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Who books the tickets for visitors to innovative installations and events in cathedrals?

Exploring the psychological type profile of the gatekeepers

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Abstract

Previous research concerned with the psychographic segmentation of cathedral visitors, employing psychological type theory has drawn attention both to the psychological types under-represented among cathedral visitors and to the capacity of an innovative event to widen the psychographic appeal of cathedrals. This study tests the thesis that the requirement for advanced online booking to attend an innovative installation may nonetheless further delimit the psychographic appeal. This thesis was supported by 778 individuals booking online to attend a Luxmuralis installation in Liverpool Cathedral who completed the Francis Psychological Type Scales. Among this constituency there was under-representation of perceiving types and over-representation of the SJ temperament.

Keywords: cathedral studies, psychological type, temperament theory, psychographic segmentation, *son et lumiere*

Introduction

Psychological type theory was introduced to the wider field of the social scientific study of visitor motivation, expectation, and experience in a series of papers by Gountas and Gountas (2000, 2001) and Gountas (2003). Psychological type theory has its roots in the work of Jung (1971) as further developed by a series of psychometric instruments, including the Keirsey Temperament Sorter (Keirsey & Bates, 1978), the Myers-Briggs Type Indicator (Myers & McCaulley, 1985), and the Francis Psychological Type Scales (Francis, 2005; Francis, Laycock, & Brewster, 2017). Within the field of personality theories, psychological type theory occupies a unique position, distinguishing it from the Big Five Factor model of personality (Costa & McCrae, 1985), the Major Three Dimensional model of personality (Eysenck & Eysenck, 1975) and the Sixteen Personality Factors model (Cattell, Cattell, & Cattell, 1993). Psychological type theory is rooted in a theoretical model of cognitive functioning, is concerned with neither character nor pathology, involves no value judgements regarding the individual differences observed, and operates in terms of dichotomous preferences rather than in terms of continua.

Psychological type theory distinguishes between two core cognitive processes, the perceiving process that is concerned with gathering information and the judging process that is concerned with evaluating information. The perceiving process is expressed through two contrasting functions styled sensing and intuition. The judging process is expressed through two contrasting functions styled thinking and feeling. Sensing types (S) focus on the details, while intuitive types (N) focus on the big picture. Thinking types (T) emphasise objective logical analysis, while feeling types (F) emphasise subjective and interpersonal values. Within psychological type theory these two core cognitive processes are nested within two orientations and two attitudes. The orientations are concerned with the source of psychological energy: introverts (I) are energised by their inner world, while extraverts (E)

are energised by the outer world. The attitudes are concerned with the orientation within which individuals exercise their preferred perceiving function and their preferred judging function. Judging types (J) employ their preferred judging function in the outer world and appear to others as organised and well-prepared individuals, while perceiving types (P) employ their preferred perceiving function in the outer world and appear to others as flexible and spontaneous individuals. It is these four contrasting characteristics, concerning orientations (I and E), perceiving (S and N), judging (T and F) and attitude toward the outer world (J and P) that carry implications for individual differences in visitor motivation, expectations, and experience.

The component parts of psychological type theory can be employed in a variety of ways, in addition to paying attention to the four dichotomous preferences. The dominant type preference focuses on the individual's best developed function in terms of dominant sensing (a practical focus), dominant intuition (an imaginative focus), dominant feeling (a humane focus), and dominant thinking (a logical focus). The sixteen complete types offers a full profile. Following Keirsey and Bates (1978), the four temperament profiles distinguish among the Epimethean temperament (SJ), Dionysian temperament (SP), Promethean temperament (NT), and Apollonian temperament (NF).

