

## A Developmental Framework for Teaching Expertise in Postsecondary Education

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### The Development of Teaching Expertise

Many postsecondary institutions have started to explore what it means to develop and demonstrate teaching expertise, recognizing not only the complexities of teaching and of documenting the experiences of teaching, but also that teaching expertise is developed through a learning process that continues over time (Hendry & Dean, 2002; Kreber, 2002). Our framework for this growth of teaching expertise draws from the scholarly literature related to postsecondary teaching and learning to demonstrate that teaching expertise involves multiple facets, habits of mind (or ways of knowing and being), and possible developmental activities.

### The Structure of the Framework

Our framework (Figure 1) introduces three foundational **habits of mind**—**inclusive, learning-centered, and collaborative ways of knowing and being**—that ground five interwoven and non-hierarchical **facets of teaching expertise**:

- teaching and supporting learning,
- professional learning and development,
- mentorship,
- research, scholarship, and inquiry, and
- educational leadership.

Within each facet are possible activities that reflect a **developmental continuum from explore, to engage, to expand**, demonstrating a shift from the growth of *oneself* within a local context toward contributing to the growth of *others* and creating processes and resources for the broader teaching and learning community (see table, pp. 5-7).

Although the table is useful for identifying details within the framework, we acknowledge that the image of a table suggests linear movement, hierarchies, and fixed borders, so we look to Figure 1 as the more precise visual to demonstrate that

- activities within each facet and across the continuum are **fluid and iterative** because the **development of teaching expertise is recursive and context dependent**, and
- there is **no single entrypoint** into the framework, as instructors **move across the facets and back and forth in the continuum** throughout their careers.

### The Intention & Possible Uses of the Framework

This framework is “written in pencil” in that it is meant to be shared, adapted, and used according to the needs of local contexts. The intention is to provide a scholarly framework for recognizing the breadth of characteristics involved in the development of teaching expertise in postsecondary contexts across all career stages. We envision a variety of uses of the framework, such as the following:

- As a framework for understanding, it will guide the academic community in finding meaning in the everyday activities that make up the growth of teaching expertise.
- As a framework for self-reflection, it will help instructors—faculty, sessional instructors, postdoctoral scholars, and graduate students—identify and communicate their strengths, and pursue particular aspects of their teaching for further development.

- As a framework for dialogue, it will help peers and critical friends facilitate their ongoing growth through significant conversations about teaching and learning (Roxå & Mårtensson, 2009).
- As a framework for facilitating future-oriented conversations, it will help department heads and other campus leaders nurture individual instructors and contribute to teaching and learning cultures across postsecondary education.

