Micro-Processes in Group Decision and Negotiation: Practices and Routines for Supporting Decision Making

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Group decision and negotiation has come a long way from its early days embracing the benefits yielded from technology, for example through anonymity (Jessup, Connolly, & Galegher, 1990; Valacich, Jessup, Dennis, & Nunamaker Jr, 1992), simultaneous contribution (Ackermann, 1996; Kersten & Lai, 2007; Lewis, 2010; Valacich et al., 1992)) etc. These developments recognise the value added for incorporating both qualitative and quantitative modelling thus remaining relevant and rigorous through tackling wicked complex problems and extending the scope of problems addressed such as e-negotiation (Kersten & Lai, 2007), virtual teams (Qureshi & Vogel, 2001; Turoff, Hiltz, Bahgat, & Rana, 1993), multi-organizational teams (Ackermann, Franco, Gallupe, & Parent, 2005), strategy making (Ackermann & Eden, 2011; Eden & Ackermann, 2001) etc. As part of this ongoing development, this special issue aims to explore a particular development that is gaining increasing profile, namely the study of the micro-processes which unfold as groups seek to negotiate towards effective and efficient decisions.

This focus on micro-processes recognises the need to develop an in-depth understanding of what occurs in the context of group decision-making processes, in particular seeking to understand the relationship between the social, behavioural, and the material. As such, micro-processes can be seen as a portmanteau label for a burgeoning stream of different but related research that focuses on practices and routines for supporting decision making in groups. There are many approaches that could be taken in order to understand micro-processes underlying group decision-making, for example a focus on agency. However, this would risk limiting the scope on what comprise micro-processes. Taking a more wideband view allows for emphasis on the connections among the entities involved in group decision support activities, including but not limited to facilitation, negotiation and modelling.

Although interest in understanding group decision support has historically focused on evaluation of the efficacy of group support activities, the current interest recognises that group decision support initiatives, as part of the functioning of organizations, communities, networks, and systems, carry out group decision support processes through a social process that is influenced by affect, emotion and social interactions. Understanding these and other micro-processes when providing group decision support is a required capability of researchers and/or practitioners facing increasingly complex workplaces and non-work situations such as open communities, the subject of a another recent special issue in Group Decision and Negotiation (De Liddo & Concilio, 2017). While regarding micro-processes as important, this should not be at the expense of avoiding looking into the creative process of group decision making. This is where the study of micro-processes is at its best. The challenge is both to retain sensitivity to the creative processes of group decision making and to the social interactions and inter-connections across levels of analysis.

We, the editors, are delighted to have received so many fascinating perspectives on this particular focus – addressing different aspects, adopting a variety of research methods, harnessing a number of modelling

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approaches, and encompassing papers from across the globe. Articles accepted for publication in this special issue represent contributions from the UK, the Netherlands, the US and South America.

It is also of note that there is a wealth of modelling support methods represented in this special issue ranging from Strategic Choice Analysis to Group Model Building, from Cognitive Mapping to Soft Systems Methodology (SSM). This is very encouraging as it not only demonstrates the relevance of these modelling approaches to group decision making but also highlights how researching micro-processes can provide insight into the operation of these approaches.

In taking an overview of the papers in this special issue, there are a number of interesting themes emerging. The first is that the research reported here concentrates on studies where the research has been conducted i.e. it is experiential rather than conceptual. The special issue is equally divided between studies that based their findings on research involving managerial teams, and those studies of student groups using group support. This mixture of the study of real-world groups alongside those able to use control groups ensures reporting research that is not only rigorous but also relevant. For example, the paper from Staggs, Bonito, and Ervin (2018) looking at zero history groups is relevant to promotion panels or appointment committees.

A further theme centres on the role and skill of facilitation. For example Franco and Nielsen (2018) consider formulations in facilitation practice examining the different scripts used to shape and support group working. McCardle-Keurentjes and Rouwette (2018) take a different approach, focusing on the value add of asking question and subsequently exploring the categories of questions. In both papers there is clear benefit to those seeking to research or practice facilitation skills.

