Talking about interactions: Eliciting structured interaction stories in enduring product experiences

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Abstract

In this paper, we first address the problems of assessing full sequences of interaction episodes that lead to/are followed by enduring product experiences. Enduring product experiences are dynamic experiences that occur towards the same object, in person-product relationships, through a (relatively) long period of time. The appraisal of these sequences of interaction episodes allows the assessment of information that is envisioned to be valuable to designers who are concerned with designing for experiences.

To aid the assessment of interactions linked to enduring experiences, we propose the development of a manageable tool, envisioned to (1) sensitize (inform) participants in research about interactions that may be associated with product experiences, (2) impose a structure to stories in order to (a) easily identify interactions, (b) avoid unneeded data and (c) facilitate the systematic assessment of interactions and experiences.

Here, through a succession of iterative exploratory studies, we present the first three phases of the development of the Experience Interaction Tool (EXIT).

Conference theme: Usage & Interaction

Keywords: Interaction; Product Experience; Enduring Experiences

Introduction

The *pleasure* of touching the soft surface of a table top, the *desire* to own a videogame console that has just been released, the *admiration* over a silent vacuum cleaner, and the *contempt* felt when looking at a pretentious chair design: we have experiences while interacting with products. Product Experience refers to these affective experiences involved in human-product interaction. It is the "entire set of effects that is elicited by the interaction between a user and a product, including the degree to which all our senses are gratified (aesthetic experience), the meanings we attach to the product (experience of meaning), and the feelings and emotions that are elicited (emotional experience)" (Desmet & Hekkert, 2007, p. 160). Interaction between people and products is a key aspect in understanding experiences (Forlizzi and Battarbee, 2004). For long, designers have tried, often intuitively, to incorporate experiences in their designs. In order to design for experiences, designers have also been trying to "better understand the principles of how people interact with various types of artifacts, and how those interactions affect the experiences people have" (Forlizzi & Ford, 2000, p.419). In order to facilitate designers' attempts to 'design for experience' and influence the experiential impact of new designs, design researchers have been investigating product experiences by examining how interactions between people and products lead to certain experiences or are followed by certain experiences. For example, Ludden (Ludden et al, 2008) investigated types of incongruence between seeing and touching products that elicits surprise.

In this paper we first address the problem of collecting all interactions that might be linked to product experience. At this point, we don't know yet which interactions leads to/are followed by experiences. Later, based on the conclusions of a pre-study, we present the problem of assessing interactions that are linked, specifically, to enduring product experiences. Enduring product experiences are dynamic experiences that occur towards the same object, in person-product relationships, through a (relatively) long period of time.

The questions that arise are: how can we understand the dynamics of interactions in enduring experiences and how can we link that to the design of these experiences. In this paper, we focus on answering the first question and report the initial iterative stages of the development of a tool to be used in research with participants. With this tool, we aim to investigate which interactions take place throughout a relationship between a person and a product and their sensible 'contribution' to product experience. The tool is being developed through a succession of explorative studies.

The study reported here is part of a broader research about the (enduring) experience of love in person-product relationships that is currently being conducted. In that research, we investigate

the interrelatedness between person-product interactions and the experience of love that is elicited or followed by these interactions, with the aim of contributing insights for design. This paper contributes to the investigation of how this interrelation can be studied.

Problems in Assessing Interactions

The assessment of interactions that lead to/are followed by experiences can be quite laborious and, sometimes, not even viable.

Experiences are complex

Product experience is "a multi-faceted phenomenon that involves manifestations such as subjective feelings, behavioral reactions, expressive reactions, and physiological reactions" (Desmet & Hekkert, 2007, p.59). Experiences happen in 'a scene of various dynamic aspects' (Jääsko et al, 2004) since they are tangled together and may occur simultaneously. Even the anticipation and remembrance of experiences generate other experiences.

Experiences are difficult to grasp and its complexity does not facilitate the assessment of associated interactions.

Experiences can be of different sizes

Experiences like surprise and irritation are short-lived. They are likely to be manifested (with the same object) during a relatively short period of time in a small number of distinct interaction episodes.

On the other hand, based on earlier research, enduring experiences like love tend to last longer and change through time (Russo, Boess, and Hekkert, submitted). Like interpersonal close relationships (Kelley et al, 1983), person-product relationships are enduring experiences and can be thought of as shaped by sequences of interactions episodes (see figure 1). Interaction episodes are moments in time where a person interacts with a specific product (e.g., buying the product; using the product; cleaning the product).

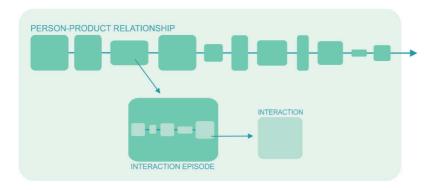


Figure 1 – Hierarchy of interactions in person-product relationships