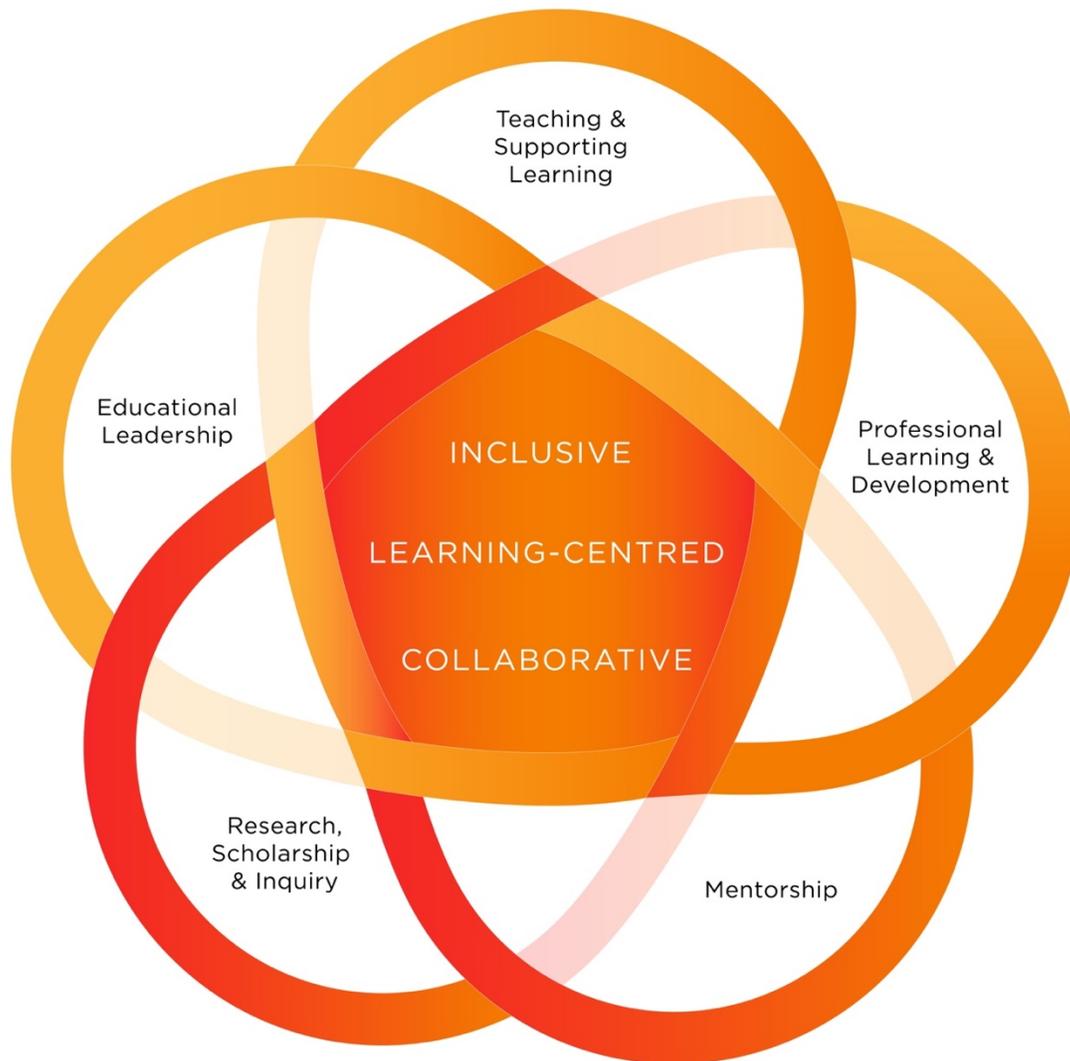


Figure 1: Conceptualization of a developmental framework for the development of teaching expertise

## **Habits of Mind, or Ways of Knowing and Being**

### *Inclusive*

Teaching expertise takes place within a mindset of inclusivity that seeks to welcome, respect, learn from, and orient teaching to multiple and diverse perspectives. Expert teachers recognize that being inclusive involves an ongoing process of self-examination and reflection, openness to and exploration of various dimensions of difference, a commitment to learn about and teaching from various perspectives, and knowledge of diversity-related issues. Inclusive instructors reflect on, design, and facilitate teaching and learning spaces where diverse contributions are fostered and encouraged (Dimitrov & Hague, 2016), students are exposed to multiple points of

view, all students can learn optimally (Meyer et al., 2014; Tigelaar et al., 2004), and critical analyses of issues are developed. An inclusive mindset is also about appreciating the work of diverse colleagues and advocating for, supporting, and building collegial relationships across lines of difference.

### ***Learning-centred***

Teaching expertise is reflected in a learning mindset focused on both students' and one's own learning. Expert teachers understand that teaching is about supporting and improving student learning, not an end in itself (Barr & Tagg, 1995). This learning mindset also recognizes that teaching expertise (like all expertise) is learned and that it develops over time (Dweck, 2006) with experience, intentional effort, and reflection. Specifically, expert teachers critically reflect (Brookfield, 1995) on their teaching approaches and practices--questioning what they do, why they do it, and what works and what doesn't--in light of evidence drawn from existing research and from their own students' learning (Hubball, Collins & Pratt, 2005).

### ***Collaborative***

Teaching expertise is developed and shared with others. Recognizing "teaching as community property" (Shulman, 1993), expert teachers draw upon and contribute to the experiences, practices, and expertise of participants across the teaching and learning community. As a contributing citizen of this community, teachers share challenges and insights, grounded in their own experience, to help others in their own growth and development. Within this network of global and local communities, expert teachers understand that all are learners, that knowledge is shared through collaborative dialogue, and the resulting growth is individual, collective, and reciprocal (Roxå & Mårtensson, 2009; Roxå, Mårtensson, & Alveteg, 2011).

## **Facets of Teaching Expertise**

### ***Teaching and Supporting Learning***

Teaching that places learning at its centre involves creating experiences and environments that empower students to engage, learn deeply, and become self-directed learners (Barr & Tagg, 1995; Trigwell, Prosser & Waterhouse, 1999; Weimer, 2013). Teaching organized around student learning also recognizes that understanding and improving learning is an ongoing process, hence, teaching expertise is developed over time and always evolving (Hendry & Dean, 2002; Kreber, 2002). A commitment to setting clear expectations for both teaching and learning, regularly providing and gathering feedback, and critically reflecting on one's teaching practice and philosophy guides practitioners in a learning-focused teaching framework (Brookfield, 1995; Lizzio, Wilson & Simons, 2002; Nichol & Macfarlane-Dick, 2006; Tigelaar et. al, 2002).

