
Transcendhance: A Game to Facilitate Techno-Spiritual Design

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Abstract

This late-breaking work describes the design and application of a game to facilitate techno-spiritual design. In it I report the results of 24 interviews with people of diverse spiritual perspectives and three “Transcendhance” design game workshops involving 12 participants; I describe design fictions arising from these activities; and I discuss issues and challenges of designing a game to enable people to explore indescribable experiences and create design ideas in an atmosphere of fun and play. My work bridges the domains of user experience and spiritual experience, aiming to gain insight into design for enhancing experiences of

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CHI'16 Extended Abstracts, May 07-12, 2016, San Jose, CA, USA
ACM 978-1-4503-4082-3/16/05.

<http://dx.doi.org/10.1145/2851581.2892536>

something beyond oneself. Spiritual experiences are tricky to define, difficult to discuss, impossible to predict, and challenging to address in design, so I used a game to explore the design space.

Author Keywords

Techno-spirituality; techno-spiritual design; spiritual experience; user experience; design fiction; design games.

ACM Classification Keywords

H.5.m. Information interfaces and presentation (e.g., HCI): Miscellaneous.

Introduction

People use artefacts in many ways to support their spirituality [7], their search for connection with something greater than themselves [17]. Artefacts can influence spiritual¹ experiences, so design should have something to contribute to such influence. But spiritual experiences tend to be ineffable [16] — impossible to describe — and the rationalistic HCI methods that dominated the field for so long are inadequate for indescribable experiences [5]. The techno-spiritual design space needs a new approach.

¹ These kinds of experiences have many names. The use of “spiritual” does not imply a specifically religious meaning.

Spiritual experience research is a rich body of work that addresses experiences of the transcendent, something larger than oneself [10, 19]. This literature studies mostly brief experiences [16] and pays little attention to the role of artefacts in the experiences. (The field of digital religion — “digital culture and its significance for religion” [12] — focuses specifically on religion, and as far as I can tell it does not address subjective experience.) In contrast, user experience (UX) research often considers experience in the longer term [12], and it explicitly addresses the use of artefacts. Little of UX research, however, examines artefacts in spiritual experiences [7], and it rarely delves into the nature of such experiences. My research bridges these two domains by studying the use of artefacts in spiritual practice and the contributions of artefacts to spiritual experiences.

This study drew on the approach in [4], which presents a game developed to explore a design space (positive ageing) by using interview insights and highlighting “play, irony and the limitations of technological intervention” [p. 3849]. The authors argue that such a game can work for other qualitative studies “as a means of generating design concepts informed by data and research insights” [p. 3857]. I adapted their game for the techno-spiritual design space.

Interviews

I conducted in-depth, semi-structured interviews with 24 people from a variety of spiritual backgrounds and faith traditions. Interviewees were thirteen women and eleven men, ranging in age from mid-20s to late 60s. All lived in the UK, the USA, or Canada at the time of the interview; some had migrated there from Asia, the Middle East, Europe, or Africa. Interviewees’ spiritual

perspectives ranged from Atheism to Buddhism to Spiritualism to Islam and Christianity. I defined “spiritual experience” to potential interviewees as an experience of feeling deeply connected to something larger than oneself (as I have defined it throughout my PhD programme [6]). Both religious and non-religious interviewees were able to relate to that definition and to describe at least one such experience from their lives.

I conducted the interviews mostly in person, in locations ranging from conference rooms to university offices to interviewees’ homes; two interviews took place via Skype. The interviews, which lasted from just under one hour to almost two hours, comprised two sections:

1. *Background.* Interviews began by eliciting the interviewee’s spiritual perspective and practices, then explored a spiritual experience that the interviewee found meaningful and felt to be important.
2. *Artefact Influence.* Interviews continued by probing artefact use in interviewees’ spiritual practices and the contributions of such objects to their spiritual experiences. I ended by asking them to use their wildest imagination to dream of a product that could enhance such experiences. “What might such a product do for you?” I asked.

I analysed the interview data using a Grounded Theory (GT) technique [8]. I chose constructivist GT because it explicitly accepts the consideration of existing theory and can provide the kinds of rich insights [9] that techno-spirituality research needs.

