



## Scholarship of Teaching and Learning in Higher Education: An Assessment Framework

Muhamad Saiful Bahri Yusoff<sup>1</sup>, Abdul Karim Alias<sup>2</sup>, Fatimah Salleh<sup>3</sup>

<sup>1</sup>Medical Education Department, School of Medical Sciences, Universiti Sains Malaysia, 16150 Kota Bharu, Kelantan, Malaysia. <sup>2</sup>Director, Centre for the Development of Academic Excellence, <sup>3</sup>School of Educational Study, Universiti Sains Malaysia, Pulau Pinang, Malaysia.

---

### ARTICLE INFO

Received : 01/07/2012  
Accepted : 09/09/2012  
Published : 01/06/2013

---

### KEYWORD

Scholarship of teaching  
Scholarly teaching  
Assessment  
Higher Education

---

© Medical Education Department, School of Medical Sciences, Universiti Sains Malaysia. All rights reserved.

**CORRESPONDING AUTHOR:** Dr Muhamad Saiful Bahri Yusoff, Medical Education Department, School of Medical Sciences, Universiti Sains Malaysia, 16150 Kubang Kerian, Kelantan, Malaysia. Email: msaiful@kb.usm.my

Boyer has suggested four categories of scholarship which include scholarship of discovery, scholarship of integration, scholarship of application and scholarship of teaching (1). Scholarship of discovery is about creating new knowledge through research, scholarship of integration [later changed to scholarship of engagement (2)] is about utilising existing knowledge across disciplines in larger context, scholarship of application is a process of applying practically new knowledge into real contexts, and scholarship of teaching [later changed to scholarship of teaching and learning (3)] is about disseminating of knowledge to educational community (i.e. in the presence of learners) (1). Boyer reported that majority of teachers pointed out that teaching is an important element, therefore teaching effectiveness should be the main criteria for promotion in higher education institutions (1, 2). Unfortunately, most of higher education institutions have heavily weighted research publication (i.e. scholarship of discovery) for promotion, not the teaching effectiveness (i.e. scholarship of teaching and learning) (1, 2). The main reason lead to this situation was due to difficulty in assessing scholarship of teaching and learning as compared to scholarship of discovery (2). From that notion, an assessment framework to measure the scholarship of teaching and learning (SoTL) is crucial for policy makers to design and develop criteria to appropriately reward the teaching effectiveness. This article described an assessment framework for SoTL in higher education. The framework was reframed based on available literature from various academic databases such as google scholar, Scopus, Pubmed, ISI and Ebscohost. It is hoped that this framework may help policy makers to design an appropriate system to reward those who are excellent in SoTL.

SoTL can be inspected in three aspects which are SoTL goal setting, SoTL levels and SoTL components. SoTL goal setting concerns about how educators add values to their institutions, SoTL levels concerns about the growth of educators' SoTL capacity, and SoTL components are related to the core areas of SoTL

