



University at Buffalo

Center for Educational Innovation

Academic Affairs

Trends of Online Learning in Higher Education: How Online Learning Will Shape Higher Education

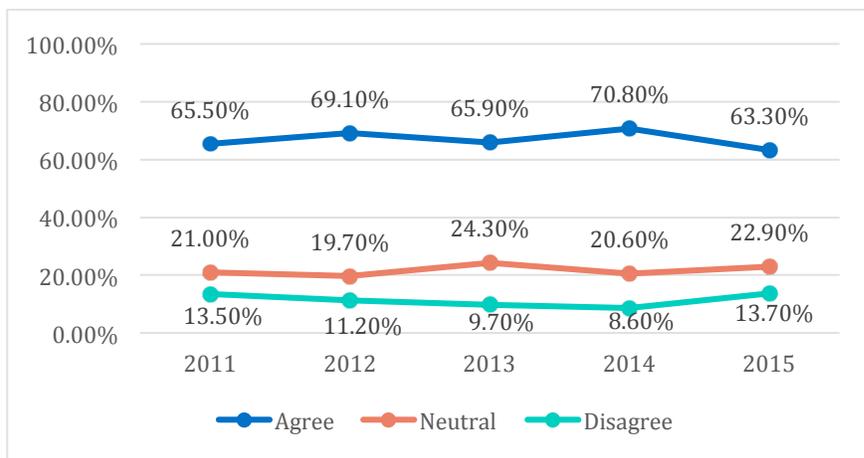
A White Paper From the Center for Educational Innovation

Online learning has been touted as a way to address some of the challenges higher education institutions face and extol as a tactic for staying competitive. Various external and internal forces have brought about the expansion and growth of online learning in higher education. External forces such as decreased state funding, tuition increases, technology costs and depressed economies have led to internal pressures to reduce costs and increase revenue in many higher education institutions. Combined, these stressors are influencing and changing the way faculty teach and students learn in higher education (Kuruvilla, Norton, Chalasani, & Gee, 2012). Academic leaders expect that online education will compensate for a decrease in traditional course offerings by saving costs and improving the effectiveness of learning (Allen, Seaman, Poulin, & Straut, 2016). However, in many universities, implementation and initiation of online education is still in experimental stages, such as combining the new ideas and advanced educational technologies of online education with existing methods (Huron Consulting Group, 2014). Therefore, identifying current trends and issues of online learning and shaping the future of online education is of importance to senior administrators as well as faculty members. This white paper examines recent trends and issues of online learning in U.S. higher education in the last five years through a review of literature and provides recommendations to guide academic leaders in making informed decisions about the future of online learning in their institutions.

Online Learning as an Organizational Long-Term Strategy

Overall, the proportion of higher education institutions reporting online education as an integral part of their long-term strategy has remained high over time. As shown in Figure 1, more than 63 percent of the institutions have agreed that online education is crucial to their long-term strategy in the last five years.

Figure 1. Is Online Learning Strategic in My Institution?

