pavilion, as common in Islamic architecture, reminding us of alternative uses of the medium beyond the Christian world.

In these spaces, stained glass also adopted different forms. As a reporter for the *Chicago Tribune* noted, in the Egyptian quarter at the Chicago World's Columbian Exposition:

All the windows are projected by graceful woodwork and many of them are made of stained glass. The shades in the windows are attractive. No paint covers the closely-woven Meshrebieh [*sic*] screens which protect them. ¹⁰⁹⁶

The 'stained glass' in the *mashrabiyya* screens here complicates traditional, European understandings of stained glass as a European Christian medium and causes us to reflect on the differences between coloured glass stuck into a wooden carved frame, or stucco, and European stained glass windows. As Ottin noted, "[t]he Arabic stained glass differs from ours in that it is not painted, and instead of leads to keep the pieces of coloured glass in place, it is in plaster that they are embedded". The European medieval tradition of making stained glass is by constructing a lead matrix around several pieces of glass, whereas the carved or pierced wooden screens of the Islamic world present a fixed frame in which pieces of glass are inserted.

David Urquhart's account of his travels in Spain and Morocco in 1848, published as *The Pillars of Hercules* (2 Volumes, 1850), included a short section on 'Windows and Stained Glass' in which he suggested that there was a connection between the pierced stucco apertures in Moorish houses and mosques, and the windows of European churches and cathedrals. ¹⁰⁹⁸ Urquhart observed that several of the Moorish structures in Spain, the Alhambra of Granada, Alcazar of Seville, and the Mosque of Córdoba (which he spells Cordova), had pierced stucco in the form of gothic windows. He wrote that:

[T]he patterns of these correspond with the tracery on the walls, which being in colour, it was natural to continue the patterns in colour to the open spaces;

¹⁰⁹⁶ Chicago Tribune (May 28, 1893). Quoted in Çelik, 1992: 83.

¹⁰⁹⁵ Çelik, 1992: 122, n.60.

¹⁰⁹⁷ Ottin, 1896: 363-364. ¹⁰⁹⁸ Tromans, 2008: 279

and to effect this, where the exposure required it, bits of painted glass are stuck into the plaster while fresh. 1099

He explained that stucco was particularly suited because of the warmer climate, and further noted that "[s]tained glass is, to this day, of universal use among the Easterns, who have spread more to the northward, and have adopted external windows". Almost fifty years later, Ottin similarly acknowledged the presence of coloured glass windows in the Eastern world, and suggested that its use here might have preceded that in Europe. In recognising a closely-aligned eastern tradition of using coloured glass to decorate windows, these accounts undermine later histories of stained glass which perpetuated beliefs that the medium was an entirely western and Christian tradition. Little has, perhaps, changed. Few modern histories of stained glass discuss Islamic precedents, and most maintain a Eurocentric focus. The International Exhibitions thus expose ancient traditions of other cultures that have since been lost to western sight.

Although the stained glass exhibited at the International Exhibitions was predominately Christian in its artistic heritage and iconography, stained glass also formed part of the decoration of synagogues, mosques and temples in the nineteenth century. Significantly, both Westlake (of London-based stained glass firm Lavers, Barraud & Westlake), and the Manchester firm of Edmundson & Son, both of whom exhibited and received medals for stained glass at the Paris Exposition of 1867, designed and executed stained glass for major Victorian synagogues. It would appear that the International Exhibitions were important events from which to attract broad clientele from different faiths as well as various nations. For example, two geometrical windows with inscriptions exhibited at the Philadelphia 1876 Exhibition by Zettler were advertised as being for a "Mohammedan and Persian temple respectively". The Algerian pavilion, erected for the French Exposition Universelle of

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¹⁰⁹⁹ Urquhart, 1850, Vol. II: 278.

¹¹⁰⁰ Urquhart, 1850, Vol. II: 279.

¹¹⁰¹ Ottin, 1896: 101.

¹¹⁰² For example, a published account of the Philadelphia Centennial Exhibition described glass painting as "an art exclusively ecclesiastical and Christian in its origin and development." Sandhurst et al., 1876: 171.

¹¹⁰³ For use of stucco in Islamic architecture and its relationship to stained glass, see Raquejo, 1986; Hillenbrand, 1994; Blair and Bloom, 1995; Flood, 2000; Bloom and Blair, 2009.

Including Princes Road Synagogue, Liverpool (1874-75), and St Petersburgh Place Synagogue, Bayswater, London (1877-79). See Jamilly, 1991; Jamilly, 1996; Kadish, 2004. In addition, Lavers, Barraud & Westlake exhibited in 1862 and 1878.

¹¹⁰⁵ In a bound collection of newspaper clippings relating to the 1876 Exhibition. The name and date of the published article is missing. See Philadelphia 1876, 1876: 116.

