

What if?

Exploring possible futures
of transnational cooperation
for Europe's universities

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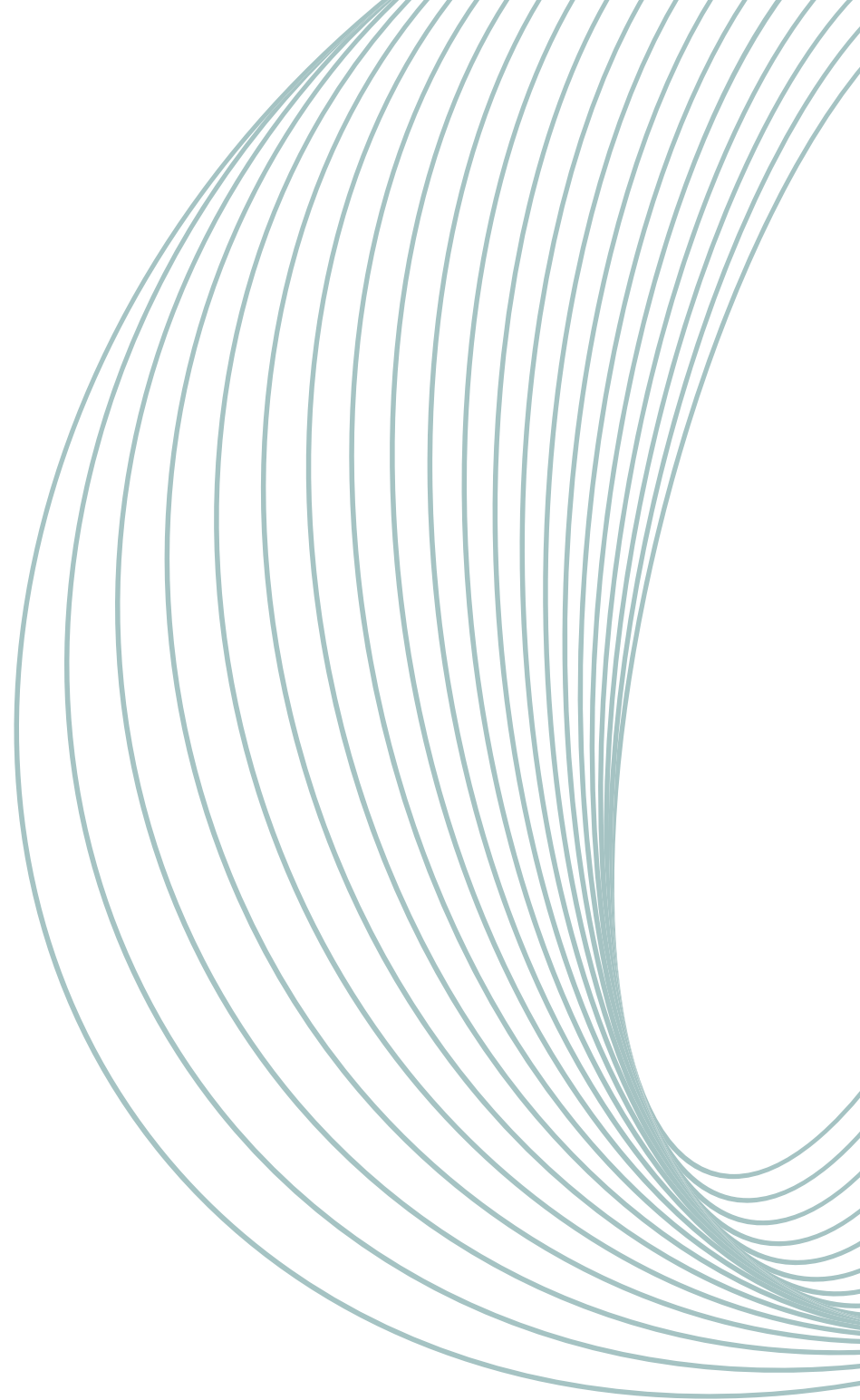
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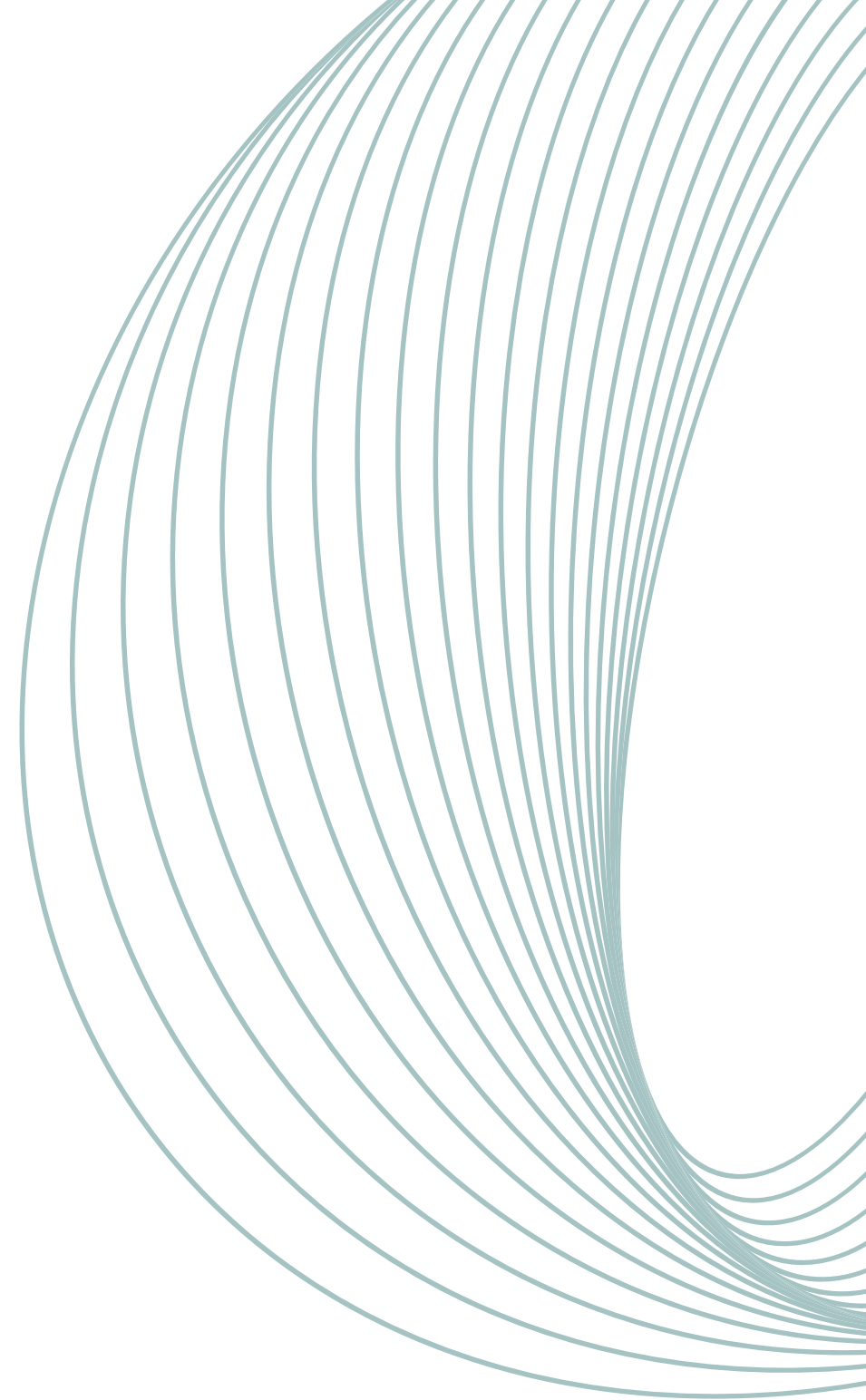
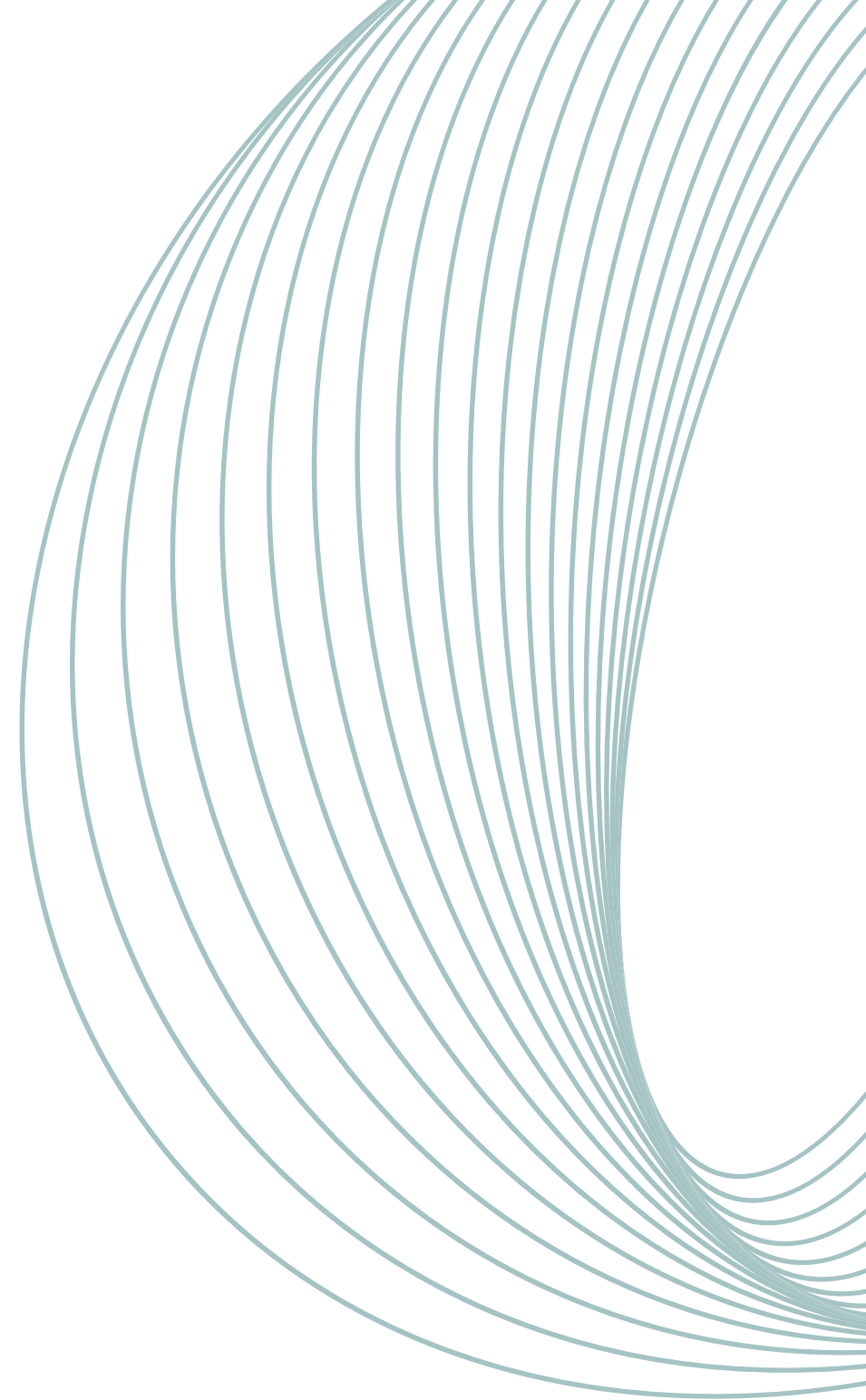


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Foreword

The future is always uncertain; nobody can predict exactly what is going to happen. Much depends on what we do, but much does not. Here, I refer not only to the unpredictable evolution of nature, but also to how humanity acts and the effect of our individual and collective decisions on the evolution of our societies and planet.

What we can do is analyse current trends, embark upon foresight exercises, and prepare ourselves for possible future scenarios. We can also leverage this process to identify what we, as universities, can do to help move our world toward the best possible future. It is not only that we can do all of this, but we must do it. It is not only about shaping the future, but also preparing our institutions to better deliver our missions, for the benefit of society, regardless of what the future holds.

In 2021, the European University Association published “Universities without walls”, which proposed a 10-year vision for our sector, and outlined how to make this vision a reality. Following the emphatically positive response to this vision, as a next step we set out on a new project, *Universities and the future of Europe (UniFE)*. UniFE is a collective exercise based on futures thinking and strategic foresight methodologies. It is primarily focused on transnational collaboration in education, research and innovation, in a changing and unpredictable world. As such, UniFE is the result of an extensive bottom-up process, and heir to the wise tradition of our association. UniFE is the result of a collective effort, and the work and energy of many passionate participants drawn from EUA’s members.

We are now very pleased to present two key outcomes from the UniFE project. Alongside this report, a second UniFE publication contains key policy messages, in time for 2024’s European elections and the appointment of the next College of European commissioners. Both documents are closely linked and should be read in tandem.

This report describes four possible future forecasts for our continent and analyses the impact of these forecasts on our sector, especially on transnational collaboration of universities. The forecasts and scenarios described here are four illustrative models, while reality is made up of a much richer scale of greys. The future is too. Some aspects described here may partially come to pass, merge with elements of other scenarios and evolve. Whatever happens, they provide interesting food for thought.

