Perspectives on geography and learning

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Introduction

Geographical perspectives on learning encompass a diverse and seemingly divergent set of literatures. This chapter attempts to outline some of the more prominent ways in which the concept of learning has recently entered debates within the discipline of geography. First, the chapter examines discussions of learning found within the sub-discipline of economic geography. This is represented in the work of key individuals such as Ash Amin (2003), Meric Gertler (2001, 2003), Michael Storper (2003), Kevin Morgan (2004) and, more recently, James Faulconbridge (2006, 2008) and Sarah Hall (2009). It revolves around some core ideas, such as the importance of physical proximity in the production of ‘tacit knowledge’, ‘learning regions’, and the capabilities of knowledge to disseminate over space. A central concern of this literature is the relative importance of face-to-face interaction and exchange for learning within firms.

Second, I consider the links drawn between knowledge, learning and international migration by Allan Williams (2006, 2009). Williams’s work asks whether or not the international mobility of individuals can facilitate and/or inhibit learning through knowledge creation and transfer. Third, the chapter examines extant scholarship on the material spaces in which learning occurs and knowledge is produced and exchanged – such as classrooms, homes, workplaces and laboratories. Educational theorists and geographers are working together to produce new understandings of spaces of learning (such as Edwards and Usher, 2008; and Kraftl, 2006), whilst historical geographers are interested in the role of space and place in the geography of science (e.g. Livingstone, 2003; Powell, 2007; Withers, 2007). This leads me on to a fourth area in which geographers have engaged with ‘learning’ (perhaps more indirectly) and this is around geography and education. Geographers’ recent preoccupation with education has been less focussed on the process of learning per se, and more concerned with eliciting the meanings attached to formalised, institutionalised forms of learning, and the credentials that result from these. There is a significant and burgeoning interest in geography and education, as seen in the work of Tim Butler (2003): Francis Collins (2008); Clare Holdsworth (2009); Kris Olds (2007) and Molly Warrington (2005): to name but a small handful of geographers engaging with this issue. Some of this work makes an explicit link to international mobility and education and could therefore be seen as a useful bridge between these ideas and those of Allan Williams and around learning and migration. What can be gleaned from this brief introduction is that, although ostensibly different, these literatures in fact have a great deal in common, despite a general lack of dialogue between them. They span a range of sub-disciplines, including economic,
cultural, social and historical geography. In this chapter, I endeavour to provide a reasonably comprehensive overview of this. In so doing, I suggest some ways in which they might productively be brought together.

**Economic geographies of learning**

Debates in economic geography around learning and knowledge transfer within and between organisations tend to be polarised around two competing views. On the one hand, there are those who argue that the ability to transfer knowledge – tacit knowledge in particular – has been transformed with the introduction of sophisticated information and communication technologies (ICTs). ICTs have, this argument goes, to a certain extent eliminated the friction of distance and enabled learning to take place over space and between geographically separated places. On the other hand, other writers have stressed the unavoidable ‘stickiness’ of certain types of (tacit) knowledge. Such knowledge is inevitably embedded in social and cultural contexts necessitating face-to-face interaction and, as such, cannot be transferred unproblematically over space, as the first argument would contend. What I have painted here, of course, is an extremely broad-brush account of far more complex debates in economic geography. In what follows, I attempt to give this account some substance.

In 2004, in an article published in *Journal of Economic Geography*, Kevin Morgan described ‘the exaggerated death of geography’. Prevalent, contemporary discourses around globalisation and technological innovation (particularly in relation to ICTs) have, Morgan argues, significantly overestimated and thereby overstated the ‘distance-destroying capacity’ of ICTs by ‘conflating spatial reach with social depth’ (Morgan, 2004: 3). There is no doubt that the growth in communication technologies has enabled information to travel almost instantaneously, unfettered by distance. However, this point of view wrongly assumes that understanding is equally transportable. Understanding (or ‘deep learning’), Morgan argues, necessitates the social reciprocity found in face-to-face interactions. This thinking is not out of line with a more general trend within economic geography – that goes back some years – which describes tacit knowledge as ‘locationally sticky’ (Amin, 2003). Gertler (2003: 96) similarly stresses the importance of ‘sharing’ knowledge within ‘local social networks’. He writes (Gertler, 2003: 95):

> learning involving tacit knowledge transfer, when attempted across major institutional-contextual boundaries, will be subject to formidable obstacles, even in the presence of substantial corporate wealth and resources … . The upshot is that transcending the bonds of spatial proximity may be possible, but it will also be difficult and expensive, because of the fundamentally different institutional environments involved … . Technological fixes and corporate will may not be sufficient to overcome these obstacles.

