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Personal Agency and Epistemology at Work

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Drawing on studies of learning in workplaces, this chapter discusses the central role of individuals' agency and epistemology to their participation in and learning through work, and the remaking of work practices. Learning through work is proposed as being the process and outcome of a relational interdependence between individuals and the social practices that comprise their workplaces. This interdependence is necessary as neither the social suggestion nor individuals' agency alone is sufficient to secure the learning and remaking of the practices that constitute paid work. The social suggestion (comprising societal norms, practices and values, and their enactment) as manifested by localised workplace factors, is never potent or comprehensive enough to project its intent or secure the faithful and comprehensive transfer of knowledge to individuals, should this be its intent. Therefore, the exercise of personal agency is required to make sense of what the immediate social experience comprising the workplace projects. Moreover, rather than merely being subjected to what is experienced immediately (i.e. in the workplace) and culturally, individuals also exercise their agency in mediating their construction of what they encounter and how they respond to those experiences. Participation, learning and the remaking of work are, therefore, active and personally and culturally transformative.

9.1 Subjectivity, Learning and Work

This chapter discusses the role of individuals' agency and epistemology in the processes of engaging in and learning through work. It proposes that to understand learning throughout working life (e.g. lifelong learning) and

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the remaking of the cultural practices comprising paid work requires bringing to centre stage the role and exercise of individuals' subjectivities and intentionality in engaging with the changing demands of work and working life. Subjectivities are defined here as comprising the conscious and non-conscious conceptions and dispositions that constitute our cognitive experience and shape individuals' gaze: how we construe what we encounter in the social and brute world. These subjectivities are manifested in individuals' ongoing and developing 'sense of self' that guides the degree and intentions of their conscious thinking and acting in seeking to comprehend and respond effectively to what is experienced, as in maintaining personal equilibrium. This formation and transformation of self is negotiated between individuals' personal subjectivities and the kinds of social experiences they encounter through work.

The associated concept of identity has both societal and personal connotations. Socially, there are forms that are associated with individual's identity. Occupations, for instance, provide examples of these, and are socially ordered and valued in particular ways. Identity as a personal concept is aligned with how individuals present themselves to the social world and with which social practices they might aim to be associated. As a product of subjectivity and manifested through a sense of self, personal identity will direct intentional activities.

Learning here is seen as an inevitable and ongoing process that occurs as individuals engage in conscious and non-conscious thinking and acting, inter-psychologically: between the personal and social. Moreover, learning also refers to the personal intra-psychological cognitive legacy arising from individuals' engagement in goal-directed activities. Importantly, both the process and the legacy are shaped by negotiations, acts of recognition, mutuality and orientation between the personal and social. These negotiations emphasise the need to understand and elaborate individuals' subjectivity, identity and intentionality, how these are engendered, exercised and transformed through engagement with work life. Further, as individuals construe and construct what constitutes their work activities, they are engaged actively in re-making work. Given that engagement in goal-directed activities is interpreted, constructed and negotiated, individuals do not merely reproduce work activities they are engaged in the process of actively remaking them. This remaking can comprise attempts to reproduce what others are doing or what is done in the workplace, or transforming those tasks through engagement. In doing so, in the two forms of this remaking both individuals' learning and cultural transformation are held to be products of interdependent relational interpsychological processes (i.e. those between personal and social sources) (Billett 2006). Because the relational nature of this interdependence is

shaped by personal subjectivity, its role needs to be considered in accounts of learning through and for work.