With this report, we hope to inspire reflection among the higher education, research and innovation community across Europe. In our busy daily activities, sometimes we don’t have enough quality time for such exercises. This is why we have designed it as a tool.

I invite you to read it, to use it, and to reflect on how we can prepare ourselves to deal with different futures. I especially invite you all to do your best to build a better future for all humankind. Knowledge, education and science represent a powerful form of soft power, and all universities should be an active part of it.

Prof. Josep M. Garrell
EUA President

Acknowledgements

Many people have contributed to making this publication possible. We are very grateful for the rich input and inspiring exchanges with all who contributed to the UniFE project, as well as their openness to engage with the future in an interactive and creative way using different futures thinking and strategic foresight methodologies.

We would especially like to thank members of the UniFE Advisory Board (listed below) who provided their extensive expertise, constructive critique and different perspectives, dutifully accompanying the project and fruitfully shaping its outcomes. Furthermore, we very much thank the academic and policy experts who participated in the UniFE online workshop in February 2023 for their help with identifying the signals and drivers of change that fed into developing the forecasts; the participants of the UniFE leadership retreat on 22-23 May 2023 for sharing their perspectives and ideas, and the European University Institute for hosting the event at their beautiful premises in Florence; the participants of the leadership roundtable at the EUA Annual Conference in Gdańsk in April 2023; the EUA Board and Council members and the participants of the online workshop with Secretaries General of EUA collective members in June 2023 for their valuable input, as well as the leadership of the European Students' Union for providing the student perspective. Finally, many thanks to our colleagues at the EUA Secretariat for contributing with expertise from their respective work areas.

Only if we open ourselves to new ways of engaging with the future, listen, sense and feel into different scenarios, can we unstick our minds from present challenges and emergencies, and enable ourselves to change perspectives. Then we can look at things from a place of possibilities and pave the way for action to shape a better future.

In fact, the future is wide open!

Thomas E. Jørgensen and Anna-Lena Claeys-Kulik

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Executive summary

In 2023, the European University Association's *Universities and the future of Europe (UniFE)* project gathered and consulted university leadership, national rectors' conferences and university associations, experts and student representatives for wide-ranging discussions on the future of Europe and our sector's place within it. This report, which distils key insights, may serve as inspiration for university leaders, as well as university staff who advise on policy, develop institutional strategies, and manage European and international cooperation.

Inspired by futures thinking and strategic foresight methodologies, *UniFE* explored likely influences on the future of university cooperation in Europe in the next decade. As such, the report analyses external drivers of change in six dimensions: political; economic; social; legal; technological and environmental.

Furthermore, the report outlines four different forecasts of possible futures for transnational university cooperation with partners in Europe and beyond:

- ❖ **GROWTH:** international cooperation in different forms grows as a survival strategy for universities that need to combat global challenges, innovate together and counter demographic decline;
- ❖ **CONSTRAINT:** cooperation happens mainly in Europe, while international cooperation is strongly constrained and politically regulated;
- ❖ **COLLAPSE:** the system of cooperation as we know it today breaks down due to political polarisation, rising nationalism and conflicts and major natural disasters linked to climate change;
- ❖ **TRANSFORMATION:** a two-tier university system in an enlarged EU emerges, member states decide to pool competences and resources due to geopolitical, economic and demographic pressures.

These forecasts are tools for reflection and creative thinking about the future. Based on evidence of signals and drivers of change in the present, they extrapolate and ask the question "What, if?". They can inspire discussions and elevate a sense of what is possible. They are neither accurate predictions nor normative recommendations.

For each forecast, the report discusses the implications for Europe's universities. This assessment also looks back at EUA's vision for Europe's universities in 2030, "Universities without walls"¹. Published in 2021, this vision called for Europe's universities to be open, transformative and transnational; strong, autonomous and accountable institutions that engage with society and work towards sustainability. Finally, this report invites European universities to use futures thinking and strategic foresight methodologies to prepare for different futures, by looking at what is possible and plausible and developing strategies in the present to shape the future.

¹ EUA, 2021, *Universities without walls – A vision for 2030*.

1 Introduction

1.1 Why universities need to engage in futures thinking now

“We are living in times of crises and accelerated change.” How often have we heard or read this sentence or some variation of it in the past few years in speeches, discussions and publications? It is the expression of a widely shared perception that things are moving fast in several areas at the same time, and external developments are shaking the foundations of our societies and the world as we know it. Change is a constant, but what we have experienced and perceived over the past few years feels much more disruptive at a global level: The Covid-19 pandemic and increased risks for public health, geopolitical conflicts and wars, risks of foreign interference, economic instability, high inflation and increasing energy prices, accelerated digitalisation and concerns around the ethical use of technologies such as artificial intelligence, changing demographics, migration and refugees, political polarisation and democratic backsliding in several countries, and above all climate change and the sustainability challenge —these are all among the major challenges of our time and drivers for change for universities, Europe and the world around us.

*We cannot change the wind,
but we can set the sails
differently.*

- Aristotle

The present appears as a time of collective exhaustion of people, organisations and entire systems. In many ways, we are living in a transition, in a liminal space at the edge of the old and the verge of something new that we may not see clearly yet. We are facing challenges that will impact the future of humanity and the planet for centuries to come. This is scary, but it is also an

immense opportunity to change things for the better and engage in a collective societal transformation.

Liminal spaces are spaces of discovery and learning, where potential is transformed into innovation individually as well as collectively. Universities are part of this transformation, and as organisations they are impacted by it and need to find ways of working with and through this process themselves. They have the capacity to contribute to driving change in society through their missions in research, learning and teaching, innovation and culture which are at the heart of transformation.

Europe’s universities are keen to live up to these challenges. They are enduring institutions that have existed for a millennium, expanding the frontiers of knowledge, educating citizens and driving societal change. The next ten years will be a brief moment in this history but given the challenges ahead it will be a critical decade, requiring significant change beyond the continuum. The Covid-19 pandemic and ensuing economic and social crisis, with which the decade has started, will cast a shadow over the coming years but will also present opportunities for innovation in Europe’s universities. [...]

Universities are created to tackle the unknown. While their future cannot be planned, the tools they have at their disposal to meet the future can be improved.²

² Ibid, p.10.

1.2 How to work with the future

In such times, we are easily getting caught up in emergencies and feel like running behind things, reacting in a rush, rather than responding in time. This can apply to individuals, as well as organisations. It is important to take a step back and think about the future strategically, not looking into a crystal ball, but using the tools that universities have at hand, such as data and methodologies: There are tools and methods which can help organisations to better prepare for different possible futures and enhance resilience.

Between stimulus and response, there is a space. And in that space lies our freedom and power to choose our response. In our response lies our growth and our freedom.

- Viktor E. Frankl

Strategic foresight and futures thinking are important tools for this. Noticing signals of change early, understanding the drivers behind it and exploring different futures increases the awareness about possibilities. Looking at different possible futures and assessing them with university missions and purpose in mind, helps to develop a vision of a preferred future. This vision can then inform actions in the present that need

to be taken to shape the future in a way that would be beneficial for universities. Such a foresight process can be conducted at the level of one individual university as well as in a collective exercise where universities work towards common ideas of the system they would wish for. For foresight to be effective, it then needs to be combined with strategic decision-making and subsequent actions.

1.3 The UniFE project: a focus on Europe and transnational cooperation

Cooperation is crucial for universities in facing the future.

European universities are characterised by collaboration. While universities across Europe compete for resources, they are cooperating on different levels to advance all their missions. They form diverse alliances and partnerships with different scopes in order to develop and enhance all their missions and ensure that excellence in learning and teaching, research, innovation and culture are present in all parts of the continent.³

Europe has a unique multilateral and multilevel framework for cooperation in higher education and research. For more than two decades, governments across Europe have built a common framework for higher education through the Bologna Process. Moreover, the European Union provides a supranational framework with common funding and policy cooperation for research and education and takes an increased policy role in the European Education and Research Areas.

Current and recent political developments have sharpened the discussion about the future of European integration and collaboration and, more fundamentally, the role of Europe on the global stage. Brexit, the Covid-19 pandemic, political polarisation and democratic backsliding in certain countries, geopolitical tensions and an emergent energy crisis triggered by Russia's war against Ukraine are changing the political geometry. Mounting pressure on political systems calls for a reflection on the place of Europe in the world and a rethink of the way countries work together within the EU, Europe in the wider sense and further afield.

³ Ibid.

While most competences for higher education and research lie at national or regional level, developments at European level are becoming increasingly important for universities. Establishing a functioning and open multilateral and multilevel governance system is the basis for much of the international cooperation between higher education institutions. Moreover, this system should connect the European level with national, regional and local levels, as underlined in EUA's "Universities without walls – A vision for 2030". While achievements under the current frameworks should be recognised, there is scope to build upon and complement these. This is the time to rethink European governance and cooperation in research, education, innovation and culture, whether in the context of the EU, the Bologna Process or other potential constellations.

To tackle these pivotal questions, EUA has initiated a project dedicated to *Universities and the future of Europe (UniFE)*. Under the umbrella of UniFE, the association has been engaging in an in-depth consultation process with its membership to develop concrete ideas about what Europe's universities want from future transnational collaboration and what they need in terms of framework conditions, political structures and multilateral frameworks. Through leadership workshops, interviews with academic experts and student representatives as well as discussions with national rectors' conferences, the project has fostered exchange and distilled common ideas.

1.4 How to use the present report

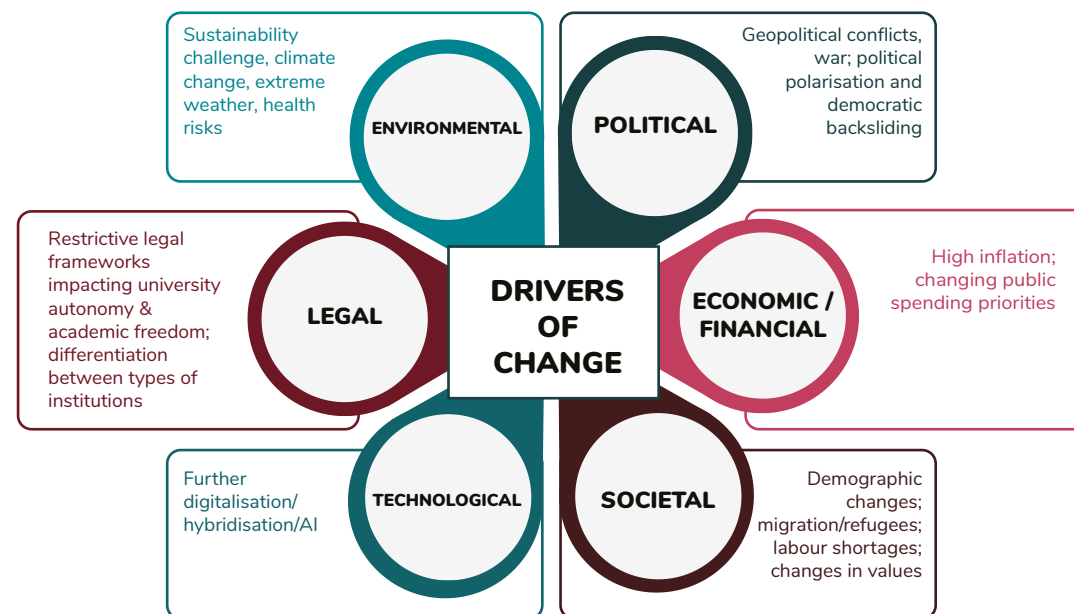
The present report is an outcome of the *UniFE* project aimed at inspiring all those interested in university strategy and institutional development, futures thinking, and foresight applied to higher education and European cooperation. The forecasts presented and discussed in this report are tools to stimulate debate and reflection asking the question "What if?". While some of the implications of certain forecasts might be more favourable than others to universities as they are envisaged in EUA's *Universities without walls – A vision for 2030*, they are not meant to be normative, nor accurate predictions.

Beyond the present report, *UniFE*'s outcomes are also feeding into EUA's engagement around the European elections in 2024 and the organisation's overall approach to European policy making as it relates to universities. For this purpose,

EUA has published a set of policy messages, addressed to European level policy makers with a view to shaping the framework for European cooperation in a way that is supportive to universities.

Before developing forecasts of possible futures, it is important to identify drivers of change that are already present in the here and now and that are likely to drive change in the years to come. The timeframe we look at are the next ten years. The drivers are grouped under the six dimensions of a PESTLE analysis used in environmental scanning of organisations: political, economic, social, technological, legal and environmental.

Figure 1: Overview of drivers of change based on PESTLE analysis



2 Drivers of change

The forces behind future developments

2.1 The political dimension

Geopolitical tensions and conflicts

In the political dimension, a major driver for change are geopolitical tensions and conflicts and the resulting security risks which are triggering changes in many other policy fields at national and European levels.

Russia's war of aggression against Ukraine is currently the harshest expression of conflict in Europe, affecting not just Ukraine, its people and its universities, but also the rest of Europe and its relations with other parts of the world. It has led to massive EU sanctions, including ceasing of cooperation in research and innovation. The EU and many member states have offered support for Ukraine at many different levels from financial to military, and this also includes higher education and research, e.g. wider access to EU programmes such as the possibility for Ukrainian universities to join alliances of European Universities as associated partners, or a new MSCA scholarship scheme for Ukrainians.

