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How the Ethnography of Communication Provides Resources for Design

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Designing solutions to social problems requires some degree of interpretive accountability to the sociocultural systems in which design solutions must live. Our case studies show how ethnography of communication research generates distinctive resources for design.

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Proponents of design's special contribution to addressing social problems suggest their success derives from the user centered approaches that characterize the areas of service design (Kimbell, 2011a), design thinking (Kimbell, 2011b, 2012), and user experience design (Buchanan, 1992; see many examples in Margolin & Buchanan, 1995; Norman, 2002). These approaches assume that it is essential to learn about the practices, needs, challenges, creativity, and preferences of people, as they interact with products and services, and that such learning requires intentional interactions with the people who will eventually experience direct impact from the designed solution.

To generate information about user experiences, designers have borrowed techniques from social science approaches, including ethnography[1], based on the premise that this way of learning is a key source of inspiration for the design process. Although user-centered approaches have done much to bring user experience into a

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central position in the design of products and services, questions persist about how these findings are used. In practice, these methods tend to be truncated and applied as techniques for the generation, but not the analysis or interpretation, of information.

Designing solutions to social problems requires some degree of interpretive accountability to the sociocultural systems in which design solutions must live. Thus, designs should be more accountable to users, not just as designers see them, but necessarily as users see themselves. When design is taken up as an approach to address problems in unfamiliar cultural contexts, what is called for is a basis of understanding and interpreting the systems of practice and meaning that animate daily life, especially with regard to local understandings of problems and the potential for locally relevant solutions. Thus, we are addressing a need to shift the role of ethnographic research in design away from mere predesign inspiration and toward the building of cultural competency and the intentional design of strategic action.

The Ethnography of Communication (EC) provides a special set of resources to guide the learning designers require. EC is an approach featuring both theoretical commitments and methodological orientations that specifically and explicitly attend to the description, interpretation, and analysis of situated systems of communication, meaning, and practice (Hymes, 1962, 1972; Philipsen & Coutu, 2005). Research generated from an EC perspective provides rigorous, grounded local findings in the form of interpretive analysis. Using such interpretations in concert with creative capacity, as the basis for design solutions, can make designs more accountable to users as culturally situated actors.

We offer two cases in which EC was drawn upon to generate distinctive resources for design. Our first case discusses the Security Needs Assessment Protocol project (SNAP) of the United Nations Institute of Disarmament Research (UNIDIR). The case shows how EC approaches were used as both the theoretical and methodological basis for conceptualizing an approach to conducting United Nations (UN) community assessment missions. Next, following design educators themselves (Kimbell, 2011b, 2011c, 2012), we address design pedagogy and the preparation of designers to tackle social problems. We show how design students can benefit from the development of skills and techniques that will help them to be responsive to the sociocultural systems within which their designs will have impact.

The Security Needs Assessment Protocol

Conducted between 2006 and 2010,[2] the SNAP project began with the basic assumption that the local effectiveness of programming on matters of peace and security could be improved through ensuring that programming objectives and activities were more accountable to local systems of practice and meaning. Therefore, SNAP was organized around two primary objectives: (1) to develop an approach for the rapid generation of programming-relevant sociocultural information that could be conducted within the particular constraints of UN assessment missions in

postconflict contexts, and (2) to develop a procedure for the explicit use of such information in program design by UN staff.

Significant challenges exist to conducting ethnographic work in the operational contexts represented by UN assessment missions. Preparation time is limited, time in the field is abbreviated, ethnographically-trained staff are few, and multidisciplinary, multinational, multilingual teams are the norm. In addressing the first objective of the project, SNAP drew heavily from the approaches and orientations of EC as both the theoretical and methodological basis from which to conceptualize security assessment missions. A grounding in EC was used to guide decisions on what to learn about and ways of carrying out investigations in the field. SNAP created an approach that made use of EC techniques as a facilitation framework for mobilizing the cultural expertise of community members.

