

# **Problem-based Learning and the Development of Capital: What about Knowledge?**

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# Aims of Presentation



- Outline the concepts of human and social capital
- To establish the relationship between forms of capital, changing economies and systems of higher education
- To illustrate how PBL students can accrue both social and human forms of capital
- To illustrate how PBL may hinder the acquisition of specialist professional knowledge

# Forms of Capital

- Economic Capital- the accumulation of money and goods
- Human Capital- accumulation of skills and knowledge through education and training (Becker 1993)
- Cultural Capital- accumulation of 'cultural markers' e.g. works of art, books, academic qualifications- associated with social status- (Bourdieu 1997)
- Social Capital- development of networks, social connections, 'doing with others' (Putman 2000)

# Forms of Capital and Globalised Economies

- Human and social capital -more significant as a consequence of globalised economies
- Globalisation- contested concept- e.g. could imply 'cultural imperialism' but in simplest form it refers to a 'shrinking world' as a consequence of technological advancements and expanding social, cultural and economic activity
- Globalisation- equates to a 'risk society' (Beck) requiring new forms of social networks and skills

# Higher Education, Globalisation and Forms of Capital

- Universities in the UK and elsewhere are instigating changes in response to governmental policies associated with ‘knowledge economies’
- ‘Massification’ of HE in the UK
- Emphasis on transferable skills and skills of ‘life long learning’ that equates to human capital
- Expansion of HE student numbers equals increased competition for jobs and perhaps more developed forms of human and social capital

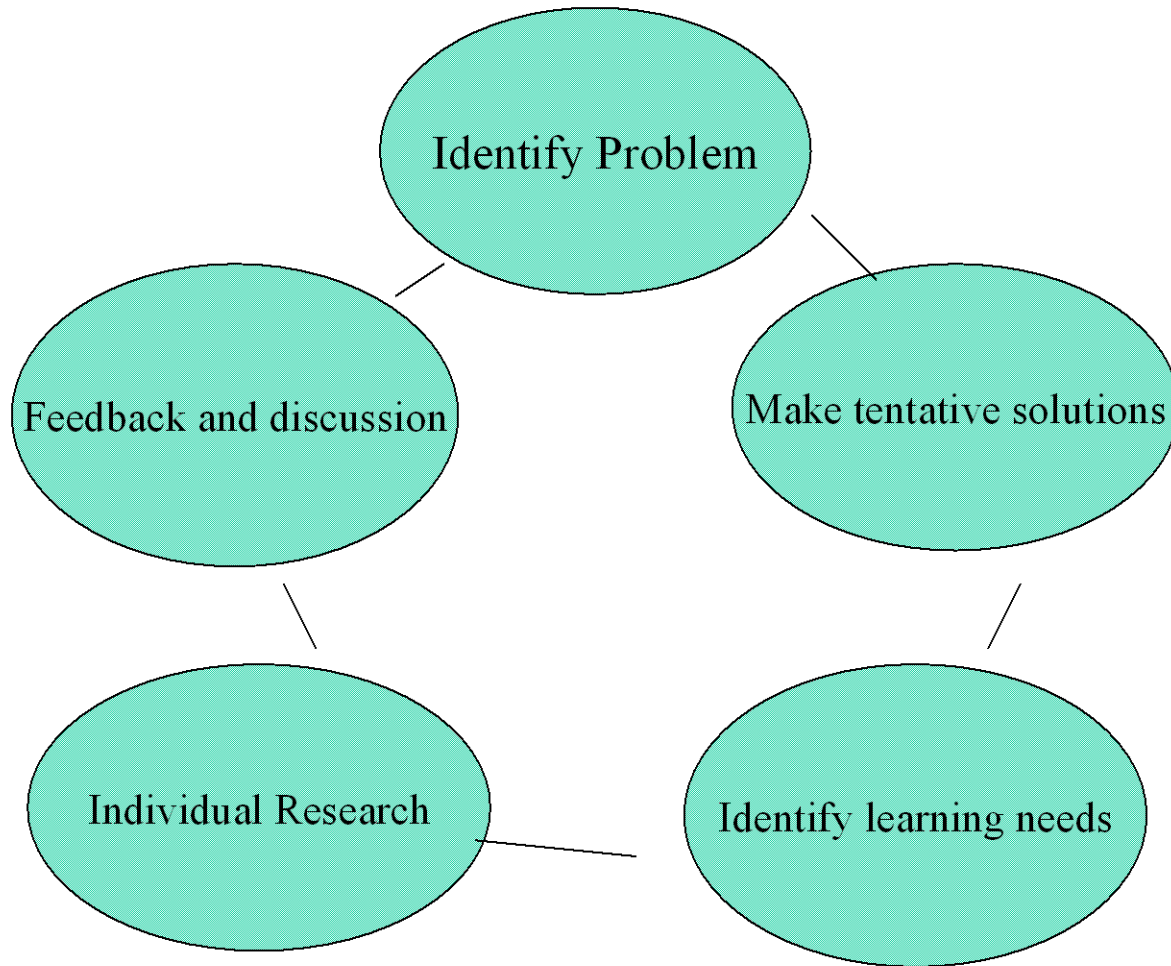
# Problem-based Learning

- Can be defined as the use of problem ‘triggers’ or case based scenarios to drive student’s learning without propositional knowledge.
- Grew out of the McMaster Medical School in Canada in the 1960s as a means to enable students apply medical knowledge to cases.
- Now used on a number of professional training programmes in health but also elsewhere e.g. law

