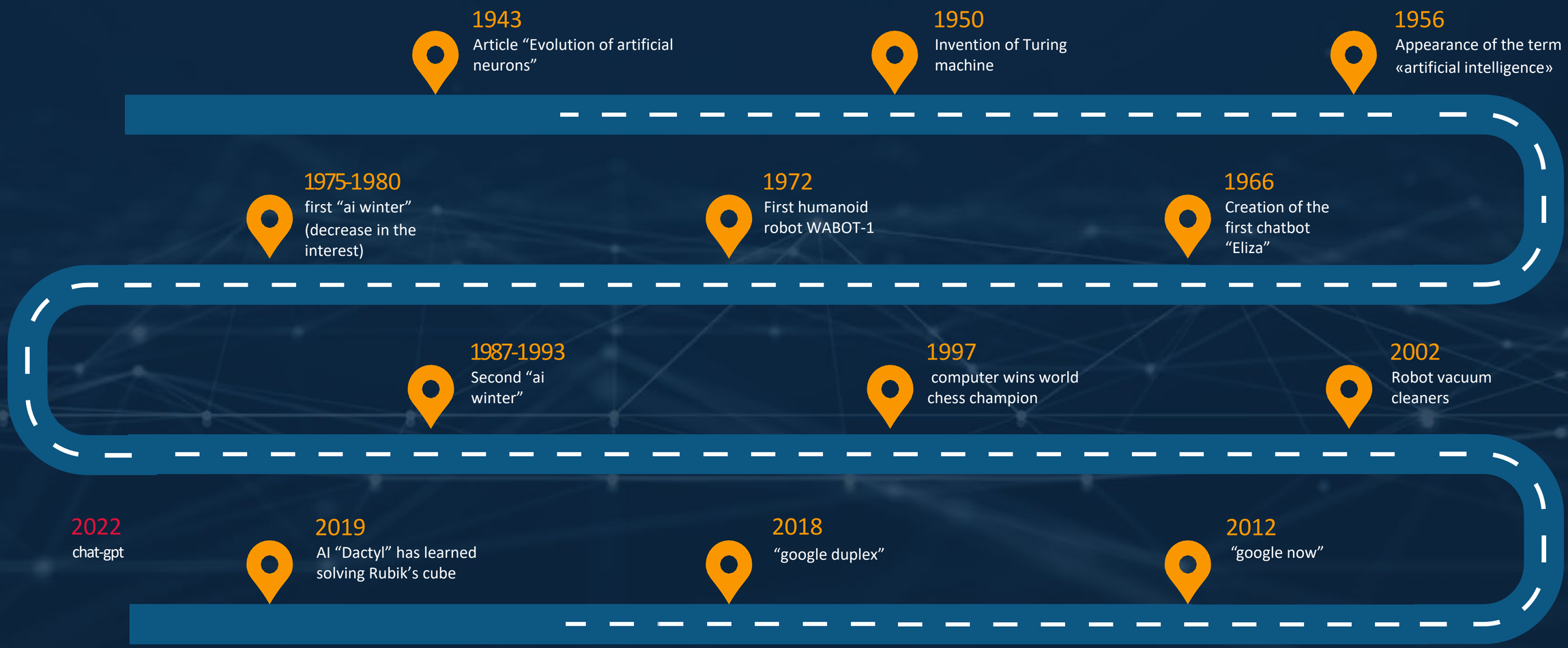
NARXOZ
SINCE 1963

How Higher Education could change
in the Era of Artificial Intelligence?