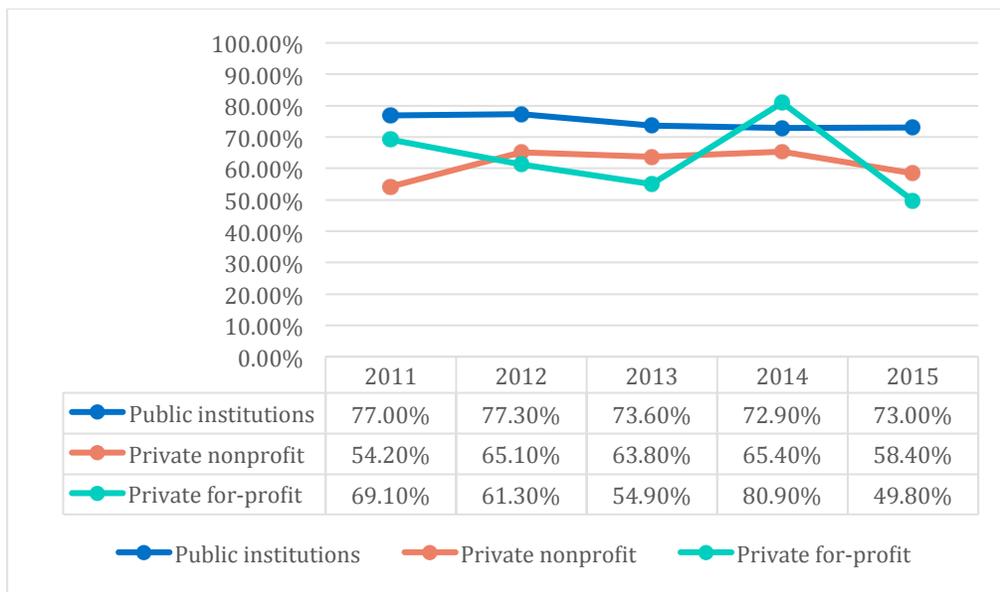


Source: 2016 Babson Survey Research Group

In 2013 and 2015, however, there was a decrease in the percentage of those agreeing with the statement, with the largest decrease in 2015. In 2014, 70.2 percent of small institutions reported that online education was critical for their long-term strategy. In 2015, small institution responses dropped sharply to 46 percent. This reflects the fact that while small institutions with online course offerings are positive about online education, those with no online offerings are negative about online education (Allen, Seaman, Poulin, & Straut, 2016).

As shown in Figure 2, in the last five years more than 70 percent of public institutions have consistently stated that online education is critical to their long-term strategy, higher than other institutions, such as private nonprofit and private for-profit institutions. For private for-profit institutions, the high percentage (81 percent) indicated in 2014 appears to be abnormal.

Figure 2. Is Online Learning Strategic in My Institution? By Public Institutions — 2011 to 2015

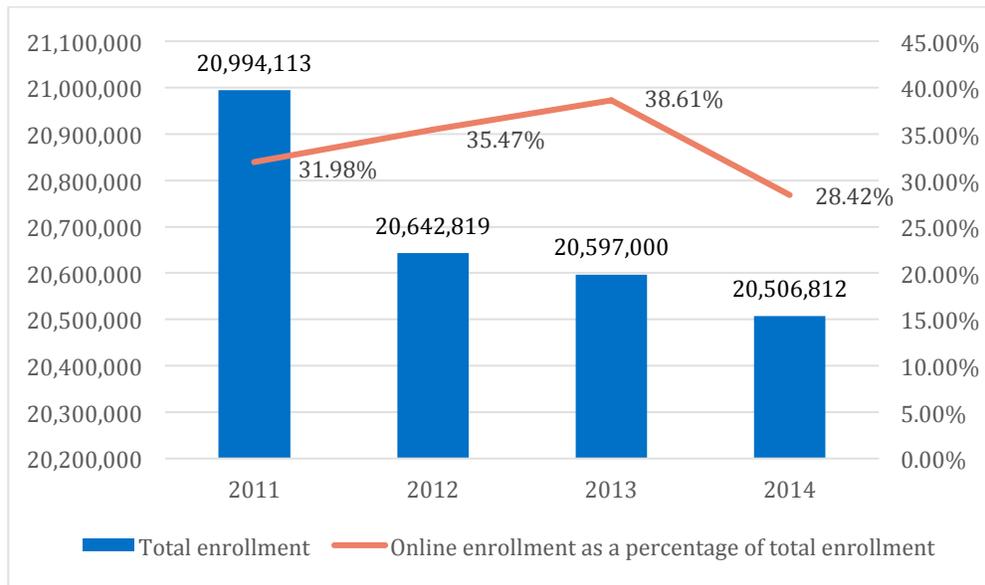


Source: 2016 Babson Survey Research Group

Enrollment in Online Learning

Even though overall higher education enrollments experienced a downturn from 2011 to 2014, enrollments in online education grew from 2011 through 2014 and then declined in 2015. The growth of enrollment in online education compensates for the downturn of traditional enrollment (Lokken & Mullins, 2014). The negative growth of enrollment in private for-profit institutions contributes to the break in growth of online enrollments in 2014.