1889, featured stained glass windows by Didron, in arabesque patterns remisicent of Islamic windows (Fig. 6.16).

Analysis of the variety of stained glass at the International Exhibitions, and its multiple applications, demonstrate that the medium should be considered in light of multiple nations, cultures and religions. Certainly, visitors to these environments were consciously aware of the diverse cultures and religions represented, and intrigued by other faiths, even though they were often viewed through the evangelising imperial eyes of European Christians. For example, an engraving entitled 'Idols on the Champ de Mars', published after the 1867 Exposition, assembled sacred statues of gods from a number of world and tribal religions which could be found across the 1867 Exposition site in a three-tier arrangement with aesthetic curiosity. A large statue of Ganesh, the Hindu god widely revered in India, took pride of place in the centre of the upper row (Fig. 6.17).

Part III Race

Michael Harris has noted, "rarely are people of African descent represented in Western art and literature". 1106 Yet, as in the cases of painting and sculpture, black people are represented in nineteenth-century stained glass. 1107 As well as visualising the history of slavery and biblical subjects, the inclusion of black people in nineteenth-century stained glass demonstrated racial diversity across empires, and contemporary nineteenth-century interest in ethnography. Given the medium's monumental associations, and political, public and religious functions in the nineteenth century, it is surprising that, to date, no stained glass scholar has engaged with the representation of black people in stained glass. As Jan Marsh reminds us, "[t]he fact that the black presence in British art through the nineteenth century has been ignored and that art historians, virtually all white, have seldom looked for it, is no accident, but the result of class and cultural power". 1108

¹¹⁰⁶ Harris, 2003: 46. On whiteness and the literary imagination, see Morrison, 1992.

¹¹⁰⁷ No decorative media appeared in the 2005 exhibition *Black Victorians* at Manchester Art Gallery however. Marsh. 2005.

¹¹⁰⁸ Marsh, 2005: 17.

Whilst historians of stained glass can learn much from recent scholarship on the representation of black people in nineteenth-century sculpture, 1109 stained glass represents an equally significant and crucially different medium with which to think about the presentation of race. As a medium that depends upon transmitted light, the representation of 'blackness' in stained glass presented both a conceptual and aesthetic challenge to artists. This section discusses the ways in which nineteenth-century stained glass artists represented race, drawing particular attention to the representation of colonial subjects within the International Exhibitions. Given the monumental character of the medium, and the imperial character of the Exhibitions, these events provided opportunities for the construction of racial identities through national, imperial and religious ideologies.

The compendium, *The Image of the Black in Western Art*, reveals the significant role that stained glass has played in the depiction of black people. The techniques and methods used to render black people in glass reveal interesting innovations in the absence of 'black' glass; for example the medieval convention was to use a blue tint for representing black skin. ¹¹¹⁰ In addition, David Bindman claims:

The first possible representation in Britain in the modern age of a black person is to be found in a stained-glass panel of the *Adoration of the Magi*, in the north nave aisle of Great Malvern Priory Church, which dates from the late fifteenth century.¹¹¹¹

This glazing scheme is well known to stained glass historians, but not for this reason. The black magus first appeared in European art in the fourteenth century and was popular after 1500.¹¹¹² Other early-Renaissance examples of a black magus in stained glass include the *Adoration of the Magi* window in the Chapel of St John the Baptist, Bourges Cathedral of Saint-Etienne, France, (*c*.1575-1600) (Fig. 6.18).¹¹¹³ As Albert Boime has demonstrated, the presence of the black magus in scenes of the Adoration of the Magi, where they are shown

¹¹⁰⁹ See Nelson, 2007. For black sculptor Edmonia Lewis, see also Burgard, 1995; Holland, 1995. For ethnographic sculptor Charles Cordier, who exhibited at all the major International Exhibitions in London and Paris, see Margerie and Papet, 2004.

¹¹¹⁰ Devisse and Mollatt, 1979b (Vol. 2, Part 1): 130-31.

¹¹¹¹ Bindman et al., 2011 (Vol. 3, Part 3): 235.