In this chapter, investigations of different kinds of workplaces and workers–and, in particular, the role of personal subjectivity and agency in the processes of learning for work and remaking work practices are used to elaborate these propositions. Billett has identified how working and learning subjectivities are co-constructed through workplace affordances and individuals' participation (2004), and the relational interdependences between these dualities (2006). Smith (2004, 2005) has focussed on the construction of personal epistemologies of those entering employment. The chapter brings together their collective work to discuss the role of personal subjectivity and agency in learning through working life. It draws on studies of learning through work by new employees in a wholesale fruit and vegetable business (Smith 2004), and of year-long studies of workers' engagement in their work practices (Billett and Pavlova 2005, Billett et al. 2005). Four interrelated proposals underpin the case advanced here. Firstly, individuals' engagement with work is premised on a relational interdependence between contributions of both personal and social agency. Secondly, working and learning are synonymous. The processes of participating in and learning through work are the same and coincidental, (Lave 1993; Rogoff 1995) and include the formation and transformation of subjectivities through work and work-learning (Billett and Somerville 2004). Thirdly, this learning is mediated by personal subjectivities: their ways of knowing. What is experienced is premised in their ontogenies (i.e. life histories) and contributes to ontogenetic development. Fourthly, transformations in the workplace are the products of individuals remaking and transforming the cultural practice (Leonteyev 1981) of work, something not separate from or conceivable without individuals' active involvement and agency. It is through these processes that both individual and cultural change occurs. These propositions are elaborated in the following sections through discussions about work, subjectivity and learning.

9.2 Individual Engagement and Relational Interdependence

The process of individuals' participation in paid work comprises the coming together of both the social experience (i.e. what is projected by the social world) and individuals' cognitive experience (i.e. how individuals' perceptions and conceptions are projected and make sense of what they experience). The social experience includes the subtle, yet ubiquitous,

social suggestions that are encountered almost unconsciously in the conduct of daily life. These are pervasive forms of social suggestion that include social norms and practices that individuals are subjected to and represent potentially enveloping social press. They have been conceptualised as habitus (Bourdieu 1991) – the battery of clues, cues and suggestions that aim to guide conduct – or subjectification (Foucault 1979). It is these forms of social suggestion that individuals elect to appropriate, transform, rebuff or ignore (Valsiner and van de Veer 2000). Both close guidance and the more distal forms of social suggestion are generative of a cognitive legacy in the form of permanent or semi-permanent change in individuals: the intra-psychological outcome of learning that reshapes their cognitive experience (Billett 2003). Indeed, Foucault (1979) claims it is how individuals communicate with the social world arises through the discourses and discursive practices of the social. That is, the subjugation to the social is, in part, dependent on the social. This extends to how personal subjectivities are constituted through their engagement in work and, hence, learning and the remaking of work (Billett and Somerville 2004).

The subjectivities of coal miners, for instance, was found to be constituted within a strong hegemonic masculine culture of aggression, competitiveness and risk-taking which was at odds with training in safe work practices (Somerville 2002). The culture of coal mining work is handed down inter-generationally in mining communities. The mines as workplaces are described as "closed communities" where workplace practices are highly regulated by the social pressure of subjugation. Billett (1994) similarly found that these subjectivities shaped how coal miners construed and constructed the mine site's management suggestion of more safety training. The miners claimed that such training was to make miners responsible for mine site safety when it was really the responsibility of management. In another study, the subjectivities of metropolitan delivery drivers were shown to value speed and accuracy as the key indicators of performance efficiency (Smith 2004). Getting complete and accurate orders to customers quickly through a tight schedule of delivery times and difficult traffic conditions meant employer respect and the personal reward of early finishing times. However, changing employer expectations required drivers to engage more in customer liaison duties which they held to be more of a sales role. In part, facilitated by the increasingly standardised use of mobile phones, drivers claimed the importance of their driving and packing skills was being diminished in favour of sales focussed communication and personal relationship skills that they were reluctant to embrace. These instances exemplify the distinct contributions of both the immediate social experience and the exercise of that over time through immersion in a particular culture of workplace practice.