Figure 3. Online Enrollment as a Percentage of Total Enrollment — 2011 to 2014



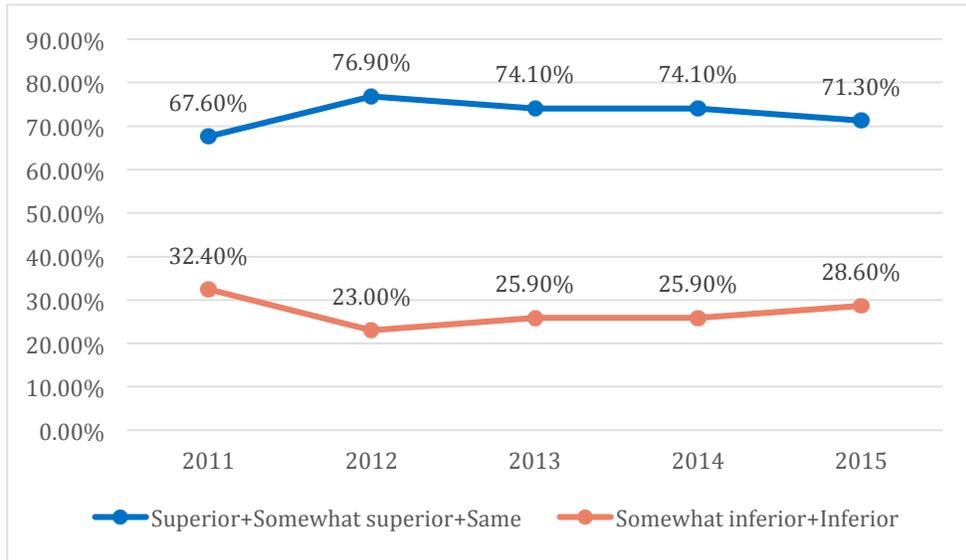
Source: National Center for Educational Sciences & 2015/6 Babson Survey Research Group

The majority of students enrolled in higher education during this time attended public institutions. Many institutions have continued to add online learning programs to their curriculum, while overall enrollment in higher education institutions has declined. In terms of the number of students, the enrollment of undergraduate students in online education was double that of graduate students in 2014 (Allen, Seaman, Poulin, & Straut, 2016).

Effectiveness of Online Learning vs. Face-to-Face Instruction

The effectiveness of online learning and the achievement of student learning outcomes in online courses have been a contentious issue. According to an annual survey implemented by the Babson Survey Research Group (Figure 4), the perceptions of academic leaders about the effectiveness of online learning were mostly positive in 2012, with 77 percent reporting that online education was as good as or better than face-to-face instruction (Allen & Seaman, 2013). However, since 2012, their perceptions decreased to some degree, with 71.3 percent in 2015 stating the same. Academic leaders in higher education institutions with online course offerings have consistently maintained a more positive view of the effectiveness of online education than those of institutions with no online course offerings (Allen, Seaman, Poulin, & Straut, 2016). This reveals that there are positive correlations between exposure to and a positive view of online education.

Figure 4. Perceptions of Learning Outcomes — Online Education vs. Face-to-Face — 2011 to 2015

