



CASE STUDY

How AI education
saved a leading
telecommunications
company \$3.8 million



Unlocking digital transformation through data science education

A prominent international mobile phone operator saved \$3.8 million in increased efficiency and reduced hiring costs, in addition to driving a projected 287% return by investing in Udacity's School of Artificial Intelligence (AI). The program upskilled more than 1,190 workers with the technical skills needed to lead digital transformation.

The Problem

A blunted competitive edge, due to lagging tech capabilities

The company, which has more than 50 million subscribers and is one of the top five largest mobile phone operators in Europe, was experiencing rapidly declining revenue, attributed to digital disruptors like WhatsApp and other, more innovative over-the-top (OTT) service providers. The downturn posed a serious threat to the company's long-term viability.

To quickly evolve its own telecom services and regain a competitive position in the market, executive leadership decided to invest in strategic education. Forming a company-wide academy, the company enabled workers at all levels to learn the digital skills required in an evolving industry, including AI programming, machine learning and predictive analytics.

“We believe in the importance of companies continuing to invest in education and development to increase employee satisfaction and loyalty, as well as corporate efficiency...we believe we will accelerate [our country's] digital transformation.”

Telecommunications Company Manager

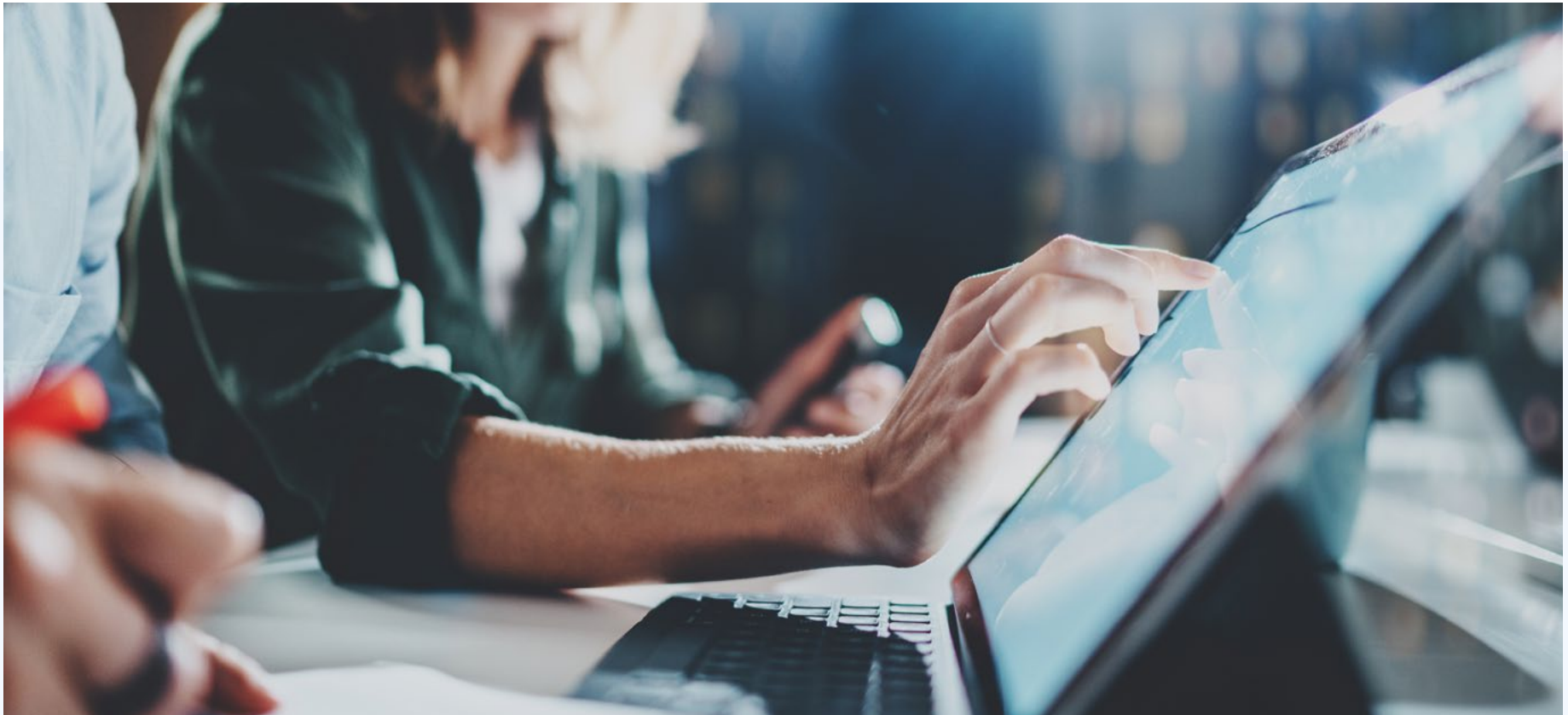
ON THE VALUE OF PRIORITIZING
INVESTMENTS IN AI EDUCATION

The Goal

Boost workforce skills across leading-edge technologies

The company's leadership reasoned that by implementing a comprehensive AI strategy — from optimizing the user experience to automating internal processes — and upskilling their existing workforce, they could transform from a basic telecom operator into a dynamic digital solutions provider.

Applying AI, machine learning and deep learning practices to business operations would modernize the company tremendously, and the company sought to do it without investing large sums in hiring new employees.



The Solution

A strategic, multi-year technology education partnership

By partnering with Udacity, the company leveraged its existing talent pool, equipping them with industry-relevant skills, coding languages and practical insights on how to best utilize data science to recapture lost market share. As part of the company-wide academy, Udacity's impact consisted of the following:



Translating AI theory into practical business situations

