Limitless Learning: The Post-Pandemic Campus Is Connected, Flexible, Resilient

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While COVID-19 has forced a reimagining of how and where we work, in the case of higher education, the pandemic accelerated trends that were already underway, according to Elliot Felix, founder and CEO of brightspot Strategy, a higher ed strategy firm focused on improving the student, faculty and staff experience.

The ways learning takes place were already converging, and a more connected campus was emerging, impacting the ways institutions compete and position themselves vis-a-vis programs, people and places, related Felix, speaking at a Knoll k. talk webinar with Carol Crane, Knoll Vice President, Healthcare & Education.

Felix shared some predictions and strategies for the post-COVID campus.
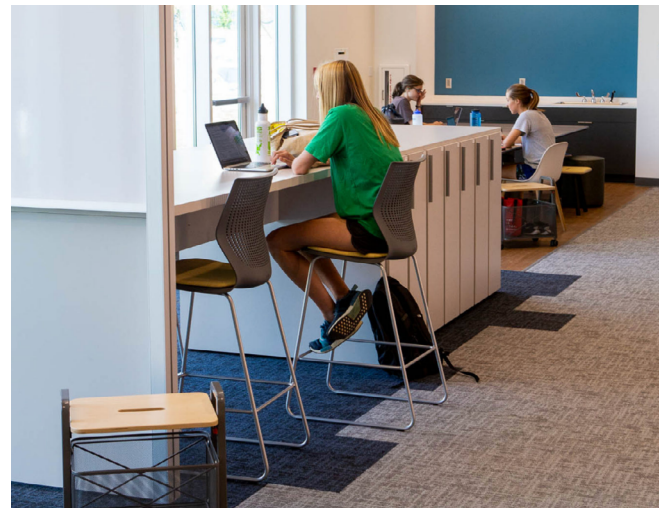
A Trend Toward a Convergence on Campus

Historically higher education has been defined by separation, according to Felix, whose New York City-based firm has helped transform more than 91 colleges and universities. Academics rarely operated with industry. Learning was either on campus or online, attended by different people supported by different programs from different parts of a university. Research and labs might have been isolated from teaching. Academic and student affairs rarely overlapped. Capital and operation planning were similarly disconnected.

Even before the pandemic those lines were blurring. "A third of students take a class online right now. Two-thirds of students study within an hour of home. And two-thirds of online [students] go to campus at least once," said Felix, adding that universities are creating storefront "microcampuses" for online students.

As these worlds further converge, institutions will be defined by how well connected they are. Felix predicts:

+ Academia and industry partnerships, lifelong learning

+ Hybrid programs that combine both online and on-campus learning

+ Interdisciplinary research in hybrid wet/damp/dry labs, overlapping with instruction to solve real world problems

+ Individual and teamwork fluidly combined

+ Integrated services to serve the whole student, connecting the academic and administrative sides with mental health and wellness support

+ Looped planning and processes connected pre- and post-space occupancy using lifecycle cost approach

Impacts of COVID-19 on Higher Education

Felix shared that the pandemic has impacted higher education across a number of areas.

Social. Social distancing that forced us to be apart may in fact make us want to be together more. At the same time, a heightened sense of risk makes high density interactions less appealing, impacting urbanization and use of mass transit.

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Financial. Decreases in state, federal and endowment funding threaten to destabilize institutions and force them to do more with less.

Enrollment. Demographic shifts – such as 15% fewer 18-year-olds in the pipeline – will impact enrollment. Additionally, as recently revised codes of ethics allow institutions to market to students enrolled elsewhere, greater competition will ensue.

Programmatic. Enrollment trends and competition will create a need for much greater flexibility in terms of degree and non-degree programs that allow people to pick the format, time, place and

how they want to learn. Instead of being confined to four years, education will stretch over a lifetime, and students will affiliate as a member of an institution.

Student Services. Student services will have to accommodate an increasingly diverse student body in a more integrated way, rather than provide numerous specialized offices that are hard to navigate and expensive to operate.

Institutional. More school closures can be anticipated. By some estimates, 10 to 20% of schools are at risk, especially institutions that are tuition-dependent and lack an endowment to buffer them in a time of crisis. We can expect more partnerships, regionalization and new ways of organizing people and programs. Institutions that can leverage their digital presence and online learning options can further broaden their reach.

Campus impacts for the near term: fewer people in space

Pending availability of a vaccine or other preventative treatment in the next few months, we can expect lower densities, increased hours of usage and new norms and operations requiring more staff to enforce.

With social distancing requiring more space per person, campuses will have more empty spaces and fewer people in shared spaces.