The Russian war against Ukraine also opened up topics that had long been dormant such as a further enlargement of the European Union towards the East (Ukraine and Moldova) and the Western Balkans, with countries like Albania and North Macedonia urging the EU to move forward in the accession process by the end of 2023⁴.

It also brought about things that had been unthinkable a few years before, such as NATO membership of Sweden and Finland and at least attempts to consider

⁴ [European Commission, 2023, QUO VADIS, EUROPA? | Session II: Enlargement and Neighbourhood. The Western Balkans on their way towards the European Union, seminar on EU enlargement, Santander, Spain, 21 August 2023.](#)

NATO membership of Ukraine (albeit with no concrete timeline⁵). The war between Israel and Hamas has also underlined the challenges of the EU taking an active foreign policy role in its neighbourhood.

Furthermore, it reinforced the narrative around Europe's open strategic autonomy and the idea that Europe must not make itself dependent on non-European suppliers in key strategic areas such as defence, certain pharmaceuticals and key technologies, a list of which is still to be defined, as mentioned in the EU's Economic Security Strategy published in June 2023⁶.

This also contributes to a greater willingness of national governments to pool investment at European level, including in research and innovation. Some of the countries which were traditionally more reluctant when it comes to investing at EU level, are changing their approach. A first signal of this is a joint policy paper⁷ of Belgium, Finland, the Netherlands, Portugal and Slovakia on strengthening the EU's open strategic autonomy, published in July 2023.

These signals all tend toward further constraining international cooperation with countries outside Europe, a trend likely to continue as long as geopolitical divisions are not solved.

Increasing political polarisation

Another major driver for change in the political dimension is increasing political polarisation. This includes in several European countries the rise of illiberal forces that openly reject values of liberal democracy, a new national conservatism that prescribes conservative morales, family models and lifestyle as well as the emergence of more radical climate activism or anti-vaccine movements during the Covid-19 pandemic. While being very different in their political views, what unites them is the "anti-establishment" dimension.

⁵ [NATO, 2023, Vilnius Summit Communiqué, issued by NATO Heads of State and Government participating in the meeting of the North Atlantic Council in Vilnius 11 July 2023.](#)

⁶ [European Commission and Higher Representative of the Union for Foreign Affairs and Security Policy, 2023, Joint Communication to the European Parliament, the European Council and the Council on "European Economic Security Strategy", Brussels \(20.06.2023\).](#)

⁷ [Florian Zubaşcu, 2023, "Five member states push for greater EU strategic autonomy", in: Sciences Business \(20/06/2023\).](#)

While in the past illiberalism and conservative nationalism have mostly been paired with anti-Europeanism, a new tendency seems to emerge: national conservatives using (when it suits them) the European Union, its fora and policy cooperation for achieving their goals. The European Parliamentary elections in 2024 will be a test case to see to what extent these forces will gain further influence or not over EU policies. In addition, there will be national elections (parliament and/or presidential) in several countries in the wider Europe including Belgium, Croatia, Finland, Georgia, Lithuania, Moldova, North Macedonia, Romania and Slovakia as well as Russia. Beyond that, the US Presidential elections and general elections in India might change the game of international politics again. Worldwide autocratisation is on the rise. In 2022, there are more closed autocracies than liberal democracies – for the first time in more than two decades, with Eastern Europe and other world regions going down to levels around the end of the Cold War⁸.

Next to national conservative tendencies, there are also tendencies towards a more federalist approach at European level. In the aftermath of the Conference on the future of Europe, the first attempt in EU history to initiate a broad discussion with citizens about their wishes towards future EU policies and cooperation that took place throughout 2021/22, discussions started about a possible change of the EU treaties. A concrete proposal was put forward by a group of members of the European Parliament led by former Belgian Prime Minister Guy Verhofstadt in September 2023, arguing for largely expending the qualified majority rule in the Council of the EU, where member states are represented. This would mean that in areas such as defence, taxation and foreign policy, unanimity among member states would no longer be a pre-condition for the EU to take decisions and act. The EU would gain a shared competence with member states in almost all policy areas, the power of the European Parliament would be drastically expanded, and the European Commission would be renamed European Executive. Following this, also Sabine Verheyen, Chair of the European Parliament’s Committee for Culture and Education, spoke in favour of a shared competence for the EU in education in order to give the European Parliament more oversight, “further mutual recognition of school and university degrees and safeguard academic freedom”⁹. While for the time being it is uncertain whether such a proposal will ever be turned into reality

8 See Papada, E., Altman, D., et al., 2023, *Defiance in the Face of Autocratization*, Democracy Report 2023, (University of Gothenburg: Varieties of Democracy Institute (V-Dem Institute)).

9 Brent, T., 2023, “European Parliament to push for greater control over education”, in: *Science Business* (14/11/2023).

(EU member states would need to agree to drastic treaty changes), the fact that the proposal comes now, while in several countries more nationalist tendencies are on the rise, also showcases the political polarisation.

Figure 2: Overview of political drivers, impact and signals of change

DRIVERS	IMPACT AT POLICY LEVEL	EXAMPLES OF IMPACT FOR UNIVERSITIES	EXAMPLES OF SIGNALS
Geopolitical tensions and conflicts; security concerns and risks of foreign interference	EU collaborates differently with different countries privileging ‘like-minded’ partners and restricting cooperation e.g. with China (EU’s Global Approach to R&I from 2021)	Constraints on international cooperation; Greater focus on developing and emerging countries (EU-Africa partnership; EU-India)	University Erlangen Nuremberg (FAU) as first German university ceasing scholarship programme with China (July 2023)
		Higher focus on intra-European cooperation, including Balkans	Alliances under the European Universities Initiative include Ukrainian universities and Western Balkans (as of Erasmus+ call from Oct 2022)
	EU’s new paradigm of Open Strategic Autonomy (OSA)	Increased willingness to invest in research and innovation at European level even by previously reluctant countries	Joint paper of Belgium, Finland, the Netherlands, Portugal and Slovakia on Open Strategic Autonomy
	New EU Security Strategy (June 2023); Finland; Sweden NATO membership; increased investment in defence	Defence research is becoming more important	Danish universities and Technological institutes announcing a common centre for defence research (January 2023)

DRIVERS	IMPACT AT POLICY LEVEL	EXAMPLES OF IMPACT FOR UNIVERSITIES	EXAMPLES OF SIGNALS
Increasing political polarisation: the rise of illiberal forces; national conservatism; radical climate activists, etc.		Pressure on universities' institutional autonomy and academic freedom and increased political steering	Specific set-up of foundation universities in Hungary; ban of gender-studies in Hungary; further examples see EUA university autonomy scorecard

Impacts on universities

For universities these political developments have an impact at several levels at present, and are likely to have an impact in the future:

Most official cooperation with Russian universities was ceased by European universities since the beginning of the war or since Russian universities officially supported the war. Instead, cooperation with and support for Ukrainian universities is increasing. Many universities host academics or students from Ukraine to enable them either to continue their studies and work remotely with their Ukrainian institution as far as possible or find a place at the host university. Although the circumstances are different, many universities can build on the work and lessons learned from welcoming refugees since the refugee crisis in 2015 due to the war in Syria.

Cooperation with other parts of the world is becoming more constrained and the focus is shifting.

As the EU and many national governments are putting forward foreign interference guidelines in research, innovation and higher education, universities are developing internal policies and strategies for risk assessment of international partnerships¹⁰, especially for cooperation with non-democratic countries that are not following the same value set.

While even up to a couple of years ago China was among the top three countries of interest for cooperation of Europe's universities¹¹, there are signals that this is changing. In July 2023, the first German university (FAU in Nuremberg) announced it would cease cooperation with China under the state-funded scholarship programme due to concerns over academic freedom. There are voices saying that this could become a trend, although two other major German research universities officially communicated that they would continue cooperation with China for the time being¹².

Instead, there is a renewed interest in cooperation with Africa which is illustrated for instance by partnerships such as the one initiated by the Guild of European Research-Intensive Universities and the African Research Universities Alliance¹³, fostering ties between the two continents through dialogue and collaboration in various research clusters and addressing common challenges.

2.2 The economic and financial dimension

Two drivers seem to be particularly important in the economic and financial dimension currently and are likely to have an impact for the years to come, also on university funding.

¹⁰ [EUA, 2021, EUA webinar series on global relations - Webinar III: Risk assessment for international partnerships.](#)

¹¹ [Claeys-Kulik, A., Jørgensen, T.E., Stöber, H. et al., 2020, International strategic institutional partnerships and the European Universities Initiative, results of the EUA survey, p.11.](#)

¹² [Sharma, Y., 2023, German university ends ties with China scholarship scheme, in: University World News, 20 July 2023.](#)

¹³ [The Guild and African Research Universities Alliance \(ARUA\), 2019, Strengthening the African Knowledge Society.](#)

Figure 3: Overview of economic and financial drivers

DRIVERS	EXAMPLES OF IMPACT
Inflation putting pressure on public and private budgets	Challenges due to high energy prices forcing universities to change use of buildings; semester schedule; maintenance of infrastructure;
Changing public spending priorities with an increased focus on health and defence	Possibly more funding for research in certain fields; increasing use of targeted and competitive funding; changes to funding formula for allocating public core funding for universities; EU funding with bigger strings attached

High inflation

The global economy is slowly moving in a positive direction, but according to the OECD Economic Outlook 2023¹⁴, it will be a long road to achieve “strong and sustainable growth.”¹⁵ Energy prices which skyrocketed at the beginning of Russia’s war against Ukraine, are falling again. China’s economy re-opened, supply bottlenecks are easing, employment rates are high and household finances across OECD countries are “relatively resilient”¹⁶. However, recovery is likely to be slower than in the past and the global growth rate in 2024 is projected to remain lower than before the Covid-19 pandemic (around 2.9%). According to OECD projections, achieving lasting growth will be tough due to a combination of too high public debt rates, high core inflation (not counting energy and food prices) and too low economic output. Decoupling economic growth from natural resource use and creating an economic model focused on wellbeing of people and nature will be a major task for the years ahead (see EC Foresight Report June 2023¹⁷)

14 [OECD, 2023, OECD Economic Outlook, Volume 2023, Issue 1, \(Paris, OECD\).](#)

15 [OECD, 2023, ‘Editorial: A Long Unwinding Road’, OECD Economic Outlook, Volume 2023 Issue 1, \(Paris, OECD Publishing\), p.9.](#)

16 Idem.

17 [European Commission, 2023, Communication from the Commission to the European Parliament and the Council, 2023 Strategic Foresight Report - Sustainability and people’s wellbeing at the heart of Europe’s Open Strategic Autonomy, \(Brussels, European Commission\), 6 July 2023.](#)

Changing spending priorities

The Covid-19 pandemic has torn massive holes in public budgets and clearly, sustainable transformation of society and the economy, as well as adaptation to and mitigation of climate change, will need large public and private investment in the future. In addition, governments across Europe, even those in countries traditionally reluctant to spend money on military, have significantly increased their defence budgets since the Russian invasion of Ukraine.

Austerity policies as we knew them from the decade after the financial crises in 2008 seem to be over. Saving was yesterday, both at national as well as at European level. Even some countries traditionally rather reluctant to invest too much at European level, are starting to change attitudes and argue for stepping up investments to strengthen Europe’s open strategic autonomy (see chapter on political drivers), also in research and innovation. At first glance this may sound promising for future EU funding for research and innovation. However, money is likely to come with more strings attached, and we might see a growing political tendency to focus investment on key strategic research fields and technologies.

Impact on universities

The fear that nominal increases in national public core funding for universities could be eaten up by inflation was already present during the pandemic, as EUA’s latest Public Funding Observatory Report from 2021/2022 shows¹⁸. Also, the tendency of tying funding to certain policy objectives is something that has been observed for a while, coupled with more frequent changes to funding formula and the increase in the share of competitive funding in the share of the overall public funding available to universities. The energy crisis in winter 2022/2023, which hit public and private purses across Europe very hard, was also a major challenge for universities. “In some countries, inflation and soaring energy bills compound structural underfunding of the sector.”¹⁹ While energy prices are going down again as European countries have filled their reserves outside Russia, this example just

18 [Bunescu, L., Estermann, T., et al., 2022: EUA Public Funding Observatory 2021/2022, part 1: sector perspectives on funding, \(Brussels, EUA\), p. 5.](#)

19 [Bennetot Pruvot, E., Kupriyanova, V., 2022, ‘Universities, the energy crisis and the cost-cutting trap’, University World News, 10 December 2022.](#)

shows the vulnerability and fragility of the system. Universities across Europe to a large part depend on public funding with limited possibilities to diversify their income streams and restraint financial autonomy over the internal allocation and strategic use of funds. Even if universities in several systems have these rights on paper, the “freedom for universities to allocate funds internally or independently recruit and set salaries for (some) staff, remains essentially theoretical if the institutions do not have financial room to manoeuvre.”²⁰

The developments in the economic and financial dimension are likely to put further pressure on university funding in the future. To ensure sufficient and sustainable funding for all university missions, learning and teaching, research (particularly basic research in all disciplines to ensure a broad knowledge base) and innovation, a holistic and in-depth reflection with all relevant actors on how to reform current regulatory and funding systems must take place.