HISTORY OF ARTIFICIAL INTELLIGENCE DEVELOPMENT



Source: Great learning, august 2023

AI market size

$86,9 МЛД

2022

$407 млрд

2027

World economic forum

97%

Business owners are confident that chatGPT will help their business

forbes advisor

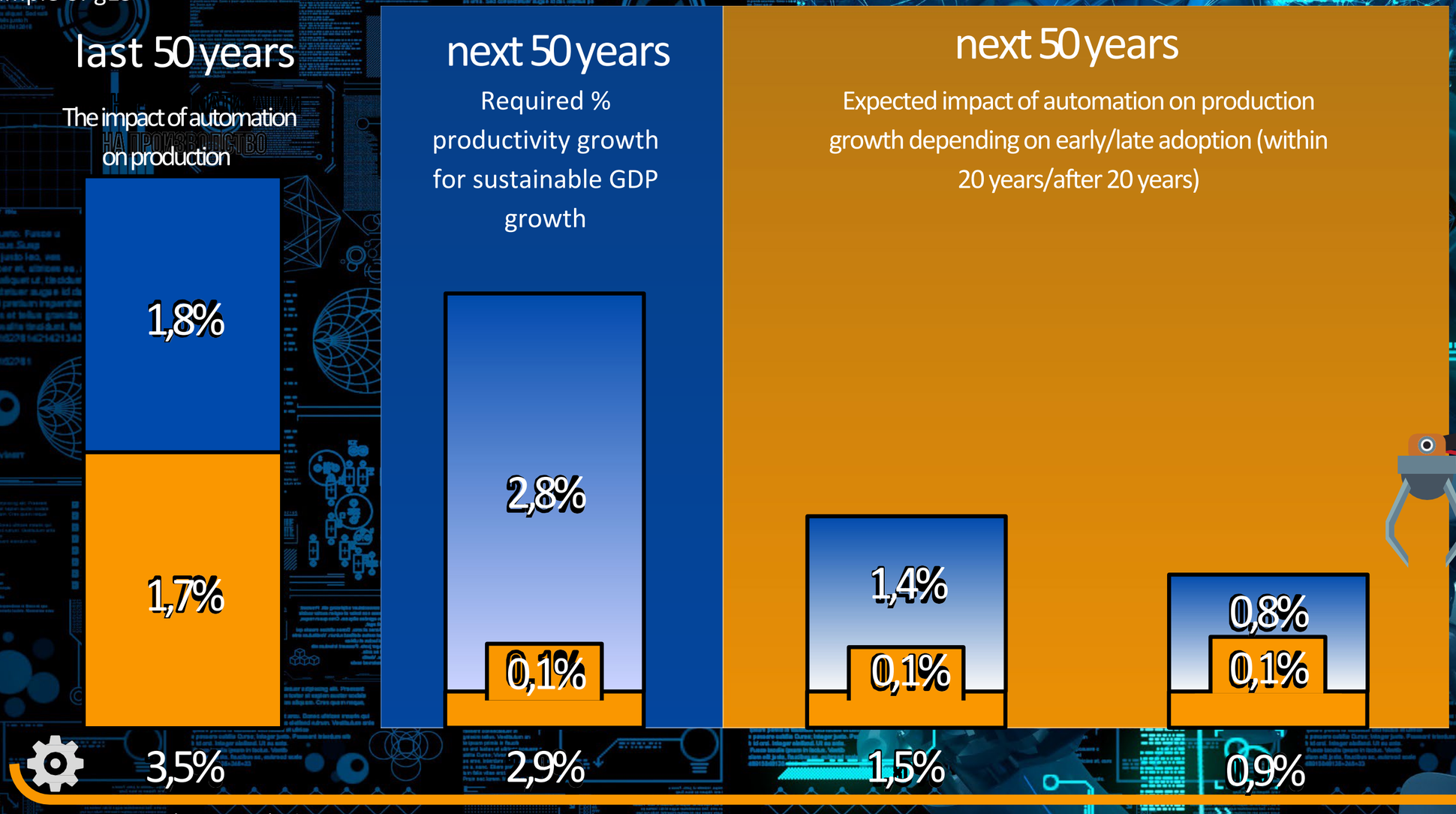
400 million workers risk loosing their jobs because of the AI

AI will create 97 million jobs

McKinsey & Company

The impact of Automation and AI development on the growth of productivity and GDP of countries