Interview Analysis

Analysis of the interview data yielded five broad themes: creating the context, living the experience, integrating the experience, using artefacts in spiritual

life, and desiring techno-spiritual enhancement. The first three were informed by both UX and spiritual experience literature, which also describe experience in three components. On the UX side, McCarthy and Wright [12] write, “Any description of an experience...is constituted of things and events, what they did to those involved, and how they² responded” (p. 50). Spiritual experience research [e.g., 10, 20] has identified similar sets of three components. All of these structures describe experience in terms of what surrounds and sets the stage for the experience, what the person underwent and how she perceived it, and at least some part of the person’s response to what she underwent. The structures differ mostly in their treatment of short- and long-term responses to what is perceived, and in the elements of the major components. My structure of artefact-supported spiritual experience adds two “bridge” themes to bring in artefact use and desires for artefact-supported enhancement. For reasons of space, I summarise here the interview data at a high level.

Creating the Context

Spiritual experiences occur in a context (the “things and events” mentioned in [12]). My interviews revealed contextual factors such as the person’s upbringing and life experiences, their current beliefs, where they were and what they were doing, who was with them, and the season of the year. Interviewees varied in the importance they gave to different contextual elements, some stressing for example their beliefs and their religious community, others emphasising the physical or social environment in which the experience occurred.

² The first “they” in this sentence from [12] refers to things and events; the second refers to people involved in the experience.

Living the Experience

Interview analysis led to the sub-themes of perceiving the phenomena and reacting to perceived phenomena. Interviewees described perceptions as simple as sudden darkness or a voice speaking, and as complex as a sense of unity with the ocean in which they were swimming. Their in-context reactions included interpretations such as identifying a voice as God or their deceased mother; emotions such as awe, joy, fear, or relief; somatic reactions such as goosebumps or tingling sensations; and immediate effects such as laughing or having a sudden insight.

Integrating the Experience

A common finding in spiritual experience research is that such experiences have a lasting impact on people’s lives [e.g., 10]. People integrate a spiritual experience by recognising its importance for their lives and making changes — or not! — to respond to this understanding. Interviewees reported such profound changes as forgiving a wrong from thirty years earlier and losing the fear of death. Whether an experient makes intentional life changes or simply continues to reflect and ponder, a spiritual experience can become integrated into that person’s life.

Using Artefacts in Spiritual Life

Interview data suggest that, currently, artefacts play their largest role in creating the context of spiritual experiences. Artefacts remind people to meditate or pray; they play recordings of guided meditations or religious services; they provide sacred texts with commentaries and the opportunity to discuss them with other people. Artefacts also support integration of spiritual experiences, often via sharing aspects of lived experiences and insights gained.

Transcendance Game



Figure 1: Playing the game



Figure 2: Two sets of experience cards drawn during play

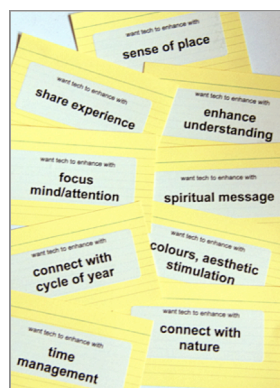


Figure 3: Sample of desire cards

Desiring Techno-Spiritual Enhancement

Interviewees described various ways in which they would welcome artefact-supported enhancements of their spiritual experiences. They most commonly mentioned desires to increase mental focus and reduce distractions, to share and discuss their experiences with others, and to increase their understanding of their own spiritual traditions or their spiritual experiences.

“Transcendance” Workshops

The ineffability of spiritual experiences precluded the reliance on “classic” HCI methods involving definition and description. Although aesthetic experiences, too, are ineffable, the approach described in [5] was not feasible for my research because spiritual experiences tend to be fairly brief and largely unpredictable. As one interviewee put it, “you can’t dial it up”. I decided to build an environment of imagination, fun, and play for exploring experiences and creating design ideas. I chose to design a game.

