

## Strategic Plan 2020-2022





Strategic Plan 2020-2022

Updated October 2020 following the Covid-19 pandemic

202	La Statale: Eyes on the Horizon. A Supplement to the 2020-2022 Strategic Plan by Elio Franzini, Rector of the University of Milan	
	present and future of a great university o Franzini, Rector of the University of Milan	19
	On the horizon Introduction Unimi 2040 Internationalisation Academics Research University Innovation, Leadership, and Health Policy University Administration: Departments and Programming Questions for the Future	
2. 2.1 2.2 2.3	A shared path Genesis of the Strategic Plan Objectives Quality policies	
<b>3.</b> 3.1 3.2	Potential Scenarios Strategies Assessment	
4.	Conclusion	

## Strategic areas and objectives

41

#### Internationalisation

43

Becoming a beacon for university education in Europe

A university open to international mobility (objective shared with the Departments)

**Attractive international-education offerings** 

**Fostering department internationalisation within the greater University** (QA objective)

Education 49

A pledge to ensure continuity of service during the 2020-21 academic year using hybrid learning as required during the Covid-19 pandemic

Meeting the demand for education

(objective shared with the Departments)

Fostering an inter-disciplinary approach within the course offerings

**Support student learning in order to increase student follow-through** (objective shared with the Departments)

Strengthening the right to an education in its various forms

Improving job-placement rates for new graduates, along with the key skills needed to transition into the workforce

**Strengthening Master's-level course offerings** 

Strengthening the third cycle in higher education and increasing its appeal

Promote teaching efforts, and experimentation with new "student-centred" teaching methods

**Constant improvement of our educational offerings** (QA objective)

Research

**59** 

65

Fostering an environment that stimulates research

(objective shared with the Departments)

Bolstering researcher competitiveness, promoting networking amongst various scientific areas

Attracting the most competitive scientists and scholars

Implementing the use of UNITECH and departmental / institutional use of new, low-cost platforms for interdisciplinary projects

Implementing instruments pursuant to international-level best practices for research quality and Open Science

(objective shared with the Departments)

**Bolstering scheduling / monitoring capacity within the departments** (QA objective)

Third Mission (University Innovation and Community Leadership) and Technology Transfer

**The Civic University** 

Deploying and transferring knowledge

**Engaging in dialogue with the economic and social context** (objective shared with the Departments)

Strengthening how cultural heritage is safeguarded, promoted, and accessed

Healthcare 69

Strengthening the English-language degree programme offerings in Medicine

Strengthening the Italian-language degree programme offerings in Medicine

Degree programme in Dentistry as a training programme for orthodontists ready to enter the workforce, and establishment of the new location

Bachelor's (degree) programme in Healthcare Professions

Post-graduate programmes as a training hub for well-trained specialists ready to join the workforce

Organisation, removing red tape, rights, and transparency

**75** 

Pledging quality standards for services rendered, and providing these to users

(QA objective)

Organic review of the IT services system for a simpler and more modern university, one that is able to deliver services remotely

At the forefront of legality and transparency

(QA objective)

Inclusive UNIMI

(QA objective)

Optimising internal and external communication

Sustainability

(QA objective)

**Appendix** 

**The University in Numbers** 

83

#### How to Read this Strategic Plan

The Strategic Plan is a planning document which, within the framework of those standards established by the Articles, outlines a strategic vision for the University for the 2020- 2022 period. The Plan identifies the main objectives and actions having a significant impact on the University's ability to generate value for the public; it represents a reference for the Departments' three-year Department plan, and identifies a path for interaction and synergy amongst various projects, developed both within and outside the University at various levels.

The documents comprises two sections (*The present and future of a great university and Strategic areas and objectives*) as well as an Appendix (*The University in numbers*).

Previously presented to the La Statale community on 4 February 2020, during the inauguration of the 2019-2020 Academic Year, the Strategic Plan was revised in September 2020 in light of the sudden and sweeping changes triggered by the Covid-19 emergency.

This updated version of the Strategic Plan is provided to the community along with a new introduction by Rector Elio Franzini. The rector calls upon our university to come together as an academic community, and to provide a resilient and cogent response to this crisis, during a climate of dramatic uncertainty with no shelter yet from the storm.

Like the prior edition, this new edition includes two sections (*The present and future of a great university and Strategic areas and objectives*) as well as an Appendix (*The University in numbers*). The first section (*The present and future of a great university*), signed by the Rector, is the introduction to the first edition of the Plan. We republish it now for the sake of completeness, but also because it continues to provide a lens through which to read the strategic trajectory contemplated therein.