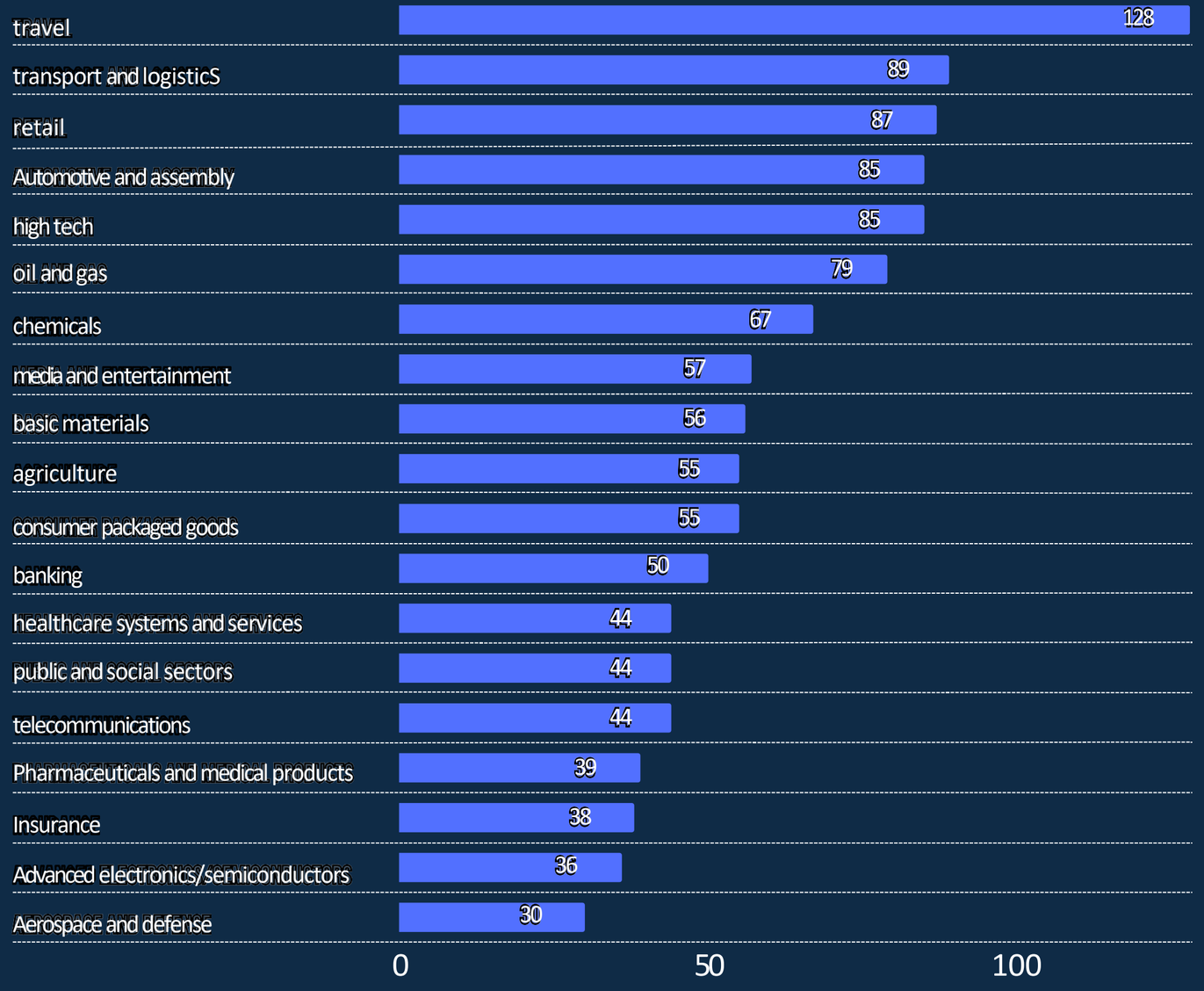
The example of g19 + Nigeria



Source: McKinsey Global Institute analysis

Assessment of productivity growth after introduction of AI

Analysis of the impact of AI on productivity



Source: McKinsey Global Institute analysis

44%

of skills are at risk of serious transformation and extinction in the period 2023-2028