Yet there is interdependence between these individuals' experiences and that of the social world. This battery of social suggestion is experienced in different ways and/or construed differently (Newman et al. 1989). Some coal miners elected to defy the dominant localised culture and work to change it (Somerville 2002). The degree of adherence to mine site cultural practices was not uniform nor wholly shared, no more so than by those workers who were employed as supervisors and those who were becoming supervisors (Billett 2001). The social suggestion or press comprising societal norms, practices and values, and their enactment is never complete or comprehensive enough to secure socialisation: the faithful and comprehensive transfer of knowledge from the social world to individuals. As Berger and Luckman (1966) conclude and Valsiner (1994) proposes, the degree of social subjection encountered in the immediate experience is not uniform or uniformly impelling. Also, Valsiner (1994) and Bhaskar (1998), while acknowledging the breadth and ubiquity of social influence, emphasise the relatedness between individuals' interests and goals, and those comprising the social suggestion. Valsiner (1994) holds relatedness ranges from total involvement to being wholly disengaged. In keeping with this, Berger and Luckman (1966) hold that, "socialisation is never completely successful. Some individuals inhabit the transmitted universe more definitely than others. Even among the more or less accredited inhabitants, there will be idiosyncratic variations in the way they conceive the universe" (1966:24). Moreover, what is proposed as idiosyncratic by these authors is seen here as being the product of individuals' personal histories. These are the products of individuals' selective and interpretative engagement with the immediate social experience and the construction of learning over time (i.e. ontogenetically) (Billett 1998). The exercise of personal agency necessarily mediates individuals' participation and engagement with what is being suggested socially, because that suggestion is never complete or comprehensive enough to be appropriated with fidelity, even if the individual wanted to do so. Consequently, the social suggestion cannot determine how individuals engage in the interpsychological processes. It follows that, rather than being reciprocal, the interdependencies that constitute the relationship between personal and social practices, such as work, are relational. Rather than dualisms they are dualistic: inclusively separated parts of the system between which function processes occur (Valsiner and van de Veer 2000). To avoid confusion, the distinctions between dualisms and dualities warrant being made explicit. Dualisms are "two independent principles", whereas dualities are separate but interrelated principles. It is this very relationship that is at the heart of the ongoing structure and agency debate. Yet, even within theories emphasising dualism there is acknowledgement of both parallel and interactive dualism in the Penguin Dictionary of Psychology,

(Reber 1985:228-29); the Collins Dictionary of Sociology refers to current views emphasising a dialectic interaction between two kinds of things (Jary and Jary 1991:179) and the Penguin Dictionary of Philosophy refers to dualism as 'two-ness' rather than separation (Mautner 1996:152).

The relational nature of this duality is evident in the negotiations between two sets of continuities: workplace practices and individuals' intentions. Firstly, the social practice of the workplace likely affords opportunities in ways directed towards securing its continuity and development or those of interests within it. Workplaces provide opportunities directed towards advancing their goals and practices (e.g. maintaining the production/quality of goods and services)(Billett 2002). However, individuals' participation in the social practices of the workplace is also mediated by their intentions for continuity and development, albeit shaped by subjectivities about cultural or occupational identity. For example, a counsellor was able to transform his work practice, partially afforded by the professional standing of his work and, in doing so, secured personal and professional goals; whereas another worker was constrained by consensus based decision making which denied her the autonomy that the counsellor enjoyed (Billett et al. 2004). In the former, the individual could transform some workplace practices and continuities. In the latter example, the practices constrained both transformation and individual agency. The interplay between these two sets of continuities and the degree of their consonance or contestation underpins the relations that also constitute the parameters for its remaking. Therefore, an instance of social practice, such as a workplace, needs understanding in terms that include: (i) participants' subjectivities and agency: (ii) the goals and continuities of the workplace, including its affordances for participants (i.e. the possibilities for an active role in its remaking) and (iii) the degree of consonance between them.

It follows; therefore, that personal agency is held to be exercised within and through the social practices of the workplace, yet is not necessarily subjugated by them. Indeed, individuals may elect to appropriate and be subjugated by the social suggestion in ways describable as appropriation: the unquestioning construction of what is experienced. In these ways, individuals are always socially related, albeit through their idiosyncratic but socially derived subjectivities (Bhaskar 1998). Any action individuals' agency initiates, including action to transform society, most likely occurs from a social basis, albeit from earlier experiences – that comprised relational negotiations between social (i.e. situational and cultural) and personal (i.e. subjectivities) factors. In this way, bringing the personal to the foreground in conceptions of learning is to consider the interdependence between personal and social forms, including the role of socially-derived, but personally constructed subjectivities. These forms

represent suggestions that may be weaker or stronger dependant on its projection as well as significance to the individual.