Psychological type theory was introduced to the field of cathedral visitors in a sequence of papers by Francis, Williams, et al. (2008), Francis, Mansfield, et al. (2010), Francis, Annis, et al. (2012), Francis, Robbins, and Annis (2015), and Francis and Mansfield (2022). These disparate studies generated highly similar findings. For example, Francis, Annis, et al. (2012), drawing on 2,327 visitors to St Davids Cathedral in Wales, and Francis and Mansfield (2022), drawing on 1,082 visitors to three cathedrals in England and one in Wales, reported similar preferences for introversion (58% and 60%), for sensing (72% and 72%), for thinking (51% and 49%), and for judging (81% and 80%). In order to contextualise

these findings, Francis and Mansfield (2022) compared their profile of cathedral visitors with the population profile for the UK provided by Kendall (1998). While 60% of cathedral visitors preferred introversion, the proportion fell to 48% in the population as a whole. While 80% of cathedral visitors preferred judging, the proportion fell to 58% in the population as a whole. However, the ratio between preferences for sensing and intuition was similar within the two groups: 72% of cathedral visitors preferred sensing and so did 77% of the population as a whole. Likewise, the ratio between preferences for thinking and feeling was similar within the two groups: 49% of cathedral visitors preferred thinking and so did 46% of the population as a whole. In other words, extraverts and perceiving types were significantly under-represented among cathedral visitors.

The report for the Association of English cathedrals on the social and economic impact of cathedrals by Ecorys (2021) drew attention to the enhanced footfall generated by innovative installations, exhibitions, and events, drawing particular attention to the Helter Skelter installation in Norwich Cathedral and the Crazy Golf Bridges in Rochester Cathedral. Subsequently, McKenna et al. (2022) provided a chronicle of the installations, exhibitions, and events hosted within the 43 cathedrals of the mainland dioceses of the Church of England and the Isle of Man, since 2018 by drawing on information available on the cathedral websites between January and March 2023.

In an initial attempt to chart whether distinctive events drew in visitors with differing psychological type profiles, Francis, Mansfield, et al. (2023) examined the profile of 196 visitors to Brecon Cathedral at the time when the cathedral functioned as an integral component of the Brecon Jazz Festival. Their data demonstrated both a different demographic profile (younger) and a different psychological type profile (more intuitive types and more perceiving types). While within four other cathedrals, Francis and Mansfield (2022) found 28% of the visitors were intuitive types, the proportion rose to 41% in Brecon at

the time of the jazz festival. While Francis and Mansfield (2022) found 20% of the visitors were perceiving types, the proportion rose to 27% in Brecon at the time of the jazz festival.

Research aim

Among its range of innovative installations, exhibitions, and events, Liverpool Cathedral, as England's largest cathedral (Kennerley, 2008; Thomas, 2018), has given prominence to the immersive *son et lumiere* experience offered by Luxmuralis, light and sound shows drawing on the skills of sculptor Peter Walker and composer David Harper. Between 18 and 27 February 2022, the installation, *Space, the Universe and Everything* was envisaged by Peter Walker as taking visitors back to the start of everything, whether conceived as creation or the big bang (see further Kirby et al., 2023). Between 2 and 9 December 2022, the installation, *The light before Christmas: The angels are coming*, offered participants a chance to enjoy the festive season in a modern and artistic way, as stunning light and sound artworks depict the remarkable story of how Christmas began, providing a perfect opportunity for different generations to join together for reflection.

Installations of this nature are not designed as open access for walk-up entry, but require prior booking through an online agency. This phenomenon moves, in the first instance, the focus of attention from the range of people who may visit to the gatekeepers who book the tickets. So who is it who books the tickets for these visitors to the immersive experience of the Luxmuralis *son et lumiere* installations in Liverpool Cathedral? What is their preferred psychological type profile? Extrapolation from psychological type theory offers some particular hypotheses for testing. Advanced online booking is likely to appeal more to judging types than to perceiving types, more to dominant sensing types, or more to the Epimethean temperament (SJs)

Method

Procedure

When people booked to attend one of the installations, they were invited to give assent to receiving a follow-up survey from the cathedral team to assess their experience. In respect of the February installation, a 11.4% response rate generated 283 replies (the request was sent in August). In respect of the December installation, a 25.6% response rate generated 978 replies (the request was sent at the beginning of February).