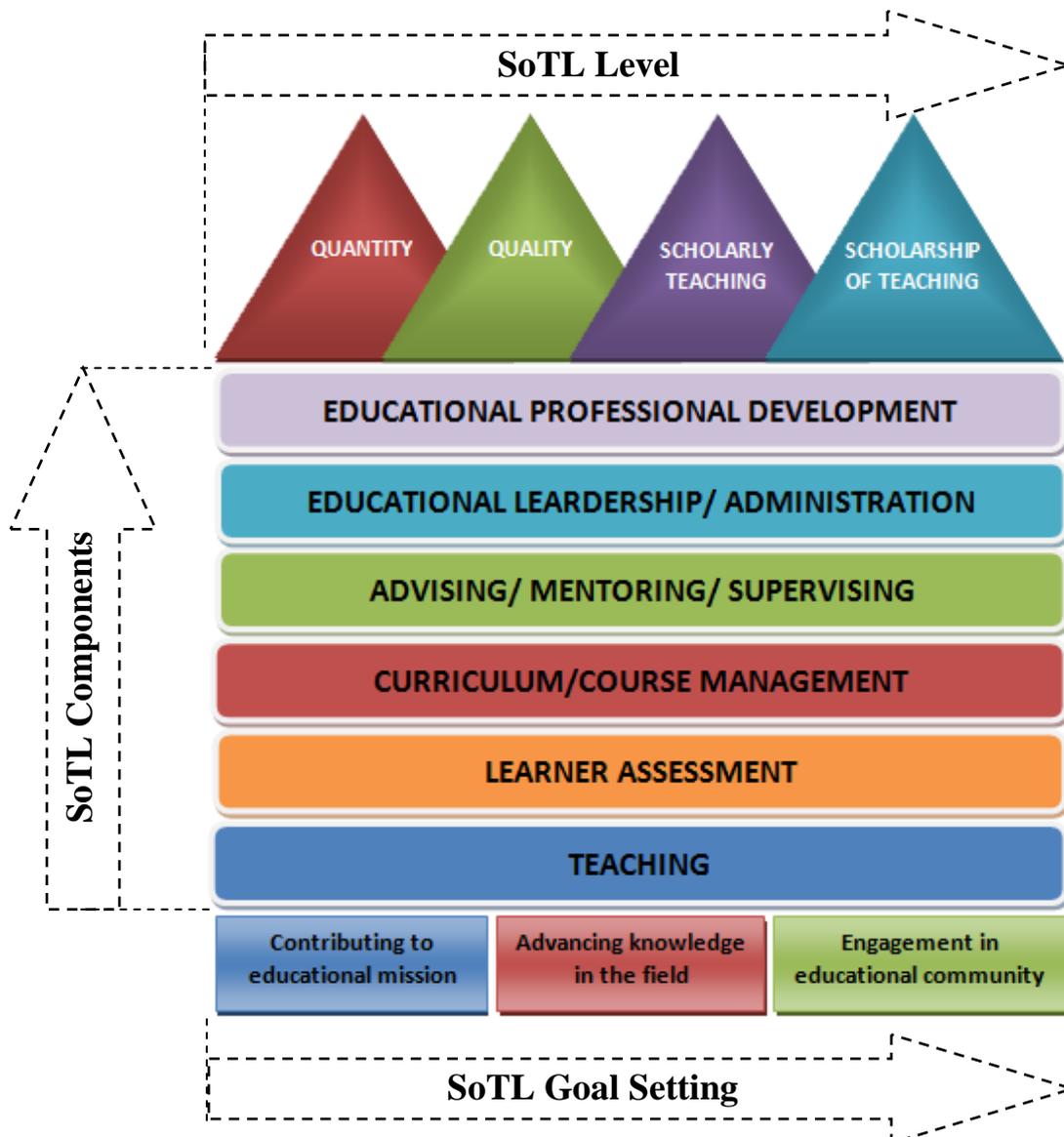
that educators are expected to make contributions (figure 1).

In relation to SoTL goal setting, educators can add values to their institution through 1) contributing to their institutions' educational mission, 2) advancing (i.e. disseminating) knowledge in their own field, and 3) engagement in the educational community (4) (figure 1). Educators outline of major achievements, including a statement of goals, responsibilities and philosophy of teaching and learning, in relation to institutional goals and plans (i.e. contributing to educational mission) (4). In addition, if teaching is to be seen as a form of scholarship, then the practice of teaching must be seen as giving rise to new knowledge (i.e. advancing knowledge in the field). Aim of teaching is to make student learning possible, while the aim of scholarly teaching is to make transparent how we have made learning possible (5). For the scholarship of teaching, the focus is on how the process of teaching was evaluated through review of teaching documents (5). Engagement with educational community is evidence that educators' work is informed by what is known in the field (i.e. scholarly teaching) and how educators contribute to knowledge in the field (i.e. scholarship of teaching) (6). This information provides the contextual basis against which assessment of SoTL can be made.

SoTL levels can be categorized into four levels which include quantity, quality, scholarly teaching and scholarship of teaching (4, 6) (figure 1). Quantity is about descriptive information regarding the types and frequencies of educational activities and roles. This is a basic requirement for every new educators (6). This can be measured in term of teaching hours per semester, how many student being supervised, and etc. Quality concerns about producing evidence that activities achieve excellence using comparative measures, when available (6). This can be measured by student feedback at the end of semester, peer feedback, head of department feedback, and etc. Scholarly teaching is about drawing from the literature and best practices in the field to systematically design, implement,

assess, and redesign an educational activity (6). There are six standards that any work done to be considered scholarly; the work must be characterized by clear goals, adequate preparation, appropriate methods, significant results, effective presentation, and reflective critique (2). A scholarly teacher selects the

teaching method that has the best chance of helping students achieve the learning objective. Scholarship of teaching is about faculties engage in educational scholarship by both drawing upon resources and best practices in the field, and by contributing resources to it (6).