Accommodating lower densities will require scheduling over a greater period of time, such as night and weekend classes.

Campus impacts for the long term: fewer spaces

Demand for large lecture halls will decrease since that type of learning adapts well to online platforms. With a recognition that much office and instructional work can be done remotely or at satellite locations, demand for space on main campuses may decline, as may funding for expansion.

Building systems and materials will need to be re-evaluated for health and safety, and updated operations put into place for the new norms. Renovations to support different ways of using space may become more common than new buildings.

Five Planning Considerations

Felix offers five steps institutions can follow to plan for these changes.

1. Take the pulse of your community

Figure out how they're feeling and what they need using tools such as surveys, focus groups, interviews. Mine usage data about how services and learning management systems are being used. Assess needs by race, income and demographic background to ensure the most vulnerable students are supported. They are the ones hit hardest in a crisis.

Identify the invention and ingenuity that has emerged in the last few months and scale it up. Include feedback loops in place for the future.

2. Assess current spaces and systems

Understand future user demand. For students, expect enrollment changes due to fewer international students, increase in gap years, more local and lower cost options, and preferences for online learning. Faculty and staff might need or want to work remotely.

Assess space capacities and supply, estimating the number of people who can be accommodated in various scenarios and what

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those changes would mean. For example, "If we did X, we'd have to teach 7 days a week. If we did Y, we'd have to teach 5 days." Think about the implication those scenarios have on staffing as well. Also think about what disciplines must have in-person access to spaces to be effective for students, such as health sciences education, research, performing arts and others. Policies may need to vary to effectively accommodate these curricula.

An institution's numerous interdependencies make it a rather complex problem. However, running a couple different scenarios of possible demand and understanding the supply of space available

will provide a quick sense of how the two compare so shortfalls or surpluses can be identified.

Also consider configuration for distancing, airflow and people flow.

3. Adapt current spaces and systems

The resulting shifts in demands and reduced density will likely require layouts to be adjusted, spaces reconfigured and traffic flows through spaces, stairs, elevators and other pinch points be reconsidered.

Additional technology such as occupancy sensing and seat/room booking platforms may be needed to manage, monitor and utilize spaces, as well as mitigate risks.

Air exchange, filtration, and humidification systems will likely need to be improved and touch points such as elevator buttons or faucets reimagined.

4. Adapt operations and organization

Revised schedules and systems will require new operations with greater levels of flexibility, as well as more frequent cleaning and supervision.

For example, international students may not make it back to campus and choose to enroll in online classes, presenting time zone issues. Large events will not happen in-person but will be simulcast.

Organizations must adjust to a hybrid curriculum, blending on-campus and online learning. To accommodate in-room and remote learners, courses will incorporate more testing, tracking and sensing of students.

New, more flexible ways of organizing will emerge. Cohorts of students studying in smaller groups decrease the risk of exposure. Residence halls become living and learning communities.

Block plans may be implemented, so instead of four courses over four months, students may take a single course a month over four months.

As a major pinch point, procurement can conceivably determine whether the university is ready to reopen or not. It will take months to work the supply chain to obtain tens of thousands of masks,

pallets of sanitizers, as well as the manpower to manage and monitor spaces, operations and cleaning, so processes should be in place now.

5. Communicate those norms

Proactively communicate the norms and behaviors with wayfinding and visible cues similar to signage seen in grocery stores. Advise procedures for elevators and other transit hubs, and articulate expectations for self-monitoring and personal responsibility.

Other Lessons From the Field

Felix shared some examples of strategies implemented by other institutions that provide lessons for colleges and universities to consider.

Provide easy access to technology for students in need. Scale up.

Early insights from brightspot's Student Experience Survey indicate that students are likely to take advantage of online offerings – from classes to online support service, such as career consultation, library support and tutoring.

Preferences vary by type of student. Part-time students, low income students and students of color all ranked access to technology important. Some schools have jumped to fill the gap by providing grants, laptops and/or mobile hotspots to students who may not have necessary technology access.

Finding a small-scale pilot program that's working, but needs more funding or support is a great way to meet some of these needs. At North Carolina State, a laptop lending library program was scaled up 20-fold once classes pivoted online. It was a quick win and terrific lesson in how campuses apply ingenuity and dedication to be really nimble.

New, more flexible ways of organizing will emerge.

Use tools to manage smaller transactions to offset lost income

School closures resulted in significant losses of auxiliary income: refunds for housing, dining and activity fees; cancellation of elective medical procedures; and space rentals for events and summer camps.

It's pretty grim in terms of recouping lost revenue, Felix admitted.

