Seminar abstract

Innovating with data in Scotland; multi-sector and multi-disciplinary approaches to support social equality, wellbeing and participation

Design From/With/By Data

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Focus and argument

The design community have used qualitative and quantitative data to inform the development of products, services and systems for many years. From market analytics to observational analysis, and questionnaires to design probes, designers understand implicitly the need to watch, listen and learn from the data that is gathered by prototypes before, during and after the design process. However, whilst the methods for gathering data have grown to reflect research through design approaches, there has been little classification of the kinds of data that we are encountering in an age of large digital data sets, nor to frame how we design alongside them.

The talk / argument reflects upon a framework for designers that was introduced in 2016 that reflected on methods of working with data, in order to anticipate its ability to transform design processes as its level of performativity increases. This talk recovered kinds of value that data is involved in mediating and then establishes a complexity in which qualitative and quantitative data becomes entangled across social, economic, moral and ethical values. Whilst digital forms of data are often preceded by an assumption that designers should be designing interactions with computers (Human Computer Interaction), the talk encourages a move toward a field of enquiry entitled Human Data Interaction (HDI) (Mortier et al 2014). HDI demands that serious attention is required to address the systems that place stress on conventional ethical and moral models of handling personal data. The talk extended this mantle and proposed that designers play a vital role in the design of future systems in which people, things and computers co-exist in the production and consumption of data.

In order to understand better how to design alongside data, the talk recovered the ablative framework for designing from/with/by data and uses a series of cases studies to exemplify how design is taking place. The framework aims to offer a means of organising both existing methods but also of anticipating emerging methods that recognise the increasing performative qualities of data. The framework is placed within a network society in which designers are working alongside a wide range of disciplines to mediate value within a constellation of stakeholders including algorithms:

- Design **from** data: when systems are designed by people, where they are inspired by measurable features of humans, computers, things, and their contexts.

- Design **with** data: when systems are designed by people, where they take into account the flows of data through systems, and the need to sustain and enhance human values.

- Design **by** data: when systems are designed by other systems, largely autonomously, where new products and services can be synthesised via the data-intensive analysis of existing combinations of humans, computers, things, and contexts.

The provocation of the talk / argument is that by acknowledging the fast-moving nature of data-driven technologies, there are many challenging aspects of being a contemporary design researcher within the SHAPE agenda, and we need new literacies (including the ablative framework) in order that we retain a digital literacy and social values.

References

Mortier, R., Haddadi, H,. Henderson, T., McAuley, D. & Crowcroft, J. (2014) *Human-Data Interaction: The Human Face of the Data-Driven Society*. Available at SSRN: http://ssrn.com/abstract=2508051 or http://dx.doi.org/10.2139/ssrn.2508051

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Keywords

ablative case, design, data