Importantly, everyday, individuals engage with or transgress any number of social practices, mostly obliviously, and it is through these engagements that learning arises. This relational interdependence is inherent to and embedded within the simultaneous processes of thinking, acting, and learning at work (Lave 1993; Rogoff 1995) including the formation of identities about work (Lave and Wenger 1991).

9.3 No Separation Between Thinking and Learning

The proposition that there is no separation between thinking and acting and learning finds company elsewhere. The anthropologist Lave (1993) concluded that wherever you encounter practice you also identify learning. The socioculturalist Rogoff (1990) similarly emphasises the central role of participation in learning through the process of moment-by-moment learning or microgenetic development. Within cognitive views (e.g. Anderson 1993), the consequences of individuals' engagement in goal-directed activities are also proposed as being more than engaging in and completing those activities. There is also a cognitive legacy: change in cognitive structures shaped by these experiences (Anzai and Simon 1979; Newell and Simon 1972). So both social and individual constructivist perspectives hold that deployment of individuals cognitive resources (e.g. experience or structures) when engaging in tasks and interactions results in a cognitive legacy (Billett 1996). These and cognitive theories suggest the scope and character of this legacy is likely to be influenced by the novelty of the activity to individuals and the degree of effort they elect to engage in when undertaking the activity (Newell and Simon 1972), emphasising the role of personal intentionality and agency. Hence, these authors suggest that human cognition (i.e. thinking, acting and learning) draws on both personal and social contributions, albeit exercised by individual effort and intentionality. Across a range of industry sectors, (i.e. coalmining, food processing) workers reported largely learning their skilful work through everyday work activity (Billett 2001). Indeed, detailed analyses of the micro-social processes that individuals engage in and their social sourcing of the knowledge in the workplace elaborate this interdependent process of learning through combinations of workplaces affordances and individual engagement (Billett 2006).

Smith (2004) found new employees with no previous experience in the wholesale fresh produce market are initially overwhelmed by the diversity of factors that impact their decisions when selecting product to satisfy customers' orders. Learning strategies employed to

secure the information necessary for successful decisions about product suitability, quality, size, ripeness, flavour, colour and so on, could involve familiar practices of questioning and observing more experienced co-workers. Similarly, these could include observing and understanding the eating habits of co-workers who, for instance, were fond of snacking on raw chilli and would indicate the heat intensity of different varieties and shipments by their facial expressions. Noting this enabled one new employee, despite disliking chilli, to build a strong and reliable knowledge that was directly applicable to his duties. Also, the same kinds of processes lead to correctly reading the mood of the boss prior to necessary interactions with him. By adjusting behaviour and attitude accordingly, employees could avoid potential conflict that might result in dismissal when he was in a 'bad' mood. The boss, with his many years of experience and first hand knowledge of the needs and preferences of customers, was a reliable and authoritative source of information. One new employee would often forego potentially rewarding interactions with him for fear of failing to read him correctly. Conversely for another, more skilled in reading him correctly, through such clues as his demeanour, voice while on the phone and responses to other workers, interrupting the boss with a timely question could mean securing valuable information about a product or customer or occasionally being assigned favourable duties when he was in a 'good' mood. So figuring when and when not to interrupt the boss and how to value the personal habits of co-workers are instances of everyday workplace activities that in part determine access to important social sources of knowledge that are integral to successful performance and participation. Further, and particularly because these workers were new employees unfamiliar with much of their cultural context, they exemplify individual agentic responses to cultural experience that emerge from the relatively independent self, the "primary agent" (Archer 2000) with their established identity and drives to secure their selves as viable. That is, these actions are founded in the personal subjectivities that contend with the distinct social suggestion of the workplace, in this case for these workers, in the effort of securing satisfactory performance to maintain their employment, and also seek advancement.