¹¹¹² For the visual depiction of black Africans by white Europeans in the Middle Ages and Renaissance period see Kaplan, 1985; Pinson, 1996

¹¹¹³ Devisse and Mollatt, 1979b (Vol. 2, Part 1): fig. 142.

paying homage to the founder of Christianity, references early missionary expeditions to Africa in the beginnings of the slave trade. 1114

In his recent book on visual representations of Europe, Michael Wintle has noted the continuation of this trend from the mid-fifteenth century; stating that the three magi were seen to represent the three known continents, Africa, Asia and Europe. 1115 Each magus bore a physiognomy associated with a continent. Melchior was often shown with 'Caucasian' features (Europe), Caspar with 'Semitic' features (Asia), and Balthasar with 'negro' features (Africa). Although Matthew's gospel provides no evidence for these stereotypes, Wintle points to a potential literary source for the black magus written by a pseudo-Bede Irish writer of the eighth century who described Balthasar as fuscus, or 'dark'. 1116 After charting the development of the black magus through the late medieval and Renaissance period, Wintle acknowledges the figure's prevalence in the "stained glass windows which adorn parish churches in England and elsewhere". 1117 Significantly, Wintle's selected example (and the only stained glass illustrated in the book) is a nineteenth-century window by Capronnier, the west window at Howden Minster, Yorkshire, which was shown at the London International Exhibition of 1862 (Fig. 6.19). Although this exhibit is not discussed in contemporary reviews, the window's presence at the International Exhibitions, where ethnic minorities and colonial subjects were objectified, prompts us to consider the iconography in relation to nineteenth-century European imperialist objectives.

Wintle interprets the scene depicting *The Adoration* in relation to the pre-New World concept of three continents. The youngest magus, offering myrrh, is black and accompanied by a black servant at his side. Both individuals have characteristic physical 'racial' traits, large white eyes and full lips, and Wintle reads them as representing the African continent. Behind 'Africa', in the outer light, is an older magus swinging a censer containing frankincense, the iconographic symbol for Asia. In prime position however, is the kneeling magus presenting gold, the only figure to wear a crown, and Wintle identifies this figure as 'Europe'. He concludes, "in the ecumenical world of Christianity, the young black prince and the Asian

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¹¹¹⁴ See Boime, 1990: 8-9.

¹¹¹⁵ Wintle, 2009: 191.

¹¹¹⁶ Wintle, 2009: 195.

¹¹¹⁷ Wintle, 2009: 211.

¹¹¹⁸ Pellatt, 1863: 3.

sage have now ceded precedence of position to crowned Europe". ¹¹¹⁹ This is further emphasised by the position of the black magus and his servant behind the figure of 'Europe'. Thus Capronnier's window may be viewed as a representation of the political and cultural dominance of Europe in the nineteenth century. ¹¹²⁰

Furthermore, there are four black figures depicted in this scene, and their physical characteristics, pigmentation, and arrangement, follow nineteenth-century conceptions of racial difference and ethnological hierarchies in relation to one another, as well as in relation to the 'white' figures. In addition to the black Magus and his black companion shown in the second light, another black servant figure appears in the first light accompanying 'Asia', and the fourth black individual, whose presence is unexplained, is barely visible behind that of Joseph in the fourth light. All four of these figures are depicted on a subordinate visual plane to the figures of 'Asia', 'Europe', Joseph, the Virgin Mary and infant Christ, yet the black magus is differentiated from the others through his elevated status and position in the group; he is shown in front of the other black figures, and, although still 'dark', his complexion is slightly paler than the others, likening him to the white magi. However, nineteenth-century viewers may have interpreted the fact that the black magus is shown with his mouth slightly open as a sign of his 'primitivism', since in popular satire this was a signifier of the black subject's 'lack of decorum'. 1121

Amongst other stained glass exhibits at the 1862 International Exhibition, a window from William Bullock of Toronto, 1122 one of the few Canadian exhibitors to exhibit an artwork, was described by the *Art Journal* as a "portrait of a Canadian Indian in his full war-dress – accurate in character and costume" (Fig. 6.20). The fact that the *Art Journal* published an engraving of this window for their readers confirms European interest in the Native American. The representation of colonial peoples in stained glass was perhaps more common, and certainly more poignant, at the International Exhibitions because, as we shall see, these were

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¹¹¹⁹ Wintle, 2009: 212.

¹¹²⁰ In other nineteenth-century representations of this religious subject the depiction is much the same. As Caroline Bressey has acknowledged, Burne-Jones' Balthazar in his tapestry of the *Adoration of the Magi* (commissioned in 1886 for the chapel of Exeter College, Oxford, and completed 1890) was based on a black model. Bressey, 2005: 98.

¹¹²¹ See Boime, 1990: 48.

Bullock was associated with Joseph McCausland in the 1850s. *Dictionary of Canadian Biography Online*. http://biographi.ca/009004-119.01-e.php?id_nbr=6892 (accessed 21 January 2013). See also Stevens, 1961 (1967); 161.

¹¹²³ Art Journal Illustrated Catalogue, 1862: 226.

venues where ethnographical and anthropological exhibits of peoples formed an important part of imperial displays and were incredibly popular with visitors.