Instrument

Psychological type was assessed by the Francis Psychological Type Scales (FPTS: Francis, 2005; Francis, Laycock, & Brewster, 2017). This 40-item instrument comprises four sets of 10 forced-choice items covering each of the four components of psychological type: orientation (extraversion or introversion), perceiving process (sensing or intuition), judging process (thinking or feeling), and attitude toward the outer world (judging or perceiving). Francis, Craig, and Hall (2008) have demonstrated that this instrument functions well in church-related contexts, reporting alpha coefficients of .83 for the EI scale, .76 for the SN scale, .73 for the TF scale, and .79 for the JP scale. For each pair of characteristics, participants were asked to check the 'box next to that characteristic which is closer to the real you, even if you feel both characteristics apply to you. Tick the characteristics that reflect the real you, even if other people see you differently'.

Participants

Of the 1,261 individuals who completed the main part of the survey, 778 also completed the Francis Psychological Type Scales. Of these 778 participants, 159 were male and 619 were female; 60 were under the age of forty, 116 were in their forties, 227 in their fifties, 262 in their sixties, 106 in their seventies, and 7 in their eighties.

Analysis

A highly distinctive method for analysing, handling, and displaying statistical data in the form of 'type tables' has been developed within the empirical investigation of psychological

type. This convention has been adopted in the following presentation to enable integration of these new data within the existing literature and to provide sufficient detail to aid secondary analysis and further interpretation within the rich theoretical framework afforded by psychological type theory. The sixteen discrete psychological types, the four dichotomous preferences, the six sets of pairs and temperaments, the dominant types, and the introverted and extraverted Jungian types are all incorporated in the design of the type tables. Only commentary pertinent to those aspects of the data strictly relevant to the research question will be provided. Within these type tables, the statistical significance of the difference between two groups is established by means of the selection ratio index (I), an extension of chi-square (McCaulley, 1985).

Results

-insert table 1 about here-

The four scales of the Francis Psychological Type Scales achieved satisfactory internal consistency reliabilities in terms of alpha coefficients (Cronbach, 1951): extraversion and introversion, $\alpha = .81$; sensing and intuition, $\alpha = .68$; thinking and feeling, $\alpha = .71$; judging and perceiving, $\alpha = .76$.

Table 1 presents the psychological type profile of 778 individuals who used the online provider to book tickets to attend a *Luxmuralis son et lumiere* in Liverpool Cathedral. These data demonstrate that there were more introverts (59%) than extraverts, more feeling types (59%) than thinking types (41%), and more judging types (88%) than perceiving types (12%). In terms of dominant type preferences half of all participants were dominant sensing types (49%), a quarter were dominant feeling types (27%), 13% were dominant thinking types, and 11% were dominant intuitive types. The most prevalent complete types were ISTJ (23%), ISFJ (23%), ESFJ (14%), and ESTJ (11%). In terms of temperament theory, the most prevalent temperament was SJ (72%), followed by NF (18%), NT (6%) and SP (5%).

Table 1 also compares the profile of these 778 individuals who booked tickets for the *son et lumiere* in Liverpool Cathedral with the profile of 1,082 visitors to four cathedrals (three in England and one in Wales) reported by Francis and Mansfield (2022). Comparison with the normative data for cathedral visitors draws attention to the ways in which the dichotomous preferences of those who book the tickets differ from those norms. While 80% of cathedral visitors preferred judging, the proportion rose to 88% among those who book tickets. While 72% of cathedral visitors preferred sensing, the proportion rose to 77% among those who book tickets. While 51% of cathedral visitors preferred feeling, the proportion rose to 59% among those who book tickets. In terms of dominant type preferences, while 43% of cathedral visitors were dominant sensing types, the proportion rose to 49% among those who book tickets. In terms of temperament theory, while 62% of cathedral visitors were Epimethean temperament, the proportion rose to 72% among those who book tickets.