### ***Professional Learning & Development***

Professional learning and development of practice is a key component of expert practice and contributes to teacher reflective practice. Reflective practice and participation in formal and informal professional development is linked to improved student learning outcomes and engagement as well as improved experiences for teachers (Carmichael, 2012). Professional development includes engaging in formal processes such as conferences, seminars, or workshops, courses or programs on teaching and learning; collaborative learning among members of a community. Professional learning can also occur in informal contexts such as discussions among work colleagues, independent reading and research, observations of a colleague's work, or other learning from a peer (Arthur, 2016).

### ***Mentorship***

Mentorship is characterised as a positive, mutually-beneficial relationship that supports the teaching and academic development of both mentor and mentee (Mathias, 2005). Mentoring relationships foster self-exploration, career advancement, intellectual development, enhanced confidence and competence, social and emotional support, academic citizenship and socialization, information sharing, and professional identity formation (Kram, 1983; Johnson, 2007; Angelique, Kyle & Taylor, 2002; Schlosser et al., 2011; Foote and Solem,

2009). Mentorship typically occurs between an experienced faculty member and a less experienced colleague, student or postdoctoral scholar, but can also occur in a group context (Phillips, Dennison, Cox, 2015). Developed formally (i.e. structured programs) or informally, mentorship focuses on topics most relevant to the mentor and mentee.

### ***Research, Scholarship, & Inquiry***

One way in which teaching expertise is both *developed* and *expressed* is through research, scholarship, and inquiry--terms that reflect the variations of this activity across different contexts (Poole, 2013). Teaching and learning have a complex relationship that invites teachers to develop “pedagogical content knowledge” (Shulman, 1986), or an understanding of how learning happens (or doesn’t) within specific disciplines and subject areas. Research, scholarship, and inquiry play a key role in developing this knowledge. Expert teachers consult relevant existing research to build a strong foundation for designing, implementing, and assessing effective learning experiences for students (Shulman, 2004). Expert teachers may also conduct and share their own pedagogical research, scholarship, or inquiry not only to advance their own understanding, but also to contribute to the larger body of knowledge about effective teaching and learning (Felten 2013; Shulman, 1993).

### ***Educational Leadership***

Educational leaders influence change and implement initiatives to strengthen teaching and learning practices, communities, and cultures (Keppell, O’Wyer, Lyon & Childs, 2010; Mårtensson & Roxa, 2016; STLHE, n.d.). They share their expertise to inspire and help others strengthen their teaching practices; implement strategic programs, initiatives and policies to improve teaching and student learning; advocate for positive change; and, lead institutions, faculties and committees to continuously improve postsecondary education (Creanor, 2014; Mårtensson & Roxa, 2016, STLHE, n.d.; Taylor, 2005; UBC, n.d.; University of Calgary, n.d.). Educational leadership is demonstrated through formal leadership roles (e.g. Committee Chairs, Department Heads, Deans, Provosts), structures and responsibilities, and through leadership activities that may not be formally identified as part of one’s teaching responsibilities (Creanor, 2014; Gosling, Bolden & Petrov, 2009; Bolden, Petrov & Gosling, 2008; Jones, Lefoe, Harvey & Ryland, 2012; Keppell, O’Wyer, Lyon & Childs, 2010; Mårtensson & Roxa, 2016). Educational leaders identify, understand, and consult with others within their local contexts (Taylor, 2005). They build and nurture positive relationships, and bring together effective teams creating collaborative opportunities to enhance teaching and learning.