At the 1867 Paris Exposition, meanwhile, Goglet, Queynoux and Pouyet exhibited a *Jesse Tree* window with a difference; the Old Testament figure of Joram was portrayed as black. The Parisian stained glass firm may have been influenced by late-medieval depictions of black kings in Jesse Trees and many examples of this survive in late-medieval French stained glass; for example in the axis chapel at Évreux Cathedral (1467-69), just north-west of Paris (Fig. 6.21). 1124 An argument might be made that this was a deliberately racially-prejudiced depiction, since Joram was one of the 'bad' Kings of Judah, who, during his reign over the southern kingdom of Israel, 851-843 BC, killed many leaders, constructed idols, and forced his people to worship them. 1125 Yet Didron, in his jury report, offered an alternative explanation:

Joram is illustrated as a negro in this composition: it is to be supposed that the artist has been guided, in representing him as a different race to all those issued of the family of Judah, by the desire to break the monotony of the figures. 1126

If the purpose of the Jesse Tree is to show the genealogical lineage of the Kings of Israel and Judah from David, however, then this iconographic depiction of Joram as black confuses the didactic message. Why then, did the firm do this?

We might follow Didron and argue that it was to provide some variation of colour, given that, in the same year a critic in the *Art Journal* commented that a "black man, if not a subject for Phidias, is eminently picturesque; his colour can be turned to good account in picture making; witness the effect gained by Venetian painters out of the swarthy Ethiopian king in 'The worship of the Magi'."¹¹²⁷ Rossetti made similar aesthetic choices in his painting *The Beloved* (1865-66), which includes a Jewish, Romany, and Asian woman as bridesmaids, and a little black boy carrying a cup, surrounding the central Caucasian red-headed bride (Fig. 6.22). ¹¹²⁸ In a letter to George Rae, who commissioned the painting, Rossetti explained that he meant

¹¹²⁴ Devisse and Mollat, 1979a (Vol 2, Part 2): 223, 296, n.176-77.

¹¹²⁵ 2 Kings, 8:16-23; 2 Chronicles: 21.

¹¹²⁶ "Joram est figuré en nègre dans cete composition: il est à supposer que l'artiste a dû être guidé, en le représentant ainsi comme appartenant à une race différente de celle dont est issue toute la famille de Juda, par le désir de rompre la monotonie des figures". Didron, 1868: 122.

Art Journal, 1867: 248. Cited in Marsh, 2005: 19-20.
 Rossetti studied these figures from life models. The black boy was a slave travelling with his American master in London. See Marsh, 2005: 106

the "colour of my picture to be like jewels, and the jet would be invaluable". Such an attitude may suggest that the representation of black people in nineteenth-century art was not always a tribute to racial diversity, but an aesthetic preference for contrasting flesh tones. The ethical and theoretical implications of using black figures to perform such a formal function require further thought. For, as Toni Morrison has demonstrated in *Playing in the Dark* (1992), the presence of Africans in American literature was not purely "decorative". Studies of nineteenth-century stained glass might be galvanised by further engagement with critical race theory, and exploration of the racial subject, rather than the racial object, especially since the Exhibitions were places where people viewed race as relational. Black and aborigine groups were consistently represented as subordinate colonial subjects, appearing as "human showcases".

The Midway Plaisance at Chicago's Columbian Exposition of 1893 included a number of living ethnographic groups. It has been interpreted by Robert Rydell as representing a "sliding scale of humanity", built on racial prejudice. Chicago's Christopher Reed has offered a more nuanced study of extant sources, in which he argues that the "Midway did not exist as a panorama of ethnic or racial shame", but a place of human interaction, not devoid of prejudice, but not entirely built upon it either. This was certainly the experience of Mrs D.C. Taylor who wrote, after her visit to the 1893 Exposition, we "see people of every nation under the sun, black, brown, yellow and white, old and young, beautiful and homely, rich and poor, intelligent and ignorant, all brought to the same level, and crowding one another in this wonder Midway". Although African-American citizens represented a high proportion of Chicago's population, they were not present as exhibitors, construction workers or staff at this Exposition, however. Chicago Newspaper editor Ferdinand L. Barnett commented that whilst the fair was "[t]heoretically open to all Americans", it was "literally and figuratively, a 'White City', in the building of which the Coloured American was allowed no helping hand,

¹¹²⁹ Surtees, 1971: 105, in Marsh, 2005: 106, Cat. 83.

¹¹³⁰ On RA painter William Etty's introduction of a "dark man or tawny female" for a "picturesque contrast" see Turner, 2011: 79.

¹¹³¹ Morrison, 1992: 16.

¹¹³² See especially, Schneider, 1977; Greenhalgh, 1988; Corbey, 1993; Benedict, 1994; Reed, 2000; Harris, 2003; and Greenhalgh, 2011.