The overall economic situation of course also has an impact on students. According to the European Students’ Union, student poverty as well as student housing is a growing problem in Europe over the past years, exacerbated by the Covid-19 pandemic and high inflation and the energy crises in the winter 2022/2023.²¹ For many, this makes it challenging to afford higher education, especially in countries without adequate support systems and measures. In several countries, the lack of affordable student housing is also a problem affecting incoming international students, making mobility more challenging.²²

2.3 The social dimension

In the social dimension, demographic change, migration and new waves of refugees as well as changes in values and the way we live and work together are important drivers that influence the future direction.

²⁰ Bennetot Pruvot, E., Estermann, T., et al., 2023, *University Autonomy in Europe IV: The Scorecard*, (Brussels, EUA), pp. 58-60.

²¹ European Students Union, 2022, *ESU Resolution on student poverty ‘Education is freezing’*, Brussels, Belgium, 17 November 2022.

²² European Students Union, Erasmus Student Network, 2022, *International student housing: how are exchange students in Europe navigating the housing crises?*, (Brussels, ESU, ESN).

Demographics

Demographic change is a big driver of change for societies across Europe, impacting the work force, economic growth, values and politics. While the overall population of the European Union has been growing over the past two decades until 2020, it is now stabilising. Fertility rates are going down almost everywhere. In many cases this is compensated for by immigration which still leads to a growing population in 15 countries, while for others emigration is a big problem, with eight countries having a shrinking population. All of this leads to an ageing population with the share of those aged 80+ that almost doubled since 2001 and a decrease in the share of those under 20 years old.

Figure 4: Population growth in EU countries (as well as NO; IS; LI; CH) since 2001²³

GROWING (15)	SHRINKING (8)	STABILISING (4)	REVERTING TREND (4)
Austria; Belgium; Czechia (with break down in 2020); Denmark; Finland; France; Germany; Ireland; Luxembourg; Netherlands; Spain; Sweden; Iceland; Norway; Switzerland	Bulgaria; Croatia; Greece; Hungary; Italy; Latvia; Poland; Romania	Cyprus (growing until 2022); Estonia (growing until 2020); Malta (growing until 2020); Liechtenstein (since 2007)	Lithuania (shrinking until 2020, since then growing); Portugal (shrinking until 2020, since then growing); Slovenia and Slovakia (growing until 2020, since then shrinking)

Over the last two decades student numbers have been growing in many European countries while others, especially in central and Eastern Europe, had to cope with decreasing numbers due to emigration. Massification policies have increased attainment and led to an increase of the population share with a higher education degree. Overall, this resulted in a more diverse student body, making it necessary for universities to adapt their activities to different needs and student profiles²⁴.

²³ Eurostat, 2022, *Demography of Europe statistics, Population on 1st January*, (Luxemburg, Eurostat).

²⁴ See Claeys-Kulik, A., et al. 2019, *Diversity, equity and inclusion in European higher education institutions, results from the INVITED project*, (Brussels, EUA).

While diversity is a feature that is likely to increase, overall student numbers could well decline in many countries as the share of young people traditionally building the bulk of higher education students is waning. However, the need for higher skills is going to stay, and more people will need to be reskilled and upskilled to manage the transition towards a society and an economy focused on the wellbeing of people and the planet. Lifelong learning will be even more important, and universities will need to further adapt their offer to the needs of people already part of the work force who wish to combine studying with working and private life at different stages of their career. Microcredentials certifying the learning outcomes of a short learning experience will likely become even more important than today. Beyond expertise and skills in a specific field, the way of working will also be a bigger focus.

Changing working patterns

Forced remote working during the Covid-19 pandemic was the icebreaker for many sectors to open up to structural remote work, especially for knowledge workers. What was unthinkable in many places before 2020 has now become a pattern. In sectors where this is technically possible, employees are alternating a few days per week between the office and working at home. Many workers expect their employer to offer such possibilities, and for many it has become a relevant factor for job change and choice²⁵. This also affects the way people work and collaborate and requires a high degree of self-organisation and trust among teams challenging traditional hierarchical models of management. In the world of hybrid work, mental health and well-being become an even more important topic for organisations. Individuals and teams are adapting to changing patterns of social interaction that are here to stay beyond the pandemic due to more flexible working hours, part-time work, and expectations and needs around work-life balance. Furthermore, the shortage of qualified staff in many areas is becoming a severe problem in several countries. In addition, more people are changing jobs since the pandemic. Entrepreneurship is on the rise, with the number of businesses growing in Europe over the past couple of years. In several sectors this is changing the bargain, and employers need to adapt more than before to individual expectations of workers if they want to find qualified staff.

²⁵ [Dias da Silva, A., Georgarakos, D., et al., 2023, 'How people want to work – preferences for remote work after the pandemic', ECB Economic Bulletin, Issue 1/2023.](#)

Figure 5: Overview of social drivers

DRIVERS	EXAMPLES OF IMPACT
Demographic changes with uneven demographic development across Europe driving a quest for lifelong learning, reskilling and upskilling	Changing composition of the student body leading to more diversity and possibly overall shrinking student numbers in most places; Staff shortage at universities and increased competition for talent across all functions;
Migration; refugees	More diverse student body; need to integrate migrants and refugees into higher education system making issues of recognition and access more urgent
Lack of people on the labour market; change in values, expectations towards work and life	Many sectors need workers, for example in the IT industry, but also in the health sector and many other places; increasing demands on universities focus on labour market needs; reskilling, upskilling, shorter courses, microcredentials; digital/blended learning

Impact on universities

For universities these developments have importance at several levels. They affect learning and teaching and how universities prepare their students for work life as well as how universities deal with those learners, who are already working and may come with different expectations and experiences to university. Furthermore, the developments can also effect internal university organisation and management and the institutions attractiveness towards staff. Staff shortage can become a serious issue for universities across the types of staff, both administrative and academic. For example, in the IT field, universities have difficulties attracting employees from a sector that pays salaries beyond what universities can afford. Beyond salaries, incentives such as attractive working conditions, career prospects, offers around childcare or mental health and, broadly speaking, a caring organisational culture will become an important topic for organisational development if universities wish

to stay competitive in the race for qualified staff.²⁶ The reform of academic careers is an important element in this regard and highlighted in EUA's Universities without Walls – A vision for 2030 as one of the three joint key priorities for universities across Europe that need to be tackled in the current decade.

The change in attitudes towards work and the search for purpose and meaning that is present among many young people today, may also influence study choices, both in terms of subject areas as well as length of study. There was no quantitative evidence available on this, but it was mentioned both by the students as well as the academic and policy experts at the UniFE expert workshop.

2.4 The technological dimension

The digital transformation is clearly dominating the technological drivers for the future of universities. These technologies open a myriad of new opportunities and risks, some of them with a potential to be disruptive for fundamental functions of universities.

Figure 6: Overview of technological drivers

DRIVERS	EXAMPLES OF IMPACT
Hybridisation	Diverse forms of online, onsite, synchronous and asynchronous learning. Access for larger and more diverse groups of learners. Remote research processes.
Artificial intelligence	Integrating generative artificial intelligence in the learning process. Changing skills needs for graduates. Automated research workflows.

²⁶ See Van Hees, V. & Buffaerts, R., 2022, 'Student mental health across Europe: towards a public mental health approach', *EUA expert voice*.

DRIVERS	EXAMPLES OF IMPACT
Big data	Data driven governance and management of universities. Data driven research.
Blockchain	Digital credentials.

Impact on learning and teaching

The experience of online learning from the Covid-19 pandemic looms large in the discussion about the digital transformation, but the actual impact remains difficult to pin down. Society at large seems to be still digesting the experiences that were made in the time of the lockdowns. Hybridisation of learning and teaching through online provision is a very important driver of change. The demand from learners for differentiated types of learning: asynchronous, synchronous, online, and onsite is highly diverse and individual institutions are looking to see how they profile themselves in terms of their learning offer. New technologies might make this even more pertinent in the future if universities begin to use virtual reality to create new kinds of learning spaces or virtual mobility options. These different modes of learning and their application in different contexts are likely to be an underlying discussion for the future of higher education.

The possibilities in particular of asynchronous and online learning give opportunities to reach out to larger groups of learners who would otherwise not have the opportunity to attend university. This could be people living in areas far from the university campus or with work or caring responsibilities that make it difficult to follow onsite, synchronous courses. According to EUA's DIGI-HE survey from 2021, almost 80% of respondents saw the opportunity for widening access to higher education as a strategic priority for digitally enhanced learning and teaching.²⁷ As a driver, widening access through technology is closely linked to demographic developments and the labour market, as many places there will be fewer learners and more groups in diverse contexts who will need upskilling and reskilling – or will look to higher education in terms of personal development.

²⁷ Morrisroe, A. et al., 2021, *Digitally enhanced learning and teaching in European higher education institutions* (EUA), p. 46

The link between technology and work is also getting stronger, as the future workplace will likely have much more digital technology integrated in the work processes. Generative artificial intelligence is one very prominent example of this, where content can be created digitally, and the human input comes from the ability to give the right instructions to the machine (prompt engineering). However, data-driven technologies uncover new possibilities to work more efficiently, for example in customer relations, design, engineering, medicine and many other fields. Medical doctors work with machines proposing diagnoses through, for example, image recognition; engineers and architects work with virtual digital models. The processes of work have also changed through the use of cloud computing and multiple communication channels. All this requires digital skills and the ability to work and understand different digital tools, and universities will have a growing responsibility to ensure that learners are equipped with these skills.

Generative artificial intelligence opens several possibilities or adaptations in higher education as parts of the writing process can now be automated. There are large efficiency gains to be had, but these adaptations are not tantamount to a full automation of academic work. Indeed, much of the practical discussion about the implementation of artificial intelligence-driven solutions is about where the ‘human in the loop’ is necessary.²⁸ In this vein, much of the discussion now and in the future will be about how and when to introduce human oversight and steering in the processes. As an immediate reaction, generative artificial intelligence has raised concerns about assessment in higher education. Many of the skills connected with higher education have now become automated, such as the ability to present knowledge, or the use of written essays to assess whether learners have acquired knowledge. This raises questions about assessment techniques but also more broadly about what universities assess in their learners. Even if artificial intelligence tools could be used to detect texts generated through artificial intelligence, this would not mean that universities should continue to make exams the same way, as if nothing had happened. Generative artificial intelligence is a tool that graduates will use to write emails, short texts or even reports, and universities will need to make them accustomed to managing these tools to disseminate knowledge at a high level.

28 For research, see [OECD, 2023, *Artificial Intelligence in Science: Challenges, Opportunities and the Future of Research* \(OECD\)](#).

At a broader societal level, generative artificial intelligence poses a severe risk to trust. Deep fakes and fake news that are calculated to resonate with specific groups could deepen the rifts in societies that are already divisive and radicalising. Such uses will call for an ethical as well as a practical discussion about the use of generative and other forms of artificial intelligence, ensuring awareness about risks and limits to specific applications.

Digital transformation of research

Artificial intelligence as a research tool goes hand in hand with access to large data sets. Research could be done on ‘digital twins’, a digital version of a system that can be used for testing and observation. This requires availability of large amounts of data as well as investments in computers that are powerful enough to run these complex simulations. The European Union is working to set up the legal framework to make much more data, for example industrial data or health data, available and interoperable through ‘data spaces’²⁹. Here the European Open Science Cloud could be a data space for research data.

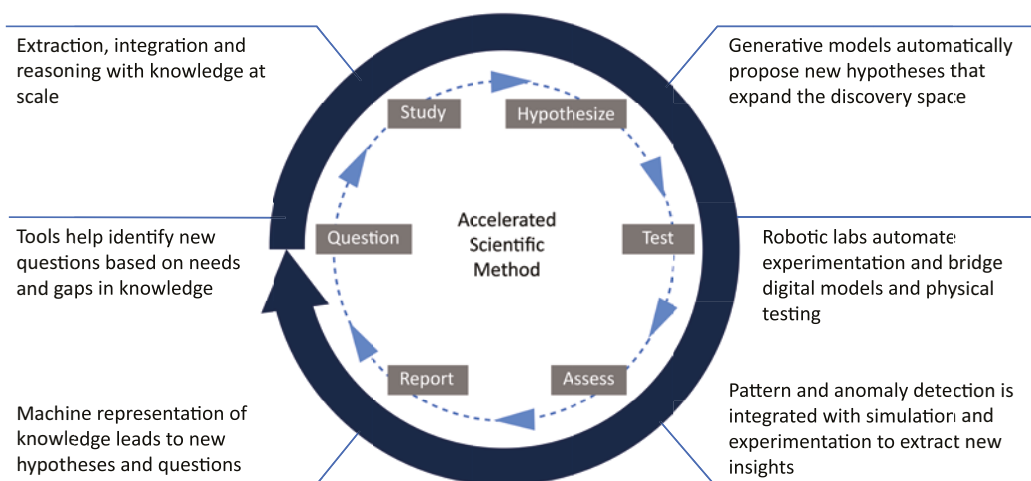
Artificial intelligence can be incorporated into the research process in automated research workflows, for example by testing materials or chemical reactions. Parts of the research process are already being automated by using different kinds of artificial intelligence to categorise existing research results and generating new experiments, accelerating and systematising parts of research that were earlier reliant on human experience, intuition and trial and error.³⁰ Here, the role for humans in the research process is – like prompt engineering for generative artificial intelligence – to design the input for the artificial intelligence and investigate the outcomes. This could considerably accelerate the research process and lead to more, and probably more reliable, research results faster. Robotic laboratories could further automatise and accelerate the part of research that is not feasible through digital modelling.³¹

29 See [European Commission, 2019, *Building a data economy – Brochure*, Brussels](#).

30 See for example [Pyzer-Knapp, E.O. et al., 2022, ‘Accelerating materials discovery using artificial intelligence, high performance computing and robotics’ *npj Comput Mater* \(84:2\)](#).