Another theme emphasises moving beyond focusing purely on rational decision making i.e. through the use of algorithms or rigorously defined mathematical processes. For example, Burger, White, and Yearworth (2018) discuss research which aims to improve performance in problem restructuring through integrating cognition and affect. In their paper they consider the value added of paying particular attention to the role of emotion which, whilst not new (e.g. (Druckman & Olekalns, 2008; Eden, 1993; Martinovski, 2010)), has not been examined in depth and their argument regarding the efficacy of paying attention to affect/emotion on creativity provides an interesting lens (Kelly & Barsade, 2001). Moreover, this work suggests a potential tension facing those designing workshops as group decision and negotiation support systems that are strongly supported by technology (and so benefiting from, for example, anonymity and simultaneity) risk paying too much attention to the rational world as the technology-less techniques support play and creativity, which act as a scaffold for cognition.

As noted earlier, the papers in this special issue reflect research endeavour which extends the remit of existing modelling methods. Todella, Lami, and Armando (2018) explore the use of Strategic Choice Approach in architectural design, paying particular note of physical properties and the need to attend to many stakeholders. There is clear harmony in the application as the design process demands continuous negotiation as part of the stakeholder management but adds to the mix the importance of including physical space.

The consideration of divergence and convergence in group decision making is not new, however Staggs et al. (2018) provide additional insight. By exploring zero history groups better understanding is gained regarding the requirements necessary to support groups needing to get to convergence in a timely manner. Their paper also considers convergence requiring both cognitive and behavioural elements.

Verhulst and Rutkowski (2018) discuss the 'imbrication' between human and technology agency in the decision-making processes of a police force. The idea of affordance is that the use of models that instantiate thought may supply certain enduring material aspects which may play a special role in enabling the group to possess a given shared understanding of their state of knowledge about a situation.

In the last paper of this special issue Velez-Castiblanco, Londono-Correa, and Naranjo-Rivera (2018) provide a rich case study describing a novel approach for understanding micro interactions in group decision processes. They combine ideas of the use of a 'boundary object' (Carlile, 2002), that is mediating communication between participants, with language games. The approach helps to visualise conversation structures within group processes underlying macro outcomes.

In exploring the micro-processes of group decision and negotiation the papers in this special issue reflect on a number of recurrent themes that have appeared in the journal such as facilitation and how technology assists decision making processes. It is clear that research into micro-processes needs encouragement given the insights they afford and is boundary spanning at the intersection of the technological assistance to human creativity and emotional engagement in decision making. The purpose of investigation into the micro-processes is not to replace the human elements by technology but to understand their mutual agency. According to structuration theory, this is getting the balance between technology having an impact on what we do, and what we do having an impact on the technology (Orlikowski, 2000).

There is clearly a need to find the trade-offs between the apparent rationality of algorithmic and automated decision making with the creative and emotional qualities that humans bring. Emotional commitment to the actions arising from a group negotiation is as important as cognitive commitment (Eden & Ackermann, 1998). Whilst precision is necessary, so too is human judgement. Negotiation requires a degree of equivocality else there can be no emotional engagement and attachment with the outcomes. Technology assists us in managing and analysing data in sufficient detail to enable implementable decisions. What makes the special issue stand out is the manifest belief that when leaving decision making to algorithms we lose the soft skills, the non-cognitive skills that are always there in the group decision making setting. From the perspective of micro-processes, it is paying attention to these soft elements that is important. Organisations are political cauldrons of shifting coalitions and there is the temptation for decision makers to abrogate difficult decision making to processes or algorithms. Reclaiming the soft aspect of decision making allows individual and collective agency to come to the fore in the messiness of decision contexts. Innovation that leads to more automation means that the softer aspects are side-lined. The articles remind us that we need to pay attention to both the rational and emotional aspects of group decision making and re-evaluate the focus of our research. To conclude, the themes emerging in the articles in this special issue are not new; they restate past debates in different forms and thus the focus on micro-processes offers a new and powerful lens to researchers.

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