This introduction unfolds over three chapters dedicated to (1) illustrating the forecasts that will then be discussed in the second section, and in which the University's strategic vision is positioned; (2) describing the path to generate the Strategic Plan, which saw buy in from key stakeholders; (3) reflecting on the way in which various strategic objectives (to be illustrated in the second section) should be contextualised, from a critical perspective, within a series of potential scenarios, thereby making the Plan a living, breathing tool, one that imagines the University of tomorrow, whilst being grounded in the realities of today. A University whose many paths and possibilities can be fully explored.

The second section (Strategic areas and objectives) provides a summary, schematic view, breaking down the individual strategic objections identified in each of the six macro areas in which the University operates: internationalisation; instruction; research; third mission (University Innovation and Community Leadership) and Technology Transfer; healthcare; organisation, removing red tape, rights, and transparency. For each of these areas, we have identified targeted quantitative outcomes; for some of these, the impact on departmental-programming objectives is shown, and the connection to the University's Quality Policies.

The Strategic Plan, although certainly the lodestar of the University's vision and strategic trajectory, does not set forth the full spectrum of planning processes, and much less the tactics used on a daily basis to carry out the same. Rather, it is in an overview of the general strategy for the 2020- 2022 period.

The detailed, exhaustive description of those processes, tactics, and objectives of University programming is supplied instead by University strategy documents taken as a whole. These include, in addition to the Strategic Plan:

- the Financial Statements, which contain the designation of resources allocated to those tactics which are instrumental in the pursuit of strategic objectives. Moreover, the Financial Statements include a description of those resources needed to maintain the day-to-day operations which keep the University up and running;
- the Ministry of Universities' Three-Year Plan, through which each University may assert its autonomy in terms of its internationalisation policies, educational offerings, student services, and in the development of personnel and research policies;
- the Integrated Plan, which in the section entitled *organisational performance* notes those tactics (and related objectives, performance indicators, and targets) employed by the Administration to reach strategic goals;
- planning documents on a University level, including **Strategic guidelines on academic** offerings, the Three-year building plan;
- the Quality policies document, which sets forth the basic standards on which University operations are predicated, and the procedures adopted to identify and to reach objectives in the service of constant improvement;
- the department-level planning documents, including the Three-year department plan and the Excellence project plan for those departments receiving Ministry funding, and wherein the excellence project must be be harmonised with the three-year plan.

The strategic plan will be subject to quarterly monitoring. The findings will be posted to the University's web portal.



## La Statale: Eyes on the Horizon Supplemental Report to the 2020-2022 Strategic Plan

by Elio Franzini, Rector of the University of Milan

Less than a year ago, in the autumn of 2019, at the end of a long and winding road (which saw buy-in from most of the University community) from conception to finalisation, the University's Strategic Plan was unanimously approved by the Governing Bodies. The entire university community set some very ambitious goals, and made a pledge to review the Plan at periodic intervals. The idea was to create a dynamic tool, one that required ongoing updates and adjustments to keep it attuned to the ever-changing environment in which the university pursues its mission. The goal was to be able to respond to unforeseen events within the general context in which the university operates.

Yet even within that flexible mindset, an "unforeseen" event of Covid-19's magnitude would have been difficult to predict. The pandemic has now prompted an urgent and necessary review of our strategic plan.

The following Plan serves to supplement and to correct those sections requiring a shift in our strategy. Instead of forgoing our presentation, entitled, "The present and future of a great university", we have simply supplemented it with this memorandum of observations, which will now be grafted onto the plan approved last year. Memorialised is this document are the ways in which the pandemic has altered certain expectations regarding our everyday interactions with the region, and the greater university community.

No small feat. What we will not do is speculate about a drop in enrolment (very early figures have, at any rate, shown a surprising uptick in enrolment compared to last year at the same time). Although lower enrolment would certainly be no boon to the University's finances, one must consider that the epidemic has triggered a more widespread crisis within academia, which both reflects and depends upon a broader social context. The situation must be monitored, to be sure, especially because the broader ripple effects are likely to impact programming as well as an increase in administrative and organisational expenditures.