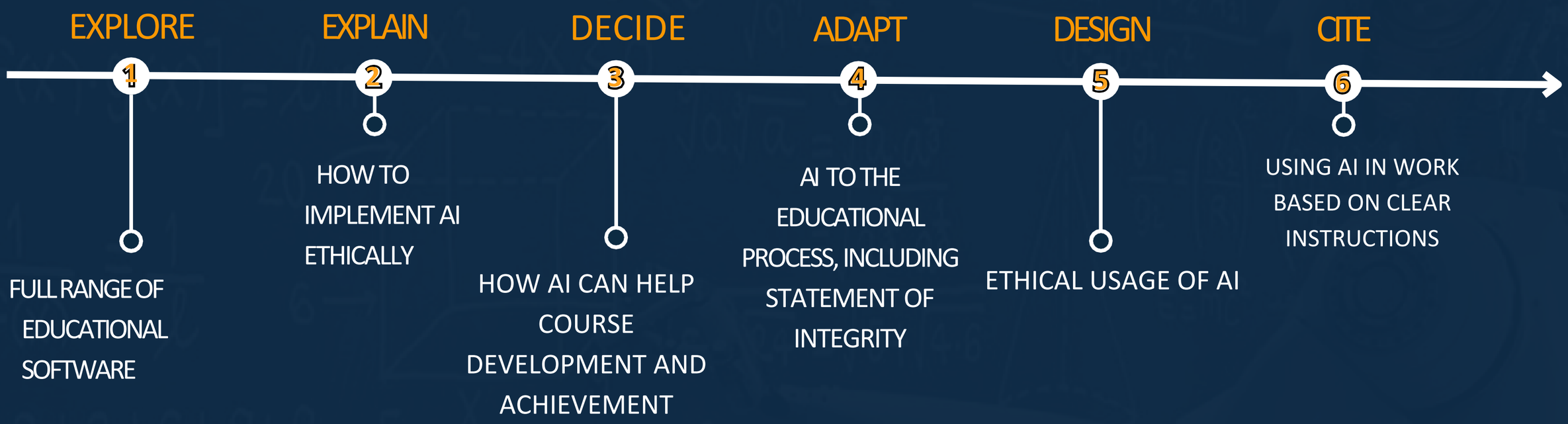
WORLD ECONOMIC FORUM

workers risk loosing their jobs not because of AI, a but because of people ,who know how to work with AI

IBM

- IBM AI report 2023

6 steps before developing an AI strategy for universities



“to stay relevant in this new economic reality, higher education needs a dramatic realignment”

“Robot-Proof: Higher Education in the Age of Artificial Intelligence”

by Joseph E. Aoun, president of Northeastern University (USA)

creativity

A KEY CHANGE IN EDUCATION IS THE FOCUS ON THE DEVELOPING CREATIVITY – AN AREA IN WHICH PEOPLE WILL CONTINUE TO EXCEL

- New model of Higher Education must emphasize «experiential learning»
- Typically, students participate in hands-on learning through internships, practicums, work-study combinations, educational programs, and research opportunities
- Transfer occurs when skills or knowledge are learned in one context, and the learner successfully applies them in another
- Students are faced with a completely new situation, but can take a step back and understand how to use their knowledge to solve problems through the context

1. Personalized learning

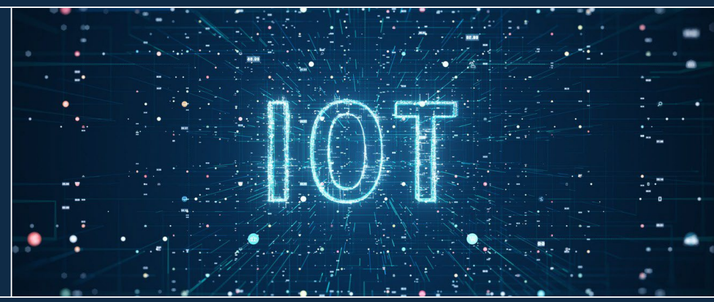
AI allows to move away from the “one course for all” training model. Educators will be equipped with data sets to analyze and understand people’s needs. Work can be automatically adapted to the learning style and pace of each individual student

2. No walls classroom

Universities are already using AI-enabled smart building concepts for learning spaces. Modern “smart” classrooms are usually equipped with round tables, laptops, monitors, interactive whiteboards connected via the Internet of Things. This means that you can not only learn whenever and wherever you want, but there are even greater opportunities to encourage and support collaborative and active learning.

3. smart-campuses

The Internet of Things can also transform universities into smart places to work and training. At its core, technology is simple: it's about connecting devices over the Internet and allowing them to communicate with us and with each other.