The real-world examples built into Udacity's coursework allowed learners to quickly and efficiently incorporate their new skills into their work without getting muddled in the more theoretical AI world. From using advanced programming languages to predicting energy consumption with machine learning, Udacity's project-based learning model put complex lessons into action immediately.



Designing comprehensive learning paths for all stages of study

From beginners to advanced learners, all participants in Udacity's Nanodegree programs received hands-on guidance and feedback from industry professionals. The insight from those already using the advanced data science skills at work was essential for envisioning how the theoretical concepts could be applied to each learner's position and future aspirations.



Teaching data science as a vehicle for value creation

With workers enrolled in advanced programming, business analysis and machine learning courses, the company was able to quickly apply data science principles and drive quantifiable performance gains. Learners reported that the Nanodegree programs overwhelmingly made a positive impact on their work (97%). Participants also approached their role from a broader scope (44%) as a result — and have been assigned to strategic projects or new roles to better utilize their skills.

The Results

Increased numbers in efficiency — and on the bottom line

Almost immediately, the company's leadership saw a return on their investment in terms of productivity, hiring costs and a transformed workforce — ready to advance the company into a modern telecommunications giant.

\$1.7 million saved with increased efficiency

A majority of Udacity graduates reported an average of 3.3 hours saved because of efficiency gains, including one worker who automated tasks using Python, alleviating the need to multitask in emergency situations — and simplifying a number of other daily tasks.

\$2.1 million saved in hiring gains

By upskilling its existing workforce, the company was able to save money on hiring costs and reduce the need for contractors or third-party consultants. Nearly half of all graduates were able to move into new roles and responsibilities, utilizing their AI skill sets to create a domino effect across the company. So far, 1,190 workers in the company have successfully completed a Udacity Nanodegree program, participating in 7,434 projects.

The company thus saved a total of \$3.8 million — a number that continues to grow — by investing in Udacity's School of Artificial Intelligence and its Nanodegree programs. The minimum estimated return on investment for 2020-21 because of this partnership is 287% — as well as a now transformational talent pool catalyzing the company from within.

Changemakers come from within.

Transform your workforce and move your industry forward with Udacity's courses in artificial intelligence, curated to fit your needs.

How can Udacity help?

[Contact our team today to find out.](#)