Gertler (2001, 2003) has contributed significantly to the resurgence of the concept of ‘the region’ in contemporary geography, arguing that socially ‘rich’ and institutionally ‘thick’ geographical regions are fundamental to enabling the smooth transfer of tacit knowledge. In the 2003 Hettner-Lecture, Michael Storper (along with colleague Anthony Venables) discussed directly the issue of physical proximity, where they began with the claim that ‘Face-to-face contact remains central to coordination of the economy, despite the remarkable reduction in transport costs and the astonishing rise in the complexity and variety of information – verbal, visual and symbolic – which can be communicated near instantly’ (Storper and Venables, 2003: 43). Storper and Venables attempted to describe here the specific properties of face-to-face contact, and identify four of these: it is an efficient form of ‘communication technology’; it ‘allows actors to align commitments and thereby reduces incentive problems’; it allows for the ‘screening of agents’; and it ‘motivates efforts’ (Storper and Venables, 2003: 46). In relation to the first of these (an efficient
communication technology), they argue that face-to-face contact enables high-frequency, rapid feedback and the advantages of visual and body-language cues. It is possible, in this context, for the speaker to adjust his or her message ‘mid-flow’ and before it is even done, in order to elicit a different response from the receiver. Such actions are virtually impossible during other forms of (non-proximate) communication. Although I do not have the space to discuss all of these perceived advantages of face-to-face contact here, suffice it to say that there is a great deal of evidence, from research on interactions and co-presence, to suggest the unique properties of face-to-face exchange – essential for effective and successful knowledge transfer and learning.

Morgan’s (2003) defence of ‘geography’, outlined above, was a response to recent counter-claims within economic geography that tacit knowledge is, in actual fact, not as locally specific and ‘sticky’ as it has been portrayed. Rather, ICTs have enabled the transfer of different types of knowledge over space, including tacit knowledge. Implicit in these claims are a critique of the perceived tendency amongst some academics (such as Gertler and others) to valorise unjustifiably face-to-face interactions. Ash Amin (2003): for example, has forcefully argued that relationships based on trust can be established at a distance. He writes: ‘I wish to suggest that relational proximity is also possible in distantiated networks, through mobility and a series of other technologies of contact and translation’ (Amin, 2003: 116). Amin (2003: 124) argues for an alternative view of geography, where ‘nearness’ is not just constituted by spatial proximity, but can also be non-territorial in nature, where ‘mobilities and flows count as more than spaces of transit’. This ‘topological’ definition of geography is ‘made up of organisational networks of varying length and spatial composition [and] network sites of varying intensity of proximate and distant connectivity’ (Amin, 2003: 124).

Thus, knowledge spaces are not simply reducible to spatial proximity (i.e. face-to-face contact). As exemplified in the contemporary multi-national corporation, relational proximity is achieved through such things as ‘trans-lation, travel, shared routines, talk, common passions, base standards, brokers, epistemic and community bonding, and the ordering and orientation provided by files, documents, codes, common software and so on’ (Amin, 2003: 127). These, he argues, are not necessarily achieved through physical spatial proximity.

In this vein, and drawing upon rich empirical data achieved through field work on professional service firms, James Faulconbridge (2006) argues that tacit knowledge ‘can have global geographies when knowledge management practices focus on reproducing rather than transferring knowledge across space’ (p. 517, emphasis added). He considers how learning is ‘globally stretched’ in advertising professional service firms. Like Amin, Faulconbridge (2006: 581) argues that, while notions of the ‘local stickiness of tacit knowledge’ are useful in highlighting the challenges of transferring knowledge within and between organisations, an important alternative view can be found in the work of those who recognise ‘the possibility of spatially stretched learning that operates beyond scale-defined limits’. This latter perspective, he argues, is really about the ‘social production of knowledge’. Notions of ‘local stickiness’ and the possibility of spatially stretched learning in fact indicate two different epistemological stances on learning. There is a difference, Faulconbridge argues, between knowledge transfer and the social production of new knowledge. In conclusion, he argues that ‘globally stretched’ or spatially distantiated learning actually involves the ‘social production of new knowledge’ and not knowledge transfer as it has come to be understood.