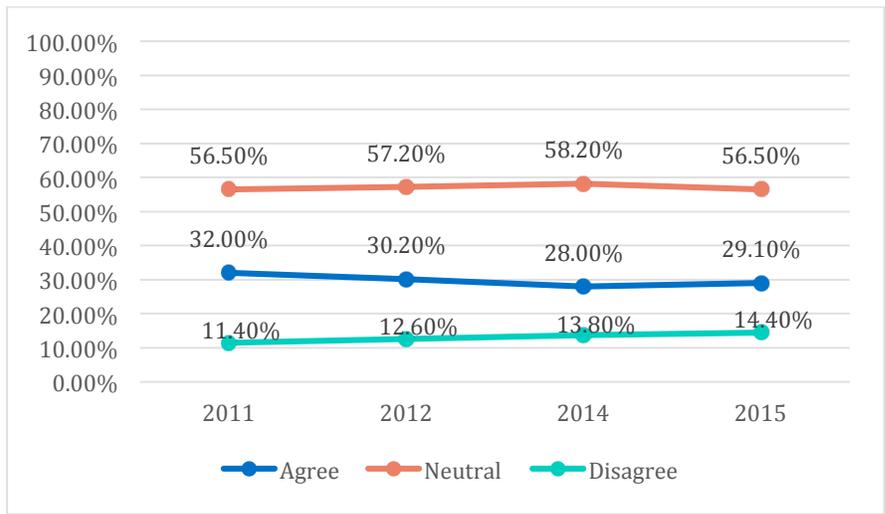


Source: 2016 Babson Survey Research Group

Faculty Acceptance of Online Learning

A majority of academic leaders consider online education as part of their long-term strategy, and enrollments in online courses have consistently increased, showing student acceptance. However, chief academic leaders believe that the faculty acceptance of online education has remained neutral or low. An overwhelming proportion (83 percent) of faculty members at institutions with no online offerings believe that learning outcomes for online courses are “inferior” or “somewhat inferior” to those of face-to-face instruction. This rate drops to 69 percent of faculty at institutions with online course offerings, and 55 percent at institutions with fully online program offerings (Allen & Seaman, 2012; Allen & Seaman, 2013). In other words, administrators and professors with greater exposure to online offerings have taken a more positive view of online learning. As shown in Figure 5, from 2011 to 2015, only about 30 percent of academic leaders believed that their faculty accepted online education.

Figure 5. Perceptions of Academic Leaders on Faculty Acceptance of Online Education — 2011 to 2015



Source: 2016 Babson Survey Research Group

Interestingly, for the last several years, academic leaders believed that more than 55 percent of faculty remained neutral to accepting the value and legitimacy of online education. Reasons why faculty acceptance of online learning remains neutral or low include a relatively heavy workload for online teaching, little or no exposure to online learning, and lack of institutional supports for faculty who teach online courses. Exploring opinions of faculty members who reside in the neutral category is key for improving faculty acceptance of online learning. This provides an opportunity to address the restraining forces in faculty members’ minds and to help them shift to a more positive view of online learning.

Institutional Supports for Faculty

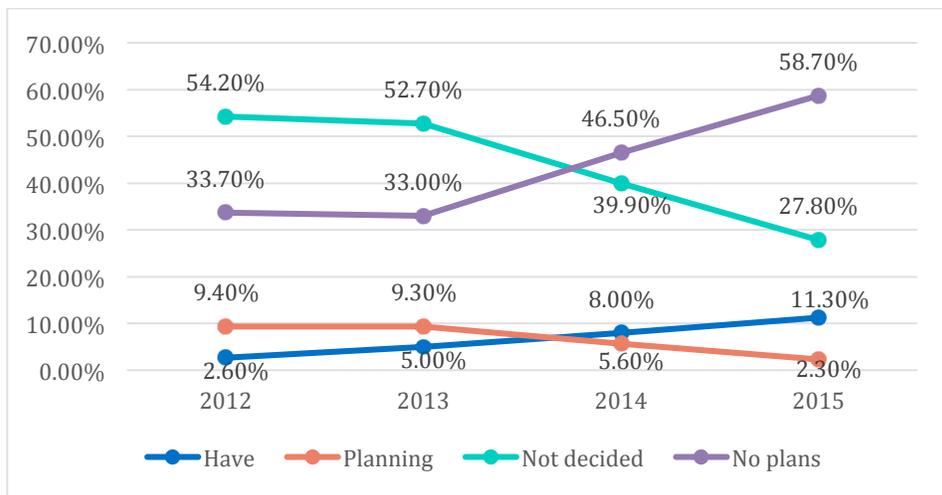
A majority of academic leaders in higher education institutions reported that they provided training opportunities and quality assessment tools for faculty teaching online. Conversely, only one-quarter of faculty thought that their institutions had good tools for assessing online instruction. Academic administrators have a much more positive opinion regarding the assessment tools and the fair reward systems for online teaching than faculty do (Allen & Seaman, 2012). Faculty who teach at least one online course have a much more positive view of the assessment tools than those who do not teach online. Since many faculty believe teaching online courses requires more time and effort than traditional courses, appropriate and fair rewards, such as promotion and tenure, need to be considered for these faculty. Many institutions seem to recognize the importance of developing a fair reward system for online teaching, and a third of faculty agreed that their institutions had a fair system paying for online teaching.