There is little distinction in these accounts between the engagement in thinking and acting and the process and outcomes of cognitive change referred to here as learning. Importantly, these processes are not reserved for particular learning moments (i.e. significant events) or situations (i.e. those designated for intentional learning – schools). It is a product of everyday conscious thinking and acting as directed to secure personal and social goals. Giddens (1991) refers to individuals seeking to balance what they encounter with their own goals and interests. Similarly, Piaget (1968) and van Glasersfeld (1987) refer respectively to individuals

seeking to maintain their equilibrium or viability with what they encounter. Importantly, this drive to secure the self likely energises and shapes the direction and intensity of individuals' learning (Billett et al. 2005). Given that individuals play an active role in constructing meaning from what they encounter, this suggests that a focus on learning for change, working life, and participation in the workplace needs to account for individuals' sense of self and identity which are both shaped by and shape their agency and intentionality.

9.4 Importance of Individual Agency and Intentionality

Following from consideration of the relational contributions of the individual and the social, the role of personal agency and intentionality is held to be both central and necessary to the relational processes of thinking and acting. Individuals' subjectivities shape the agentic action and its intentionality that constitutes learning and the remaking of practice. The degree by which individuals engage with what they encounter and what learning arises, is in part, person-dependent, because of the uniqueness of each individual's cognitive experience (Valsiner 2000): their pre-mediate experience. This uniqueness arises from the distinct and individual pathways that constitute individuals' ontogenies. So individuals' construction of self is person-dependent, as individual ontogenies and ontogenetic development are idiosyncratic in some ways because their prior experience cannot be the same as others as it is individually negotiated through a lifetime of interactions with the social world. Moreover, as discussed, the social suggestion is never complete (Berger and Luckman 1966) or capable of a uniform effect (Valsiner 1998). Newman, Griffin and Cole (1989) suggest that if such socialisation efforts were effective there would be no need to communicate because socially-derived understandings would be uniformly understood. Further to this, Harre (1995) suggests,

> …personality becomes socially guided and individually constructed in the course of human life. People are born as potential persons, the process of becoming actual persons takes place through individual transformations of social experience. (p.373)

The diversity of individuals' personal histories and vocational pathways, and the process of negotiation they comprise was well illustrated in a recent study of learning throughout working life (Billett and Pavlova 2005). Each of the five participants had had highly varied pathways to their current work role, and reported that their pathways

had influenced how they thought about and engaged in their work. For example, during an interview about his working life, Jim a motor mechanic reflected upon both his and his subordinates' approach to work as motor mechanics. It was a conversation that emphasised the fluctuating relationships among identity, engagement in work and learning. He referred to the enthusiasm of school students' engagement in work experience programs at the garage, and their enjoyment at being allowed to undertake authentic work activities. Initially, first-year apprentices were keen to work after normal working hours putting cars away each evening for which they received overtime and were grateful for both the responsibility and the extra pay. They also willingly accepted responsibility for tidying up the workshop at the end of each day. Yet, as they progressed through their apprenticeship they came to resent these menial tasks and the amount of overtime paid for these additional duties. However, they remained enthusiastic about being given more complex and responsible tasks, such as conducting routine services on new vehicles, albeit under supervision. Later, they were eager to be offered tasks that were more complex than servicing new vehicles or the replacement of parts. As they progressed towards the completion of their apprenticeship, Jim noted that the apprentices were often disrespectful towards and dismissive of more experienced mechanics and were quick to leave at the end of the working day. He put this down to them being ready to move on to another workplace, where they could practice in a work environment different from where they had learnt their trade. So changes in ontogenetic development map changes in relations with the workplace.