31 OECD (2023), [Artificial Intelligence in Science: Challenges, Opportunities and the Future of Research](#), OECD Publishing, Paris.

Figure 7: Accelerating materials discovery using artificial intelligence, high performance computing and robotics³²



This would also entail use of remote access to research processes through cloud computing or virtual access to high performance computers or quantum computers, with collaborators working in these digital structures at different times and in different places – a hybridisation of the research process, so to speak. On a less ambitious scale, using artificial intelligence to screen scientific literature is a way for researchers to cope with the fact that the number of publications has become too large for humans to read, even in relatively narrow fields of research. Here, generative artificial intelligence could summarise methods and results from existing research.

Digitalisation of procedures

Digitalisation also has a large impact on the administrative procedures of universities. This impact goes much beyond digitalising processes and moving away from paper; new digital systems often imply institutional change. Implementation

³² Pyzer-Knapp, E.O., Pitera, J.W., Staar, P.W.J e.a. (2022) [Accelerating materials discovery using artificial intelligence, high performance computing and robotics](#). *npj Comput Mater* 8, 84.

of new systems, such as a new student information system, can become an institutional change management process rather than just a technical project. A new digital system will give new kinds of data, perhaps more data, that can be used in management processes across the institution. This requires that staff at all levels are enabled to use the systems to make their working life easier and attain new insights. With large amounts of uniform data, the possibilities of data-driven governance of universities expand. There are very different attitudes towards this in Europe. In the UK, for example, universities collect a wide amount of data on learners for various reasons: for example, to identify which students are at risk of not finishing their studies so that the university can proactively give them support. In other countries there are either cultural or legal obstacles to collecting data on sensitive information, for instance on ethnicity or religious background.³³

At times, introduction of new technologies can lead to disruptive change beyond increases in efficiency. One example would be the introduction of digital diplomas or microcredentials verified through blockchain as a non-falsifiable way to record the ‘transaction’ between the institution and the learners. The legal and technical fundamentals for this would be new EU regulation of digital identity and digital ‘wallets’ (the eIDAS regulation³⁴), an application that can be used for identification and storing of credentials such as passports, driving licenses or university diplomas – and theoretically also microcredentials. This would mean that learners would have secure and standardised proof of their education stored digitally, which could seamlessly be recognised across institutions and borders. Such a system would certainly improve efficiency, but it could also be disruptive if other education providers are able to issue verified credentials.

The role of learning platforms is important, although hardly a novelty. MOOCs and other forms of online learning have been present in the higher education landscape since the last decade, and they are part of the learning offer of many universities. With more content being created for online, asynchronous learning, the platforms for accessing this learning and the accreditation of it have become more prominent. Some of this will be on commercial platforms, where university courses are available

³³ See [Claeys-Kulik, A., et al. 2019, Diversity, equity and inclusion in European higher education institutions, results from the INVITED project, \(EUA\)](#), p. 32-36.

³⁴ [EU Regulation on electronic identification and trust services \(eIDAS\)](#)

next to learning material produced by many other organisations; big technology companies have, for example, invested in providing online learning for business or digital skills.³⁵

A wide implementation of digital technologies can facilitate procedures and broaden access to learning. However, it became clear during the Covid-19 pandemic that basic access to digital services is not ubiquitous among learners. Some do not have access to their own computer, and they might not have a quiet place outside the university, where they can connect to services, online classes or exams. It also became clear during the pandemic that not all learners have the same basic digital skills. Moreover, accessibility to high-speed internet can be difficult in remote areas, and this access varies considerably across Europe. Looking at digitalisation as the main technological driver without taking into account these social aspects is to ignore the double-edged tendency of digital technologies to be both potentially inclusive and exclusive.

This world of learning through platforms as well as performing automated science at a distance are examples of ‘unbundling’ of learning, knowledge production, place, and institution. Learners can access knowledge everywhere, from factual knowledge to complex learning, and universities lose their unique position as being the places that gather knowledge and learning in one place. They can give the special ‘campus experience’ where space and knowledge play together in a particular way, but with unbundling and hybridisation, this is only one modality of being a university.

2.5 The regulatory dimension

As mostly public institutions, European universities are subject to a differentiated regulatory framework. There are specific laws for universities as institutions, their funding is regulated, and they are subject to more general regulation both from the national and from the EU level.

³⁵ See for example Google’s [Digital Garage](#) or Amazon Web Service’s [Skills Builder](#)

Figure 8: Overview of regulatory drivers

DRIVERS	EXAMPLES OF IMPACT
Political control of universities	Reduced academic freedom Ad-hoc political steering
Immigration policies	Difficulties in hiring international staff Fewer non-EU students
Stronger EU role in higher education and research policies	Pressure for national reforms Harmonisation of framework conditions
Increased impact of non-university related regulation	More requirements for compliance

National regulation

At the national level, much of the regulation specific to universities can be summarised in the question about university autonomy, the framework conditions that facilitate or hinder universities in taking their own strategic decisions. There are large differences across Europe concerning autonomy, as summarised in EUA’s University Autonomy Scorecard. Formally, there is a slight progress in terms of autonomy for Europe’s universities. However, one of the clear trends in recent years has been that universities are increasingly steered through other channels than formal regulation, such as micro-management through public funding to universities. This can be done through performance contracts, which can prescribe the fields where new academic staff should be hired or how universities contribute to national policy goals. Steering can also come from ad-hoc political initiatives.³⁶

In the most extreme cases, this is connected to democratic backsliding (see chapter on political drivers), where laws are made to retain direct control of universities by political leaders. One prominent case is Hungary, where university board members have been politically nominated for life, or in Türkiye where the president directly appoints university rectors. Such procedures can directly affect academic freedom and institutional autonomy, for example the prohibition to have programmes in

³⁶ [Bennetot Pruvot, E. et al., 2023, University Autonomy in Europe IV: The Scorecard 2023 \(Brussel, EUA\), p. 77](#)

gender studies – again an example from Hungary, but this has also been discussed in other countries. National conservative leaders on the European continent are to some extent looking to the discussion on ‘woke’ culture (woke originally meaning being alert to discrimination and social inequality) and have declared ‘war on woke’, using the term as a pejorative against what is perceived as left-wing activism. In this debate, universities risk being seen as woke institutions that have taken sides in a cultural war of values. One highly prominent example from the state of Florida in the United States is the Individual Freedom Act (or Stop WOKE Act), which attempted to regulate the content of education in Florida, for example by banning critical race theory. The law was later opposed by the courts, but this would not be the case in countries where the courts are coming under political control or constitutional safeguards are weak.

Immigration regulation can be concerning for universities as well. Generally, Europe is today making up for its low birthrates through immigration. Universities benefit from this, as they are particularly dependent on globally mobile researchers. In Europe about 25% of doctoral graduates come from abroad on average,³⁷ and universities often depend on this pipeline of foreigners for their research activities. The dependence on fees from international students is less pronounced in Europe, but in some systems, notably England but also Ireland and the Netherlands, this is part of the picture. As national governments work to limit immigration, this might very well hamper universities’ activities.

European level regulation

The European Commission does not have the competency to propose regulation for education the way it can in other sectors. It does have more power in research, but it has not used these powers in the past. Instead, it works through funding, sharing and discussion between member states, which can lead to recommendations on common topics. The EU can for example agree on non-binding commitments from member states and use the Erasmus+ Programme for furthering specific agendas and supporting the Bologna Process. Nevertheless, in recent years, the European Union has taken a highly active role in higher education policies. With the establishment of the European University Initiative as a vehicle for policy reform, the European Commission is within the limits of the current EU treaties,

exploring new instruments for closer cooperation, such as a possible European legal statute for transnational university alliances as well as a European degree label. In 2024 there will also be a proposal for a European quality assurance and recognition system, and it has yet to be seen to what extent this will fit with, be different from or complementary to the system we already have in the European Higher Education Area with the European Standards and Guidelines for Quality Assurance. The future of the European University Initiative is still open, but clearly, EU level policy discussions are creating new dynamics aiming at shaping the framework conditions for universities in a more proactive way. This leads to the question about the wider European Higher Education Area (EHEA) and the European countries that are not in the EU. Would they be increasingly relegated to an observer status with associated partners in EU-driven policies, or could they retain the full and equal role in a strengthened EHEA?

Similar, the European Research Area (ERA) works through different groups consisting of member states, the European Commission and stakeholders, sharing knowledge, for example by discussing researchers’ careers or international cooperation. As in the EHEA, the commitments made by the member states have been voluntary in the past, but the structure allows for a much more coordinated approach and the articulation of common values and goals. While the EU has not used its powers to translate these discussions into regulation, they can potentially lead to coordinated implementation of similar national regulations or EU member states sharing knowledge and approaches. If the ERA is consolidated as a main forum for research policy discussions, this will add to the harmonisation of approaches, and possibly to national policy reforms, much like the Bologna implementation.

One big theme concerning European regulation has been the impact on universities of rules that are not specific to the sector. The General Data Protection Regulation (GDPR) has been a good example of this: rules concerning the gathering and storage of personal data were made for society at large, but had a considerable impact on processes within universities, as they gather large amounts of personal data on learners and as part of their research activities. Compliance with the GDPR remains a major concern for universities, particularly with regard to digital

37 [Eurostat, Learning Mobility Statistics](#)

transformation. There have been similar worries about the impact on regulation of platforms (the Digital Services Act) on Open Science.³⁸ There have been calls for a European Knowledge Act, which would set sector-specific rules for research, ensuring implementation of the European Research Area and avoiding unforeseen consequences of other regulations. This would be a driver for much greater and centrally controlled coherence in the EU, but it is also highly speculative. At the time of writing, making sure that new regulation generally takes universities into account seems a more viable route.

The new rules for a European ID, the Regulation on electronic identification and trust services for electronic transactions in the internal market (eIDAS)³⁹, will also have very considerable impact on university processes (see chapter on technological drivers): learners will have a common, electronic identity and a ‘wallet’, which contains documents such as diplomas in a verifiable, electronic format. This will have a large impact on recognition of degrees (and potentially of credits) across the European Union.

Rules that set standards for higher education and research within the EU also have consequences in non-EU countries. Within the European Economic Area, these regulations have direct impact, but for other countries, there would be requirements for compliance with EU rules. This is already the case for GDPR, where the European Commission can grant ‘adequacy’ for countries that have similar data protection standards, so that universities can treat partners here like any EU partner. Also, for eIDAS, it is foreseen that non-EU countries can work with the EU system, provided they follow EU standards.

Generally, one may expect that regulatory compliance will become more important for universities. This is already clear in the digital sphere, but as both the EU and individual countries either move towards closer steering or make general rules in, for example, the security field, more resources must be allocated to ensure that universities and their staff comply with all this regulation.

³⁸ See [Eechoud, M. v., 2022, Study on the Open Data Directive, Data Governance and Data Act and their possible impact on research \(European Commission\)](#) and [Senftleben, M. R.F., 2022, Study on EU copyright and the related rights and access to and reuse of data \(Brussel, European Commission\)](#)

³⁹ [EU Regulation on electronic identification and trust services \(eIDAS\)](#)

2.6 The environmental dimension

Climate change is here. Rising temperatures bring with them more extreme weather with risks of phenomena like flooding, heatwaves, and repeated, long droughts. With this comes a more acute awareness of how resources are used, accentuated by geopolitical events, such as the Russian war in Ukraine. Universities are finding themselves at a point of change, where they are working across a large spectrum of activities to respond proactively to prevent climate change as well as working to manage and mitigate the risk of the climate change that we are already experiencing.

Figure 9: Overview of environmental drivers

DRIVERS	EXAMPLES OF IMPACT
Sustainable Development Goals	<ul style="list-style-type: none"> Student activism Infrastructure investment (greening) Sustainability policies Sustainability skills Sustainability-oriented research and innovation
Climate change	<ul style="list-style-type: none"> Climate anxiety among students Protecting infrastructure against extreme weather Risks to mobile students and staff Influx of climate refugees

Working towards sustainability

For a number of years, the issues of environmental sustainability have been seen as an opportunity for universities: The sustainable development goals (SDGs) and the framework that they provide for action corresponded well to the scope and potential of universities' activities, and many felt that they corresponded better to universities' contribution to the knowledge society than the paradigm of competitiveness and economic growth. Across the world, universities embraced the SDGs, including in EUA's Universities without walls – A vision for 2023, which stated that:

*Sustainable development will be the main framework for driving impact through university missions, as universities proactively reflect upon, find and promote solutions in dialogue with society.*⁴⁰

Sustainable development will be the main framework for driving impact through university missions, as universities proactively reflect upon, find and promote solutions in dialogue with society.

Within universities, students as well as academic staff have expectations that their institutions act to promote sustainability, often understood as environmental sustainability. In an EUA survey on greening of universities, staff and student engagement were rated important or very important by over 90% of respondents.⁴¹ This expectation and engagement are likely to continue to be drivers for universities' response to environmental sustainability, although activism could be hampered by growing feelings of anxiety and disempowerment in face of particularly climate change.