	<b>EXPLORE</b> growth of self in a local context (e.g., recognizes, reflects on, identifies, articulates, explores, becomes aware of)	<b>ENGAGE</b> actively participates in, implements new strategies, and seeks out opportunities (e.g., develops, implements, collects, seeks out, applies, tries, aligns)	<b>EXPAND</b> contributes to the growth of others and of the field, creates resources for broader teaching and learning community, expands upon knowledge, creates community (e.g., contributes, creates, shares, leads, advances)
<b>TEACHING &amp; SUPPORTING LEARNING</b>	<ul style="list-style-type: none"> <li>- Recognizes and reflects on the teaching and learning approaches that are typically used in one's discipline or one's own practice</li> <li>- Begins to recognize and explore the importance of placing student learning at the centre of one's teaching activities</li> <li>- Recognizes that there are multiple ways to design learning experiences and engage with students in the class</li> <li>- Recognizes that teaching expertise is developed over time and always evolving</li> <li>- Begins to articulate one's beliefs and/or philosophy about teaching and learning</li> </ul>	<ul style="list-style-type: none"> <li>- Reads about and tries out new teaching and learning approaches and activities</li> <li>- Develops and intentionally aligns course components (i.e., learning goals, learning activities, assessment strategies)</li> <li>- Develops educational experiences with a range of learners in mind</li> <li>- Designs participatory learning activities that engage students and encourages them to apply their learning in novel contexts</li> <li>- Designs assessment strategies that provide clear criteria and timely feedback to help students progressively learn</li> <li>- Establishes appropriate course workload requirements to challenge students while ensuring adequate time and support for work to be completed</li> <li>- Collects feedback at various times (e.g., mid-semester, end of term) from a variety of sources (e.g., students, colleagues, self-reflection) and adjusts teaching practices accordingly</li> <li>- Develops a teaching philosophy and begins to gather artefacts and materials for a dossier that captures and documents one's effectiveness and growth</li> </ul>	<ul style="list-style-type: none"> <li>- Designs, implements, and collects feedback on novel and high-impact teaching and learning practices that allow students to become self-directed learners (e.g., capstone courses, collaborative assignments, experiential learning, opportunities to conduct discipline-based research)</li> <li>- Creates opportunities for students to become aware of the conditions that best support their learning such that they can adjust accordingly</li> <li>- Engages students as collaborators or partners in the classroom (e.g., includes students in course and assignment design)</li> <li>- Formally and informally shares course materials and teaching approaches with colleagues (so others can learn)</li> <li>- Has an established teaching philosophy and dossier that is shared with colleagues</li> <li>- Is aware of where and how their courses fit into the larger curriculum and actively contributes to curriculum development and review processes</li> </ul>
<b>PROFESSIONAL LEARNING &amp; DEVELOPMENT</b> (to strengthen one's	<ul style="list-style-type: none"> <li>- Becomes aware of professional learning opportunities</li> <li>- Identifies learning interests / topics / themes</li> </ul>	<ul style="list-style-type: none"> <li>- Seeks out and engages in professional learning opportunities (e.g., conferences, workshops, forums, communities of practice, programs)</li> <li>- Critically reflects and documents professional learning and development</li> </ul>	<ul style="list-style-type: none"> <li>- Designs, develops, and implements professional learning opportunities for colleagues</li> <li>- Contributes to professional learning of others (e.g., offers workshops, forums, facilitates communities of practice)</li> </ul>

teaching and learning practices)	<ul style="list-style-type: none"> <li>- Recognizes that professional learning and development is ongoing throughout one's career</li> </ul>	<p>(e.g., in discussions with colleagues, to self-assess, to incorporate into practice, to include in annual reviews, tenure and promotion processes, awards, teaching portfolios)</p> <ul style="list-style-type: none"> <li>- Applies learning to practice and critically reflects on that experience</li> <li>- Discusses learning with others</li> </ul>	<ul style="list-style-type: none"> <li>- Continues engaging in professional learning</li> <li>- Contributes to and advances the knowledge and practice of professional learning, development, growth to the broader educational community</li> </ul>
<b>MENTORSHIP</b>	<ul style="list-style-type: none"> <li>- Recognizes value of mentorship as a high quality relationship and a reciprocal process</li> <li>- Identifies ways for mentorship to take place in one's own growth and development (things to talk about and people to reach out to as mentors)</li> <li>- Identifies and explores mentoring opportunities and resources in one's local context</li> </ul>	<ul style="list-style-type: none"> <li>- Seeks mentorship in disciplinary and interdisciplinary contexts</li> <li>- Builds a mentorship network to help support one's growth in a variety of areas</li> <li>- Identifies and addresses challenges and opportunities for discussion with mentors through development of rapport, trust, and respect</li> <li>- Seeks out and meets regularly to engage with mentors</li> <li>- Critically reflects and documents mentorship in one's professional growth (e.g., as part of annual reviews, tenure and promotion processes, awards, teaching portfolios)</li> <li>- Actively engages and collaborates on specific teaching and learning activities with a mentor</li> </ul>	<ul style="list-style-type: none"> <li>- Becomes a mentor by meeting regularly with mentees to support their growth and/or the growth of their mentorship skills</li> <li>- Critically reflects upon and documents how one contributes to a variety of mentoring contexts</li> <li>- Develops a mentorship identity and philosophy that reflects the reciprocity of mentoring relationships</li> <li>- As a mentor, facilitates dialogue, outwardly encourages others, shares advice and resources, models, and promotes self-exploration and growth with mentees (e.g., colleagues, undergraduate and graduate students, postdoctoral scholars)</li> <li>- Openly discusses academic culture, governance, politics, and institutional processes through mentorship</li> <li>- Creates departmental or group mentorship programs, networks, and communities</li> <li>- Develops and creates mentorship resources for others</li> </ul>
<b>RESEARCH, SCHOLARSHIP, &amp; INQUIRY</b>	<ul style="list-style-type: none"> <li>- Recognizes and identifies curiosities about teaching and student learning</li> <li>- Becomes aware of SoTL and discipline-based educational research literature</li> </ul>	<ul style="list-style-type: none"> <li>- Applies SoTL and discipline-based educational research to improve one's teaching practice and one's students' learning</li> <li>- Asks questions about one's students' learning and its relationship to one's teaching</li> </ul>	<ul style="list-style-type: none"> <li>- Engages in research, scholarship, and inquiry with peers</li> <li>- Develops both approaches to teaching and teaching practices that are informed by research, critical reflection (e.g., examining one's own context and</li> </ul>

