

# The Impact of Academic Beliefs on Student Learning

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## INTRODUCTION

The article makes an attempt to understand the academics' beliefs on teaching and how this might influence their actual teaching methods, thus, informing Technology-enhanced teaching practices. More specifically, the aim is to explore the likelihood of how beliefs of teaching may encourage or even hinder a student-centred setting that aims to put students at the core of Higher Education (HE). The importance of student-centeredness is heavily emphasised in the recent reforms outlined in the Bologna Process Implementation Report (2012) and also included in the European Strategy for 2020.

Six categories of beliefs were identified, represented in terms of lower and higher level categories. The lower level categories set foundation for teacher-centred approaches to teaching, whilst the higher level, lay the ground for student-centred approaches. It is suggested that the last two categories of beliefs should be used as foundation for systematic discussions on teaching, training and the professional development of academics.

## BACKGROUND

In view of the present economic crisis and the rising of youth unemployment there is an urgent need to cultivate a learning culture that requires much closer attention to the different ways in which students learn more effectively, (Leoni, 2011).

In recognition of these challenges and in an attempt to rectify and improve the quality of instruction, the Bologna Process agreement together with the European Strategy for 2020 initiated a number of reforms. One of the overarching objectives of the reforms was the improvement of teaching in HE. This, assumes the development of more flexible approaches that can override

inflexible structures of formal educational practices (Metcalf and Fenwick, 2009; Jütte et al., 2011).

Research in the area of teaching has long been steered mostly from the standpoint of teaching methods. This is because most of the researchers assumed that learning is automatic and occurs as a result of good teaching and so most of the research was focused on developing good teaching skills. As a result educators are very well informed about teaching but noticeably less about learning.

In recent years, research focusing on the academics' point of view or beliefs is considered as equally important, (Kember, 1997; Prosser and Trigwell et al., 1999; Samuelowicz and Bain, 1992, 2001; Åkerlind, 2005; Igwebuike and Okandeji, 2009; Igwebuike, 2011).

In general terms, beliefs have been identified as the conscious or subconscious, perceptions, views and conceptions of teaching, (Thompson, 1992). In practical terms, however, they are understood as the way lecturers go about what and how they teach, (Åkerlind, 2005). Over the past decades, much interest has been generated in exploring the variation of these beliefs, nonetheless, their effect on teaching practices (Kember, 1997) and student learning remains, as yet, unexplored.

The value in investigating teachers' beliefs in relation to their instructional practice is strongly supported in the literature. Brown (2003) provides a convincing argument; that all pedagogical acts "are affected by the beliefs teachers have about the act of teaching, the process and purpose of assessment, and the nature of learning" (p.1). As noted by Zuljan (2007), beliefs of teaching also influence classroom management. These personal beliefs can serve as lenses of understanding classroom events (Jones and Carter 2007) in terms of student or teacher-centred activities.

Thus an attempt is made within this article to understand how beliefs could actually influence teaching methods that in turn could have a profound and definite impact on student learning.

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## Student-Centred Learning

The concept of student-centred learning has been around for many years but its implications is still not realised by many academics. It is not yet widely understood – or at least, acted upon – that student-centred learning means that the teacher’s role is shifted from imparting knowledge to guiding the student in his or her own learning, (European Commission Report 2013).

It is a teaching model whereby students are placed in the core of the learning process (MacHemer and Crawford, 2007). Dupin-Bryant (2004) defined student-centred learning as a method of “instruction that is responsive, collaborative, problem-centred, and democratic in which both students and instructors decide how, what, and when learning occurs” (p.42).

The student-centred, as a concept, was first originated out of the constructivist learning theory which asserted that knowledge is constructed uniquely and individually in multiple ways (Vygotsky, 1978). Thus, constructivism is based on the idea that students must construct knowledge, in order to learn, with the emphasis being placed on cooperation, rather than competition. Furthermore, constructivists make the assumption that learning is ‘active’ and that all learning activities involved some kind of experience and exchange of ideas (Fink, 2002) which helps students to learn independently (MacHemer and Crawford, 2007; Borg et al., 2012). It also makes the assumption that learning is centred around the student and not the teacher by shifting the effort away from teaching the students “what to think, but to teach them how to think” (Tsui, 2002, p. 740). This approach changes the role of the teacher, from being entrusted with the “transmission of knowledge to supporting and guiding student learning” (Van Eekelen et al., 2005, p.447).

## Beliefs of Teaching

Over the years, a growing body of research has helped to provide evidence that university teaching and classroom behaviour activities are determined by a theoretical framework which is belief driven (Clark and Peterson, 1986; Marland, 1995, 1998). Such beliefs (known also as epistemological beliefs) have offered insights as to how lecturers promote their actual beliefs on teaching across educational settings.

These ‘beliefs’ appear to play an influential role in lecturers’ judgments about what knowledge is relevant to a particular situation (Pajares, 1992). From this, it can be concluded that there may be a direct relationship between the lecturers’ beliefs of teaching and teaching practice. The identification of such a relationship could be valuable in supporting the arguments that the lecturers’ theoretical frameworks are, indeed belief - driven (Marland, 1995, 1998). Many studies have demonstrated that there are definite links between these concepts (Brown and Rose, 1995; Kagan, 1992; Entwistle, Skinner, Entwistle, and Orr, 2000; Chan, 2004, 2007; Postareff and Lindblom-Ylänne, 2008; Igwebuike and Okandjeji, 2009; Igwebuike, 2009; 2011). However, research has not yet produced a common framework, although there is some agreement between the findings in the literature. Furthermore, research in this area remains limited, (Tsai, 2002; Friedrichsen and Dana, 2005).

Previous studies have shown that beliefs can be experienced in a limited number of qualitatively different ways referred as categories, (Marton, 1981). The number of categories in the literature varies from two (Gow and Kember, 1993) to seven (Samuelowicz and Bain, 2001).

At a very general level, the categories found in the literature are similar to some extent, and this inevitably provides some evidence of their validity (Buaraphan, 2007). The literature revealed two broad teaching categories, known as teacher-centred and student/learner-centred (Lindblom-Ylänne et al. 2006; Trigwell et al., 1999; Samuelwicz and Bain, 2001).

The teacher-centred categories are distinguished by a number of features that are consistent across studies. Lecturers who approach their teaching in this manner see teaching mainly as the transmission of knowledge. On the other hand, lecturers whose approach is categorised as student-centred, see teaching as supporting conceptual change in their students. These lecturers focus on encouraging students to construct their own knowledge and understanding, and to activate their existing beliefs (Samuelowicz and Bain, 1992, 2001; Prosser et al., 1994; Trigwell and Prosser, 1996a).

Most of the findings talked also of a ‘middle or intermediate categories’. These are, however, less defined; and they are termed as encouraging learning or helping or facilitating understanding (Samuelowicz and Bain, 1992).

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