In terms of infrastructure, greening of the campus is a continuous topic. Greening of the campus includes investment in making buildings more efficient or ensuring that laboratories are using resources in a sustainable manner. This is often an important strategic part of university management and is also a good investment over the long term. Some countries provide financing for this, for example through in Recovery and Resilience Plans for using the Next Generation EU funding available after the pandemic.⁴²

Travel, procurement and catering policies are also areas where greening has had an impact. Universities have established policies that incentivise train over plane travel as well as virtual meetings and events to reduce CO₂-emissions. Some universities have exclusively vegetarian catering and sustainable procurement policies to various degrees.⁴³

Impact on university missions

The impact of the sustainability agenda is palpable across university missions. Generally, aiming at sustainability can be seen as an opportunity to promote interdisciplinarity in education as well as in research and innovation. There are big expectations from society that research proposes solutions to particularly climate change, and this is partly echoed within universities. In a survey regarding innovation, conducted by EUA in 2021, new technologies developed through research were seen by most as a way for universities to contribute to sustainability. This has been a strong tenor within the innovation mission of universities, where researchers, students and entrepreneurs (including researcher and student entrepreneurs) have been working on technical solutions aiming at reducing energy consumption and waste in society. Developments in artificial intelligence and data-driven solutions – particularly good at increasing efficiency – as well as materials science have been important foundations for these new solutions. Social innovation has also been part of this picture, and it might be increasingly important: given the short timeframe and the size of the challenge, there are few technological solutions that have the necessary impact and are immediately ready for being taken up widely.

⁴² See [Estermann, T. & Bunescu L., 2021, Greening in European higher education institutions. A governance, funding and efficiency perspective \(Brussels, EUA\)](#).

⁴³ See [Estermann, T., 2021, The green transition at universities: public procurement as a powerful tool, EUA Expert Voice](#).

⁴⁰ [EUA, 2021, Universities without walls – A vision for 2030 \(Brussels, EUA\)](#), p. 6.

⁴¹ [Stöber, H. et al., 2021, Greening and European higher education institutions \(EUA\)](#), p. 16.

In this perspective, the voices that call for more holistic ideas of societal change could become louder.⁴⁴

For learning and teaching, sustainability is integrated in many ways, through dedicated study programmes, microcredentials or as part of general curriculum reform. This is likely driven by a wish by learners and university leadership alike to contribute to sustainability. There is also a perception for a need for sustainability related skills on the labour market. Companies have invested in sustainability to retain customers with these concerns, and they need staff with sustainability skills to steer this investment and develop policies. Likewise, governments and public institutions are implementing sustainability policies, which requires people with an understanding of the issues.

All these types of initiatives are now commonplace across Europe, and they will likely continue to be a driver for university policies in the years to come. However, they have often been aimed at preventing or slowing climate change and achieving sustainability. With the impacts of climate change becoming increasingly evident in the present, these impacts are becoming drivers of their own for universities to work for mitigation and adaptation.

Managing environmental risks

In the years after the Covid-19 pandemic, there has been a slow realisation that climate change is already here. In Europe, floods in Belgium and Germany, droughts in France and fires in the Mediterranean Region have demonstrated the immediate effects of extreme weather. Managing these risks could very well be an additional driver in the present as well as the near future, and there are already examples of the impact.

44 One example would be Linda Doyle, President of Trinity College Dublin stating "[The world is broken ... the only thing that universities can do is offer alternative futures](#)", From the Science |Business Conference Sustainable horizons: Does our future depend on science? See also: [King, L.C., Savin, I. & Drews, S. \(2023\). "Shades of green growth scepticism among climate policy researchers" in Nature Sustainability volume 6, p. 1316–1320.](#)

One example would be countries where the academic year goes well into the summer months. With repeated long heat waves during these months, some universities are discussing changing the academic calendar to avoid July and August. Extreme weather could also influence campus management beyond limiting the use of resources. With natural disasters becoming more commonplace, universities with large, widespread and at times sensitive infrastructure could have to assess and manage these risks in new ways. Low-lying campuses could be in risk of flooding and even buildings that are not wholly at risk might not store valuable and sensitive equipment or collections below ground. Water management and cooling could also be issues that need more investments and procedures than in the past. Another aspect of this could be that universities are further integrated in or have their own policies for contribution to local disaster management, for example to accommodate victims of disasters in their buildings. This was already the case during the 2021 floods in Belgium.

Risks are not only mounting at home, mobile students and staff could also more often find themselves in zones of natural disasters, as violent storms, flash floods or landslides become more frequent. While such disasters will be risky for travellers from Europe, they are obviously much more serious for the populations in the Global South, which is much harder hit by climate change than parts of Europe. Climate inequalities could increase tensions between North and South and make international cooperation more difficult – or conversely, the common challenge of climate change could make North-South partnerships more necessary. It is also likely that Europe will see many more climate refugees, as regions such as parts of Africa become unliveable or experience large-scale disasters. As one concrete example, the floods in Pakistan in 2022 alone affected 33 million with more than 8 million displaced persons.⁴⁵ Universities have already considerable experience with assisting refugees from the Syrian refugee influx in 2015 and the Ukrainian refugees from the Russian invasion in 2022. The experience and the processes from these crises might become even more useful considering climate refugees.

45 [World Bank, 2022, Pakistan: Flood Damages and Economic Losses Over USD 30 billion and Reconstruction Needs Over USD 16 billion - New Assessment, October 2022.](#)

Closer to home, student activism on climate issues might give way to climate anxiety and feelings of impending doom. This becomes stronger in areas where people have had direct experience with climate-related disasters. A global survey among children and young people from across the world saw 60% of respondents being extremely or very worried about climate change. This was slightly lower in European countries, but everywhere, almost all young people are worried to some extent, and 50% felt helpless.⁴⁶ The arguments that technology or even basic research will provide future solutions to climate change might not sound believable to this generation. Here, expectations from universities by learners would not only be skills and knowledge about technological solutions but a broader sense of empowerment and meaning in a menacing world. In this situation, it would be important that teachers are equipped for discussions and for learning that prepare for managing the very real threats from climate change and also – importantly – provide a sense of meaning beyond the solutions provided by new technologies.

Beyond climate, there is the looming threat of new health crises. The combination of global urbanisation, increased travel across the world, climate change and international trade raises the risk for global pandemics like Covid-19.⁴⁷ Universities might be particularly vulnerable here due to their large global engagement, which is often with partners in urban centres. Experiences from the Covid-19 pandemic in handling such events would be important to keep in mind should the world experience another such period in the coming years. This threat could also lead to more funding being directed towards health research. It could be imaginable that risks like new pandemics could increase the use of science advice, as was the case during Covid-19, and further develop the interface between politics and science. Here, risk mitigation could lead to opportunities for universities to contribute even more at the societal level.

⁴⁶ [Hickman, C. e.a., 2021, 'Climate anxiety in children and young people and their beliefs about government responses to climate change: a global survey', *The Lancet* \(5:12\).](#)

⁴⁷ [Baker, R.E. et al \(2022\) 'Infectious disease in an era of global change', *Nat Rev Microbiol* \(20\), 193–205.](#)

3 Possible futures

a focus on transnational cooperation

The following forecasts are all tools for reflection; they are not predictions, and they are not made to point to a specific future that would be better than the others. They are creative spaces that attempt to describe different futures for transnational cooperation using the drivers and dimensions mentioned above. Not all of the drivers are explicitly mentioned, but the reader is more than welcome to imagine how all of the drivers play out in the different futures below.

The methodology is taken from The Institute for the Future⁴⁸, which has developed a framework of four basic ways to think of possible futures: Growth (like now, but more), Constraint (the present developments meet a limit), Collapse (the present developments stop) and Transformation (things will be radically different). For the purpose of the UniFE project, this framework is used to develop forecasts about the future of international and transnational cooperation of European universities.

⁴⁸ See [Website of the Institute for the Future, Palo Alto, California, USA](#) (accessed on 19 December 2023).

Figure 10: Important terms in futures thinking (source: Institute for the Future, IFTF)

A signal

A phenomenon that signifies a sudden change of something habitual and if amplified has a potentially big impact

A driver

The force behind major changes

A forecast

A picture of a particular possible future developed based on a combination of different drivers

A scenario

A story set in a particular future forecast

A future artefact

An imaginative artefact from the future, such as an email, a newsletter article, a policy document or anything else from a date in the future that makes a certain future more tangible and is used to tell a story (a scenario) of a certain future

3.1 The growth forecast: continued internationalisation as survival strategy

In this forecast, forms of international cooperation are further diversifying at different scales due to the need to innovate, connect researchers and students globally and address the grand challenges together. Further digitalisation and hybridisation make this possible, while keeping the environmental footprint in check.

In this future, the following scenario can be imagined

It is Monday morning, 22 May 2033, and the President of Opperthal University, a small town with 150.000 inhabitants in Germany is sitting in his self-driving car that brings him to his office at the university. He is skimming the local newspaper on his phone and the following article catches his attention:

Opperthal University breaks records of international student numbers

For the winter semester 2033, Opperthal University is awaiting 1,273 new international students starting their Master's programmes. They mostly come from India and Africa. Student intake and collaboration with China was stopped five years ago due to foreign interference concerns. The new international students will spend the first year of their master's studies in Opperthal, before moving to other partner institutions and continuing certain courses online at Opperthal University. This will increase the number of foreign students to more than 7,000 which is about half of its total number of 14,321 students currently enrolled. Overall student numbers have been shrinking over the past decade as demographic decline is ongoing with most of the Opperthal population now being above 45 years old.

"This is unbelievable, why are we still supporting a university with taxpayers' money which will soon serve more foreign than local interests?", the leader of a new citizens initiative "KinderStattInder" commented to Opperthal Daily. The Mayer of Opperthal tried to calm things down: "International students are a good way of bringing life to our city and money to our local businesses as well as to the university. We need to keep our city vibrant and internationally connected to be attractive and guarantee a good local environment with life quality for all parts of society, including good care for our elderly." It will be interesting to see how things play out in the City Council next week, when delegates are to vote on co-funding for the newly to be built Metaverse campus."

PN/Opperthal Daily

The President of Opperthal University starts feeling nervous: "Damn, I told the press office to be careful to not leak the international student numbers before we had an internally agreed strategy for presenting them in public. How could this happen? I have to talk to my leadership team; we have to urgently devise a plan for securing support for our metaverse campus. It would be a disaster for the university if this failed..."

In this scenario, the main drivers for change are demographic decline and an aging society. This leads to drastically dropping local student numbers, after a longer period before, where student numbers had been growing in Germany. The strategic response of the university in this case is to focus on attracting international students, notably from growing regions and countries like Africa and India. European and international cooperation would grow in different forms and areas of activity including all university missions, albeit not with risky countries such as China.

Mainstream politics are pro-immigration, despite vocal opposition. This is a way to keep local communities alive in a difficult demographic situation, and it is a way for universities to keep up student numbers.

Another strategy could be to shift learning and teaching activities more towards lifelong learning, trying to attract learners at different stages of life through offers of short courses and microcredentials beyond traditional degrees enabled through further digitalisation.

The strategy applied would very much depend on the institutional profile and mission of the university as well as the funding model and level of financial autonomy of the institution. In a system where a university is able to charge (higher) fees for international students, the focus would likely shift to that, while in a system where this is not the case and in addition the local environment is rather sceptical towards further internationalisation, it is unlikely that universities would go that way.

Also, further digitalisation and hybridisation play an important role in this future, as it enables different forms of international cooperation, while keeping the environmental footprint for travelling in check. Interoperability of different systems across institutions and borders as well as cybersecurity are very important for universities in this future.

Connecting global cooperation with local engagement and outreach to the population beyond the traditional study programme offer are key in this future to ensure societal relevance and acceptance of the university.

3.2 The constraint forecast: cooperation with big strings attached

International cooperation is constrained due to geopolitical divisions. Universities have to manage an increased set of limits that are imposed from the outside. In Europe, deeper cooperation through alliances continues, albeit with lower ambitions and reduced to certain areas of universities activities and what is possible within the given diversity of national frameworks.

The main drivers here could be an increased political attention to academic cooperation as well as the effects of climate change on travel. Concretely, the current geopolitical situation already results in constraints on research cooperation where there are political concerns about security. The academic sanctions against Russia following its invasion of Ukraine is an extreme example of a much broader trend to try to codify the limits of international cooperation.

Academic cooperation and European 'Realpolitik'

To give an example of a situation that could theoretically occur in this forecast, here are the fictive conclusions from a meeting of European ministers in 2033:

In this future, the following scenario can be imagined

Excerpt - changes to country listing following the Meeting of the Council of the EU, 28 March 2033

After the high-level meeting between European Commissioner Radu Mircea and The President of the Republic of Indonesia, Siti Sari, and the ratification of the Europe-Indopacific Technology Security Agreement, The Republic of Indonesia has been moved up the country security list two places from orange to light blue.

Indonesian partners in research projects led from the European Union will now fall under risk assessment level 2, instead of level 3. Data exchange regulations have changed from non-adequacy to limited adequacy.

Following the decision of the government of Uruguay to grant access to the RosGor mining company for marine mining off Punta del Este, Uruguay has moved down from blue to light blue in the security list. The risk and data status of the country is now equal to Indonesia.

Any changes regarding ongoing or planned research cooperation with the two countries must be reported to the National Technology Security Contact Point within two weeks.

