Virtualizing Experiential Learning: Tips + Resources for Experiential Learning Educators

Virtually all MIT students participate in one or more experiential learning programs like UROP, MISTI, and internships. These experiences give students an opportunity to:

- Apply and master concepts and theories that they learn in traditional classes;
- See the interplay of different disciplines in authentic problem-solving;
- Build critical professional skills like communication, teamwork, and cultural competence;
- Engage with faculty, graduate student, and industry mentors;
- Explore personal values and career goals;
- And last but not least... Have fun!

Experiential learning is wildly popular and sticky (in a good way)—many alumni report that, when they think back on their time at MIT, they may not recall physics or chemistry formulas but they remember how to build the vacuum tube from their UROP or the cookstove technology from their D-Lab class project. It is an integral part of what makes an MIT education special and has a major impact on academic and career pathways and life trajectories.

Today, many of our students have moved off-campus and are embarking on remote learning for their coursework. As experiential educators, we find ourselves facing an extraordinary challenge of reshaping experiential learning opportunities to adjust to our current reality. How can we adapt experiential learning programs to virtual offerings while maintaining their spirit, meaning, and impact? What does hands-on learning look like as we are all collectively striving to maintain social distance?

Many of us are asking these questions for the first time, at the same surreal moment in time. While we may not be able to gather together in person or travel to experience new cultures, we can reimagine alternative experiential learning programs that keep our students engaged in hands-on learning while also keeping them and our communities safe. Experiential educators are some of the most resourceful and creative program developers and leaders around, and no doubt your creative juices are already flowing.

This document is intended to start a conversation and create a space to share ideas and encouragement. We hope that the ideas and resources below will be helpful to you, and that you'll contribute your own advice, examples, and stories in the comments section.
What is experiential learning?

Action learning. Hands-on learning. Learning by doing. Mens et manus. There is no shortage of terms for “experiential learning.” Yet experiential learning (EL) entails more than just an active approach. We believe that the combination of these five qualities makes for exceptional learning experiences for students:

1. **Significant hands-on engagement.** Students are engaged in active problem-solving, not passive absorption of knowledge in a lecture hall.
2. **Rigorous connection to academic content and expertise.** This includes both the nature of the work and the involvement of an expert mentor or supervisor (typically faculty, staff, employer, or community practitioner).
3. **Meaningful intensity & sustained duration.** Dosage matters!
4. **Structured student reflection & formal evaluation & assessment.** Students have opportunities to reflect on and process their experiences, and there is some external evaluation and assessment.
5. **Authentic context, connections, & consequences.** Real-world stakes and accountability for results sharpen and lend an urgency to student learning.

Experiential learning in a moment of social distancing

We know what you’re thinking. “Let me get this straight: I now have to convert my messy, hands-on, roll-up-your-sleeves program to exist within... a virtual environment?” Virtualized experiential learning seeks to adapt traditional EL programs and activities to an online or remote format. To be honest, not every element of every program will translate, but some definitely can. And either way, there’s plenty of learning that can still happen.

Below, we’ve crowd-sourced some initial tips and advice from experiential educators across MIT. *(Big thanks to Jill Bassett, Michael Bergren, Elise Chambers, Ari Epstein, Libby Hsu, and Ellen Reid for their invaluable input!)*

Our advice

1. **Empathize and improvise with your students.** MIT program participants anticipating hands-on, in-person experiences may be deeply disappointed by the loss of them due to the COVID-19 pandemic. It’s important to acknowledge and discuss this, while also reinforcing that lots of important work and learning can be done virtually. MIT students, faculty, and staff have the potential to make huge contributions in the current moment, and we know that our students are at their best when faced with the gnarliest problems.