Enter *Transcendance*. The name, a portmanteau of “transcendent” and “enhance”, reflects the goal of enhancing experiences of transcendence. The game had to allow the interview findings to influence the generated ideas without requiring the players to understand the findings. For example, the data analysis distinguished between what a person perceived during a spiritual experience and how she interpreted it — e.g., sensing a presence vs deciding its identity (say, God or a deceased loved one). Clearly, this was too fine a distinction to ask players to consider in the time we had, so I included interpretations with perceptions. For simplicity’s sake, I omitted considerations of longer-term integration.

Transcendance is a board game (Figure 1) that can be described as a combination of Pictionary³ and Snakes & Ladders⁴. For its design I took inspiration from the game in [4], in which players move around a board and use categories of cards to inspire design ideas. Each Transcendance board space represents an aspect of the context of a spiritual experience. At each step, players roll a die to determine how far to move their game pieces along a spiral path towards the centre. Landing on a space with a snake or a ladder moves the player to a different arm of the spiral after that space is played — closer to the End point (if a ladder) or farther from it (a snake).

After the players roll the die and move their game pieces, each draws four cards: one perception, two reactions to it, and one overall characterisation of the experience (see examples in Figure 2). The contents of the cards came from my interview data and from the literature on spiritual experiences. Players sketch as many ideas as they can, to illustrate scenarios in which a person might have a spiritual experience that involves an artefact and includes the context (the board space) and the words on any or all of the experience cards. When play ends, players choose one of their drawings to build. They use cardboard, construction paper, pipe cleaners, cellophane tape, coloured markers, and glue. A new set of cards, from which they choose, provides interviewees’ desires for techno-spiritual enhancements (Figure 3); this aims to stimulate further creativity.

I conducted three Transcendance workshops with a total of 12 participants, a mix of PhD students (mostly

3 <http://en.wikipedia.org/wiki/Pictionary>

4 http://en.wikipedia.org/wiki/Snakes_and_Ladders

Distracti-Bin Evolution



Figure 4: Mobile device bin as drawn by workshop participant



Figure 5: Mobile device bin as built by workshop participant



Figure 6: Advertising concept for Distracti-Bin design fiction (see Table 1 for attributions)

non-religious) and local-area friends, mostly from the Newcastle Unitarian Church (a faith tradition that supports people in finding their own spiritual paths). All participants knew of my research topic and were interested in participating. The workshops produced roughly 70 ideas. I began further exploration by developing two of them into design fictions.

Design fiction is a means of exploring how the technology future might look. Science fiction writer Bruce Sterling, a leader of the movement, defines design fiction as “the deliberate use of diegetic prototypes to suspend disbelief about change” [18]. A *diegetic* fiction about a prototype includes not only the artefact but also “the fictional time, place, characters, and events which constitute the universe of the narrative” [15].

Techno-Spiritual Design Fictions

I augmented some of the workshop ideas to add more information from the interviews, then converted them to design fictions to facilitate further exploration. Let’s look at two examples.

Distracti-Bin

This idea drew on the game-board space of the “being indoors” context and on experience cards for *perceives nothingness, feels curious, feels watched, and experience is mystical*. Figure 4 and Figure 5 show the participant’s drawing and low-fidelity construction, respectively, of this idea. From the interviewee desires for techno-spiritual enhancement I identified five that seemed relevant: focus the mind, tune out distractions, a message of welcome, time management, and a reminder for spiritual practice. I thus added several features: a welcoming voice inviting them to bin their distractions; electronics to block telephony and wifi

signals; a keyboard for entering details of the consignment; and the ability to accept paper, to allow people to let go of their worries for a while. Figure 6 illustrates an advertisement for a Distracti-Bin in context, decorated with leaves and showing people consigning devices and worries to it.

The Distracti-Bin is a somewhat practical idea, one that we can well imagine might be buildable with current technology. It directly addresses stated user needs — in fact, removing distractions and aiding mental focus appeared among the most commonly mentioned interviewee desires for techno-spiritual enhancement.

Pilgrimage Perspectivator

This idea drew on the context of “being outdoors” and on cards for *perceives out-of-body, feels quiet of mind, feels curious, experience is heavy/weighty*. In the drawing (Figure 7), mind links with cameras and transmitters connect the remote pilgrim to the object of the pilgrimage (Mt Fuji) and to a bird soaring overhead. The person can feel the worship of the approaching pilgrims and the detachment of the birds-eye view.