¹¹³³ Rydell, 1984: 65. See also Harris, 1993; Downey, 2002.

¹¹³⁴ Reed, 2000: xxvii.

¹¹³⁵ In Halycon days in the Dream City (self-published, 1894). Cited in Reed, 2000: xxvii.

and in its glorious success he has no share". African-Americans were almost entirely excluded from the fair, despite several petitions to Congress for representational exhibits. 1137

The presence of American Indians at the Exposition was also minimal, in spite of the fact that Columbus had encountered American Indians in the Caribbean when he first landed in the New World. 1138 Yet, on the Chicago Midway, a number of exhibits were gathered to showcase American Indian life and handicrafts alongside an ethnological village of Native American peoples (Fig. 6.23). 1139 As Greenhalgh and others have demonstrated, these displays presented American Indians as "a primitive, amorphous race defying Western ideals of decency and civilization". 1140 A surviving cabinet photograph of a group of Plains Indians from this Exposition demonstrates how souvenir photographs from these events further perpetuated ethnic stereotypes while demonstrating contemporary interest in American Indians as an exotic curiosity (Fig. 6.24). One of the Native Americans is wearing a suit and top hat, but he is only just within the photographic frame. The photographer appears to have been more interested in capturing the meeting of the Native American and his white visitor, which forms the centre of the photograph, and those in native dress on the right. The Native American on the far right, holding a shield and arrow, bears some resemblance to Bullock's 1862 representation. Both perpetuated an ethnic stereotype through the props of native dress, and war implements.

Elsewhere, Native Americans were represented in stained glass at the Chicago Exposition in the Minnesota Building.¹¹⁴¹ The window, entitled *Minne-ha-ha*, a fictional Native American woman from Henry Wadsworth Longfellow's 1855 epic poem *The Song of Hiawatha*, was designed by one of the 'Tiffany Girls', Anne Weston from Duluth, Minnesota, and made and exhibited by Tiffany Studios (Fig. 6.25). It was subsequently purchased by St. Louis County Women's Auxiliary at the Fair, and presented to the Duluth Public Library. It is now in the

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¹¹³⁶ Douglass et al., 1893: 2-3. Quoted in Harris, 1993: 149.

¹¹³⁷ A group led by abolitionist Frederick Douglass published a pamphlet entitled *The Reason Why the Colored American is not in the World's Columbian Exposition* (1893), which catalogued the achievement of African Americans since the Abolition of Slavery and drew attention to apartheid in the American South. See Douglass et al., 1893.

¹¹³⁸ Harris, 2003: 68.

¹¹³⁹ The American Indian first featured as an exhibit at the 1876 Philadelphia Centennial Exhibition. Burton Benedict has demonstrated that Native Americans were the most frequently displayed colonised peoples at World's Fairs, exhibited by colonial powers US and Canada. Benedict, 1994: 59. ¹¹⁴⁰ Greenhalgh, 1988: 100.

¹¹⁴¹ A bronze sculpture of Hiawatha carrying Minnehaha was also created for the Chicago Exposition by Norwegian-born American sculptor Jacob Fjelde, and now resides in a park near Minnehaha Falls in Minneapolis, Minnesota.

Duluth Depot.¹¹⁴² In Weston's window, Minnehaha is shown standing in front of a waterfall, a reference to her name, which has local significance to a number of Minnesota landmarks. She wears Native American dress, mittens and *mukluks* (soft boots), with her hair in long braids. The decorative border contains a number of feathers and some arrows, as well as a passage from Longfellow's poem in which Hiawatha first sees the Arrow-Maker's daughter:

And he named her from the river, From the water-fall he named her, Minnehaha, Laughing Water. 1143

Longfellow's poem inspired many artistic depictions, including a series of sculptures - *The Old Arrow-Maker and His Daughter* (1866) and *The Marriage of Hiawatha* (1866-7) - and sculptural busts of *Hiawatha* (1868) and *Minnehaha* (1868) by Edmonia Lewis, whose mother was of both African American and American Indian descent, and whose father was Haitian. Although this window depicted a Native American woman, the story had a hidden message. Longfellow's poem ends with Minnehaha and her lover Hiawatha meeting a 'pale face' missionary and accepting the message of Christ.

As a medium strongly associated with Christianity, stained glass was arguably an important form of imperialist propaganda. The evangelical revival and Protestant Missionary movement provided ideological support for expanding colonial Empires and spreading western ideals, culture and religion well into the twentieth century. As already noted, the International Exhibitions were the venues from which colonial natives were commoditised, objectified, decontextualised, aestheticised and fetishised. We must understand, therefore, the presence of colonial subjects and black figures in nineteenth-century stained glass exhibits, as both a signifier of, and a response to, Christian imperialism. Of course, this was widespread beyond the Exhibitions too. As English stained glass artist E. R. Suffling recalled in 1898, when executing a window for St George's Cathedral, in the former British colony of Sierra Leone (which gained independence in 1961), the Bishop asked him to introduce as many black men as possible to the east window. 1147 Presumably the Bishop wanted to ensure that the growing

¹¹⁴² Duncan, 1980: 18.

