Teaching for the future: a transnational university practice

Qian Wang and Jiajun Liu

Abstract

Purpose – The purpose of this paper is to explore an innovative teaching design to teach accounting management that aims to foster students’ technical and soft skills. The effectiveness of this new teaching design addresses current concerns for universities preparing students for the future.

Design/methodology/approach – The paper deploys the qualitative research methodology and applies multiple methods to gather data in a case study. The researchers collected data through pre- and post-surveys of individual students, three half-day observations on the five project teams and a one-hour long semi-structured interview with a focus group.

Findings – Five themes emerged in the research to support the effectiveness of the new teaching design. The study also showed that students’ abilities in self-directed learning (SDL) link to their learning experiences. When students were more capable of initiating learning, such ability enriched their practices of soft skills in the team setting.

Research limitations/implications – This one-shot study had a small group of homogeneous participants and had no baseline comparison to identify the increment of students’ soft skills.

Practical implications – The findings provide valuable insights into the course design and implementation of the teaching approach for the future. The paper suggests that fostering students’ SDL will increase the effectiveness of soft skills development.

Originality/value – This empirical research extends current knowledge of teaching soft skills and calls for action on the development of students’ SDL abilities.

Keywords Accounting education, Self-directed learning, Soft skills, Transnational higher education

Paper type Research paper

Introduction

One way for universities to make an impact on society is to cultivate a quality labor force through teaching. When traditional middle-class jobs (e.g. accounting) are no longer a secure form of employment (Susskind and Susskind, 2015), the public turns its attention to how universities should teach for the future. Many practitioners agree that teaching should focus on preparing students’ technical and soft skills to face the increasingly unpredictable demand of the labor market (de Villiers, 2010). Business educators agree too that soft skills are essential in the twenty-first-century workforce (Mitchell et al., 2010). Soft skills typically include team skills, communication skills, leadership skills, time-management skills, work ethics and an appreciation for differences (Mitchell et al., 2010; James and James, 2004). Research (Sutton, 2002) has found that soft skills are “the number one differentiator” for companies to hire employees across all industries (p. 40).

Teaching only the technical knowledge, which could be obsolete by the time of graduation, can no longer sufficiently justify the value of a university teaching. Joining other foresight scholars (Buskist and Groccia, 2011; Thomas and Brown, 2011), this paper is based on the premise that education needs to shift towards enhancing students’ abilities in problem-solving, decision-making and performing in teams. Soft skills are essential to support the
development of these abilities (Riggio and Saggi, 2015). Furthermore, students should be put in a process where they can choose to work on issues that they deem to be important. Such thinking reflects Knowles’s crucial assumptions about the characteristics of adult learners, especially when adult learners’ learning shifts from subject-centeredness to problem-centredness (Knowles, 1984).

The conceptual framework that informed the research case’s teaching design is called Research-Led Learning and Teaching (RLLT) (Zhang et al., 2017), an emerging approach that has been advocated throughout the transnational university campus where the research took place. While the RLLT framework applies to the teaching of many subjects, the paper takes accounting management as an example to address the following question: how can teaching and learning be designed to meet the predicted focus on both the technical skills (e.g. accounting calculation) and soft skills (e.g. team and communication skills)? The findings suggest that students who can master self-directed learning (SDL) can immerse themselves in better learning experiences when working in teams; students who are less willing to adopt had a mixed learning experience. The findings provide insights into the role of SDL in developing soft-skills.

Methods promoting self-directed learning

So far, SDL has not been widely practiced among many tried approaches (e.g. simulation, videogame) in accounting education (Sava, 2018). Knowles (1975) articulated several vital characters of self-director learning. He stated that in the learning process, students of SDL take the initiative, with or without the help of instructors, in figuring out their learning needs, establishing learning objectives, seeking the instructor and material to support learning, applying suitable learning strategies and evaluating learning outcomes. Greg (1993) later added that SDL should take place among collaborative peers, and peers are also learning resources. Soft skills are important for performing SDL.

Action learning (AL) also emphasizes SDL (Watkins and Marsick, 1993). A major difference is that AL takes place in a workplace when dealing with an actual project or problem (O’Neil and Marsick, 2007). As much as educators try to replicate workplace situations, the project or problem for university teaching is not “real”. Hence, this paper chooses to highlight the other two well-known concepts (problem-based learning and inquiry-based learning) that have been adapted to teach in school settings. Then, the paper introduces the emerging approach: RLLT.