In her work, Sarah Hall has attempted to ‘situate business education within broader landscapes of corporate knowledge circulation, production and learning’ (Hall, 2009: 597). She argues that very little attention has been paid to the role of continuing education in the reproducing of global financial systems – business education in particular is increasingly being used in the reproduction of ‘highly skilled’ financial workers (Hall and Appleyard, 2009). Interestingly, from a geographical perspective, it is argued that business education serves to embed ‘investment bankers in particular places and organisational cultures’ (Hall and Appleyard, 2009: 613). There are local and national elements to this embeddedness – a far cry from the ‘homogenisation’ and ‘globalisation’ discourses that have often been used to describe the financial services industries. In terms of situating this work in extant debates within economic geography, Hall
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and Appleyard (2009: 613–614) point to the need to extend ‘analyses of situated learning within firms and organisations to include more formal educational experiences associated with business education’. There are explicit links, here, with the growing body of work on geographies of education, discussed later in the chapter.

**Learning and migration**

As noted above, Amin argues that relational proximity is achieved through such things as ‘trans-lation, travel, shared routines, talk, common passions, base standards, brokers, epistemic and community bonding, and the ordering and orientation provided by files, documents, codes, common software and so on’ (Amin, 2003: 127). His allusion to travel makes implicit reference to work that has attempted to understand the specific role that mobility plays in the process of knowledge transfer and it thereby proffers a critique of the ideas outlined above on ‘learning regions’ and proximity for neglecting the role of migration in learning. Allan Williams, who is perhaps the most prolific writer on this topic, has dealt directly with four related issues: a) whether international migrants act as carriers of particular types of knowledge; b) how migrants contribute to knowledge transfer; c) what determines a firm’s effectiveness in capturing migrant knowledge; and d) the ways in which place mediates migrants’ learning.

In respect of the first and second of these issues, Williams draws on Blacker’s (2002) typology of knowledge, which distinguishes between ‘embrained’, ‘embodied’, ‘encultured’, ‘embedded’ and ‘encoded’ forms. Embrained knowledge refers to cognitive and conceptual skills, whereas embodied knowledge requires physical experience (i.e. practical work in a particular context). Encultured knowledge refers to knowledge imbued with shared cultural meanings and understandings, and embedded knowledge is, as the term suggests, embedded within particular contexts. Finally, encoded knowledge refers to ‘signs and symbols’ found in books, manuals, websites and policy reports. Some of these types of knowledge are simply more transportable than others. Encoded knowledge, Williams argues, is knowledge in its ‘most mobile’ form. Embrained and embodied knowledge are also capable of moving, as they are found within the migrant (what Williams calls ‘corporeal mobility’). In contrast, encultured and embedded knowledge are far less easy to transport as they represent ‘relational knowledge, grounded in the institutionally specific relationships between individuals’ (Williams, 2006: 591). Such ‘settings’ of knowledge are not easily moved.

More generally, Williams argues that the movement of knowledge through migration is perhaps best conceptualised as translation, in recognition of the fact that learning is relational, and necessarily embedded within particular contexts. ‘Migrants’, he writes, ‘have distinctive roles as translators of knowledge …. The notion of translation takes us beyond simplistic ideas about transferring immutable knowledge, and leads to consideration of knowledge creation’ (Williams, 2006: 593). This notion displays clear synergies with Faulconbridge’s (2006) arguments, outlined above. When migrants bring knowledge with them into a new setting, this knowledge will be integrated with other knowledge. There comes a point at which this process leads to knowledge creation, or as Faulconbridge prefers, ‘the social production of knowledge’.

In respect of the third issue raised by Williams (2006: 596) – how organisations are able to ‘capture’ the knowledge brought by migrants – he asks, ‘Where do migrants fit into [a … ] picture of knowledge transfer and learning in firms?’. The answer to this question is partly dependent upon a number of conditions, including: whether or not individuals are moving through intra-company transfers (the opportunities for co-learning are more plentiful under these conditions); whether migrants have sought permanent or temporary immigration; the nature of the employer (e.g. large or small firm); and norms of trust and cooperation within the firm (co-learning occurs in places where these are high). I do not have the space to tackle each of these in turn, so to draw on Williams’s own summary:

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migrants are bearers of knowledge, and those organisations which value diversity as a source of creativity ... seek to maximise knowledge transfers from migrants ... . But knowledge creation and knowledge transfer depend on co-learning, and the latter is mediated, both by the organisation of the firm and by positionalities and social identities.