¹¹⁴³ Longfellow, 1909 (1856): IV.

¹¹⁴⁴ Lewis also sculpted a bust of Longfellow. See Richardson, 2002.

A series of eight stained glass windows in the nave clerestory of St Andrew's Cathedral, Sydney, designed and executed by the Sydney artist Norman Carter between 1943 and 1956 show reconstructed and imagined events from the history of the Anglican Church in Australia. The windows depict early meetings of Priests and Aboriginal tribes, demonstrating the influence of Christian missionaries and conversion.

¹¹⁴⁶ Corbey, 1993: 363-64.

¹¹⁴⁷ Suffling, 1898: 592.

Christian church was represented as both multicultural and inclusive to the local black community. Suffling reported, with humour rather than horror, that in several windows along the North African coast "the Virgin Mary is frequently depicted as a *black* woman!" The fact that such representations of colonial subjects, both African American and Native Indian, were executed by white Europeans or Americans reminds us of the bias of representation, in this case, the white imperialist's control over the production and dissemination of visual knowledge. We are left wondering were there any non-white stained glass artists, and who were they?

Another subject in which black people were readily apparent, and which was particularly pertinent to nineteenth-century Imperialism, was the Te Deum Laudamus, which was important in Anglican liturgy and often represented in art. This early Christian hymn of praise was the subject of one window exhibited by Lyon, Cottier and Wells at the Melbourne Centennial of 1888. After the exhibition, the window was installed at the east end of All Saints Church, Hunters Hill, Sydney, in April 1889, where it remains today. 1149 The Te Deum dominated the upper row of scenes, with angels above and scenes of Christ's Last Days below. Christ's crucifixion is depicted in the central light and is witnessed by all those in heaven and on earth. The inscription beneath each of the five lights identifies each group above: "The glorious company of the Apostles praise Thee / the goodly fellowship of the Prophets praise Thee / the noble army of Martyrs praise Thee / the holy Church throughout all the world doth acknowledge Thee". The fifth light, representing "the holy Church throughout all the world" reveals eight figures of different ethnicities from all over the world, their faces rendered in different tones of white, pink, and dark murrey glass (Fig. 6.26). At least two men, presumably one of African descent and the other East Asian, are identifiable from the use of stereotypical skin complexions, hairstyles and facial characteristics. The inclusion of these multi-ethnic figures serves to demonstrate the extent of the Christian world, and pays silent homage to white western missionaries. 1150 Given the indigenous black population and proximity of East Asia to Australia, this window has special significance in its current context in an Australian church.

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¹¹⁴⁸ Suffling, 1898: 592.

¹¹⁴⁹ Sherry, 1991: 16, 33, 91. A replica was made for Grafton Cathedral, NSW. Giedraiyte, 1983: 354-55, Plate

¹¹⁵⁰ For religion and the Exhibitions see Burris, 2001.

Similar depictions of a world 'united', but this time for a political cause, can be seen in the Australian Federation window (1901), executed by Morris & Co. for George Brookman, after he had been impressed by the firm's wares at the Paris Exposition of 1900 (Fig. 6.27).¹¹⁵¹ Brookman commissioned the window for the Adelaide Stock Exchange to commemorate the federation of the six self-governing colonies and the formation of the Commonwealth of Australia in 1901. 1152 It was installed there in 1902, and gifted to the Art Gallery of South Australia, also in Adelaide, in 2007. 1153 As an investment in the stock market, and a vehicle for imperialism, although posthumous, this window seems to go against both Burne-Jones' and Morris' and political ideals. Indeed, according to Fiona MacCarthy, Morris was the "least imperialist figure in British history". 1154 The three panels on the upper register depict the Morning Star, Sun, and Evening Star and were made after designs by Burne-Jones. The large panels on the lower register were designed by John Henry Dearle and depict personifications of newly federated Australia with other members of the Commonwealth; India on the left, and Africa and Canada, on the right. Despite representing the Federation of Australia, the window paid homage to the former mother colony and its colonial subjects. As such, they develop a number of the allegorical devices employed at the International Exhibitions in order to support European Imperialism and western religious ideals.