One pilot of this approach was conducted in Nepal in 2009.[3] SNAP worked with UNICEF on the articulation of a practical goal to support broader programming objectives for the Terai. UNICEF team asked the question: "How can local capacities be supported to prevent or reduce child involvement in violent activities?" Using the theoretical orientations of cultural discourse analysis (CuDA; Carbaugh, 2007), the SNAP team developed a research agenda around this question. As an initial step, the key terms "local capacities," "child," and "violent activities" were problematized as cultural terms, and indicated as key categories for investigation for the field team. The team was interested in learning the symbols, forms, and meanings active for these terms among community members. The analytic objective was to arrive at, in a short period of time, a preliminary or basic formulation of a cultural discourse around each of the key terms.

EC also provided guidance on how to gain access to the community. Rather than identifying interlocutors on the basis of etic categories, such as ethnicity, gender, or age (as is common practice in many assessment techniques), EC was used in the identification of relevant interviewees based on local notions of communication and persons. The analytic concepts of communication acts, events, and situations (Hymes, 1972), as well as models of sociation and social identities (Carbaugh, 2007) proved useful starting points. Interview guides were produced in a cooperative process through the participation of the whole field team (the SNAP team and local researchers and community members). In addition, fieldwork was conducted to identify locally appropriate procedures for entering communities and to provide guidance on conduct. The findings included information about local terms, categories of persons and practices, a model of sociation describing the network of relationships within which such persons are situated, an attendant model of decision making, and identification of a communication event potentially relevant to the matter of local capacities. On their own, such findings represent an important set of resources with which to design local-level programming and engage in program design in new ways. More importantly, it becomes possible to introduce a new move into the program design process: comparative discourse analysis. Such analysis is the outcome of SNAP's second objective: to develop a procedure for program design by UN staff.

Though a hallmark of the EC approach, the comparative move does not presently feature in the program design approaches typically practiced across the UN. SNAP includes comparative analysis between the agency or policy discourses that shape the programming objectives being assessed and the local discourses learned. In so doing, key areas of disjuncture or overlap, which may be crucial to designing effective engagements, can be identified and addressed. This analysis is in turn used creatively as a primary resource in the strategic design process (Miller & Rudnick, 2010).

Findings of the sort previously discussed create a basis of understanding and interpreting the systems of practice and meaning that animate daily life among communities. SNAP (and other approaches like it) makes these available for use in the design of solutions developed for and in such communities. In this way, SNAP strives to engender a design process that is grounded in a representation of local experience.

Teaching User-Oriented Collaborative Design[4]

The second case highlights a different opportunity for applying EC to design and does so by illuminating the success of using EC to create design research methodology in a project-based undergraduate course.

Students in the course were tasked with addressing local needs related to food security in an impoverished neighborhood through the design of a product, system, or service. Interpreting cultural and communicative ways necessary for addressing such local needs requires a theoretically and methodologically grounded set of practices and skills. Increasingly, design curriculum addresses the development of these practices and skills through the teaching of design research (Roth, 1999), but the research component of design education is often weaker in the curriculum or, more typically, is focused on the practices and skills that increase the capacity to visualize information in order to facilitate idea generation (e.g., Saffer, 2007). In this course, EC was used to develop a methodology for planning, carrying out, and analyzing fieldwork that was to be held in juxtaposition with other methods in the design process.

In a broad and open-ended problem such as food security, EC can help provide a theoretical and methodological basis to conduct user research. Whereas design is well suited for asking how we can represent our understanding of users in order to best inspire design. EC provides answers to the questions "What, and how should we seek to learn about users, in their terms?" In this course, students were introduced to CuDA (Carbaugh, 2007) as a framework for guiding and analyzing interviews and observations in the field. The five modes of inquiry, and primarily the first three (theoretical, descriptive, and interpretive), were employed to guide the students through the development of a research question, the description of communicative practices, and the interpretation of the meanings of those practices. Furthermore, the students developed arguments about communicative practices following typical conventions of ethnographic writing (Emerson, Fretz & Shaw, 1995; Jackson, 1986; Philipsen, 1992) to make direct connections between observations generated in the

field, analytic ideas, and empirically-grounded interpretations. As a result, the students produced written ethnographic reports that sought to answer the research question posed by the student teams. The students used this report as an additional framework that accompanied the visual frameworks traditionally used by designers to visualize fieldwork data (such as personae, interaction narratives, and affinity diagrams; Saffer, 2007) during the design research phase.

