

Human Centred Systems: Ethics and Communication “Roboethics Atelier 2006”

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Interaction and social intelligence

- Symbiotic systems and how technology alters our interactions and our capacities for intersubjective co-construction, tacit knowing. (e.g. impacts on human cognition and affect.)
 - Making judgements
 - Coordinated autonomy and collective action
 - Entrainment - coordination and synchronisation.
 - Designing for human-centred performance
 - Ethics - a) self-expression/identity, b) effect upon skills of human social intelligence.

- Grounding in understanding of the communicative situation
- Emergence and movement of paralinguistic pulse periodicities
- Entrainment: coupling of oscillations of 'autonomous' entities/beings (when the rhythms of two or more people become coupled).

Paralinguistic pulse

- Salient phenomenal 'beats'- beat already has phenomenological experience embodied - iconicity/cultural of bodily states (cannot fake these 'beats')
- Emergent beats from interactive structures -accents - points of reference in order to gel the interaction.
- Indicates nature of relations between participants - tells you about the structures through which relating to each other.
- Music (a model) - in order to grasp it you have to engage with it.

QuickTime™ and a
DV/DVCPRO - NTSC decompressor
are needed to see this picture.

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Attempt-Contact

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DV - NTSC decompressor
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Inhibition of Parallel Coordinated Action renders
this surface problematic for collaborative use
Disrupts synchrony and coordination

QuickTime™ and a
Sorenson Video 3 decompressor
are needed to see this picture.

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- *Tacit knowing* is the unspoken dimension of human knowledge, formed in practice (through action/adaptation/negotiation/repair of breakdown), and is essential for skilled communication.
- *Collective action* - achieved through our understanding of the performance of representations of the tacit dimension in our communication - gestures, non-verbal cues, speech, and silence, evident in how we perform with them.
- *RoboeEthics*: impacts on human social intelligence