Jim noted a time when after qualifying to become a mechanic he questioned whether this was what he wanted to do for the rest of his life. Just a year prior to the interview Jim had decided never to work as a mechanic again. Yet, having tried a few other jobs, a year later he had a job as a supervisor of a large motor workshop. He worked long hours, many of which were voluntary, derived much personal satisfaction and immensely enjoyed his job that included hands-on mechanical work. Other mechanics currently in the workshop had been through this kind of experience and had resolved their dilemmas and reconciled themselves to continue working as mechanics. Not that this was always a compromise. In ways analogous to his own commitment, Jim noted the older mechanics were more likely to be concerned to complete a job before leaving work. It was they, rather than the younger mechanics, who would request overtime in order to complete a job and be concerned about precision and thoroughness in their work.

The energy or agency an individual deploys when interacting with socially derived knowledge is likely to be central to what they learn: how they constitute the concepts and practices they encounter. Different bases

exist for those encounters and what individuals construct. Therefore, how individuals engage in workplace tasks is central to the learning that occurs. This engagement is, at least, in part shaped by and subsequently shapes individuals' subjectivities. As the workshop supervisor, Jim referred to the wavering and changing engagement of apprentices during their indenture and work beyond their apprenticeships. Similarly, hairdressers were quite strategic about selecting the kind of salons that they wish to work in (Billett 2003) and inexperienced market workers quickly identified and developed the particular skills necessary for their preferred aspects of the job (Smith 2004). Some sought to specialise in specific products, such as herbs, while others opted for warehouse management roles. This was associated with their preferred vocational identity as hairdressers and/or their situational identity as task specialists and the desire to practice in circumstances that reflected their self-construction of these identities. These instances provide different accounts of relationships between identity and learning. The mechanics engage in tasks enthusiastically that reflect their evolving identity as mechanics from work experience, through apprenticeship and in their post trade development. The hairdressers were considerate and deliberate in their vocational planning. The market workers selective of where they wished to best position themselves in the minimal options of their work.

These instances of epistemological agency (Smith 2004) – the wilful and effortful mediation of self in context comprise individuals' construal of what they experience (e.g. what constitutes welcomed or unwelcomed affordances), the degree of intentionality in their engagement in those affordances (e.g. activities and interactions) and their construction of meaning, procedures and values. This personal epistemological agency is seen as having two dimensions. Firstly, there is intentionality – that is the focus and direction of the engagement by individuals with what is experienced socially. Then, there is the degree of intensity – priority and potency of the exercise of personal agency. These dimensions highlight the diversity of interests and motivations that personally mediate workers' engagement in their work and evidence personal epistemology as a strong relational base of work and learning practices. Because of this, engagement is not a process inevitably leading to unquestioned appropriation or socialisation. Epistemological agency is the enactment of the personal mediations that in part constitute the relational basis for the participative practices of workers' engagement and learning. This relationship is founded upon the intensity of personal agency (e.g. the interests and dispositions), on the one hand, and the intensity of the social agency (i.e. the kind of affordances that are provided) on the other. These forms of agency are exercised and engaged in constructing the self and learning through work. The mechanics question the worth of their work and whether they

wish to continue to be identified with and engaged in the work of car mechanics. This elaborates a reflective process that characterises the exercise of epistemological agency through work and its basis in the internal mediations of personal and vocational values and motivations developed over time. By contrast, the market workers prioritise more seemingly immediate concerns that characterise their new employee status. The insecurity their relationship with the boss represents and the pressing need for accurate information to fill orders correctly highlight the demands of external mediations of the workplace culture on their exercise of epistemological agency.

In exercising their agency, individuals' actions have consequences additional to the transformation of identity and subjectivities. They also work to remake the cultural practices, interactions and workplace activities that constitute the workplace.

