The fog of work: the necessity for black and white, and grey rules to ensure safe workplace behaviour

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Research Context

In line with the notion of factional approaches to Occupational Safety and Health (OSH), Dekker (2003, 2005) outlined two perspectives on rule development in the workplace, Model 1 (procedure application through rule following) and Model 2 (procedure application as substantive cognitive affectivity). Hale and Borys (2013) developed these notions further outlining the advantages and disadvantages of each.

Model 1: Top-down classical rational approach to formally pass on OSH information.

From this perspective there is 'one best way', which can be dictated by formal procedures or rules. These are devised in advance by 'experts' and imposed and implemented by management. This is a logical and rational approach; both the rules and the consequences of breaking them are explicit. Rules of this type are said to be good for novices and useful when 'golden rules' (key rules or checklists which aid fast working or must not be broken

because of the extreme consequences) are necessary. However, this approach cannot deal with anomalies well, can result in a blame culture and disempowers workers.

Model 2: Bottom up constructionist approach to socially constructed practice.

This approach indicates that a range of behaviours are acceptable within permissible boundaries. In this context workers are experts and apply their experience and knowledge to develop rules. Rulemaking is ongoing and dynamic, evolving in an ever changing working environment. This approach is said to deal better with the ambiguous realities of work. However, there are limitations to this approach, it lacks transparency and can therefore be difficult to audit and problematic for novices. The role of the organisation is diminished and the active management of rules is undervalued.

Dekker (2003) indicates that where there is a focus on Model 1, it results in a 'double bind'. A 'double bind' occurs when there is a gap between procedures and practice i.e. workers can fail to adapt to a problem when adaptation was necessary or workers attempt an adaptation which results in a problem. Rather than seeking to increase compliance, through the application of pressure, organisations should try and understand the gap between procedures and practice, and address competencies which will help workers adapt to new situations. Moreover, Hale and Borys (2013) suggest that a combination of the classical rational and constructivist approaches will enable organisations to manage safety more effectively. They propose a "Framework of rule management", and call for more research exploring how rules are used in practice and ethnographic research in this field.

The research presented here is part of a project funded by the Institution of Safety and Health (IOSH) and involves an investigation of different types and sources knowledge and information in three sectors in an attempt to uncover how workers use procedures, developed from models 1 and 2, and bridge the gap between the two extremes to develop safe practice.

The project

Background

The research outlined here is the result of a multi-disciplinary project which brought together engineers, ergonomists, ethnographers, sociologists and psychologists, entitled "Management of OSH in Networked Systems of Production or Service Delivery:

Comparisons between Healthcare, Construction and Logistics". The project aims to identify what types of OSH knowledge and evidence are in circulation and how they interact with each other in networked organisation. More specifically, investigating how workers interpret the multifaceted information they are exposed to and how this interpretation, in dynamic work contexts, influences their behaviour. The data obtained illuminate how top-down rules (explicit information) and socially constructed knowledge manifest and combine in different types of organisations.

Method

Data were collected from three industries: healthcare, construction and logistics. A combination of qualitative methods (interviews, focus groups) and ethnography were used. Thirty face-to-face interactions were completed for each industry. Interview and focus group inventories addressed: sources of information, the creation of information and rules, the translation and dispersal of information within organisations, and ultimately the enactment of safety within complex working environment. An ethnographer spent 25 days in each organisation and used a combination of methods: observation, visual, interviews, and participant observation in order to better understand the enactment of OSH in practice.

Results

In practice, both types of rule formation occur concurrently, with organisations producing both top-down rules and facilitating constructivist approaches. The working environment influenced the type of approach taken. In controlled environments top-down approaches are more likely; however, in dynamic environments expert workers are given the means to develop their own practices. Workers operate in a hinterland where they use a combination of formal rules and informal learning and experience to determine their behaviour. When

questioned and observed it becomes apparent that workers are often using a combination of top-down, socially constructed and experiential expert knowledge to inform their performance of a given task. For example, delivery drivers use a combination of formal manual handling training, experience, and 'on-the-job' learning from colleagues to manoeuvre goods into customers' homes. Behaviours varied depending on the circumstances, with workers evaluating their course of action having taken account of multiple variables. For example, workers may or may not ask for help lifting a heavy object depending on the proximity and workload of their colleagues – if their colleague is busy or some distance away they will not ask for help, if they are close they will ask for help. Rules are adapted, this is does not necessarily compromise safety, as workers are able to apply their knowledge to adjust to situations. When rules were broken, with resultant negative consequences, evidence of 'the gap' was sometimes found.

Conclusions and Implications

In practice, classical rational and constructionist rule development are conjoined and symbiotic; in dynamic working environments their manifestation is complex with the influence of either approach waxing and waning depending on circumstances. Our data reveal good practice within organisations who manage the transfer of OSH knowledge well i.e. they recognise the value of both approaches and adapt their strategies depending on the job role and situation.