

The discussion question is based on a paper (Wilson and Scalise 2006), which discusses how assessment practices in higher education can improve or hinder learning. An example is given to illustrate some common educational practices that may be contributing to underpreparation and underperformance of students. Elements of effective assessment and learning environments that may better address underlying metacognitive issues are discussed.

The BEAR Center has for the last several years been involved in the development of an assessment system, which we call the BEAR Assessment System. The system consists of four principles, each associated with a practical "building block" (Wilson 2005) as well as an activity that helps integrate the four parts together. Its original deployment was as a curriculum-embedded system in science education (Wilson et al. 2000), but it has clear and logical extensions to other contexts such as in higher education (Wilson and Scalise 2006), in large-scale assessment (Wilson 2005); and in disciplinary areas, such as mathematics (Wilson & Carstensen, 2007), and chemistry in higher education (Claesgens et al. 2002).

In that paper, the four principles of the BEAR Assessment System are discussed, and their application to assessment in higher education is described using an example based on a US assessment of chemistry used across the Year 12 curriculum in California, and first year college curriculum at UC Berkeley. The BEAR Assessment System is based on a conception of a tight inter-relationship between classroom-level and large-scale assessment (Wilson 2004a; Wilson and Draney 2004). Hence, in the process of discussing this application, some arguments and examples will be directed towards large-scale applications, or, more accurately, towards the common framework that binds the two together (Wilson 2004b).