

See discussions, stats, and author profiles for this publication at: <https://www.researchgate.net/publication/261698097>

# Digital Spirits: Report of an Imaginary Workshop on Technologies to Support Religious and Spiritual Experience

Article · April 2014

CITATIONS

3

READS

108

2 authors:



[Mark Blythe](#)

Northumbria University

105 PUBLICATIONS 1,716 CITATIONS

SEE PROFILE



[Elizabeth A. Buie](#)

Northumbria University

37 PUBLICATIONS 147 CITATIONS

SEE PROFILE

Some of the authors of this publication are also working on these related projects:



Transcendhancement: Design Games and Design Fictions for Technology to Enhance Transcendent Experience [View project](#)

All content following this page was uploaded by [Elizabeth A. Buie](#) on 17 April 2014.

The user has requested enhancement of the downloaded file. All in-text references [underlined in blue](#) are added to the original document and are linked to publications on ResearchGate, letting you access and read them immediately.

---

# Digital Spirits: Report of an Imaginary Workshop on Technologies to Support Religious and Spiritual Experience

## Mark Blythe

Northumbria University  
Newcastle upon Tyne, UK  
mark.blythe@northumbria.ac.uk

## Elizabeth Buie

Northumbria University  
Newcastle upon Tyne, UK  
elizabeth.buie@northumbria.ac.uk

## Introduction

The scope of HCI has broadened considerably in the last decade to include concerns with experience, emotion and aesthetics. A small but growing body of work studies the role of digital technology in supporting religious and spiritual practices and experiences. Addressing such sensitive topics presents many challenges, both in understanding the practices being

Permission to make digital or hard copies of part or all of this work for personal or classroom use is granted without fee provided that copies are not made or distributed for profit or commercial advantage and that copies bear this notice and the full citation on the first page. Copyrights for third-party components of this work must be honored. For all other uses, contact the owner/author(s). Copyright is held by the author/owner(s).  
CHI 2014, April 26–May 1, 2014, Toronto, Ontario, Canada.  
ACM 978-1-4503-2474-8/14/04.

supported and addressing them in design.

Before making a research prototype, one needs a clear idea of what research questions it could potentially address. This paper presents six fictional HCI studies considering a number of approaches to the topic. The studies are presented as “imaginary abstracts”.

Imaginary abstracts summarise papers that have not been written, about prototypes that do not exist [1]. This collection comes from an imaginary workshop, an event that did not occur, about technologies designed to support religious practices and spiritual experiences.

## Author Keywords

Design fiction; imaginary abstracts; techno-spirituality.

## *Imaginary Abstracts*

### ***Unworldly Goods: Supporting religious and spiritual practice through eBay roulette***

Hank McPhearson. University of Texas. USA

There is increasing interest in computing technologies which support religious or spiritual practice. This paper describes “Unwordly Goods”, a system designed to help affluent Christians follow the teaching that they should

sell all of their possessions and give their money to the poor (Mark 10:17-31). It was also designed to support Buddhists who wish to turn away from the material world of Samsāra and free themselves from desire. To use Unwordly Goods, users enter a list of all of their possessions into a database; the system then makes a weekly selection from the list, places the item for auction on eBay and donates the money raised to a charity of the user's choice. We recruited ten people who self identified as either Christian or Buddhist to use the system for one month. All but two dropped out of the trial before it ended. Like the rich man who "went away sad" after Jesus told him to sell his goods, six of the participants withdrew from the trial as soon as an expensive item was sold at auction. The duration of participation correlated with how long it took the system to select an item worth more than \$100. Two participants gamed the system by listing only inexpensive items and both dropped out of the trial before the end. One participant completed the trial but argued that the system was simply a novelty which trivialized religious life. One participant was, however, extremely enthusiastic about the system and requested to continue using it after the trial ended. The paper argues that the challenge of designing apps to support religious practice are far from merely technical.

***How evil am I? Field trials of the Evil-O-Meter.***

Debra Ogilvy, Ian Lassiter, Saleem Rushdie, Jack Campbell, Lakysa Gitajoy, John Hendersen, Eugene McCarthy, J.B Entwistle. Leon Uruguay, Henry Dulcimer and Anton Fig. Massachusetts Institute of Technology. Cambridge, MA, USA.

