

The Need for Skills-Based Curricula Building in Higher Education

One of the key, enduring purposes of graduate education is to equip graduates with the skills and tools necessary to be competitive in the labor market. This holds across many surveys that study graduate students stated goals for their degree; for example, in a recent study by Third Way/ Global Strategy Group, the three largest factors that influenced the respondents' decision to pursue a graduate degree were "To advance in the field of my choice," "To get a good job," and "to earn more money."¹ The research clearly shows that career advancement and salary increases are the key motivators for students to pursue graduate education.

Additionally, insights from the Eduventures Adult Learning Demand report reaffirm this, highlighting that the number one expectation for prospective students considering graduate degrees is to increase their earning potential.² Furthermore, with employers increasingly shifting toward skills-based hiring, the emphasis on equipping students with relevant, in-demand skills has never been more critical.³

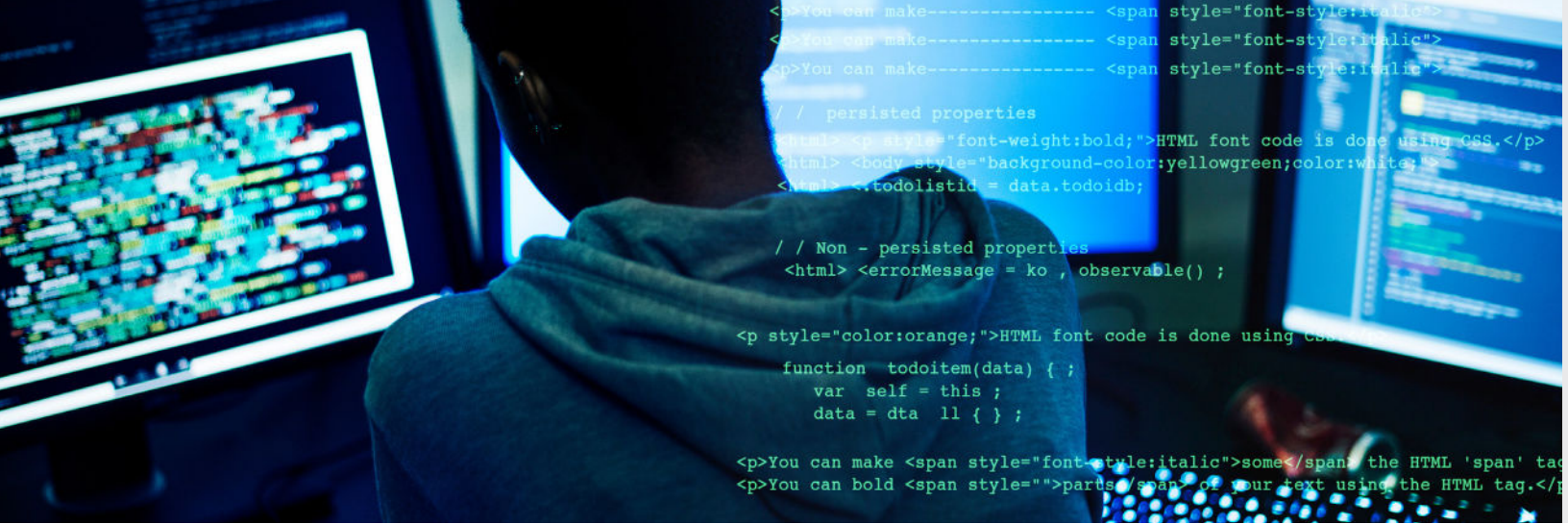
These characteristics influence what degrees prospective students get. Historically and contemporarily, business graduate degrees are the market's largest segment. The top five largest graduate degree areas by the number of 2023 graduates are shown in the chart below⁴:

Degree Area	2023 Master's-Level Graduates
Business	210,144
Education	148,230
Health	148,154
Computer and Information Sciences	77,673
Engineering	54,153

Each of these degree areas offers unique advantages. For example, an MBA is widely seen as a pathway to lucrative careers, while advanced degrees in education and health are often necessary for professional licensure and career advancement. Tech-related degrees, such as computer science, have seen significant growth due to industry demand, growing 69% since 2019 and 50% from 2022-2023.⁵

As technology advances rapidly, adapting curricula to evolving market demands is essential for ensuring that graduates are competitive. In the next section, we explore a real-world example of how universities can leverage data to align their programs with current job market trends.