The Moldovan Presidency congratulated the ministers on the swift approval of the new listings.

There are several elements in this text where events in the present have grown and gained in importance. Firstly, the concept of 'like-minded countries' has been further codified. This is already an established term in European foreign policy and in European policies for research cooperation. Here, the European Commission embraces a 'modulated approach' based on "reciprocity, a level playing field, and the respect for fundamental rights and shared values".⁴⁹ Countries that have more shared values have access to deeper cooperation. In this forecast, the term 'like-minded countries' has been heavily institutionalized with different levels regarding security (enough levels to necessitate a 'light blue' label). Technology plays an important role, as it is seen as a strategic asset to control globally, share with friends and exclude from opponents. In this future, the European Union has established a network of treaties and agreements to regulate and develop technologies. This could both happen in a situation where Europe and the US are leading a democratic block against authoritarian countries led by China. It could also be that the world is divided in three blocks led by respectively the US, Europe, and China.⁵⁰ Such a network of treaties and agreement has begun with the EU-US Trade and Technology Council⁵¹, which was set up in 2021 to coordinate trade and technology policies between the US and the EU. The model is also used for EU-India relations, where a similar council has been set up in May 2023. In the forecast, the Indo-Pacific area (roughly speaking China's neighbours to the South and East), is a continued area of contestation between China and the other main global blocks. As Indonesia is entering the system of agreements set up by the EU, the possibilities for academic cooperation widen. Apart from the bilateral agreements, the EU can also unilaterally take decisions on, for example, data transfers. This is already the case for personal data governed by the GDPR (General Data Protection Regulation), where the EU unilaterally decides whether the data protection system of a third country is in line with European standards or not.

49 [European Commission, 2021, Communication from the European Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions on the 'Global Approach to Research and Innovation, Europe's strategy for international cooperation in a changing world', p. 14, Brussels, 18 May 2021.](#)

50 [For these scenarios, see Claeys-Kulik, A.-L. & Jorgensen T.E., 2021, Pathways to the future, \(Brussels, EUA\), p. 11-13.](#)

51 [See European Commission website on the EU-US Trade and Technology Council \(accessed on 19 December 2023\).](#)

Secondly, there is the factor of global competition for influence between the major blocks, for instance when it comes to access to resources. If a country begins to lean to another global block, it risks losing the status that it has in terms of cooperation. Here, Uruguay has given mining rights to a Russian company, and it is thus seen as further away from the 'like-minded countries' block. Uruguay moves from what must be assumed to be a very privileged position to the same category as Indonesia, which is just entering the group of 'like-minded countries'. Here, the downgrading in the system is probably a slap on the wrist to warn the country that sharing its resources with competitors will have consequences. As a side note here, this is evidently a situation where raw materials are so scarce and expensive that marine mining has become much more economically viable.

Thirdly, the European Union has enlarged and likely has become a more important global power. Moldova is a member of the European Union, and so also likely Ukraine and countries on the Western Balkans. Being much larger, Europe might become a significant world power, and with this status, the European Union might increasingly embrace Realpolitik, promoting its own interests through power rather than being led by ethical values and a rules-based world order – although one does not completely exclude the other. As in the example above, Europe uses its status to influence countries around the world and bring them under an EU-led order of bilateral treaties. With the increased strategic value of scientific knowledge, academic cooperation is part of the system and can be used to bind partners closer together or punish those that act against European interests.

The university perspective

In this future, the following scenario can be imagined

How would such a situation influence the daily working of universities. One could imagine an email sent from the Director of the International Office at a (fictive) Swedish University, reacting to the news:

From: Signe Olsen <internationaloffice@uhx.se>
Sent: 29 March 2033 14:35
To: Espen Svensson <rector@uhx.se>
Subject: New country listings

Dear Espen,

There is good news and bad news from Brussels. They have decided to make things easier regarding Indonesia, which is really positive as the country has emerged as a major higher education player in the last years. Without going into details about the new status, there is a big difference between risk assessment level 2 and 3, and the new status for data exchange is also a big step forward, particularly for health research and exchanges. I would suggest having a meeting next week with Anders from Medicine about how to react. By that time, we should also have guidance from the government.

Regarding Uruguay, the news is not too good. We will have to review our procedures for student exchange and the data that we share with our partner in Montevideo. Our office will prepare a note based on our general guidance for data sharing. We also have to make sure that there are no research projects going on that would be affected.

Apart from that, I will send you a new email regarding the Singapore flash floods and our exchange students there. We might have another problem on our hands.

Best wishes,
Signe

As the email shows, the increased codification of security levels and changing status of different countries according to their political closeness to the EU would require continuous action on behalf of the university. It will be important to remain compliant with the various rules for research partnerships, which would be a challenge if the status of established partners changes as in the case of Uruguay in the example. It is not difficult to imagine the challenge of having an overview of the different elements in research projects that could be problematic as well as knowing exactly what kind of data is shared within partnerships. This would probably require a rigorous ex-ante approval of any partnership and international project as well as requirements for reporting if and when the contents of these projects change. The data from approval and reporting would also need to be stored and made accessible as part of the overall data-driven management of the institution. In the present discussions, universities are recommended to set up specific structures to assess and implement responsible internationalisation in the sense of managing security risks as well as ethical and value-related issues in international cooperation.⁵²

In this scenario, EU countries agree on the various classifications, and national agencies ensure compliance. In Sweden, the government agency issues guidelines for compliance, and it is imaginable that such guidelines are done in a dialogue with research and education institutions. However, checks for compliance could also be done in a much more top-down manner and without much transparency in cases that are unclear. Apart from compliance with these European requirements on security, universities already have to take into account regulations on national security, cybersecurity, research ethics, data sharing and many more issues.

⁵² See for example [European Commission, 2022, Tackling foreign interference.](#)

The already existing complex compliance requirements would in this example be amplified by changes following a shifting geopolitical situation, putting pressure on university resources.

The last part of the email points to further constraints in academic cooperation: with climate change and more extreme weather comes risk for students and staff in the zones that are affected. This could be flooding, storms, landslides, extreme heat or cold, or fires. It could also be the political fallout of natural disasters or climate change-related crisis that create risks for university staff, students or partners. This could be conflicts created by large numbers of displaced persons, conflicts over resources like water or arising from scarcity of food. These issues would have to be considered in international cooperation. Moreover, a more acute climate crisis could affect international travel in general, making travelling by air either more expensive or limited due to university policies. Many universities today have policies to avoid short-haul travel by plane, and as climate change accelerates, these policies could well be stricter, limiting physical travel.

While this future is much more constrained than today's international cooperation, the institutional answer is to set up procedures that can adapt and follow these constraints; at times universities can even be part of the national or European dialogue together with governmental authorities about the concrete implementation of the highly codified framework. In the larger picture, universities could also move the general discourse about geopolitics by underlining the role of soft power and support a values-based policies. They would still play an active part in these policies, although with generally much less autonomy than today.



3.3 The collapse forecast: back to national borders

A future of extreme, nationalistic policies could see the collapse of international cooperation. In this future, suspicion against the international engagement of universities has grown to the point where it is being actively sabotaged by politicians. The current EHEA and international university cooperation breaks down. Alliances of European Universities dissolve due to unsurmountable legal, administrative, financial and governance challenges.

There are signals of this in several European countries that have seen a large influx of international students, and where politicians and citizens begin to ask whether universities are serving their country or whether they are promoting their own, cosmopolitan agenda without regard to the taxpayers that fund them. The arguments point to nationals not having access to education because foreigners take their place, or more broadly, that international students put pressure on the housing market. While these arguments are mostly concerning very large numbers of international students, they could well be radicalised by national conservative voices that see universities and their international engagement as problematic per se. Political forces that drive democratic backsliding would also want to keep control over universities and their potential for being a critical voice in society. Environmental drivers could play a role as well, if particularly travel by plane becomes too costly for large numbers of international students to go to Europe.

In this future, the following scenario can be imagined

As an example from this future, the international office in a fictive Belgian universities closes. Here is the message, sent through the Telegram messaging app, from the Head of Communication to the rector with a draft text, announcing the closing of the office:

Message sent on Telegram 15 November 2032

Dear Olivier,

Please find below a draft for the announcement of the closing of the international office, as requested by you last week. I was tempted to cite the minister's remarks about "universities as gateways for the Great Replacement", but I believe that it would be too politically sensitive. At the board meeting yesterday, M. Leclercq underlined how the university has a duty to preserve the "historic cultural composition of our territories", so I am sure that this is not the last word that we have heard from the political powers that be.

Talking to Denis, I have become aware that several of our staff of third-country origin is looking to go elsewhere because of the atmosphere, so this will just add to our recruitment challenges.

Announcement: closing of the international office from 1 January 2033

Following the decision of the Senate of 10 October 2032, the international office will close as of 1 January 2033.

I cannot emphasise enough how much I regret this decision but facing the no-immigration policy of the government, it is difficult to justify supporting the office, also given the overall challenges regarding staff shortages.

Since the triple storm surges, and the dramatic rise in the cost of air travel to our country, the number of visiting students and researchers has been greatly reduced. With the further restrictions in visa policies, we can foresee that activities will be at a level where the academic office and the research office will be able to manage the administrative tasks.

The message testifies to a very difficult situation with general pressure on the university from political powers. It is telling that the message is not sent through email, but through the Telegram messaging services, which provide more privacy. Evidently, the comments about external control are deemed too sensitive to be sent through the university's email servers, which could be monitored by the authorities.

The political discourse of the government is clearly one of fairly radical ethno-nationalism, which fears that the nation will be replaced by outsiders. The government refers to the conspiracy theory of the 'Great Replacement', which states that western elites are conspiring to replace the white majority populations in Europe with particularly immigrants from Muslim countries. This idea has been partially embraced by some European political forces, including in the governing *Fratelli d'Italia* party in Italy,⁵³ or by the Hungarian government.⁵⁴ Universities would fit well in such a world view as elitist institutions that actively seek to host learners and staff from all over the world; in this perspective, it makes sense that they are a 'Gateway for the Great Replacement', both in terms of letting foreigners in as well as being institutions of the elites that want to destroy the nation.

In this future, the government is working to undermine or take over institutions like universities. Government officials play a big role in the governance of the university, in this case in the board. It is not unusual that university board members come from the political scene, but there are cases – notably Hungary – where this has been used to exert permanent control of the institution.⁵⁵

More than being in positions of control within the governance of universities, political actors that look to permanently control society and permeate it with their ideology might also look to replace societal elites. This would not necessarily only mean that the government would repress universities, but they might change them to better fit the official world view. This could well mean the end of the cosmopolitan, critical university and the advent of a university that is promoting the knowledge that political power finds useful.⁵⁶ The view of universities as fundamental for national culture would by no means be new. In the 19th century,

European universities were often places of nationalist fervour, particularly in places where the development of universities was close to the state apparatus. Indeed, nationalism arguably began with scholarly interest in the nation or country during the Enlightenment.⁵⁷ A more state-serving and less cosmopolitan university would have very different values than those we know today, but it would not be an oddity in the historical perspective.

In the examples above, the issue of staff shortages is prominent. In Europe, many universities to the North and West are deeply dependent on international flows of academics to retain their research capacity. Doctoral programmes in these countries often graduate between 30% and 40% (or more) PhDs from abroad.⁵⁸ These doctoral candidates are important for the research work in general and function as a pipeline for more senior academic positions. In a future where this pipeline is severed and where existing academic staff would leave the country for political reasons, universities would have big challenges continuing research at the same level. Other challenges would come from the overall lack of skilled labour for administrative and technical positions. If the possibility of hiring staff from outside the country is limited, the difficulties of finding staff due to demographic developments would be felt even more. Likewise, a political context that is explicitly hostile to diversity will lead to a lower number of learners with the current demographic developments. If birthrates are falling and learners of diverse backgrounds are actively marginalised in society, the pool of those that can and want to attend university will fall. Universities in areas with drastic demographic decline are today looking to policies promoting diversity.⁵⁹ In the example, the discrimination is mainly against ethnic background, but it could also be against sexual orientation and gender identity, further diminishing the number of potential learners.

This marginalisation of learners with different identities might lead to a general lack of skilled people in society, but it could also lead to alternative roads to learning beyond the official structures. Learners could for example use online learning

53 [Italian outcry over Lollobrigida 'ethnic replacement' remarks \(BBC\)](#)

54 [The European country where "replacement theory" reigns supreme \(Vox\)](#)

55 See [EUA, 2023, The evolution of university autonomy in Hungary, \(EUA\)](#)

56 See also [Claeys-Kulik, A.-L. & Jorgensen T.E., 2021, Pathways to the future \(EUA\)](#)

57 Hroch, M. 1985, *Social Preconditions of National Revival in Europe* (The University of Chicago).

58 See Eurostat 2020 [Share of tertiary education graduates from abroad within each level of education.](#)

59 [Claeys-Kulik, A., et al. 2019, Diversity, equity and inclusion in European higher education institutions, results from the INVITED project, \(Brussels, EUA\), p. 17](#)

from less restrictive systems to access knowledge that the national conservative government has suppressed, such as knowledge about gender or racial relations.