2. **Adjust and manage expectations, not just experiences:** Not all learning outcomes are achievable in a virtual environment. It’s ok to shift gears and focus on learning skills or content that better lend themselves to an online experience. Consider engaging students in helping to develop or revise learning objectives. Make sure they’re clearly stated and design and foster experiences to deliver those outcomes.
3. **Add more ingredients for a tastier cake.** If some elements of your usual EL offerings just can’t be transferred online, get creative about other ways to enrich the recipe. Think about assigning reflection materials that help students consider how others experience the issue they are working on. Look for online courses or provocative TEDTalks that encourage sideways thinking about key topics. Encourage students to step out of the normal work and do something fun, novel, or relaxing. *Pound cake notwithstanding: with just 4 ingredients, it’s pretty tasty.*

4. **Overcommunicate.** Compensate for the awkwardness of virtual platforms by reaching out more frequently, calling on specific people to speak up in meetings, etc. When possible, check in with students one-on-one in addition to meeting as a group. And communicate on their terms whenever you can; students may find a phone call or email hopelessly old-fashioned (and you may find that it is frustratingly ineffective). You might have better luck with Slack or Discord.

5. **Put students in the driver’s seat.** Empower participants to drive their own learning and reflection; engage with the cohort frequently as a guide and facilitator. Brainstorm with students about what personal/professional/academic enrichment they were hoping to get out of an in-person EL opportunity, and how they might work with you and other partners in the project to replicate some of this virtually.

6. **Consider student needs and responsibilities.** Some students may find themselves with caregiving, financial, or other responsibilities due to COVID-19. These may take priority over more abstract learning outcomes, and that’s ok. Try to help students structure their activities to meet these more immediate needs as well as their long-term goals.

7. **Create a virtual community by adopting digital communication tools that everyone can use.** Utilize learning management software (LMS) or other virtual platforms in ways that effectively support engagement in the learning process and with others in the program. Ask students what their preferred platforms are and use them wherever possible. Consider access, inclusion, and equity when choosing and using these tools. (MIT exemplar: Terrascope)

8. **Invite your partners to the table.** Partners, be they organizations you’ve worked with for decades or recent alums of your program, can be a gateway to real world expertise in a virtual setting and expand the networks of learners in ways that are similar to in-person interactions. Enlist partners, as their needs and capacity permit, as “co-instructors” collaborators on projects, virtual tour guides, lecturers, demonstrators, or mentors. Pay them if you can, especially if they are non-profits/social impact orgs. (MIT exemplar: PKG Center)

9. **Foster online mentorship** among the cohort of students and broadly through partners. Matching based on student needs and interests and mentor expertise can be a time-consuming, painstaking process. With a relatively short program window, it may not make sense to try to create large numbers of deep mentor relationships, but programs could encourage and support them on a case-by-case basis when there’s interest and availability on both sides. (MIT exemplar: Sandbox)
10. **Make your community a fun, social, and safe place** where everyone feels comfortable sharing, struggling, failing, commiserating, rebounding, and celebrating. Make time for personal connections and even silly games. Establish solid ground rules. Give students room to create “unsupervised” spaces as well where they can communicate with one another without a program leader present. Build a culture of belonging and inclusion. (MIT exemplar: D-Lab)

**Program Ideas and Options**
- Expert practitioner panel discussions
- Simple “kits” (containing small parts or supplies) mailed to students for hands-on project work
- Gaming-style virtual simulations
- Presentations and other interactions with real world “clients” to get critical feedback
- Private, shared, and public reflections (posted on blogs, Twitter, or other platforms)
- Virtual meals, “coffee breaks,” or office hours with alumni, professionals, or staff members

**Other Resources**
- MIT Teach Remote: [https://teachremote.mit.edu/best-practices#nonlecture](https://teachremote.mit.edu/best-practices#nonlecture)
- MIT Open’s Teach Remote: [https://open.mit.edu/c/teachremote](https://open.mit.edu/c/teachremote)
- MIT Open Learning: [https://openlearning.mit.edu/](https://openlearning.mit.edu/)
- MIT Libraries: [https://libraries.mit.edu/](https://libraries.mit.edu/)
- Association for Experiential Education, Principles of Practice: [https://www.aee.org/what-is-ee](https://www.aee.org/what-is-ee)
- Harvard’s Teach Remotely: [https://teachremotely.harvard.edu/best-practices#anchor2_4](https://teachremotely.harvard.edu/best-practices#anchor2_4)
- GuideStar: the national database of nonprofit organizations: [https://www.guidestar.org/](https://www.guidestar.org/)