Faculty face a lot of pressure when they consider teaching online. About one-third of faculty members expressed concerns that their institution was pushing too much instruction online; one-third of all faculty members said they “disagreed” that their institution was pushing too much instruction online, and another 8 percent reported that they “strongly disagreed.” In fact, faculty who teach online have similar or greater workloads than faculty who teach traditional face-to-face courses, and online courses have at least the same work unit schedules as face-to-face courses (Godow & Zellner, 2012). For academic leaders, fewer than 10 percent of administrators either agreed or strongly agreed that their institution was pushing too much instruction online (Allen & Seaman, 2012). There is a discrepancy between academic leaders and faculty members regarding faculty pressure to teach online.

Massive Open Online Course (MOOC)

A massive open online course (MOOC) is defined as an online course aimed at large-scale interactive participation and open access via the web. MOOCs have been one of the emerging themes in online learning in higher education. MOOCs have greatly accelerated the change of the online learning environment. Even though many institutions are not likely to have MOOCs in the coming decades, they are more likely to feel pressure to adopt MOOCs as a new instructional approach over time. As shown in Figure 6, institutions that have or are planning a MOOC remained steady, from 12 percent in 2012 to 13.6 percent in 2015. On the other hand, the proportion of institutions with no plans to implement MOOCs has consistently increased, from 33.7 percent in 2012 to 58.7 percent in 2015 (Allen, Seaman, Poulin, & Straut, 2016).

Figure 6. Implementation of MOOCs at Your Institution — 2012 to 2015



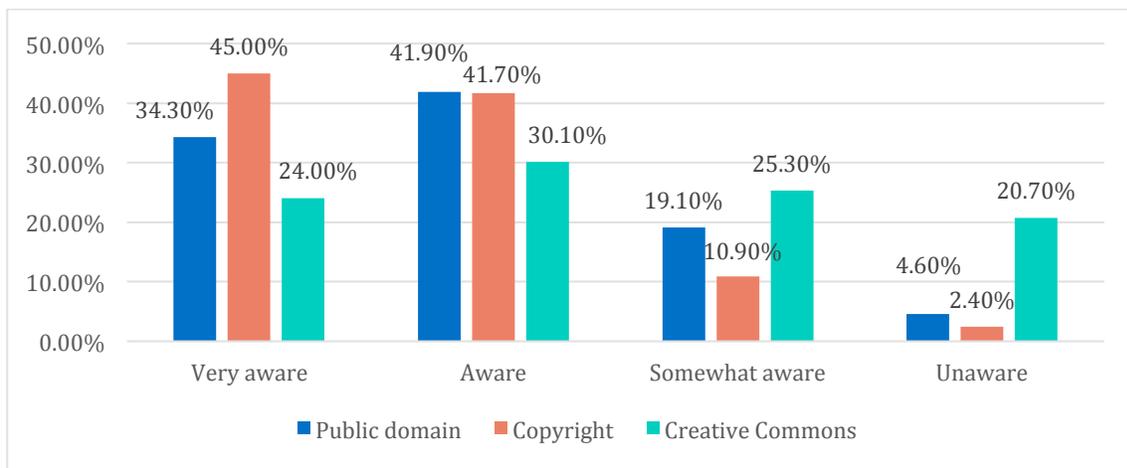
Source: 2016 Babson Survey Research Group

In particular, the proportion of institutions with no plans sharply increased in 2014 and 2015. On the other hand, the proportion of institutions that had not yet decided sharply decreased in 2014 and 2015. While the number of institutions delivering MOOCs has steadily increased, the number planning to implement MOOCs has decreased. Only 43.5 percent of institutions reported that MOOCs are a potential way to draw students in the future. Institutions offering or having a future plan to implement MOOCs also aim to boost their national and international brand power and awareness (Allen & Seaman, 2013).