Programming in smaller increments may help close gaps. For example, instead of a campus being used for a camp all summer, it may run in a couple two-week sessions.

Colleges and universities can take a lesson on managing smaller transactions from new fundraising platforms that reach small donors. Much of the shift from large donor bases would not have been possible without the tools to do outreach and broaden the scale of people, expand the pipeline and manage smaller transactions and make them meaningful.

Peer into the future

Regions hit with the coronavirus earlier have begun opening up, providing a window for U.S. colleges and universities to peek into. NYU Shanghai has a partial re-opening underway. Strategies included a phased approach (20% of classes resumed), a single point of entry into each building, temperature and health checks, masks, and frequent cleaning and sanitizing.

Social distancing is accomplished via lower density classrooms, dining halls with single tables, elevator limits and reduced reserved seating in library.

Build community with unique online campus experiences

College students crave connection. However, maintaining it in the post-pandemic world is more complex than moving activities online.

"You don't want to directly translate campus to online, because there is a difference in the two media, much the way you don't want to just lecture through Zoom," said Felix. "We know good online learning has synchronous and asynchronous aspects," he said.

Much like the mistake of assuming all learning happens in the

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classroom, it's not an online classroom that's needed, but the entire campus to build those experiences. It's about thinking through how you provide those opportunities for community and connection.

Lessons can be learned from institutions with long-time online presences. For example, University of New Hampshire has very active social channels: they simulcast sports games, they have numerous clubs and activities. Similarly, Davidson College maintains

community online by broadcasting theater productions over video and showcasing work online.

"It's looking for what you can do online that you can't do elsewhere," suggests Felix, which may mean trying different things out.

"It can be done. It just has to be intentional and you have to widen the frame beyond the classroom and know you're creating an online campus."

Leverage regional locations with differentiated product

With declining enrollments, small private universities may have a tough road ahead. Today, one hope lies with regional comprehensive universities. Pre-pandemic, they had a tenuous future, as large numbers of students increasingly opted for flagship state universities.

But as a result of the pandemic, people may prefer to study closer to home and, all of a sudden, a regional's scale and location becomes a significant draw for local students. With the threat of another outbreak, smaller regional universities have strong appeal because they pose less risk than their bigger sibling based in a higher density metropolitan area.

Regional comprehensives will have to figure out how to differentiate themselves and offer what a two-year or community college can't, added Knoll's Carol Crane.

Additionally, regionals will have to think about how they will collaborate with community colleges, who are historically the best at working with local communities and are known for being responsive, able to turn on a dime and stand up new workforce development programs that help their community.

Looking Ahead

Higher education may face some significant challenges in the near and mid-term. But with some smart planning now, there is hope for a healthy future. Felix imparted some findings from his firm's research and observations that offer new thinking.

Improve utilization

Higher education has one of lowest utilization rates of the built environment since spaces are often used only certain months of the year for select hours. This will probably improve post-pandemic.

A better metric to analyze usage is cost per hour utilized, explained Felix. For example, an open office is about 10 times the cost per hour used as an open classroom seat. The average office is used 30% of the time, and the typical classroom might be used 65% of the time. Students might take up 25 square feet whereas an office dweller takes up around 125 square feet.

Looking at hybrid metrics such as space per hour utilized, or dollars per hour per square foot provides a revealing look that might spur reimagination and repurposing of existing spaces rather than building new ones for certain space types such as offices.

Rebuild for resiliency

When it comes to upgrading systems, changes need to be more durable and resilient than existing ones. For example, after Hurricane Sandy destroyed much of New York City's infrastructure, new systems were built that provided greater resiliency.

Changes to building systems and air filtration were upgraded so building managers could shut certain parts on and off and operate differently as needs shifted around the clock.

The future is connected

Some of the COVID-19 impact on built environments will be temporary and some will be permanent.

Certainly, programmatic trends will endure, according to Felix.

"The convergence of online and on-campus, and education and work will continue. That has been accelerated. The notion of having a lifelong affiliation to one's school, choosing a job based on how much you can learn there and how you develop will only intensify," he related.

"As will the idea that you can have the flexibility to modulate between on-campus and online, by course by semester or by week—the so called "high flex hybrid flexible class"—where you're in person for the discussion and the next week, online for the lecture. All of that is going to take place."

"I don't think we will spend the rest of our lives 6 feet away from each other," said Felix. "Though we can expect density to come down, spaces will open back up, more spaces will be shared, technology will make it easier to share, manage, monitor."

Campus will be more connected than ever. ⬛

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Replays of "Keeping the Campus Connected in a Post-Pandemic World" k. talk can be viewed on the Knoll website.