An increasing number of apps offer educational material on world religions. This paper reports findings from a

"critical design" field study of the "Evil-O-Meter", a web and Android app which produces a score from one to ten (with one being low and ten being high) for how evil a user is according to five world religions. Users answer a series of questions to determine their score for Christianity, Judaism, Islam, Buddhism and Hinduism. The app begins with core values identified as common to the texts of each, e.g. prohibitions on murder, lying and theft. It goes on to ask questions where religions and interpretations of religions diverge, e.g prohibition on homosexuality or divorce. Four hundred people responded to recruitment via Amazon Mechanical Turk and used the app. Their scores were normally distributed and the mean was 5.6 on the Evil-O-Meter. After receiving their score, participants were asked to reflect on the app in an open-ended question. 27% of the users completed this question and responses ranged from amusement and interest to serious offence (particularly amongst participants who self-identified as Muslim or homosexual). There were also significant difference in responses by gender, with men more likely to find it amusing and interesting and women more likely to find it offensive. The paper argues that designing apps for education in such contested contexts is an inherently political act.

***Pilgrim Trail: Presence and absence in religious pilgrimages***

Patrick Piecemuller, Molly Bloom and Fr. Tim Brown. University of East Anglia, UK

The act of pilgrimage figures heavily in a number of religions. This paper describes "Pilgrim Trail", a website and mobile app designed to enable adults who cannot make a pilgrimage in person to join one remotely and experience it in spirit with those who are there in the

flesh. The person uploads a photo as an avatar and searches for forthcoming group pilgrimages on the basis of religion, geography and/or date. Once the person has joined the pilgrimage, the system depicts the pilgrims' progress from beginning to end. It enables the person to participate in group activities remotely and to share thoughts and feelings with other pilgrims.

We chose two types of pilgrimage for testing, a Hajj to Mecca and a Camino de Santiago walk, and recruited one tour operator of each type to provide the venues for the in-person side of the system. To help us test the remote participation we recruited six Muslims and six Catholics, all in their eighties. We chose these two pilgrimages because they differ in three ways — choice, movement and duration. The Camino de Santiago is a *voluntary* pilgrimage that involves *walking miles* (perhaps hundreds) over *weeks or months* along one of the many hiking routes from Spain, France, Italy and Portugal that lead to the city of Santiago de Compostela in northwestern Spain. The Hajj is a *five-day* annual gathering of Muslims *in the holy city of Mecca*, *required* by Islam for every adult Muslim who is physically and financially able, at least once in his or her lifetime. For the Camino we chose the one-week route to minimise the time required for the testing.

Six of the remote participants felt inspired and moved, grateful that they could participate in some way in an act that was so important to their spiritual lives. Five people said they felt more remote from the pilgrimage rather than closer. The ability to see the sites on route and speak with the people there emphasizes rather than diminished their sense of not being there. One person dropped out, describing the experience as completely artificial. The paper suggests that a

successful experience with online pilgrimage may be influenced by characteristics of the pilgrimage itself, such as choice factor, nature and length. Future work will delve more deeply into differences in people's subjective experience with the different types of online pilgrimage.

### ***Ganesha Me: Learning Hindu stories via role play***

Ulrich Rhode, Sonia Noren and Jan Eric Llarson. Mobile Life, Sweden.

Stories of holy figures abound in sacred texts, and many digital versions, including interactive apps, are available in Apple's iTunes App Store [2] and Google's Play Store to aid in teaching these stories to children. This paper describes "Ganesha Me", an app for smartphones and tablets, designed to draw kids into the stories by including in each an avatar of the child user allowing him or her to accompany and interact with the holy figure as the story unfolds. The child can choose from a set of pre-existing avatars, customise one of these to suit or upload a photo from which the system will create the avatar. We recruited ten families with a child between the ages of six and ten, and we asked them to have the child use the app for at least half an hour three days a week, for 30 days. Two families dropped out of the trial after the first use because the parents felt that the depiction was sacrilegious. Two families reported that their child was unable to get into the story because they found it incredible that they could be with a holy figure. The parents of five children reported that their child became very engaged with the stories and learned a great deal about the holy figures, although in two of these five cases the parents felt the app was too engaging because it was drawing their child into the story itself

and away from reverence for the holy figure. The paper argues that engagement and suspension of disbelief are different for different children.