9.5 Individual's Remaking and Transforming Practice

Key issues for cultural practices, such as paid work, are their transmission and transformation over time. Following from propositions advanced earlier, these processes seem not to be achieved through some uniform wave of socially-derived change that propels each new generation of practitioners. Instead, it appears to be a process where individuals actively play a role in remaking, refining and transforming these cultural practices as they construe and construct the everyday work activities in which they engage, confront novel problems and adapt to new technologies and practices. As with learning, work tasks are not performed uniformly and machine-like. How they are enacted includes the subjective experience of workers and the particular ways of engaging in and performing these work tasks. This moment by moment remaking occurs hand in hand with individuals' microgenetic or moment-by-moment development. Leontyev (1981) proposed this process of remaking culture as being a product of individuals' active engagement in and appropriation of particular cultural practices and values. He claimed that "through activity, human beings change the environment, and through that change they build their own novel psychological functions" (1981:195). So, the cultural heritage is remade incrementally, individually and yet in ways that constitute a pattern of change as workers come to confront changes in work activities, ways of working and technologies (Billett et al. 2005). At the heart of this transformation are changing environments, requirements and technologies that are a product of evolving history. Structuralist views suggest that the social determines change and represents the locus of new learning or change. However, other views suggest that it is individuals' actions in shaping responses to

these changing circumstances that is generative of cultural transformation (Leontyev 1981; Valsiner 1998). Hodges (1998), for instance, when faced with practices that were contrary to her values and beliefs, elected to disidentify and withdraw from that practice. There are other examples of workers who elect to participate in and attempt to transform practices that were inconsistent with their values and beliefs (e.g. Darrah 1996). The dramatic experience of an aged care nurse, through a workplace injury, led her to focus upon improving work practices in the industry sector (Somerville 2003). In a mortuary where coronial autopsies are performed, one counsellor succeeded in changing the processes of counselling the next of kin that transformed the operation and practice not only of the counsellors, but also other workers in the facility (Billett et al. 2004). That individual's belief about appropriate counselling, the opportunity to advance his view and an invitational environment in which he was afforded professional standing all contributed to his capacity to transform the counselling activity in this workplace. In small business operators' efforts to learn about the new goods and service tax, it was found that the key factors directing their learning included who was consulted and about what, and the degree of their agency deployed in learning about this new initiative (Billett et al. 2003). The response to this uniform taxation initiative was diverse in its scope, attention and enactment. Even when compelled to conform to particular practices, it was individuals who decided how they would respond which included how they construed and constructed their intents about this initiative.

The point here is that the formation of self: the act of negotiating the kind of crises of identity that Jim the mechanic referred to as well as through everyday events as part of working life are likely to be salient for individuals' learning and their engagement in transformatory events, such as the remaking and transformation of work across their working life. The self both energises and directs the intentionality required for robust learning from events individuals encounter, yet the self can be transformed by these very events. As Fenwick (1998) proposes, the self is not just reflexive of socially-derived subjectivities and practices, it has intentionality that is personally directive. So personal subjectivities can play more than a reflexive role in responses to these events (i.e. what is learnt) and in turn can be reshaped by particularly traumatic events (i.e. formation or reinforcement of identity and even dis-identification).

9.6 Personal Agency and Epistemology at Work

What has been proposed above suggests that rather than being wholly subject to change, individuals are actively engaged in their learning and the

remaking of cultural practices, such as those required for effective work practice. The change or learning that arises from everyday and novel events is associated with how individuals direct their intentionalities and agency when engaging with what they experience through these events. Sitting behind this is the personal subjectivities that direct their intentionality and agency in the process of learning and remaking of work practice and are sources of intentionality, agency and personal identity. Individual experiences in social practices, such as workplaces, will incrementally, and at times, transformationally contribute to changes in their ways of knowing and sense of self (i.e. subjectivity). In this way, individuals' subjectivity both shapes the kind of changes that occur and is itself shaped by events, particularly singularly dramatic events, because it shapes their response to those events. This reshaping of practice and learning is not circular, it reflects the ongoing negotiation between the personal and the social. As Rogoff (1990) suggests, the engagement of individuals in solving novel problems that are generated by culturally and historically derived knowledge is their confronting new circumstances through which culture and cultural practices are remade. So here the interdependence between individuals' agency as shaped by their subjectivities and the social suggestion are necessarily enacted and negotiated in work life. These, in different ways, lead to both transformations of the individual (i.e. their learning including their subjectivities) and the gradual change and transformation of work practices.

9.7 References

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