

Extending the Social Identity of Information Systems: Telemedicine Transfer to Sub-Saharan Africa

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ABSTRACT

Although Benbasat and Zmud's (2003) pronouncement of an "identity crisis" within the information systems (IS) discipline has been mitigated in the industrialized world, the authors are concerned that the crisis still looms large in the developing world. The author's objective is to theoretically underpin how the discipline can extend its social presence in developing countries to help sustain life. These arguments are contextualized with an in-depth examination of an area for which information systems research has much to offer: telemedicine. Telemedicine is an information systems intensive method concerning the remote delivery of healthcare. Telemedicine is fundamental to any healthcare solution in Sub-Saharan Africa (SSA)— a capital-starved society, home to 33 of the 48 least developed countries of the world, and suffering from a dire shortage of medical professionals. The social, political, and economic idiosyncrasies of SSA require a different lens to investigate telemedicine to induce social development. This article proposes a research framework for telemedicine transfer in the context of SSA with propositions pertinent to the developing world. The authors draw on thorough implications of this research agenda as a stepping stone to recreate a social identity in developing nations plagued with more immediate concerns surrounding basic human sustenance.

Keywords: Information Systems, Social Identity, Socio-Economics Factors, Sub-Saharan Africa, Technology Transfer, Telemedicine

INTRODUCTION

...Ever since my eye swelled up, I've gone to church three times a week to pray for a cure. As soon as I'm better I'm going back to thank God.

I always knew He would send a way to make me better—I just didn't know that it was going to be from London." Anna Mobutsu, a 23-year-old farm laborer, cannot imagine taking a journey farther than a few hours' bus ride from her home in the small African town of Nelspruit. As an illiterate single parent with a seven-year-old son and an elderly mother to support on R500

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(about US\$56) a month, Anna does not even have a television to introduce her to a world beyond her own. "...But this afternoon I went to London. (Fenster, 2000).

Anna's experience with telemedicine highlights the potentially tremendous societal impact that information and communication technologies (ICTs) can have on people's everyday lives. However, such societal life-changing applications are merely a dream without purposeful and focused attention on the part of those who develop, motivate, and direct the technologies (Mbarika et al., 2005). We believe the information systems discipline can have a major part to play in changing people's lives for the better by extending social benefits of information technology, especially in medicine and healthcare, to the information-starved developing world.

The mettle of information systems has been tested in both organizational and social contexts. Yet, one can argue that the identity within the information systems discipline is at a crossroads. Our social identity is constantly elevated by fresh action or cognition leading to a re-defined self-image (Tajfel & Turner, 1979). While the discipline has strived to establish a "meaningful, resilient identity within the institutions that comprise its organizational field" (Benbasat & Zmud, 2003 p. 183), much of our efforts is still directed towards the specification of academic, social, and organizational commitments in the developed world; the IS community has largely overlooked social development in the developing world. We are yet to carve out a social identity built on the benefits of information technology beyond the borders of the industrialized world (Vessey et al., 2002).

In this article, we suggest the need for extending this social identity to the developing world in dire need of information. In a sense, we argue that IS as a discipline will not gain its intended maturity unless it can export the very social identity that it has so well propounded in developed countries to the underprivileged

many. By extending the reference frame to the world at large, we argue that IS, as any other scientific field, will be able to demonstrate "perpetual and continuous social construction" (Banville & Landry, 1989) as a part of our social responsibility as a discipline. The discipline of IS would remain narrow and restrictive without efforts to investigate social benefits of IS in the developing world.

In the scope of this article, we establish our position as advocates calling the IS community to get involved in research that can help disadvantaged societies benefit from the tremendous potential of contemporary information technology by adopting an information systems approach to address these ongoing problems. We feel that a social identity is fundamental to IS as a community and a discipline. Specifically, we present the case of technology transfer of telemedicine to SSA as a viable example of how this goal can be achieved. By under-investigating such issues, we risk positioning IS as lacking social identity, considered a Western world phenomenon and relegated to organizational basements.

We begin by assessing the current healthcare scenario in SSA followed by asserting why technology transfer of telemedicine is a prudent healthcare option for SSA. We then identify the critical socio-economic and technological factors that influence telemedicine transfer to Sub-Saharan Africa, and by extension, to other developing countries. Next, we deliberate on the need to construct a theoretical platform to address the phenomenon of telemedicine transfer, thus tackling the contingencies and challenges faced by this region, hence extending the work on global IS transfer, adoption, and diffusion. We conclude by offering suggestions for the IS community to help occasionally divert scholarship towards assigning and maintaining a social identity that can strengthen the credibility of the IS discipline.

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