The commonwealths are united by the central white figure of Britannia who holds a golden nugget inscribed 'Federation' within a laurel wreath. 1155 Yet there is a clear racial hierarchy evident in the arrangement. Sherry has observed that Britannia appears like the Roman goddess Minerva, 1156 and the black figures of India and Africa are set back and partially obscured by Australia and Canada, who are both represented by fair women, although the figure of Canada has a paler complexion. The window is an interesting example of the ways in which glass painters achieved varying tones in glass from which to execute and enhance depictions of racial difference. On the figure of India, the areas representing skin are formed of plated glass to darken the colour and deepen the tone. 1157 In addition to the colour of the glass and the effect of different pigments, stained glass makers must also consider the quality

¹¹⁵¹ For the Federation window see Goodwin, 1971; Sewter, 1974; Donovan and Donovan, 1983; Zimmer, 1984: 78; and Baker, 1999.

Sherry, 1991: 14.

¹¹⁵³ Nunn, 2010.

¹¹⁵⁴ MacCarthy, 2007: 63.

¹¹⁵⁵ This depiction is significant, given that Brookman made his fortune from gold mining in Western Australia and South Australia.

¹¹⁵⁶ Sherry, 1991: 65.

¹¹⁵⁷ Zimmer, 1984: 75-76.

of the penetrating light, particularly for countries where the light is stronger than in Britain, and the graduations from light to dark within the overall composition, as a means of depicting race. All of these factors are dependent on light conditions, which modify and change the effect by heightening or lightening the skin tone. While supporting a correlation between race and skin colour, stained glass is therefore also a medium that raises questions about whether race is stable, relational or performative.

Conclusion

As we have seen, nationalism and European imperialism took many forms at the Exhibitions, in the division and decoration of exhibition spaces, the conceptualisation and actualisation of exhibits, and the written and visual comparison of them. Although individual stained glass windows were commonly used to express nationalistic sentiment in these contexts, their very presence in a temporary collection of global cultural exhibits suggested international associations and exchange. It is therefore unsurprising that stained glass exhibits reflected, articulated, and also sometimes interrogated, both national aims and international relations.

In spite of its light-driven possibilities for more performative understandings of race, the structure, iconography and symbolism of stained glass exhibits mostly perpetuated western attitudes towards empire and 'orient'. Stained glass can also be considered as an emblem for the roles and connections of Empire. It can evoke the past, symbolise the present and indicate future hopes and concerns. At the International Exhibitions, the medium played an important part in the glorification of imperialism and appropriation of foreign and colonial pavilions by Western imperial powers. But the International Exhibitions also draw our attention to the widespread use of stained glass beyond Europe and the colonies in the Muslim world. The influence of Orientalism and Islamicism upon stained glass, a medium that is almost always described as a solely western instrument of Christianity, suggests that these events enabled a two-way cross-cultural exchange from east to west and vice-versa. I have demonstrated that the relationship between stained glass and Imperialism indicate the potential for further postcolonial exploration into the complexities of cultural, national and ethnic identities, and relationships between gender, class, sexuality, religion, race and racism in the nineteenth century.

CONCLUSION

As this thesis has demonstrated, stained glass was an integral part of the architectural fabric, idealised visions, and imperial structure of the nineteenth-century International Exhibitions. The monumental and spectacular presence of stained glass altered the physical environment of the Exhibitions and affected visitors' experience. Examination of many of the stained glass exhibits reveals the underlying aims, ambitions, successes and failures of the Exhibitions, and reminds us of the ways in which stained glass engaged with modernity. As a medium that embodied the original aims of the Exhibitions (to unite art and industry) stained glass was, in many ways, the ideal exhibit, but it also exposed the contradictions of Exhibition classification schemes and arrangement. Many stained glass exhibits, through their placement within national and imperial sections, and through their iconographies, enhanced the national and imperial purposes of these 'international' events. The medium also demonstrated modern technological, economic, political and artistic progress. As the first study to consider the importance of stained glass in such large-scale public displays, this thesis has highlighted the ways in which exhibitions reveal the importance of decorative arts such as stained glass in the formulation and visualisation of nineteenth-century culture on both a national and international scale.

The displays of stained glass at the International Exhibitions mark an important moment in the history of the medium's display. They retained aspects of eighteenth-century spectacular exhibition culture while pre-empting twentieth-century museum and gallery displays. The long-lasting influence of the exhibitions on the classification and display of stained glass remains evident today. For example, at the V&A Museum in London, stained and painted glass is part of the 'Ceramics and Glass' Department, and therefore remains categorised according to its mineral composition and kiln-manufacture following the precedents set by the nineteenth-century exhibitions. Remarkably, over 150 years since the display of stained glass in 1851, current display techniques at the V&A also reveal little change. Stained glass panels, mounted in thick, black, square-edged frames, are arranged along the outer wall of the stained glass and silver galleries overlooking the John Madejski garden in a manner extraordinarily like the first major secular display at the Crystal Palace (Fig. 7.1).