As we all know, the pandemic struck quite expectedly towards the end of February 2020, just a few days after the strategic plan had been disseminated, at the start of the academic year. Then, just a few weeks later (Saturday, 22 February 2020, to be exact), universities within the Lombardy Region, in an early recognition of the looming crisis (before any Prime Minister's decree or ordinance was issued, in fact), cancelled classes for a week to limit the clustering of persons in classrooms and crowding on public transport. Within one week of that initial decision, with a Herculean effort on both the operational and academic fronts, our campus planned a transition to online learning. If the measure of an institution is how nimbly it can react, we can say that the vast majority of Italian universities emerged from this unexpected stress test having proven themselves to be both grounded and reliable, even with a few understandable hiccoughs with

Despite the speed with which the events unfolded, our recognition of the magnitude of the crisis (setting aside the armchair arguments that inevitably followed) was swift, and only truly appreciated when infection rates began to spike.

The future stretching before us is not without its uncertainties. The desire to supplement or amend last year's Plan could certainly smack of cock-eyed optimism, as if we could rely on the current health crisis to plateau in the coming months. Indubitably the need, and the yearning, to return to business as usual will be met with a number of roadblocks. Willpower alone will not be enough to clear the way, especially since even within the scientific community there has been a struggle to reach a consensus on the future and the effects of the virus. "Hybrid learning", the path chosen by the Italian university system for the upcoming semesters, should be understood as our firm commitment, riddled as is with challenges: honouring the 35,000 who have succumbed to the disease and avoiding the insurgence of new hotspots. Putting in an appearance is simply not enough. We cannot afford to be naive, let alone to fall into a kind of infantile amnesia. Our eagerness should never allow us to forget, as Camus said in The Plague: "We tire of piety when piety is useless". We cannot allow ourselves to grow weary. To adopt the words of one of Camus' characters: "I feel more aligned with the conquered than with the saints. I don't believe I've got an inclination for heroism or sainthood. To be a man, that's what I'm after". It takes moderation "to be able to vanguish the scourges", to become masters over ourselves, since "plagues come from excess".

Academia knows all too well what the pandemic has generated: we simply cannot allow ourselves to give in to the pettiness and squabbling that has followed from both sides of the political and ideological aisles. In a large, multi-disciplinary university like ours, delivery methods are too varied, especially given the number of in-person attendees, to be able to find a miraculous, one-stop solution to satisfy the pundits. It has been said before, even in darker moments, that we are not and we will never be an online university. Dialogue, the sharing of ideas, and personal contact are the keywords for the true notion of a university. By the same token, the return to in-person learning is a goal that must be reached step-by-step, on a case-by-case basis, taking into account the needs of the university at large. Everyone must be able to receive a top-notch education whether in person or online, to ensure the enfranchisement of distance-learning and international students, a growing contingent within our university.

The uncertainties the pandemic continues to foist upon us make it best practice to avoid prognostications and post-mortems conducted too near in time to the events themselves. There will be time enough for reflection, but reflection requires time and a plan, not to mention the ability to analyse and thereafter make sense of an event. To do so now, without superficiality or alarmism, is simply impossible. The important thing is never to forget (and this should never become axiomatic) that we have lived through a profound (ongoing) crisis and that we must not fall into one of the great evils of Western civilisation, that of "group think". By that I mean a model of development (whether economic or otherwise) that runs the risk of subtly and pervasively revealing its true colours as authoritarianism. This model runs directly counter to the path academia must pursue, that is, an inquiry into the meaning of events, one that embraces as many viewpoints as possible, as each discipline is called upon to do. This crisis may prove to be a source of wisdom and understanding, one that allows us to fully exercise our reason, and propagates opportunities for dialogue and debate. We must understand, however, that the very underpinnings of research since its ancient beginnings - logos and episteme, reason and science - have themselves evolved over time. All that is historical, by its very nature, is ripe for discussion, debate, and critique, but that doesn't mean we should give into scepticism or relativism. These concepts, indeed, are not self-referential, nor should they be; they refer to the world in which we live our lives. There they find their roots, their historical genesis, howsoever ambivalent. The etymology of "crisis" is, in and of itself, ambiguous. It derives from the Greek verb krino meaning "to separate" and has its origins in agriculture, specifically, the threshing and harvesting of grain, the separating of the wheat from the chaff. It involves an analytical separation, with the aim of keeping the good part of the harvest, and it implies the ability to render a judgement. The term took hold in the medical arena. A "crisis" is, for better or for worse, the decisive moment in an illness, the culmination of a path of differentiated phases. The sociological definition flowed from the medical one, and came to mean a situation of profound uncertainty, almost of losing one's way. Thus crisis is, on the one hand, a "separation" requiring an analytical mindset, and being able to cull meaning from a set of parts, determining their significance and their weight. On the other hand, crisis means the turbulence that a breaking point and a moment of uncertainty can trigger. The notion of a crisis is therefore imbued by a sense of "fracturing", of separateness, schism, coupled with an attempt to overcome the situation using wisdom and the analytical (read: critical) power of thought. If the pandemic is teaching us anything, it is the urgent need to bring these elements together without destroying the symbolic import, and the potent drama, of the crisis itself.