Discussion and conclusion

This paper was designed to explore the way in which psychological type theory could contribute to the assessment of the ways in which innovative installations, exhibitions, and events could extend the psychographic profile of visitors to Anglican cathedrals. A series of earlier studies had demonstrated a relatively consistent psychological type profile of visitors to several different cathedrals and suggested that extraverts and perceiving types were significantly under-represented within this constituency (see in particular Francis, Annis, et al., 2012). The study conducted in Brecon Cathedral at the same time when the cathedral functioned as an integral component of the Brecon Jazz Festival demonstrated that this particular event attracted increased participation from perceiving types and from intuitive types (Francis, Mansfield, et al., 2023)

The specific theory being tested by the present paper was that installations, exhibitions and events that are not designed as open access for walk-up entry may appeal to a

particular psychological type profile of potential visitors who are responsive to the requirement for prior booking through an online agency. In particular three specific hypotheses were advanced.

The first hypothesis was that advanced online booking would appeal more to judging types than to perceiving types. Judging types operate their external world through their preferred judging function and prefer to have their external world well organised. While 80% of cathedral visitors preferred judging, the proportion rose to 88% among those booking advanced tickets online. According to Francis and Mansfield (2022) perceiving types were already under-represented among cathedral visitors. Now this is further accentuated among those booking online in advance.

The second hypothesis was that advanced online booking would appeal more to dominant sensing types. Dominant sensing types are characterised as practical people who function as good administrators and who are concerned with current realities. Such people would be aware of the practicalities involved in accessing these installations. While 43% of cathedral visitors were dominant sensing types, the proportion rose to 49% among those booking advanced tickets online. According to Kendall (1998) 49% of the UK population are dominant sensing types.

The third hypothesis was that advanced online booking would appeal more to the Epimethean temperament (SJ). The Epimethean temperament combines the characteristics of sensing types and judging types. Such people tend to be innately conserving in their attitudes and tend to be traditional in their outlook. While 62% of cathedral visitors were Epimethean temperament, the proportion rose to 72% among those booking advanced tickets online. According to Francis and Mansfield (2022) the Epimethean temperament was already over-represented among cathedral visitors. Now this is further accentuated among those booking online.

These findings lead to the conclusion that, while innovative installations, exhibitions, and events, like the *son et lumiere* immersive experiences designed by Luxmuralis, may have a wider psychographic appeal to extend the range of psychological types visiting cathedrals, the need to regulate attendance at such installations by means of advanced online booking may exercise a counter trend of narrowing the psychographic appeal. This conclusion may, however, be premature. Those booking online tended to make multiple ticket purchases, not only for themselves but also for family and for friends. So for now the jury must remain out until further research can access the psychological type profile, not only of those who booked the tickets, but also of those for whom tickets were purchased. This, however, is a more complex (and consequently more costly) project to design.

Disclosure statement

No potential conflicts of interest were reported by the authors.

Availability of data

Data are available from the corresponding author on request.

Ethics approval

Ethical approval was granted by the Research Ethics Committee for the School of Humanities, Religion and Philosophy at York St John University (approval code: HRP-RS-AV-05-22-01). All participants had to affirm they were 18 or over and give their informed consent by clicking a box that gave access to the rest of the survey.

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Table 1

Psychological type profile of those who book the tickets, compared with visitors to four cathedrals reported by Francis and Mansfield (2022)