At the International Exhibitions stained glass was classified and ordered according to nineteenth-century concepts of artistic labour, revealing contemporary attitudes towards the medium's status and significance. In these eclectic environments, stained glass was continually seen and compared with a range of other exhibits, making the Exhibitions important venues from which to consider stained glass in relation to other cultural objects and artistic media. Stained glass exhibits attracted visitors' attention in these new environments through their particular placement within an exhibition building, monumental size, style, iconography, and spectacular manipulation of light.

This study has considered nineteenth-century stained glass in a global context. Analysis of stained glass artists' participation in these events reveals the scale, diversity and internationalisation of the stained glass industry. The Exhibitions demonstrate stained glass artists' engagement with a diversity of styles and techniques, as well as other media such as mosiacs and photography. The list of stained glass exhibitors, some of whom we know very little about, challenges our current historiographies of the medium and indicates the need for further research. Furthermore, examination of contemporaneous discourse on the stained glass exhibited reveals the importance of individuals who also recorded and commented upon these events, but are notably absent from the historiography of the medium, including Sebastian Evans, Gambier Parry, and Francis Kirchhoff.

Over the fifty years of this study, the stained glass industry underwent vast changes. The dominance of ecclesiastical stained glass exhibits confirms this period as a critical moment for Ecclesiology and the Gothic Revival, yet the exhibitions reveal the simultaneous stylistic eclecticism of nineteenth-century stained glass, and, especially from the mid 1860s, the gradual secularisation of stained glass and the application of 'modern' styles. One of the main reasons for neglected interest in stained glass of this period may well be due to our failure to consider the equal significance of historicist and modern styles, and to engage with these productions in terms of a nineteenth-century modernity characterised by stylistic eclecticism.

The exhibition contexts enable unique and unprecedented cultural, political, economic, and art-historical assessments of stained glass, in relation to international nineteenth-century political affairs, trade, commerce and empire. They reveal how the medium engaged with modern technologies and techniques such as photography and chromolithography, as well as illustrating modern life through commemorative windows, depictions of everyday life, themes of empire, industry and multiculturalism. These large-scale public displays of stained glass have the potential to illuminate pertinent issues surrounding nationalism, imperialism and

race, and demonstrate how stained glass played an important role in nineteenth-century culture.

Of course, the International Exhibitions included in this study were not the only exhibitions in this period to display stained glass. The medium was exhibited at regional, provincial and national exhibitions, special exhibitions like the 1864 Exhibition of Stained Glass and Mosaics at the South Kensington Museum, and in displays led by the Arts and Crafts Exhibition Society (from 1887), as well as the annual exhibitions at the Union Centrale des Arts Décoratifs (from 1882), and Paris Salons (from 1891). Furthermore, displays of stained glass at the French Salons and national expositions prior to the first Exposition of 1855 were, in many ways, the predecessors for the nineteenth-century International Exhibitions and these may shed further light on the artistic status of the medium, its spectacular appeal to the public, and its economic and national value. For instance, after examples of Maréchal's stained-glass work were seen at the Paris Salon of 1843, he was asked to execute the figures for the church of St-Vincent-de-Paul, Paris. 1159

Stained glass continued to be an important exhibit at national and international Exhibitions after 1900 too. Further study into the displays of stained glass at twentieth-century exhibitions such as the Exposition internationale des arts décoratifs et industriels modernes, held in Paris in 1925, might confirm or contradict the assertions made in this thesis and raise new questions about the role of stained glass in twentieth-century modernity, especially in the visualisation of national identity leading up to, and after, the two world wars.

Yet by considering the significance of international displays of stained glass between 1851 and 1900, it is hoped that this thesis has begun to fill a gap in the historiography of the medium, and to challenge many of the major methodological and historiographical assumptions and paradigms relating to the study of the medium. These exhibitions provide a fascinating vantage point from which to survey the international development and appreciation of nineteenth-century stained glass during its broad revival. The display and presence of stained glass at the International Exhibitions also reflected and signalled a broader migration and recontextualisation of the medium in this period, from ecclesiastical buildings and the

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¹¹⁵⁸ Pillet notes the importance of these French Expositions and Salons for early development of nineteenth-century stained glass. Pillet, 2010.

¹¹⁵⁹ Pillet, 2010: 103.

country houses of the aristocracy to the bourgeois aesthetic interior, public houses and cafés, railway terminals and department stores, and to visual and textual representation in paintings, chromolithographs, photographs, novels and poems. The increased migration and dissemination of stained glass in the nineteenth century, its movement across architectural spaces, geographical boundaries and different media, is characteristic of its modernity.