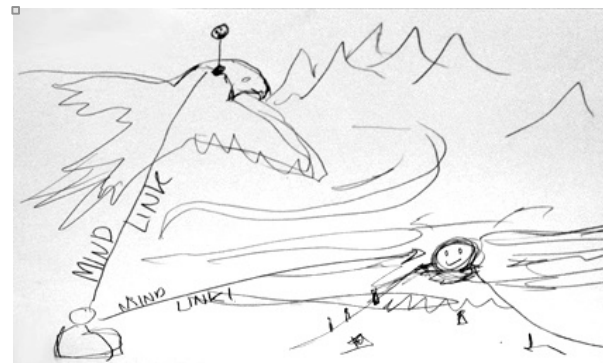


Figure 7: “Being the Mountain” participant drawing

Other Workshop Ideas

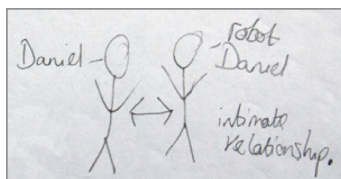


Figure 9: “Robot Daniel”, a robotic clone that provides Daniel a spiritually intimate relationship

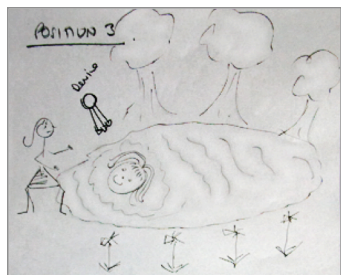


Figure 10: “Divine Mirror Lake”, which projects a spiritually meaningful reflection of the visitor



Figure 11: “Symbol Path”, a trail along which glowing symbols appear as the person approaches and fade as she passes

To this participant’s idea I added a third mind link, to connect the user with individual pilgrims and provide yet another perspective of the pilgrimage. I identified four interviewee desires that this idea might address: detach from body, remove distractions, give a sense of place, and enhance/alter senses. The Pilgrimage Perspectivator design fiction (Figure 8) goes considerably beyond the “Pilgrim Trail” system that Blythe and I conceived [2] for the CHI’14 workshop on design fiction [13].



Figure 8: Advertising concept for Pilgrimage Perspectivator (see Table 1 for attributions)

The Pilgrimage Perspectivator is fanciful and does not presume to solve any problem. It helps ask questions about the nature of pilgrimage and how people might experience it in ways that differ from the traditional.

Other Ideas from the Workshops

Many other ideas, both practical and fanciful, emerged from the workshops. Figures 9 through 11 show participant drawings of three of them.

Discussion

Games can help stimulate creativity by creating a space where the rules of ordinary life are replaced for a time with the rules of the game, and the players enter the space with a shared goal in mind and an agreement to play according to a set of predefined interaction rules [11]. The Transcendance design aimed to balance analytical fidelity with rule simplicity, so that the game would yield design ideas based on interview data while also being fun to play. I argue that Transcendance created such a space. The workshops produced roughly six ideas per player, and one group said they enjoyed it so much they would play the game again just for fun. Lessons from the design and application of this game offer opportunities for others working in design spaces involving experiences that are difficult to describe, discuss, and design for using “classic” HCI methods.

Future Work

Both the interviews and the Transcendance game workshops produced a wealth of data and ideas that can feed into future work. The interview data are rich and complex, promising many insights.

Additional design ideas can be developed into design fictions, and some can be fleshed out and studied by the “imaginary abstracts” technique [1, 3]. Imaginary abstracts “summarize findings of papers that have not been written about prototypes that do not exist” [1, p. 703]; they aid our understanding of what research questions a prototype might address. This can help us decide which ideas to prototype for further study.

Finally, a Transcendance-type game may help us explore how techno-spiritual design can contribute to other areas of life, such as well-being and creativity.

Table 1. Image Attributions

- *Attributions for Figure 6, Distracti-Bin*
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- Mt Fuji © TANAKA Juuyoh (田中十洋), CC BY 2.0
 - Blow hair dryer © Luca Volpi, CC BY-SA 2.0

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