**Figure 1: An assessment framework of Scholarship of Teaching and Learning (SoTL).**

Shulman stated that a work to be considered as scholarship, it must fill three criteria which included 1) it must be made public, 2) it must be available for peer review and critique according to accepted standards, and 3) it must be able to be reproduced in some way and built on by other scholars (2, 7). Documentation begins demonstrating that an educational activity product is publicly available to the educational community (so called 'community properties') in a form that others can build on. The product may be available at the local level (i.e. department, medical school or university) or at the regional, national and international level. Once a product is public and in a form that others build on, peers can assess its value to the educational community based on accepted criteria. These levels can provide as guideline for policy makers to set expectation according to the levels, for example for a new educator to be appointed to more senior position the assessment could be emphasized on quantity and quality levels. While to those who will be appointed to Professorship, the assessment should be emphasized on the scholarly teaching and scholarship of teaching levels.

There are six core areas (i.e. SoTL components) identified in the literature that include teaching, curriculum, learner assessment, advising/mentoring/ supervising, educational leadership/administration, and educational professional development (4, 6, 8, 9). Teaching is any activity that fosters learning, including direct teaching and creation of associated instructional materials (6). Learner assessment is any activity related to measuring learners' knowledge, skills and attitudes (6). Curriculum is about a longitudinal set of systematically designed, sequenced and evaluated educational activities occurring at any training level, venue or in any delivery format (6). Advising/ mentoring/ supervising is a developmental relationship in which educator facilitates the accomplishment of a learner's or colleague's goals (6, 10). It also includes all activities associated with creation of learning package/ activity to promote formation, development and improvement of learners' or colleague's personal qualities and professionalism that will help them in study as

well as future career (10). Educational leadership and administration is about activities that transform educational programmes and advance the field (6, 9). Educational professional development is related to activities/events associated with promotion, development and recognition of personal qualities as an educator (9). It is worth to highlight that each component is judged according to the SoTL goal setting and SoTL levels as was discussed previously. In a nutshell, using this component could help policy makers to capture all aspects of SoTL that have been done by educators. The whole assessment framework was illustrated in the figure 1.

In summary, the assessment framework could serve as a guide for policy makers in higher education to systematically capture SoTL efforts that has been demonstrated by educators. Hopefully, higher education institutions will put more weight on SoTL than the research publication for promotion and reward.

## Reference

1. Boyer EL. Scholarship reconsidered. Priorities of the professoriate, Princeton, NJ: The Carnegie. 1997.
2. Glassick CE. Boyer's expanded definitions of scholarship, the standards for assessing scholarship, and the elusiveness of the scholarship of teaching. *Academic Medicine*. 2000; 75(9):877.
3. Ochoa A. The Scholarship of Teaching: Yesterday, Today, & Tomorrow. *The Journal of the Professoriate*. 2011; 6(1):100-16.
4. Simpson D, Fincher R, Hafler J, Irby D, Richards B, Rosenfeld G, et al. *Advancing Educators and Education: Defining the Components and Evidence of Educational Scholarship*. AAMC. 2007.
5. Richlin L. Scholarly teaching and the scholarship of teaching. *New directions for teaching and learning*. 2001; 2001(86):57-68.
6. Simpson D, Fincher RME, Hafler JP, Irby DM, Richards BF, Rosenfeld GC, et al. *Advancing educators and education by defining the components and evidence*

- associated with educational scholarship. *Medical education*. 2007; 41(10):1002-9.
7. Shulman L. The Scholarship of Teaching. *Change*. 1999; 31(5):11.
  8. Simpson D, Hafler J, Brown D, Wilkerson LA. Documentation systems for educators seeking academic promotion in US medical schools. *Academic Medicine*. 2004; 79(8):783.
  9. Baldwin C, Chandran L, Gusic M. Guidelines for Evaluating the Educational Performance of Medical School Faculty: Priming a National Conversation. *Teaching and Learning in Medicine*. 2011; 23(3):285-97.
  10. Yusoff MSB, Rahim AFA, Noor AR, Yaacob NA, Hussin ZAM. The BigSib students' peer group mentoring programme. *Medical education*. 2009; 43(11):1106-.