4. New level of service

Universities are also using AI to optimize their processes, resulting in cost savings and improved service levels. for example, Deakin University in Australia, in partnership with IBM, created a 24-hour online consultation service for students, based on AI Watson

5. Processes optimization

Another dimension of the use of ai in universities could be the use of blockchain technology, for example to automate the recognition and transfer of credits, potentially opening up cross-university study opportunities

Opportunities for using AI in the university ecosystem

AI in Curriculum	Integrating AI courses into the curriculum to teach students about AI concepts and applications
AI Research	Support for research in the field of AI and the creation of research centers for the study of AI at universities
AI for Administrative Tasks	Application of AI for administrative tasks such as students admission, registration and financial aid processing
AI-driven Assessment	Using AI for automatic grading, plagiarism detection and performance analysis
AI for Student Support	Development AI chatbots for student support, career counseling and mental health services
AI for Predictive Analytics	Using AI to analyze student data for predictive analytics, helping identify at-risk students
AI for Alumni Engagement	Using AI to interact with alumni, including personalized engagement and endowment
Ethics and Policy	Incorporating discussions of ethics and AI politics into the curriculum to prepare students to address ethical issues
Faculty Training	Training and advanced training of teaching staff to keep up with advances in the field of ai
Collaboration with Industry	Developing partnerships with AI companies for internships, research projects and employment
AI for Accessibility	Implementation of AI tools to improve accessibility for students with disability (speech to text or vice versa)
Continuous Adaptation	Updating the curriculum taking into account new trends in the development of ai

Application of AI in HE

Possibility engine	ai generates alternative ways of idea expression
Socratic opponent	Ai acts as a rival for development of argumentation
Collaboration coach	ai helps groups to explore and solve problems together
Personal tutor	ai teaches each student and gives feedback on progress
Co-designer	ai assists throughout the whole design process
Exploratorium	ai provides tools for exploring and interpreting data
Study buddy	ai helps the student to think about the learning material
Motivator	ai offers games and challenges to enhance learning
Dynamic assessor	ai provides teachers with each student's knowledge profile

ChatGPT and Artificial Intelligence in higher education: Quick start guide, unesco

Using AI in teaching

Transformation of teaching methods	Teachers can use ChatGPT to design interactive lesson plans and generating new ideas for lessons and tests
Creating questions for graded assignments	Teachers can use artificial intelligence to improve questions and create multiple-choice assignments
Additional support for students	Teachers can use artificial intelligence to develop students' curiosity and generate homework ideas
Assignment/essays assessment	AI can be used to automatically score multiple-choice and single-answer tests; it can also help teachers in assigning grades based on set standards

blogs.worldbank.org

University college London experience in adapting AI in education

1. discussing academic integrity and AI with students
2. using AI to generate feedback and evaluation
3. updating exam questions taking into account the ai factor
4. updating essay questions with ai factor
5. transforming tests into case/scenario-based questions
6. a new approach to multiple-choice questions

Designing assessments for an AI-enabled world, ucl.ac.uk

Narxoz University experience

Policy update

1.6 “Works, wholly or partially, performed using artificial intelligence (Chat GPT and other neural networks) are canceled”

Regulations for checking works for the presence of borrowings and plagiarism at Narxoz Unoversity