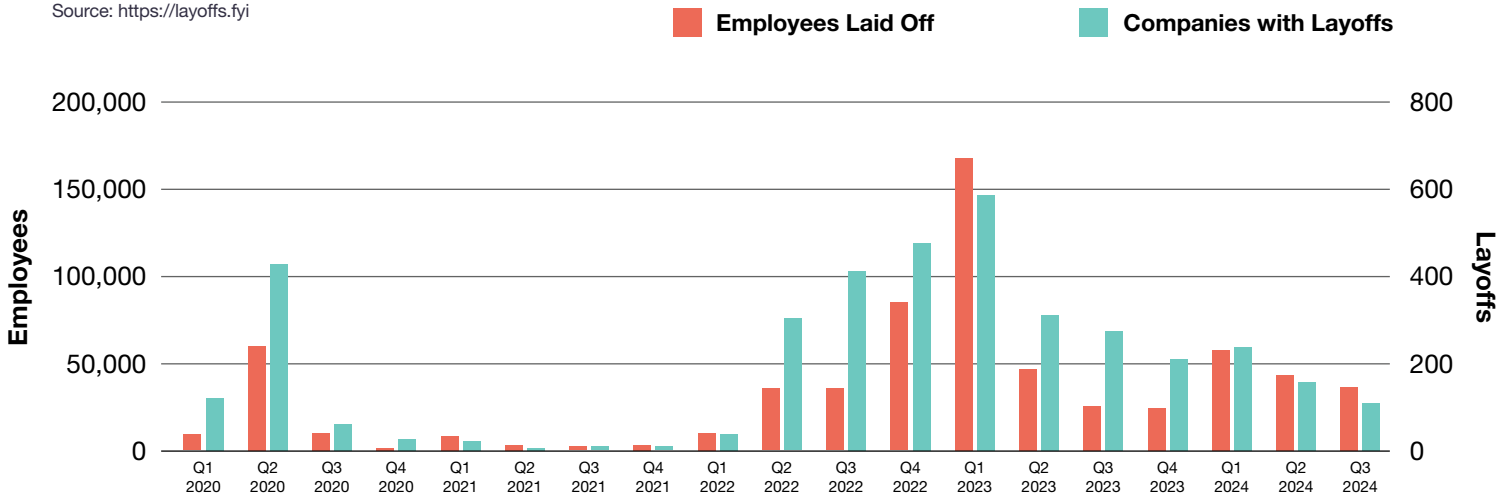


Software Engineering

We studied trends in job postings for Software Engineers to evidence a rapidly changing job market. This field has been widely reported on, having experienced a historic boom in 2020-2021, coupled with many reports of high levels of competition and saturation for roles more recently. The chart below – from Indeed – shows the amount of layoffs in the tech sector since 2020⁶:

Tech layoffs since COVID-19

Source: <https://layoffs.fyi>



Our research echoes this; a proprietary analysis shows the number of software engineering-related job postings plummeting 42% from 2020–2024.⁷

Despite a hiring lag, there are more software engineering graduate programs in the market than ever, with many launched in recent years. How can universities work to maintain these program’s value in the face of an increasingly saturated career field and highly competitive labor market?

Amongst other options, ongoing skills analyses can provide ideas for curricular features. We use Lightcast™ to find changes in skill requirements for a given job field over time. Our method for this analysis included pulling all skills in all job postings over the timeline stated above (2019-2024) and then comparing significant changes in the skills within those postings. We studied two key metrics:

1. Net change in postings with skill, to determine whether the demand for a skill has risen over the timeframe.
2. Difference in number of job postings and candidate profiles (e.g., LinkedIn) with the given skill, to see what skills have a higher employer demand than candidate supply.

Using this methodology, one skill stood out from the rest of the pack: artificial intelligence. Various additional skills, such as “Generative Artificial Intelligence,” combined to over 10,000 job postings in the past 12 months of available, representing a 120% increase in the roughly five-year timespan we studied. Additionally, it was listed in almost more job postings than relevant candidate profiles, indicating a gap between demand and supply. According to this analysis, incorporating AI/Generative AI into a program curriculum would give students a competitive edge in a crowded field, and would respond to growing employer needs.

The Importance of Regular Skills Analyses

Skills-based market analysis should be a regular part of any program strategy. In rapidly changing fields like technology, this should be done annually, if not more frequently, to ensure that programs remain relevant and that students graduate with skills that align with industry needs.

Incorporating up-to-date, in-demand skills into program curricula is vital for keeping graduates competitive. Institutions should routinely assess market trends and adjust their offerings to meet current employer demands. Partnering with Elsmere Education can help universities ensure their programs are aligned with the latest labor market needs.

Unlock Sustainable Growth with Data-Driven Strategies

At Elsmere Education, we collaborate with university leadership to deliver tailored program strategies that drive long-term success. Our comprehensive market insights help identify high-demand programs and emerging trends, positioning your institution as a leader in the field.

Ready to discover how our expertise can fuel sustainable enrollment growth? Contact Elsmere Education today to schedule a consultation.

To ensure your institution's programs meet employer demands and stay competitive in today's job market, leverage Elsmere Education's expert solutions. Contact us today to explore how our skills analysis and data-driven strategies can help you optimize your curriculum and position your graduates for success.



Sources:

1. Third way. Accessed September 2024. <https://www.thirdway.org/memo/employment-and-earnings-outcomes-shape-graduate-students-perceptions-of-program-value>.
2. Eduventures Research. Adult Learning Demand Update: Consumer Data in the Post-Pandemic Market. Encoura, 2023. <https://encoura.org>.
3. Eduventures. Adult Learning Demand Update. 2023. <https://encoura.org>.
4. Lightcast, Program Table, 2024.
5. Ibid
6. <https://layoffs.fyi/>
7. Lightcast, Job Postings Report, 2024.