The addition of these EC methods helped students in two primary ways. First, they became aware of and were able to describe and interpret the sociocultural meanings as well as the literal meanings of what was being said by the users with whom they interacted. Using the "radiants of cultural meaning"—personhood relationships, action, emotion, and dwelling—they began to develop a more structured way to articulate what they had learned about their users.

Second, students' analytic claims, both in the ethnographic reporting and in their visual design frameworks, were far more evidence-based. In particular, students were able to make direct connections between design ideas and the empirical observations in the field that led to their ideas. A constant feature of the course was to ask students to provide evidence from their user-centered data, derived from direct observation, in support of the conclusions, claims, and designs they were generating. Thus, taking design and EC together, allowed students to move from interpretation to inspiration in an evidence-based manner.

From Inspiration to Interpretation

Whereas van Veggel (2005) articulates the "collisions" that occur between ethnographers and designers because of differences in how research is conceptualized and conducted, we are interested in illustrating the productive value EC adds to design by emphasizing its potential for a stronger role in design. Designers have demonstrated a commitment to user-centered approaches yet still struggle with understanding how their methods contribute to meaningful user-centered interpretations that are grounded in data. Our cases demonstrate theoretical orientations to sociocultural phenomena and methodological techniques grounded in interpretive analysis provide resources for design well beyond predesign inspiration. Our cases show how EC uniquely addresses what is needed for designs that position users as culturally-situated social actors. EC facilitates the development of appropriate user research methodologies, the definition of design goals, the deployment and interpretation of user research, and the design of strategic action, in the form of programs, services, or products. These specific resources EC provides, as they are demonstrated in our cases, are briefly outlined next.

First, EC aids in the design of research methods formulated to build cultural competence. In both case studies, EC was employed to develop methodologies for learning about the local contexts. EC's focus on communication provides a range of ways of thinking about what needs to be known, or known about, in order to engage with local community members who are facing a problem. It provides the necessary knowledge to create community specific research agendas and research methodologies.

Second, EC provides a more locally-grounded, empirically-driven diagnosis of the design goal by influencing how designers understand needs and problems in local terms. Communication is itself a metaphor for social life (Hymes, 1962) and not just a means to an end in the study of language or culture. Communication is expressed and shared, and, therefore, more readily and rapidly observable than internal, psychological beliefs, values and desires. Communication, and the observation of it, provides a conduit, comprehensive but, admittedly, not exhaustive, for learning about individual and communal meaning.

Third, EC offers frameworks and methods for analysis to make sense of fieldwork data. These resources include comparative discourse analysis and the radiants of cultural meaning described earlier. The application of these rigorous analysis techniques yields interpretations of the data that are empirically-grounded and ready to be used creatively in the design of strategic action.

Fourth, designers approach ethnographic work in a solution-oriented way, gradually defining the solution space through fieldwork and the creation of visual frameworks. Whereas designers often lament the nature of written methods in favor of visual creations, or prefer to view written ethnographic description as a precursor to other, more powerful, design methods, we suggest written ethnographic description, that which privileges and displays empirically-driven argument, is a productive framework for interpretation alongside visual design practices. Thus, EC contributes to tried and true design practices by developing situated theories to supplement or build interpretations in design process.[5]

Notes

[1] The incorporation of social scientific methods into design approaches, particularly ethnography, has been chronicled and critiqued (e.g., Forsythe, 1999).

[2] See Miller and Rudnick (2011).

[3] The pilot discussed here was carried out in conjunction with the SNAP research team and colleagues from both Purbanchal University and Kathmandu University. David Boromisza-Habashi also accompanied the team.

[4] The name "User-Oriented Collaborative Design," as well as many elements of the course in the Creighton University Energy Technology Program course described in this case, takes inspiration from a course by that name at Olin College of Engineering (Somerville et al., 2005).

[5] Diggins and Tolmie (2003) provide a model for integrating non-EC ethnography with the generation of design materials.

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