(Williams, 2006: 599)

The final issue with respect to migration and learning concerns the role of place in mediating migrants’ knowledge. Williams makes several pertinent points here. First, that learning in relation to migrants occurs across work and non-work spaces and between public and private spheres – something not fully appreciated in the literature on learning regions (although see also Amin, 2003). Linked to this, two other perspectives are helpful when attempting to understand the relationship between learning and international migration – ‘situated learning’ and ‘lifelong learning’. In sum, migrants’ immediate learning experiences have to be placed in the context of their personal histories. This draws attention to the ‘whole person’ because, Williams argues, any understanding of the role of migrants in learning has to take account of the knowledge that they have already garnered over the life course. He draws on the work of Beaverstock (1996, 2005), who has examined the role of elite expatriate workers in knowledge transfer and creation within global cities.

Learning spaces

I want briefly to touch upon some alternative geographical understandings of space and place and to indicate how these relate to learning and the transfer of knowledge. Amongst theorists of education, the concept of ‘educational spaces’, defined by Gulson and Symes (2007: 8) as ‘spaces specifically designed with the process of teaching and learning in mind’ have become the focus of recent debate. Specifically, this debate acknowledges the fact that the spaces and places within which education and learning take place are being expanded, developed and in some cases transformed (Ackers, 2010; Dillabough et al., 2007; Edwards and Usher, 2008; Krafill, 2006; Holloway et al., 2010). Advances in technology (particularly the growth of ICTs) and in access to technology have been particularly important in precipitating these changes – learning can and does take place in a plurality of spaces (including homes, workplaces and cyberspace, as well as with the traditional classroom setting). In a somewhat different vein, there is also a substantive body of work examining spaces of knowledge production, particularly in relation to the historical geographies of science. Geographers such as David Livingstone (2003), Charles Withers (2007), Richard Powell (2007) and Peter Meusburger (2000) have been at the forefront of these discussions, arguing that scientific knowledge is produced and acquired in specific geographical sites.

Social geographies of education

Learning, conceptualised as formal education, is also an area in which geographers have recently and effectively engaged. The ‘geographies of education’ literature falls generally into two broad camps – work on ‘locality’ issues, where class-differentiated access to education and ‘choice’ are discussed; and research on the internationalisation of (national) education systems, with a focus on the transformation of higher education and the transnational mobility of students. To begin with the first of these: in 1988, Bondi and Matthews edited a collection of essays on Education and Society. Focussing on the UK, these essays provide empirical, local case studies of the social and political context of educational provision. Of particular interest – providing the context for later work – are the studies examining the ‘social role of education’. This work spoke directly to research on the ‘sociology of education’ (dating from the 1950s).

Garner (1988) draws upon data on 3,000 school leavers in Glasgow in 1979/80 and sought to assess the effects of ‘neighbourhood deprivation’ on individual academic attainment. She uses multivariate and
multilevel data, in order to separate neighbourhood factors from what she terms ‘school factors’ and ‘home factors’. She is critical of earlier attempts to measure attainment, which failed to distinguish between variables relating to individual attainment that describe individuals and ‘those which relate to the properties of the system in which people find themselves’ (Garner 1988: 29, emphasis added). Here is a clear exposition of the importance of geographical context in explanation of individual attainment. Indeed, she was able to conclude that ‘deprivation’ in a ‘young person’s home neighbourhood’ has a negative influence on educational attainment. Since then, a great deal of work (in both geography and sociology) has come to similar conclusions (e.g. Garner and Raudenbush 1991; Gibson and Asthana, 1998; Herbert 2000). In Canada, for example, Harris and Mercier (2000) drew upon data from standardised achievement tests to challenge the assumption that most of the differences in test scores could be attributed to the proportion of ESL (English as a Second Language) pupils. They write: ‘Contrary to much of the speculation in recent public debate … our results indicate that … social class (measured by income and education of parents), and also family situation (measured by the proportion of lone parents) are more important than language background … . Simply put, boards in poorer communities, and schools in poorer neighbourhoods, fair worse than average’ (p. 224). The emphasis on neighbourhoods points to the geographical aspects of their findings. Most of this work emphasises the impacts of immobility (rather than mobility) on educational achievement.

