

Designing Capstone Units in the Block

In the Block, capstones are the final opportunity for students to emulate authentic practices in their discipline. They are therefore mostly in the final year and aim to integrate knowledge and skills gained by students throughout their course. Consequently these units have minimal new knowledge or skills. This enables students to adapt skills and knowledge to diverse contexts such as workplaces, professional placements and simulated settings; demonstrate initiative and judgement in planning; make decisions and solve problems; and be accountable for their own learning and developing professional practice.

While the format of capstones vary, they will include some of the following features:

1. **Authentic, contextualised experiences** - Integrate and extend prior learning so students use existing knowledge and skills within a clear framework of your expectations. Capstones should promote transferable skills within professional, organisational or community contexts, emulating experiences in the field.
2. **Challenging and complex scenarios** – Focus on messy, multi-faceted contemporary problems/ scenarios with contestable solutions requiring interaction between multiple stakeholders and decision-points, including ambiguous philosophical and ethical issues.
3. **Opportunities for critical inquiry and creativity** – Require critical inquiry, interrogation, creativity and decision-making to resolve complex problems.
4. **Student independence and agency** – Foster independence, agency, professionalism, and, when relevant, teamwork. Students should have opportunities to make decisions about topics, approaches, and outcomes and build confidence and personal responsibility. Require students to articulate their insights and reflect on their new knowledge and skills and, optionally, further learning opportunities as part of a process of continuous evaluation.
5. **Sharing and celebration** - Include mechanisms for sharing and celebrating the students' achievements. The celebration encourages benchmarking and sharing of individual achievements and helps students to identify areas they would like to explore further, establishing a base for ongoing lifelong learning.

Note that students may be progressing their capstone work while they are completing other units. You will need to think about how to support students while they are progressing outside of your Block.

A step-by-step approach to designing a capstone unit

1. **Start with the end in mind**—informed by the unit learning outcomes. Imagine what your students will be doing in five years in their career.
2. **Define major capabilities your students need.**
Below are some example capabilities. Add your own or edit as suits.

Working in a team	Following strict protocols	Selling/marketing their work
Developing proposals	Analysing current events	Gaining government funding
Working up budgets	Working alone	Investigating policy
Managing clients	“Pitching” ideas	Persuading others
Coordinating activities	Writing up research	Acting as a consultant
Setting own schedule	Applying skills in new ways	Developing products
Engaging with community	Developing strategy	
Planning for events	Self-publishing work	

3. **Determine the most appropriate approach** for students to refine and develop the relevant capabilities. For example, complex/ authentic projects or consultancies that could be inquiry-based or practice-oriented.
4. **Allow sufficient hours for extensive independent work** then decide the number of face-to-face sessions required to support the students in their capstone work. Consider online tools to support students to achieve their milestones in a timely fashion.
5. **Scaffold the learning/process** during the unit delivery
 - Give clear boundaries so that projects are realistic, manageable and feasible
 - Make clear links with professional practice
 - Guide students to develop plans and goals to achieve project outcomes
 - Structure small and large group discussions to help students refine ideas
 - Use templates to help students understand requirements and complete project documentation
 - Assist students to establish effective teamwork principles including strategies to resolve difficulties and clear procedures for dealing with issues
6. **Assess both process and product.** Common major outputs include:

Processes	Products
Interim report	Reports and papers, client responses
Self-reviews (reflections on processes, outcomes and consolidation of learning)	Process journals (collections of work building up to the final outcome)
Debates, forums and feedback loops	Presentations and events
Leadership, initiative and responsibility (running a seminar, lecture)	Job and task logs (typically for groups), impact assessments/ evaluations
Team-based peer evaluations	Portfolios

7. **Plan holistic assessment** by breaking it down into smaller pieces to enable instructor and peer feedback at key stages. Reward ongoing problem-solving processes, depth of inquiry and resilience as much as the degree to which final products are successful. Conclude with a cumulative piece for students to share insights.

Tips

1. Design so students have authority and autonomy to ‘own’ their capstone experience.
2. Build in regular feedback from a range of sources, for example critiquing peers’ work, self-assessing own work or invite feedback from external partners. Encourage students to respond with improvements.
3. Encourage students to collaborate with each other, to work through problems and seek creative solutions. Allow space for products to fail during the process supporting students to articulate their learning from the failure.

Want to know more?

- [Capstone Curriculum](https://uwaterloo.ca/centre-for-teaching-excellence/teaching-resources/teaching-tips/planning-courses-and-assignments/course-design/critical-reflection) n.d., *Critical Reflection*, viewed 07 August 2019, <https://uwaterloo.ca/centre-for-teaching-excellence/teaching-resources/teaching-tips/planning-courses-and-assignments/course-design/critical-reflection>.
 - Lee, N & Loton, DJ 2015, [Capstone curriculum across disciplines: Synthesising theory, practice and policy to provide practical tools for curriculum design](https://altf.org/wp-content/uploads/2016/08/Lee_N_NSTF_report_2015.pdf), Victoria University, viewed 12 August 2019 <https://altf.org/wp-content/uploads/2016/08/Lee_N_NSTF_report_2015.pdf>.
 - [OLTF Powerful Assessment Exemplars 2016](http://flipcurric.edu.au/sites/flipcurric/media/104.pdf), viewed 10 October 2019, <http://flipcurric.edu.au/sites/flipcurric/media/104.pdf>.
- This document includes examples of the types of assessment tasks suitable for capstones.