# Key Features of PBL

- Philosophically it draws on adult learning theory (Knowles), humanistic psychology (Rogers) and social constructivism
- Views knowledge as relative and context dependent, and emphasizes process skills over content.
- Students work in small groups and take much responsibility for their own learning
- Tutor acts as a facilitator and does not teach

## The Problem Based Learning Process







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# Occupational Therapy



OTs use 'occupation' or activities to promote health and well being and to help people regain/maintain independence in all areas of their daily life as a consequence of ill-health or impairment.

# The Research Setting



- In the UK, OT education comprises three year (two year post graduate) degree programmes
- Cardiff course uses PBL from the outset and throughout the three years.
- Case studies are used to trigger students' learning
- OT and PBL philosophy share similar characteristics e.g. client centred /student centred, process orientated with context specific knowledge

# Research Questions



- Qualitative study (interviews) with a cohort of OT students asking them to reflect over the three years of the OT programme
- How do OT students determine what knowledge is important for OT practice? Who or what influences this decision?
- Does the students' experience of PBL fashion a particular professional identity?

# Theoretical Framework



- Influenced by Basil Bernstein - on the structuring of pedagogic transmissions and the structure of knowledge (s) was the most useful for my investigation
- Knowledge can be differentiated- **Vertical Discourse** (scholarly knowledge) and **Horizontal Discourse** (local, oral, tacit knowledge)

# Human Capital: Examples from Research

*I think problem-solving is a very important skill and the PBL course makes us very good problem solvers...For me OT is about having the skills and ability to go and look at stuff, having the skills of researching about things. (Kate)*

# Human Capital: Examples from Research

*PBL enables you to understand what OTs do. PBL gives you the skills to work as an OT, like how to manage caseloads and how to work with people. I think it [PBL] will make me a better practitioner. (Fay)*

*My last placement was in a role emerging setting. I felt that PBL was good because I knew I had the skills to find things out, what questions to ask and who to go to, to find out information. (Mary)*



# Social Capital: Examples from Research

Social capital refers to the creation of social networks but also it is about developing a collective, common identity, a sense of 'habitus' (Bourdieu)

***I feel like I am grounded in the philosophies of practice that make you an occupational therapist. I've found that I've internalised those philosophies, it's almost like they are part of me now. (Vicky)***

# Social Capital: Examples from Research

*You need to be caring to be an OT. You need to be client-centred and think about all the things that affects a person's life. How their occupations are affected by their illness. This is something that is learned throughout the course, it is just something that is embedded in you, it is something that is just expected of you. As the course progresses and you learn more, then you become more of an OT. (Joanne)*

# Placement (Horizontal Discourse)

*Placement provides the practical of working with others, and things you can never learn in college like how to order equipment; the practical day to day working of the system like how you are going to deliver the best service to your clients. (Karen)*

# Case studies (Horizontal Discourse)

*We have learned that it is important to understand what the occupational therapist does in practice. In approaching a case study, I might speak to an OT based in a similar setting. I would want to concentrate on what an OT would do to help this person get back as far as possible to his occupations and everyday routines. (Vicky)*

# What about Professional Identity/Unique Knowledge?

PBL seems to encourage what Bernstein (2000) calls, prospective, market orientated identities *possibly* at the expense of unique professional knowledge:

***We haven't any particular knowledge, because I find we take our knowledge from different places. (Susan)***

***I would say your unique knowledge of OT comes from where you are working; it comes from practice and the course. The key is to see how knowledge can be used in whatever setting you are in. (Rebecca)***

# Professional Knowledge (Vertical Discourse)

*I don't feel like we have had a definite period on the PBL course where we have learned about humans, how they use their time and what shapes their time. It's only because of my research project that I have ended up looking into the theory of occupation. (Paulette)*

# Recommendations

- Findings from my research support others (e.g. Savin-Baden 2000, Reeves *et al.*2004) of the kinds of skills and therefore forms of capital that can be developed through engaging in PBL
- More research needed in relation to forms of capital and PBL, particularly the sustainability of PBL skills and networks over time.
- For some health/social care professions there remains of question of unique professional knowledge and whether PBL can be used to promote this.

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