The origin of Problem-based Learning (PBL) emerged based on the recognition that the doctor’s work of diagnosing patient symptoms involves “a hypothetical-deductive reasoning process and expert knowledge in multiple domains.” (Savery, 2015, p. 6). Today, PBL is known as an instructional method that depicts the problem as the specific learning context and focuses on the process of investigation and problem-solving (Barrow, 1986; Savery and Duffy, 1995). Critique Newman (2003) has found insufficient evidence that the PBL instructional strategy would be useful in dealing with problems in unfamiliar situations, undertaking SDL to participate in change, and fostering empathy.

Inquiry-based Learning (IBL) is prevalent among science education because such an instructional strategy initiates with a question followed by applying the scientific method of investigation to produce solutions (Savery, 2015). Both IBL and PBL see students as the centre of the learning process and encourage students to work collaboratively. The primary difference between PBL and IBL is the role of the instructor. In IBL, the instructor is both a facilitator and an expert. In PBL, the instructor is only supposed to be a facilitator; students need to develop their thinking. IBL focuses more on triggering students’ curiosity to acquire new knowledge and understanding. Such action may or may not involve the identification of a real-world problem. Instead of merely presenting the facts and knowledge, an IBL
approach would highlight the sequence of investigations that guide students’ exploration and discovery (Kuklthau et al., 2007; Quigley et al., 2011).

PBL and IBL both can trace back to the experiential learning philosophy of John Dewey (Savery, 2015). However, the authors identify the critical difference between the two: PBL sees a problem as the source for learning (e.g. patient has a headache, why?), and IBL sees a problem (often framed as a question) as the goal for learning (e.g. How to measure water quality?). This distinction shapes students’ initial motivation for learning, which has an impact on the degree of SDL. The perspective on “problem” also alters teachers’ objectives in instructions: PBL focuses on process (e.g. what can be done to identify the cause for headache?); IBL focuses on content through mastering a set of skills (e.g. what are the standards applicable to evaluate water quality? What are the steps to measure water quality?). The scale and scope of the problem may define the extent of students’ SDL in PBL. The design of the problem investigation may shape the degree of students’ SDL in IBL. When an instructor directs students to look at a problem, it lessens the degree of students’ SDL because student initiation can be a critical part of SDL.

RLLT is a framework coined to promote quality in teaching and in enhancing students’ learning experience. RLLT incorporates some of the PBL and IBL principles, especially on the student-centered approach. The term “research-led” acknowledges the value of research in the university setting while moving beyond the traditional understanding of research. It aims to illustrate how teaching and research can integrate. RLLT framework includes four critical parts:

1. meaningful real-world problem;
2. information inquiry;
3. team-based approach; and
4. feedback for improvement in learning (Zhang et al., 2017).

RLLT specifies the ownership of the “problem” in the learning process. Students need to identify a problem to learn. The instructor acts as a boundary-setter to ensure the choice of the problem connects to the focal topic. RLLT also advocates for active learning by encouraging students to engage in exploration and investigation. RLLT immerses students in meaningful work by deploying research-based principles and methods. The goal of RLLT is to arrive at solutions that carry practical value to the real-world. In RLLT, students naturally play a central role in the process. The instructor may be an information-provider, facilitator or coach, depending on students’ learning needs. RLLT removes the instructor from lecturing students; however, when necessary, the instructor is not prohibited from giving lecture-like support.

The teaching design – teacher’s intention

The researchers conducted a teaching experiment on a transnational university campus in China. 25 undergraduate students (22 females and 3 males; between 19 and 22 years old) were in the course. Five of these students were registered full-time students in the transnational university (i.e. home-university students); the rest of the students came from other universities in the region (i.e. visiting students). Students majored in multiple disciplines of business, including finance, accounting, international trade, and marketing.

The instructor randomly assigned the visiting students into five teams and purposely allocated one home-university student per team. The five divisions were called “project teams.” Besides project teams, each visiting student also belonged to a department. There were five departments: accounting and finance, human resources, marketing and sales, planning and procurement, and production. All the home-university students belonged to...
the accounting and finance department by purposeful design. The assigning of the rest of the students to various departments was random. **Figure 1** shows the Chart for project teams versus *departments*. The home-university students had a unique role in their project teams: to collect and distribute information to their project team members.