Open Education Resources (OER)

OER is defined as freely accessible and open licensed intellectual properties for teaching and learning, such as documents and media. Although many academic leaders are aware of OER as a way of improving instruction and reducing costs, the concept of OER has been confusing to academic leaders as well as faculty (Allen & Seaman, 2014). More than two-thirds of academic leaders believe that OER has the potential to add value and reduce cost for their institution by saving the time and effort of developing new course materials (Allen, Seaman, Poulin, & Straut, 2016; Lokken & Mullins, 2014). However, many academic leaders still lack understanding of the details of OER. In addition, survey results indicate that 61 percent of academic administrators are concerned about the lack of awareness of OER by faculty (Lokken & Mullins, 2014). While they are aware of the core concepts of copyright licensing of classroom content and public domain licensing, 21 percent of academic leaders were not aware of the concept of Creative Commons licensing, where public copyright licenses enable the free distribution of an otherwise copyrighted work (Allen, Seaman, Poulin, & Straut, 2016). Figure 7 shows the academic leaders' awareness of licensing of OER.

Figure 7. Academic Leaders' Awareness of Licensing on OER — 2015



Source: 2016 Babson Survey Research Group

On the other hand, for faculty awareness of OER, most faculty (65.9 percent) reported that they were "not aware" of OER, while some faculty (13.8 percent) reported that they were "somewhat aware" (Allen & Seaman, 2014). Most faculty reported that they were aware of licensing issues, and nearly 90 percent of faculty who are aware of OER reported that they are also aware of Creative Commons licensing (Allen & Seaman, 2014).

Barriers to the Growth of Online Learning in Higher Education

The quality of learning outcomes is one of the primary issues in online learning. Many institutions do not have a consistent method for adequately evaluating and improving online courses and faculty teaching online. Another concern that academic leaders have in relation to the growth of online learning is the lower retention rates for online courses. At the national level, student retention in online courses is 8 percentage points lower than that of face-to-face instruction (Lokken & Mullins, 2014). 73.5 percent of academic leaders believe that lower retention rates in online courses are an "important" or a "very important" barrier. While most academic leaders have a positive perspective on online learning, there are several major concerns. These concerns include the need for student motivation and discipline in order to succeed in online courses; the quality of learning outcomes; and lower retention rates in online courses (Allen & Seaman, 2013). For 2012, 88.8 percent of academic leaders reported that students needed more discipline in order to succeed in online courses. Even though higher education institutions have made investments in faculty training, online learning environment, online degree programs and best practices development, online learning success for students has been a challenge, especially for first-time online students (Lokken & Mullins, 2014).

Conclusions

Online education enrollment in higher education has grown and will continue to grow, compensating for the decrease of traditional enrollment in higher education. A majority of academic leaders foresee online education as crucial for their institutional long-term strategy and as a promising way to save costs and improve the effectiveness of learning in higher education. However, there are still challenges for expansion and implementation — for instance, the tension between academic leaders and faculty members in the acceptance and implementation of online education. While academic leaders are very positive about online learning, some faculty remain skeptical about the effectiveness of learning outcomes, the value of online learning and a fair reward system for online teaching. Faculty with more exposure to online learning show a more positive perspective about online learning in terms of its effectiveness and legitimacy. In addition, there is concern regarding institutional support for faculty who teach online. While academic leaders think they have good supporting systems, only one-third of faculty

report they have fair reward systems in their institutions. To ease these concerns, faculty development and support are necessary for the success of online learning. Consistent faculty training is key for improving faculty engagement and support for online teaching. It helps faculty become confident in their ability to teach successfully online and improve their courses by increasing their exposure to online learning environments. In addition, fair reward systems encourage faculty to get more actively involved in online learning. By reducing tensions between academic leaders and faculty, academic leaders can encourage faculty to implement quality online education and improve student learning and retention in online education.

