## Decreases in the feeling of loneliness

B. BOUDIN, V. RIALLE, J. SABLIER, L. BEN-AHMED. Decreases in the feeling of loneliness by virtue of ICT-based social housing services: Is it due to technology use or to the contact with evaluators? Gerontechnology 2014;13(2):170; doi:10.4017/gt.2014.13.02.195.00 Purpose The European project 'Smart technologies for self-service to seniors in social housing' (HOST1) aimed to provide easy-to-use technologies and services in social housing flats to facilitate a better quality of communication and to simplify various tasks. The French HOST partner assessed the effect of using the social network application 'HOST Comm' on the decrease in feelings of loneliness after six months of experiments. HOST Comm is a collaborative website where users create content based on their shared interests. Method A touch screen tablet endowed with 'HOST Comm' was tested by 39 people ages 56 to 82 (mean=71; SD=5.7). Given the comprehensive TEMSED approach<sup>3</sup> employed, the data gathering method included a two-hour semi-directive interview at the onset, followed with up to ten semidirective phone calls during the experiment, and a final interview after six months of use. The number of messages sent, resources created and comments posted by the users were automatically recorded, and a score (S) of these activities was computed. Users having an S value above the median value of the entire distribution were assigned to a group called the 'highly active' users (HAUs), while the others were called 'weakly active' users (WAUs); WAU had an S<11. The feeling of loneliness (LF) was measured using the De Jong Gierveld loneliness scale<sup>3</sup> at a baseline and end point. Results & Discussion The user's LF has significantly decreased during the experiment ( $t_{(27)}$ =2.27; p<0.05) (at the onset, it was higher among HAUs). However, contrary to our expectations, despite their use of HOST Comm, HAUs had a significantly lower decrease in LF than WAUs (F(1,33)=5.24; p<0.05; Figure 1). This discrepancy can be explained by the fact that HAUs sent messages without getting responses and thus, WAUs benefited more from the evaluator's presence than the HAUs. These results should be used as a general line of questioning regarding the effects of social networks on feelings of loneliness: Are the effects of the use of ICT based services on LF due to the services or to the contact with evaluators (i.e. a bias)? The important number of interactions between evaluators and users during the experiment was necessary given the important number of effects to be evaluated. Caution must be observed because complex, real life experiments are always subject to bias. Nevertheless, with about forty participants, nearly 120 face-to-face interviews, and almost 400 phone calls, the human experience created by the evaluation task had paramount richness.

## References

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- 3. Jong Gierveld J de, Tilburg TG van. Journal of Cross-Cultural Gerontology 1999;14(1):1-24 *Keywords*: housing & daily activities, feeling of loneliness, ICT based services, social housing *Address*: Laboratory AGIM, Faculté de Médecine de Grenoble, 38700 La Tronche, France *E*: vincent.rialle@agim.eu

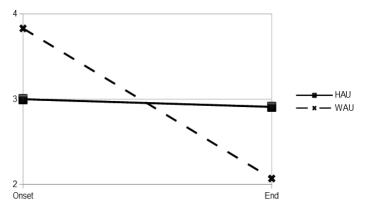


Figure 1. Loneliness score decrease; ordinate: De Jong Gierveld score; abscissa: computation time; T1=onset; T2=end