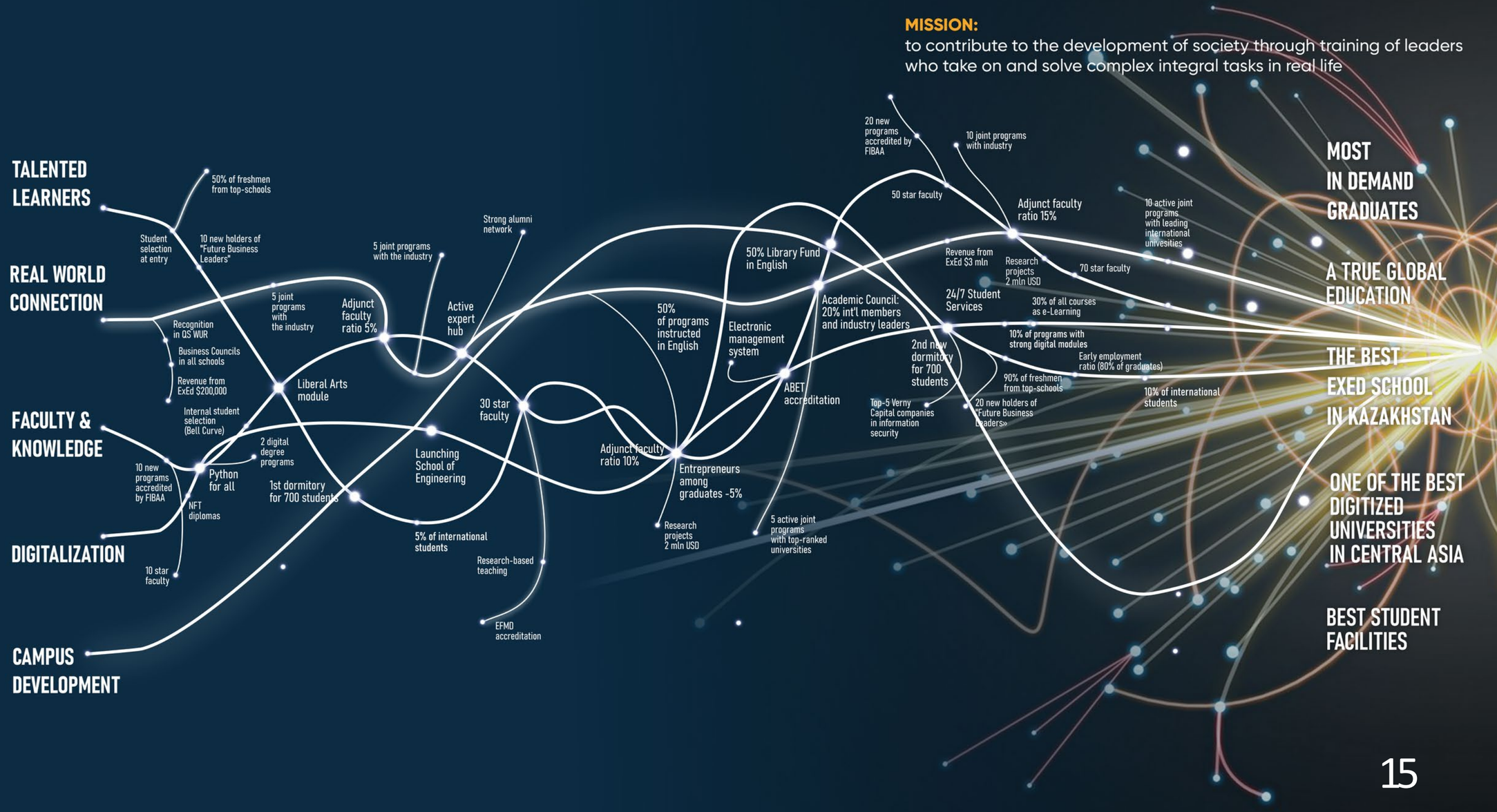
Instruments

- Turnitin chatgpt detector
- detect-gpt from stanford university
- Written works with proctoring
- Types of assignments and grading policies have been changed

NARXOZ - VISION 2030

VISION:
to become an internationally-accredited university that provides multidisciplinary and globally-oriented education with strong ties to the industry for future real life leaders

MISSION:
to contribute to the development of society through training of leaders who take on and solve complex integral tasks in real life



RECOMMENDATIONS

Integrating AI into the curriculum	Incorporate AI-related courses and modules into various disciplines to teach students the basics artificial intelligence regardless of their specialty
Learning with AI	Use AI-driven tools for personalized learning. Artificial intelligence can assess students' strengths and weaknesses, suggesting individual resources and tasks
Interdisciplinary education	Encourage cross-disciplinary collaboration to solve complex AI problems
Lifelong learning	Develop short targeted courses and micro-qualifications that will allow one to improve and change qualifications
Ethical and social aspects	Incorporate discussions of ethics, bias, and social impact into AI training
Practical use	Promote internships and projects in which students can apply artificial intelligence concepts in real-world settings
AI in assessment	Use AI for more efficient and unbiased job grading methods
Global Collaboration	Encourage international collaboration and knowledge sharing to keep pace with global developments in AI
Faculty development	Invest in teacher training to ensure they can teach AI-related topics effectively
Career guidance	Provide students with AI-powered career guidance and job placement support
Research and innovations	Encourage AI research to drive innovation
Accessibility	Ensure AI education is accessible to diverse populations by addressing issues of affordability and inclusion
AI Infrastructure	Invest in artificial intelligence infrastructure and resources to support research and development
Government and industry partnership	Cooperate with the government institutions and industry partners to align education with industry needs
Privacy and data security	Teach students about data privacy and cybersecurity as they are critical in AI applications

New Academic Year

Introduction of the “Artificial Intelligence Literacy course” / AI Literacy (2 credits, 22,5 hours)

Welcome!

“Upholding Academic Integrity in the Era of AI”

Conference with Turnitin

November 28, 2023