The Sixteen Complete Types				Dichotomous Preferences		
ISTJ <i>n</i> = 178 (22.9%) <i>I</i> = 1.04 +++++	ISFJ <i>n</i> = 181 (23.3%) <i>I</i> = 1.49*** +++++	INFJ <i>n</i> = 32 (4.1%) <i>I</i> = 0.82 ++++	INTJ <i>n</i> = 24 (3.1%) <i>I</i> = 0.48*** +++	E <i>n</i> = 322 (41.4%) <i>I</i> = 1.03	I <i>n</i> = 456 (58.6%) <i>I</i> = 0.98	
				S <i>n</i> = 595 (76.5%) <i>I</i> = 1.06*	N <i>n</i> = 183 (23.5%) <i>I</i> = 0.84*	
				T <i>n</i> = 316 (40.6%) <i>I</i> = 0.83***	F <i>n</i> = 462 (59.4%) <i>I</i> = 1.16***	
				J <i>n</i> = 686 (88.2%) <i>I</i> = 1.11***	P <i>n</i> = 92 (11.8%) <i>I</i> = 0.58***	
ISTP <i>n</i> = 1 (0.1%) <i>I</i> = 0.06***	ISFP <i>n</i> = 14 (1.8%) <i>I</i> = 0.61 ++	INFP <i>n</i> = 22 (2.8%) <i>I</i> = 0.73 +++	INTP <i>n</i> = 4 (0.5%) <i>I</i> = 0.28*	Pairs and Temperaments		
				IJ <i>n</i> = 415 (53.3%) <i>I</i> = 1.09	IP <i>n</i> = 41 (5.3%) <i>I</i> = 0.49***	
				EP <i>n</i> = 51 (6.6%) <i>I</i> = 0.68*	EJ <i>n</i> = 271 (34.8%) <i>I</i> = 1.14	
				ST <i>n</i> = 271 (34.8%) <i>I</i> = 0.97	SF <i>n</i> = 324 (41.6%) <i>I</i> = 1.16*	
				NF <i>n</i> = 138 (17.7%) <i>I</i> = 1.17	NT <i>n</i> = 45 (5.8%) <i>I</i> = 0.45***	
ESTP <i>n</i> = 6 (0.8%) <i>I</i> = 0.56 +	ESFP <i>n</i> = 18 (2.3%) <i>I</i> = 0.64 ++	ENFP <i>n</i> = 23 (3.0%) <i>I</i> = 0.97 +++	ENTP <i>n</i> = 4 (0.5%) <i>I</i> = 0.33	SJ <i>n</i> = 556 (71.5%) <i>I</i> = 1.16***	SP <i>n</i> = 39 (5.0%) <i>I</i> = 0.50***	
				NP <i>n</i> = 53 (6.8%) <i>I</i> = 0.66**	NJ <i>n</i> = 130 (16.7%) <i>I</i> = 0.94	
				TJ <i>n</i> = 301 (38.7%) <i>I</i> = 0.92	TP <i>n</i> = 15 (1.9%) <i>I</i> = 0.28***	
				FP <i>n</i> = 77 (9.9%) <i>I</i> = 0.73*	FJ <i>n</i> = 385 (49.5%) <i>I</i> = 1.32***	
ESTJ <i>n</i> = 86 (11.1%) <i>I</i> = 1.04 +++++	ESFJ <i>n</i> = 111 (14.3%) <i>I</i> = 1.04 +++++	ENFJ <i>n</i> = 61 (7.8%) <i>I</i> = 2.42*** +++++	ENTJ <i>n</i> = 13 (1.7%) <i>I</i> = 0.55 ++	IN <i>n</i> = 82 (10.5%) <i>I</i> = 0.61***	EN <i>n</i> = 101 (13.0%) <i>I</i> = 1.19	
				IS <i>n</i> = 374 (48.1%) <i>I</i> = 1.13*	ES <i>n</i> = 221 (28.4%) <i>I</i> = 0.97	
				ET <i>n</i> = 109 (14.0%) <i>I</i> = 0.84	EF <i>n</i> = 213 (27.4%) <i>I</i> = 1.16	
				IF <i>n</i> = 249 (32.0%) <i>I</i> = 1.17*	IT <i>n</i> = 207 (26.6%) <i>I</i> = 0.82**	

Jungian Types (E)			Jungian Types (I)			Dominant Types					
	<i>n</i>	%	<i>Index</i>		<i>n</i>	%	<i>Index</i>		<i>n</i>	%	<i>Index</i>
E-TJ	99	12.7	0.93	I-TP	5	0.6	0.16***	Dt.T	104	13.4	0.76*
E-FJ	172	22.1	1.31**	I-FP	36	4.6	0.68*	Dt.F	208	26.7	1.13
ES-P	24	3.1	0.62*	IS-J	359	46.1	1.23***	Dt.S	383	49.2	1.16**
EN-P	27	3.5	0.75	IN-J	56	7.2	0.63**	Dt.N	83	10.7	0.66***

Note: *N* = 778 (NB: + = 1% of *N*)
 p* < .05, *p* < .01, ****p* < .001