ENVISIONING ONLINE LEARNING

3 steps to help reach your online learning goals

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This infographic seeks to guide the future of online learning in higher education by considering trends and issues of online learning and exploring the challenges and root causes faced.

Check Driving & Restraining Forces 1

DRIVING FORCES

- Online enrollment growth
- Online learning as institutional long-term strategy
- Learning outcomes ≥ face-to-face
- Exploration of new ways, e.g. MOOC and OER

**Implementing
online
learning**

RESTRAINING FORCES

- Low faculty acceptance
- Lack of institutional support
- Lower student retention than face-to-face
- Quality of online learning and need for robust assessment tool
- Lack of student discipline

2 Take Actions to Move Online Learning Forward

STOP ■

- Do not be overly optimistic about online learning and be prepared to improve
- Do not put too much pressure on faculty teaching online

START >

- Provide opportunities for faculty to explore online teaching
- Offer institutional support and training for faculty
- Build a balanced reward system for all faculty
- Create an online learning orientation for students
- Establish a shared vision of student retention

CONTINUE >>

- Push forward with new ways of online learning (e.g., MOOCs and OER)
- Engage in ongoing communication with faculty and students
- Keep online learning a long-term strategy

3 Envision the Future of Online Learning

As we move forward, it is important to track the current state of online learning in higher education and envision the future for the next few decades.

Reviews of the state of online learning keep us motivated and on track to achieve long-term goals.

Step 1: Check the current state of online learning

Step 2: Take actions for changes in a feasible way

Step 3: Envision a big picture of the future

Embrace Now and the Future

"To accomplish great things, we must not only act, but also dream; not only plan, but also believe."
-Anatole France

References

- Allen, I. E., & Seaman, J. (2012). *Conflicted: Faculty and online education, 2012*. Babson Park, MA: Babson Survey Research Group. Retrieved from Education Advisory Board Website: <http://files.eric.ed.gov/fulltext/ED535214.pdf>
- Allen, I. E., & Seaman, J. (2013). *Changing course: Ten years of tracking online education in the United States*. Babson Park, MA: Babson Survey Research Group. Retrieved from Education Advisory Board Website: <http://www.onlinelearningsurvey.com/reports/changingcourse.pdf>
- Allen, I. E., & Seaman, J. (2015). *Grade level: Tracking online education in the United States*. Babson Park, MA: Babson Survey Research Group. Retrieved from Education Advisory Board Website: <http://www.onlinelearningsurvey.com/reports/gradelevel.pdf>
- Allen, I. E., Seaman, J., Poulin, R., & Straut, T. T. (2016). *Online report card: Tracking online education in the United States*. Babson Park, MA: Babson Survey Research Group. Retrieved from Education Advisory Board Website: <http://onlinelearningsurvey.com/reports/onlinereportcard.pdf>
- Godow, R., & Zellner, K. S. (2012). *Faculty workload & compensation in online and blended learning courses*. Retrieved from Education Advisory Board Website: http://www.uky.edu/ie/sites/www.uky.edu.ie/files/uploads/EAB_RM_Faculty-Workload-Compensation-in-Online-and-Blended-Courses.pdf
- Huron Consulting Group (2014). *Learning summit: The future of online education remains bright*. Retrieved from Huron Consulting Group Website: https://www.huronconsultinggroup.com/Insights/Whitepapers/Education/Learning_Summit_The_Future_of%20_Online_Education_Remains_Bright
- Kuruville, A., Norton, S., Chalasani, S., & Gee, M. (2012). Best practices in initiating online programs at public institutions. *Business Education Innovation Journal*, 4(2), 121–127.
- Lokken, F., & Mullins, C. (2014). *Trends in elearning: Tracking the impact of elearning at community colleges*. Washington, DC: Instructional Technology Council.