The instructor delivered the teaching in one intensive week. The instructor prepared a detailed Participant Handbook to inform students of what to expect in advance. It stated that the primary purpose of the summer course was on applications of knowledge and practice of skills; in the class, the teaching would not focus on knowledge acquisition. As a result, students were expected to learn the necessary materials and tools on their own before the course. A business case was written to provide necessary contextual information and outlines of the assignment. Students were supposed to work with both their project teams and associated departments during the course. For the project teams, their goal was to write a business proposal and deliver a presentation with practical and innovative solutions that would convince the top decision-makers (i.e. the judging panel). For the interaction with departments, the purpose was to gather as much information as possible to help to identify Key Performance Indicators (KPIs) within the business organization. Such a design aimed to enable students to access dual channels of interactions: intra- and inter-team communication via the department and cross-departmental integrations.

The instructor gave an introduction with some relevant datasets at the beginning of the course. He also distributed memos as additional information throughout the teaching. Proposal templates and guidelines made available to students. The instructor encouraged students to search for information from the public domain (e.g. internet). The summer course created a website as a platform to share fundamental knowledge on strategic management, management accounting and business analytics. Everyone had equal access to the site.

Students were asked to prepare their business proposal and presentation in three consecutive phases; each phase had a sub-target. A judging panel reviewed each project team’s work-in-progress-output and gave each project team a progress score. The first phase focused on developing strategy. Project teams were asked to create their visions, strategies and implementation plans. The second phase focused on constructing performance indicators. The instructor gave a specific reference to students. However, students need to choose what performance indicators to measure. Ideally, each project...
team’s choice should reflect its vision and strategy. The last phase was about creating a simple version of the KPI dashboard using data analytics software. The ultimate outcome was to create a new KPI dashboard that aligned with the proposed vision, strategy and implementation plan. In the final phase, students could modify their previous plans. Throughout the week, the instructor invited other guest speakers to deliver relevant topics to broaden students’ knowledge and organized a half-day company visit to enrich students’ experience.

Research method

Evaluating the effectiveness of the intended learning is no small task, especially when the learning involves soft skills because such skills often are embedded in the process rather than the outcome. For example, the delivery of a substantial presentation does not necessarily represent how well team members have collaborated. A primary aim of this research is to gather evidence that indicates students’ demonstrations in using soft skills in team activities. The researchers decided to apply the qualitative case study approach (Creswell and Creswell, 2018) and collected data before, during and after the course: a pre-program survey collecting student demographics, researchers’ observation, and a post-program survey collecting students’ perceived skill development along with a post-program focus group to capture valuable elements in participants’ experiences and perspectives (Crabtree and Miller, 1999).

The researchers conducted a self-reported survey to assess students’ general beliefs towards self, others, and relationships with others. The information is used as a reference to decipher other data in the research. Then, the study assembled five observers to each follow a project team. Each observer sat in the corner of a pre-assigned breakout room, watched the project team’s interactions, and took notes. The observer kept silent to maintain an objective research perspective (Gasson, 2004). When the project team moved to other rooms to meet with their departments, the observer followed. Each observer conducted three half-day observations with the assigned project team.

Before the ending of the course, the study issued a post-program survey asking students to self-evaluate their experiences in their teams. Example questions included “I felt safe to challenge others’ opinions” and “I dealt with conflict with maturity.” The survey ratings was based on a five-point scale from definitely agree (five-point) to definitely disagree (one-point). At the end of the survey, the researchers proposed critical incident questionnaires, asking students to review their challenges in the learning experience.

Lastly, the study recruited ten students (two from each project team) to participate in a focus group. During the focus group session, the interviewer framed two open-ended questions – “How would you describe your experience in this program?” and “What do you think of the content/topic discussed in this program?” – to inquire about students’ experiences. Students took turns answering the questions. The research assistant recorded the focus group conversation and transcribed audio data.