	<ul style="list-style-type: none"> <li>- Identifies people to have conversations with about this scholarship and research</li> <li>- Reads and reflects on the literature on teaching and learning</li> </ul>	<ul style="list-style-type: none"> <li>- Collects evidence of the students' learning to answer these questions</li> <li>- Discusses with colleagues what one is learning about teaching, learning and conducting research, scholarship, and inquiry on teaching and learning</li> <li>- Participates in local conferences and events to share knowledge related to teaching and learning</li> </ul>	<p>assumptions), and discussions with peers</p> <ul style="list-style-type: none"> <li>- Contributes to the knowledge and practices of the broader academic community beyond the local (e.g., conference presentations, publications) to expand and advance the practice and scholarship of teaching and learning</li> </ul>
<p><b>EDUCATIONAL LEADERSHIP</b> (formal &amp; informal)</p>	<ul style="list-style-type: none"> <li>- Reflects upon how to design and deliver one's teaching in support of reaching departmental, faculty, and institutional goals</li> <li>- Develops an awareness of and ensures one's educational practices align with university policy and processes</li> <li>- Recognizes and reflects on the approaches and strategies educational leaders take to build collaborations and advance teaching and learning initiatives</li> <li>- Recognizes the characteristics and features that make some groups and communities of practice work</li> <li>- Explores opportunities to participate in governance processes that relate to teaching and learning</li> </ul>	<ul style="list-style-type: none"> <li>- Actively aligns one's teaching and curriculum to support institutional, program, and departmental priorities and goals</li> <li>- Participates in opportunities to further understand educational leadership and to advance one's educational skills and abilities (e.g., through workshops, courses, books, mentorship)</li> <li>- Participates in governance committees, working groups, and processes related to teaching and learning (e.g., members of teaching and learning committees, curriculum review committees, appeals panels)</li> <li>- Participates in policy development and actively brings forward issues to help find solutions and strategies to improve program, department, or institutional teaching and learning approaches, communities, and contexts</li> <li>- Actively participates in programs and institutional processes, surveys, and strategy sessions related to teaching and learning</li> <li>- Critically reflects on and documents one's educational leadership contributions and growth</li> </ul>	<ul style="list-style-type: none"> <li>- Leads strategic development and implementation of significant teaching and learning initiatives at a variety of levels (e.g. departmental, faculty, university, national, international)</li> <li>- Creates and leads initiatives to help colleagues strengthen their teaching practices</li> <li>- Creates and leads opportunities for colleagues to network and share experiences, and for communities of practice to develop (e.g., journal clubs, online collaborations, in person networks)</li> <li>- Holds formal leadership roles that advance teaching and learning (e.g., committees, curricular reviews, working groups)</li> <li>- Leads the development, revision, implementation, and/or evaluation of policies surrounding education</li> <li>- Inspires others by championing change in teaching and learning through advocacy, mentorship, and writing</li> </ul>

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