A second and more recent strand to geographical work on education and learning concerns geographies of international education. There is now significant and growing literature on internationally mobile students, studying in locations outside their home country (e.g. Brooks and Waters, 2010; Butcher, 2004; King and Ruiz-Gelices, 2003; Lewis, 2005; Waters, 2006a, 2006b, 2008; Waters and Brooks, 2010). A focus of this work has been the motivations and experiences of international students — particularly their intentions in seeking an ‘overseas education’. What comes to the fore is less the codified or explicit knowledge sought and transferred through study, but rather the embodied cultural capital (after Bourdieu, 1986) acquired through mobility and relocation. In these circumstances, ‘learning’ often includes inculcation in alternative cultural mores (such as customs, ways of communication and style of dress), fluency in a second language (usually English), independence and the development of a general cosmopolitan sensibility. It is clear that, when it comes to international education, the learning that takes place goes far beyond the confined spaces of the class room or lecture theatre, to encompass quotidian practices and the whole of everyday life.

One aspect of international learning with implications for the education of foreign students, on which very little has in fact been written by geographers, is discussed by psychologist Richard Nisbett (2003) in his book The Geography of Thought. In this book, he describes quite profound cultural differences in modes of thought and, thus, learning styles between ‘East’ and ‘West’, with implications for how international students might be better educated and learning styles adapted to their needs. Far more work could usefully be conducted in this area, integrating Nisbett’s claims with research on the (variable) spaces and flows of knowledge and learning emerging from within geography.

**Conclusion**

This chapter has attempted to bring together ostensibly diverse and disparate literatures within geography where geographical perspectives on learning are discussed. I began with a detailed exposition of recent work in economic geography on learning and knowledge. Here, two competing views are clearly apparent. On the one hand, there are those who assert the continued importance of geography (e.g. Gertler, 2003; Morgan, 2004) for understanding how learning within and between organisations takes place. These writers claim that discourses around globalisation, ‘time-space compression’ (Harvey, 1989) and the impact of ICTs have significantly overplayed the possibilities for knowledge transfer (particularly in relation to tacit knowledge) over space. Instead, they argue that learning and the transfer of tacit knowledge necessitates the trust built through face-to-face exchanges in localised or regionalised settings. On the other hand, there is a countervailing view, which suggests that various contemporary routines and practices — what Amin (2003)
lists as ‘trans-lation, travel, shared routines, talk, common passions, base standards, brokers, epistemic and community bonding, and the ordering and orientation provided by files, documents, codes, common software and so on’ (p. 127) – facilitated by technologies, mean that the ‘relational proximity’ needed to share knowledge and promote learning is in fact achievable ‘at a distance’ and is not solely accomplished through face-to-face interaction. Another body of work, which is in many ways directly related to and develops out of these debates, examines the relationship between learning and international migration. Allan Williams has worked extensively on this topic, arguing that the economic geography focus on learning regions and proximity has erroneously neglected the contemporary importance of international migration. Williams’s work allights on four issues in particular: a) whether international migrants act as carriers of particular types of knowledge; b) how migrants contribute to knowledge transfer; c) what determines a firm’s effectiveness in capturing migrant knowledge; and d) the ways in which place mediates migrants’ learning. His particular contribution highlights the need to take seriously individual migrants’ personal, embodied histories and experiences in their abilities to transfer knowledge. Moving on, I then briefly considered how geographers have contributed to new understandings of ‘spaces of learning’ and knowledge production – particularly in relation to educational spaces and historical geographies of scientific practices. The chapter then examined the recent work on geographies of education, which presents a related but generally different perspective on ‘learning’. This is less concerned with the actual knowledge that ‘education’ imparts and more with understanding the meanings (symbolic and material) of formal education in terms of access to and the achievement of academic ‘credentials’ (what Bourdieu, 1984, 1986; has termed ‘institutionalised’ cultural capital). Although far from an exhaustive account of the ways in which geographical research intersects with understandings of learning, the chapter has sought to provide a flavour of this work and has suggested ways in which an interested reader might begin to pursue this further.

References


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