The effectiveness of learning experience – students’ perspectives

The researchers grouped data according to project teams. Following the techniques of theme analysis (Boyatzis, 1998; Braunt and Clarke, 2006), the researchers reviewed data to look for patterns. Students’ self-reported surveys and the focus group data aligned with the researchers’ observations. Designed through the leans of RLLT, this program approved to enhance students’ soft skills and teamwork from the following aspects:

- Students found the work was challenging, yet they reported that they were happy, tired, and satisfied in the learning experience. Students participating in the focus group stated that “in the first-day, communication wasn’t smooth [...] especially when our
team’s perspective was not accepted by other teams,” “data analysis was challenging given the sort time we need to learn”, and “our team stayed up till 2 a.m. working on the task”. However, eventually, students reported that “so far this is the best learning experience for me because I learned a lot from it”, “we are proud of ourselves for accomplishing this program”.

- Students had to learn new skills and knowledge on their own using available tools; students sought help from the instructor as well as their teammates. One team observer noted that “[...] their skills (e.g. decision making, communication, negotiation, and English language) in handling the project work has become much better than day one”.

- Students recognized the importance of team and teamwork. One observer stated that “team members provided necessary support to the team [...] [and] they were able to solve the problem.” One female student in the focus group stated that “the key to accomplish different tasks was our teamwork”.

- Even though students did not know each other before the course, they learned to cooperate and to express themselves in a team setting as key phrases such as “collaborate” and “learned to communicate” have frequently appeared in the focus group recording data.

- Some students reported that they had found a new reason to study hard as a result of comparing themselves with others. One student wrote in the post-survey: “I have met many people more outstanding than me; I know there is a lot I need to learn”.

The findings also suggested that students who were quicker to adapt to SDL had a better experience. During the focus group discussion, a project team shared that its crew had a slow start at first, and they “received unsatisfactory results from the judging panel in the first round”; after the team leader re-joined the team, they worked out a plan to assign various tasks according to each member’s strength. They separately learned to handle their assigned duties; the team progressed better in phase two. As a result, these team members improved their SDL skills. The same project team’s observer also reported that this team “progressed well throughout the week”. They seemed to collaborate “better and better each day”.

Research limitations

The majority of students shared similar beliefs in terms of their views of themselves, others, and their relationships with others. This group of students shared many common characteristics, such as gender (majority was female), age (close in proximity), and academic interests (all business-related majors). Only five students were familiar with the transnational education culture; the rest of the students (majority) studied in traditional Chinese universities where English was not a medium of instruction. Hence, a limitation of the research is the absence of diversity in participants. Another limitation is the design of the study as a single experiment (Astin and Lee, 2003). There is no base information for students’ pre-existing soft skill levels. Besides, there have been concerns regarding the trustworthiness of self-reported data in examining students’ experiences (Bowman, 2009). The authors are fully aware that students’ perceptions may not wholly and objectively reflect the soft skills they think they have acquired.

Practical implications

This research holds real-world value for teaching. It has reviewed a new way of teaching accounting management beyond just transmitting technical knowledge. The RLLT framework highlights the fundamental nature of asking college students to choose their problems to study. It showed that instruction with an emphasis on SDL and team activities could deliver training on technical and soft skills. Both types of skills are valuable for
problem-solving and decision-making (Riggio and Saggi, 2015). When a university can achieve both sets of skills in teaching, higher education is genuinely aiming to develop talents for the future. In the ever-changing world, when the only consensus is that the future is unpredictable, there is no doubt that fostering SDL is a pivotal answer for generating lifelong learners.

Further research

Students’ needs and characters may differ in other subjects. People of different disciplines tend to have different mindsets, which can influence their cognition and behaviors. There needs to be more data, through both quantitative and qualitative inquiries, to test the relationship between SDL and soft skills development. In future research, a measure of students’ soft skills before implementing the study would be preferred to establish a baseline so that the research can pinpoint the specific impact. The length of the course could be extended to support students who are not familiar with the SDL method and require additional scaffolding activities. Lastly, the language of the delivery may also impact the students’ learning experience. Future research could apply the same teaching design in native language instruction and make a comparison.

References


Boyatzis, R.E. (1998), Transforming Qualitative Information, Sage, Cleveland.


Further reading


About the authors

Dr Qian Wang is a Lecturer and Program Director of M.A. in Global Education at the Institute of Leadership & Education Advanced Development, Xi’an Jiaotong-Liverpool University. In research of transnational education, she focuses on education leadership, teaching, and teacher education. Qian Wang is the corresponding author and can be contacted at: qian.wang@xjtlu.edu.cn

Dr Jiajun Liu is a Lecturer and Education Developer at Xi’an Jiaotong-Liverpool University. Her research interests include learning analytics, higher education, and transnational education.