***Divinitarium: designing the impossible***

Susan Phillips, Yann Scruton and Jacques Erige.  
Microsoft Research, Cambridge, UK

Many people self-identify as having had a spiritual experience, although they define and describe it in many different ways. Not all of them necessarily connect it with a religion; many cite nature or music as the source. This paper describes the “Divinitarium”, a system that provides a planetarium-like environment to surround the user with sights and sounds that people commonly describe as aspects of their spiritual experiences. The user reclines suspended in a sling like that of Sonic Cradle [3], with a hemispherical screen above and around them like that of a planetarium, onto which images are projected to give the impression of being immersed in the environment that the images portray. The audiovisual environment uses sounds and images associated with the setting chosen by the participant: a forest, a wildflower meadow, a beach, the night sky, a stone circle or a worship space in one of the religions (church, mosque, synagogue, etc.).

We recruited ten adults, one each of Protestant, Catholic, Jewish, Muslim, Hindu, Pagan/Wiccan, Buddhist, Humanist, Atheist and Taoist faith (or non-faith) traditions. The sample was mixed in gender. We settled each person in the Divinitarium and asked them to choose an audiovisual environment. Each test lasted 30 minutes unless the person asked to end it sooner.

Four of the participants chose initial environments that reflected a worship space from the faith tradition they had listed on their recruitment; the rest chose a variety of other environments. One of the participants fell asleep during the test; one ended it after just a few minutes, saying it was quite frightening. Three participants described sensing the presence of a deity, and one of these people had a vision of that being. One participant saw an angel. Six participants reported feeling powerful joy or happiness; three reported physical reactions such as tingling or feeling warm. One person said the “contraption” was very interesting but “didn’t do anything” for him either spiritually or emotionally. This paper argues that such a system can facilitate spiritual experiences for people of many different faith traditions but this experience is a gestalt of what the system provides and what the user brings.

***Soul Food: experiences of the Choral Microwave.***

Leonard Rigby. Poppleton University. UK

Congregational singing is an aspect of religious life which many housebound people miss when they are no longer able to attend their place of worship. This paper reports findings from a pilot study of the Choral Microwave, a device which plays recordings of hymns from local church services to housebound members of the congregation. The device selects recordings whose lengths correspond most closely to the timer setting, with shorter or longer hymns played for different cooking times. An “Amen” sung in four-part harmony replaced the traditional “ping” or “beep” which signals that the machine has finished. The microwave was deployed for three weeks in the homes of three older people who were not able to attend their church. We found a strong novelty effect where participants found

the machine engaging at first but interest soon dissipated as hymns were repeated. Interest was renewed when the recordings were updated, but not to the extent of the initial response. None of the participants reported any spiritual or religious engagement with the device. Although it provided access to the hymns it failed to convey any sense of presence or liveness. This paper argues that these qualities are crucial requirements for supporting communal religious practice.

### *Discussion*

The papers generated some interesting discussion on both technological and theological questions. The proceedings were dominated by three guest participants, Rabbi Aleichem, Fr John O'Connor and Imam Salik. The meeting was interrupted, however, by a group describing themselves as the "Moderate Muslim Majority" who were offended by the Evil-O-Meter paper's representation of Islam as homophobic. The imam, the priest and the rabbi welcomed the protesters

and gave them tea and biscuits. The protesters joined the discussion in quite a friendly way but remained unhappy about the publicity the Evil-O-Meter had received in the Daily Mail and other Islamophobic tabloid newspapers.

The events and discussion during the workshop indicate the difficulty of addressing this kind of topic but also the value of attempting to do so.

### **References**

- [1] Blythe, M. [Research Through Design Fiction: Narrative in Real and Imaginary Abstracts](#). (2014)
- [2] Buie, E.A., and Blythe, M.A. Spirituality: there's an app for that! (but not a lot of research). *Ext. Abstracts CHI 2013*. ACM Press (2013), 2315-2324.
- [3] Vidyarthi, J., Riecke, B.E., and Gromala, D. [Sonic Cradle: designing for an immersive experience of meditation by connecting respiration to music](#). *Proc. DIS 2012*. ACM Press (2012), 408-417.