I’ve been teaching undergraduate chemistry courses for 18 years. My “space matters” epiphany occurred over a decade ago when Dr. Christina Bailey came to our campus to highlight Cal State Poly’s successes with Studio Chemistry, an integrated approach to teaching chemistry in physical spaces designed to coalesce laboratory and lecture experiences into a single optimized learning environment. Inspired by this reform in teaching chemistry, several of my science colleagues and I revamped multiple courses to embody learning by doing strategies and engage students in civic actions and responsibilities (SENCER initiatives). At the same time, we began to redesign traditional lecture and lab spaces to support learning experiences facilitated by seamless toggling between short lectures (lecturettes), authentic laboratory experiences, and collaborative learning. However, regardless of being externally or internally funded, learning space overhauls to align with active pedagogies like the one described seemed to be a series of random campus prototypes, done in relative isolation, and led by only a handful of faculty and campus planners.

The turning point for our camp was our University’s updates to our institutional mission and the strategic goals to support it. The latter included defining the signature pedagogies our faculty members most valued, and formulating a plan to provide innovative learning spaces to optimize them. We defined our collective pedagogies as Nexus Learning™, a descriptive phrase that exemplified the evidence-based strategies we collectively use to foster active/engage, real-world, collaborative teaching and learning strategies grounded in the liberal arts and sciences.

To support Nexus Learning™ approaches, the university began an active learning space initiative that would eventually overhaul, one-by-one, existing traditional, row and column classrooms into learning spaces that allow faculty members and students to work actively and collaboratively through mindful use of furniture, optimized configurations, and technology choices.

Currently, as the Director of our Center for Teaching Innovation and Nexus Learning™, I coordinate these campus-wide learning space initiatives. While inclusion of all stakeholders in all phases (design, implementation, assessment, iteration) of these initiatives is widely perceived as beneficial, it is often a daunting task to bring together both campus and off-campus stakeholders who may hold different agendas, viewpoints, and goals.

However, frequently bringing these stakeholders together to develop consensus building skills (e.g., conflict resolution, negotiating, value propositions) and promote “buy-in” leads to more inclusive decision-making that considers all stakeholders’ values and viewpoints. For us, this sustained effort goes beyond just getting “buy-in” but has engaged stakeholders on our campus in a unified mission of space reform that ultimately allows for better teaching and learning.

Over the past five years of our learning space initiative, we have learned much. We have used this knowledge and many lessons learned to create models and approaches to help us and others foster meaningful and sustained stakeholder involvement in learning space initiatives.

For example, in the spirit of active learning and to foster consensus building skills among varied stakeholders, we designed a game intended to be played by institutional (e.g., administrators, faculty, facilities, development, etc.) and external (e.g., architects, interior designers, etc.) stakeholders early on in the process of learning space initiatives.

“Meet the Stakeholders” is a scenario-based, stakeholder role-playing game that provides an opportunity to understand multiple stakeholders’ viewpoints, concerns, and agendas along the entire process of a campus learning space initiative. It takes “players” (actual campus and off-campus stakeholders) through problematic or challenging scenarios from the viewpoint of a particular stakeholder group.

Players work collaboratively to problem solve and consensus build to address each particular issue, mirroring the process they will use in their real-life learning space initiatives.

At a University that values the design process for our students and faculty/staff, we consider our spaces to be prototypes to be iterated, becoming better and better with each learning environment we design and implement.