The last element in the collapse of transnational cooperation in this example is climate change. It is imaginable that the consequences of climate change have become so catastrophic that there has been decisive political action limiting the use of fossil fuels and making travel by plane prohibitively expensive. In order for such drastic political action to be taken, it can be assumed that the world has experienced very severe natural disasters such as storms or flooding, or possibly mass migration. The Belgian government in the example could have embraced tough policies on air travel as a means to reassure the low-lying Flemish parts of the country and the interests of the Port of Antwerp, which would be threatened by storm surges. Here, the government would be blaming climate change on the excesses of the elites who fly around the world for their cosmopolitan lifestyle.

Institutional changes in this future are extremely difficult, if universities aim to keep the values that we know today. Those universities that have focused on being active on the global scene either through research cooperation or through international student recruitment would have to reinvent themselves in terms of profile. They would also likely lose a great deal of income that came in through these activities. At the system level, there would be less diversity of institutions, as universities are much more bound to a specific political agenda than today. If universities manage this transformation to a new political context, they could have a more transparent relation to the government, where there are very clear (although highly constraining) political expectations setting a clear frame for the strategies of universities.

3.4 The transformation forecast: division of labour in a two-tier system

In this forecast, transnational cooperation of universities will radically transform. A new form of virtually connected European super universities with campuses across the European Union emerges through a small number of alliances of universities. They will adopt a European legal statute to jointly recruit staff and students, manage funds and infrastructure and award European degrees. This is possible as EU member states under the threat of geopolitical tensions realise that they need to pool resources and better connect to ensure innovation, talent and skills made in Europe. European super universities are funded by the EU and collaborate in a restricted way with international partners, while smaller local higher education institutions are funded nationally and serve their local communities.

In this future, the following scenario can be imagined

In this forecast, the following scenario might happen. On 22 May 2030, Clare Pivot, Vice-President Global of EU Universitas, one of the European super universities, sends the following email to her colleague, Peter Sondermann, Vice-President Western-Europe of EU Universitas to seek his opinion about further collaboration with African partners.

From: Clare Pivot <VP-Global@eu-universitas.eu>
Sent: 22 May 2030
To: Peter Sondermann <VP-Western-Europe@eu-universitas.eu>
Subject: FW: Cooperation proposal African universities

Dear Peter,

We have received a proposal from our partner in Kinshasa regarding the cooperation for 5 new joint programmes and 20 new research projects. The details are not very clear yet, you remember that there was an issue with political commitment from the Congolese government last time. I think overall it sounds quite interesting and could help us strengthen engagement in Africa which would play into the EU's political priorities. It could help secure support from the EU Universitas Governing Board, at least the European Executive's officials. The problem I see is how to motivate our researchers for new projects in this area. They don't like to be steered in that way as you know. However, I know since we don't receive national funding anymore since last year, we must be careful to not lose political support from the European Executive. Also, we must check with our Nordic colleagues internally — they may have other priorities. That's for the research bit.

With the joint programmes, we will have to see as well. I will try to get a contact at the EU Accreditation Agency to see what their experience is with getting joint programmes with African HEIs through the procedure. At least we don't have to have that back and forth anymore within the EU, since we have the European degree, including in our digital wallets. The virtual mobility and collaboration bit could be tricky because of interoperability and cybersecurity issues. I remember you told me how difficult it was within Europe before we had one joint system for EU Universitas. I need to check with our VP Digital about what he says re Africa.

All this is quite some coordination, but we will get there, I am sure. Sometimes I envy my friend Thibeau Vanderstraaten, the president of our small local HEI. He just deals with the regional government for his funding and focuses on local students and engagement... but then again, he doesn't have the fun of international cooperation and has real issues with attracting any qualified staff... Let me know your thoughts about the African proposal and I'll ask my PA to set-up a meeting, so we can see how to pitch it to the Governing Board.

Best wishes,

Clare

Vice-President Global Affairs – EU Universitas

The email points to several developments that have happened in this forecast.

Firstly, it shows the focus of international cooperation that fits the political priorities of the EU, in this case the relationship with Africa. This corresponds to a political direction already enshrined in the EU's Global Approach to Research and Innovation from 2020⁶⁰ setting out a modularised approach for collaboration and a focus on strengthening relationships with strategically important partners such as Africa, India, Central and Latin America, the USA and Canada. In this forecast, this approach is emphasised even further due to geopolitical tensions. EU enlargement is going further towards the East and the Western Balkans after the end of the Russian war of aggression against Ukraine, but the situation with Russia is fragile and tense.

European super universities have to play towards the political priorities of the EU, also in terms of international cooperation as they are funded at EU level for all their missions, learning and teaching, research, innovation and culture. The funding system combines longer-term core funding with competitive funding, notably for the research and innovation dimension. Other smaller national higher education institutions serve local communities and receive national funding.

Secondly, not least due to enlargement, the EU had to undergo a general overhaul of the treaties to broaden the policy areas in which the Council of the EU, where member states are represented, can take decisions by qualified majority in order to enable the EU to act. In this wave of treaty changes, member states also agreed to give the EU a shared competence in higher education restricted to the creation and maintenance of European super universities. This has enabled the EU to set up a European Accreditation Agency for the accreditation of study programmes leading to a European degree. Furthermore, European super universities operate under a European legal statute that governs their operations, allows them to recruit staff, select students, manage funds and develop curricula, undertake research and innovation activities and organise themselves and their internal governance.

⁶⁰ [European Commission, 2021, Communication from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions on the 'Global Approach to Research and Innovation - Europe's strategy for international cooperation in a changing world', Brussels, 18 May 2021.](#)

This effectively leads to a supranational system of European super universities that are largely independent from the national level. It comes on top of the national higher education and research systems which are governed by national law. In order to ensure institutional autonomy and academic freedom for European super universities, these rights would need to be enshrined in the EU treaties.

In this future, mobility between European super universities is smooth as automatic recognition of learning periods and degrees is ensured. Issues may arise in this regard, however, regarding mobility between national higher education institutions and European super universities. Access and accessibility of European super universities will be an important question to clarify: how will student selection and admission work? To make it easier, in this future, it would probably be important that the European Education Area is completed to the extent that we have within the EU automatic recognition of secondary school diplomas and work experience as access criteria for higher education.

For research, common European priorities would be decided at EU level and member states would continue to provide funding for this through their contribution to the EU budget. EU research funding would be accessible for European super universities, but not for national higher education institutions. The EU could also work to concentrate common infrastructure (for example for AI-driven research) within these universities. Ensuring synergies and compatibility of EU and national funding would be reduced to member states making sure they agree on what is better to do jointly at European level and what they may still fund nationally. National funding is likely to be limited as national higher education institutions would largely focus on learning and teaching and local engagement and have difficulties attracting qualified researchers. This would lead to a shift of research funding towards the EU level being pooled in a relatively small number of large European super universities.

4

What if?

We shape a better future together

Figure 11: Overview of the four forecasts

Forms of international cooperation are further diversifying at different scales due to the need to innovate, connect researchers and students globally and address the grand challenges together. Further digitalisation and hybridisation make this possible, while keeping the environmental footprint in check.

GROWTH

International cooperation is constrained due to geopolitical divisions. Universities have to manage an increased set of limits that are imposed from the outside. In Europe, deeper cooperation through alliances continues, albeit with lower ambitions and reduced to certain areas of universities activities and what is possible within the given diversity of national frameworks.

CONSTRAINT

A future of extreme, nationalistic policies could see the collapse of international cooperation. In this future, suspicion against the international engagement of universities has grown to the point where it is being actively sabotaged by politicians. The current EHEA and international university cooperation breaks down. Alliances of European Universities dissolve due to unsurmountable legal, administrative, financial and governance challenges.

COLLAPSE

A new form of virtually connected European federal universities with campuses across the EU emerges through a small number of EU alliances that adopt a European legal statute and can award European degrees. This is possible as EU countries under the threat of geopolitical tensions realised that they need to pool resources and better connect to ensure innovation, talent and skills made in EU. Federal universities are funded by the EU, while other HEIs serve local communities and get national funding.

TRANSFORM

All four possible futures outlined in the forecasts above, have multiple implications for universities, of which some are more or less positive or challenging, or more or less probable.

While the growth forecast is the one with the least constraints on transnational cooperation, which is in principle something universities would prefer, it requires a much greater integration capacity of host societies than what we have today and the need to mitigate political polarisation.

The constraint forecast is very restrictive in terms of international cooperation and goes even further than what we have today in terms of risk assessment of foreign interference putting tight strings on universities' institutional autonomy and academic freedom.

The collapse forecast in many ways seems the furthest away from EUA's "Universities without walls" – a vision for 2030. In this future, universities wake up to a dystopian reality in which international cooperation does not exist anymore in the way we know it and universities as well as the rest of society are confined to national borders.

The transformation forecast represents an extremely segmented system with a federal layer and a national layer. Overall, it would likely drastically decrease transactional costs of transnational cooperation that we have today due to diverging rules and regulations and it would allow a small number of European federal universities to work at scale and pool resources and enhance their capacity in all missions. However, it brings up new challenges and questions and might reinforce some of the ones we already have today such as accessibility, how to ensure the links with local environments and society for the European federal universities and on the other side what about the links between learning and teaching, research and innovation for the smaller nationally funded higher education institutions and their attractiveness for staff.

In all the four forecasts, nation states and/or strong federal public authorities play an important role in regulating universities and giving them different degrees of autonomy that impact their ability to engage in European and international cooperation. One could imagine further possible futures, for instance one where, due to political polarisation and insecurity, states and public authorities are weakened and do not have the same capacity to enforce existing rules and regulations or create enabling regulatory and funding frameworks for universities. While chaos is a likely element of that future, one could imagine that universities find other ways to sustain themselves and create de facto cooperation bypassing certain rules and regulations. This is surely a very volatile future, with a lot of insecurity and funding challenges.

There is also a strong tendency in many places to instrumentalise universities for political agendas. EUA already warned against this tendency in the scenarios in the *Pathways to the Future* publication.⁶¹ It is interesting that this instrumentalisation is very clear in the constraint and transformation scenarios with strong European policies, but also in the collapse scenario, where nationalism reigns. The ability for universities to set their own agendas and goals will likely be a challenge in many different imaginable scenarios.

The possibility for such a future emerged in the discussions towards the end of the UniFE project and could therefore not be fleshed out further, as it would have needed more in-depth exchange and reflection on the various implications. We nevertheless briefly mention it here above, to raise awareness about the necessity to look at all the implicit and explicit assumptions we are making when developing forecasts and the biases that kick in, in this process.

Forecasts are mainly tools for reflection. While it is important to identify the most relevant signals of change and the drivers behind developments, one should not get lost in the details nor strive for accurate predications – forecasting is about “bold assumptions, lightly held.”⁶²

61 [Claeys-Kulik, A.-L. & Jorgensen T.E., 2021, Pathways to the future, \(Brussels, EUA\).](#)

62 [Institute for the Future, Palo Alto, California, USA.](#)

It is this agility in thinking and sensing into different possible futures that can help universities as organisations to devise strategies in the present to help shape the future in a preferred direction. This can be done at different levels, within one university, among universities in a national system or, as in the case of the UniFE project, as a collective exercise involving universities and experts from across Europe. Beyond flexibility in thinking, foresight needs to be coupled with strategic decision-making to achieve lasting impact. The circle from foresight to insight to action needs to be closed.

The present report can provide inspiration and input to such processes and a starting point for reflections.

When it comes to European and transnational cooperation of universities, we seem at a pivotal moment in time, with the interplay between the emerging European Education Area with the European Universities Initiative as flagship, the deepening European Research Area and the Bologna Process creating new dynamics that are likely to shape the framework conditions for universities in an important way in the future, depending how national governments play along.

More on how EUA imagines the future of European cooperation at policy level, can be read in the UniFE policy messages.⁶³

Let's make the future better together!

63 [EUA, 2024, A renewed social contract for Europe and its universities: How universities and policy makers can work together for a string, open and future-proof Europe, \(Brussels, EUA\).](#)



Europe has a unique multilateral and multilevel framework for cooperation in higher education and research. For more than two decades, governments across Europe have built a common framework for higher education through the Bologna Process. Moreover, the European Union provides a supranational framework with common funding and policy cooperation for research and education.

Current and recent political developments have prompted questions about the future of European integration and collaboration and, more fundamentally, the role of Europe on the global stage. Brexit, the Covid-19 pandemic, democratic backsliding in certain countries, geopolitical tensions and an emergent energy crisis triggered by Russia's war against Ukraine are changing the political geometry. Mounting pressure on political systems calls for a reflection on the place of Europe in the world and a rethink of the way countries work together within the EU, Europe in the wider sense and further afield.

While most competences for higher education and research lie at national/regional level, developments at European level are becoming increasingly important for universities. Establishing a functioning and open multilateral and multilevel governance system is important for higher education institutions. Moreover, this system should connect the European level with national, regional and local levels, as underlined in EUA's "Universities without walls – A vision for 2030". While achievements under the current frameworks should be recognised, there is scope to build upon and complement these. This is the time to rethink European governance and cooperation in research, education, innovation and culture, whether in the context of the EU, the Bologna Process or other potential constellations.

To tackle these pivotal questions, EUA has initiated a project dedicated to "Universities and the future of Europe" (UniFE). Under the umbrella of UniFE, the Association is engaging in an in-depth consultation process with its membership to develop concrete ideas about what Europe's universities want from future collaboration and what they need in terms of framework conditions, political structures and multilateral frameworks. Through leadership workshops, interviews with academic experts and discussions with national rectors' conferences, the project will foster exchange and distil common ideas.