Introduction

The crisis into which the pandemic has plunged us has, as a historic event, a value that transcends the moment in time we have witnessed, and juxtaposes fundamental questions with questions of principle. These questions come first, and may for this very reason be deemed ultimate questions. These questions need not lead us toward unreachable summits, quite the contrary, they force us to take a look around and to choose the paths to follow, recognising the intrinsic possibilities of each. We are obliged to look to, and to read, the images we are presented, as "tacit exhortation" and "deep-seated wisdom", to borrow the words of the philosopher Merleau-Ponty.

Faced with death, we must stay the course, redesign the future, bringing to bear, as we have learned over the past few months, both theory and practice. Having a vaccine is crucial, but it is only through research and training that we will build the foundation for long-term solutions that will open up new paths for science and for human life.

The pandemic has shown us that we cannot hide away in an ivory tower, that academics must work with the community to grapple with complex, invasive phenomena. Inter-disciplinary approaches, free from academic shackles, are the future of knowledge. There are, no question about it, differences in methodology between the sciences and the humanities, yet this traditional dichotomy may be overcome by understanding that problems (when scientific issues interact with socio-cultural issues) get solved, but even before that, assessed, thanks to a plurality of methods and tools. Only by multiplying our perspectives can we improve our vision. We much teach by example that staying locked up in an ivory tower is for "idiots" (in the Greek connotation of the word, meaning a person who refuses to take an active part in public affairs). The generations growing up after this crisis will need to be increasingly "inter-disciplinary", cognizant of science's role in analysing history, appreciating both in depth of meaning and the challenges it presents.

The revisions to the Strategic Plan are intended to underscore that facts only take on meaning if they embrace new horizons: a destiny to pursue and to construct.

For this reason, we have left our strategic goals of innovative change untouched, and have doubled down on our efforts to shore up the (long-ignored) institutional and regulatory framework in support of the same. An institution sure of its own historic, social, and cultural significance thrives by adapting, not by changing course. We lost sight of this in recent years, much to our detriment, diverting our attention away from what really matters: the university education incentive programme, and ensuring the proper academic infrastructure. For this type of innovative, large-scale project for our scientific infrastructure – and here we are talking about the MIND project, the tender for which is set to be adjudicated by year's end – cock-eyed optimism is not enough. We must build, now in a time of pandemic more than ever, in a rational manner, cognizant of the economic crisis, the collapse of GDP, and new infrastructure-related needs. At the same time, to relinquish properties we have either owned outright or leased from the state for a hundred years, in a historic moment when the value of locations and space is more important than ever, would be very short-sighted indeed. Instead, we must shrewdly analyse the costs, benefits, and prospects of each, something we have not always done in the

past. We are now constructing a new "sustainability plan", not to call into question decisions made in the recent, but somehow now distant past, but rather to transition from a facile and truthfully a somewhat stale slogan into something tangible, something intrinsic to the University of Milan, rather than a harbinger of abandoned projects, discord, and needless debate.

This issue will be analysed in greater detail through a stand-alone document when the MIND Project tender is awarded. At that point, relationships with local entities and the needs of certain departmental structures will be re-evaluated. We cite this issue simply to reiterate the University of Milan's stance: provided it can secure the necessary buy-in from the local authorities, it will, for as long as possible, maintain its tri-campus model. The University of Milan is a major international university with no plans to narrow its goals for development and innovation. We stand firm on pursuing ambitious collective goals setting aside more individualised ones. Our concrete plan for the future will take shape through the UNIMI2040 Group Project. Formed in 2018, the goal was to identify potential avenues for growth for our University. In the upcoming months, the Project will launch an investigation into Covid-19's impact on the University system.

Now, to move on to the specific forecasts made in the Plan we approved a year ago, and the strategic vision for the University, in the hopes of contextualising them within the new, now radically changed status quo, it is clear from a critical vantage point that one of the areas hardest hit by the pandemic is **internationalisation**. The Erasmus exchange programme came to a swift halt, although it will likely start up against in the upcoming months, whereas contacts amongst the various 4EU+ alliance tables continued without interruption, albeit virtually. The hope is for a return to in-person events next fall. Provisional statistics we have on hand show a slight increase in international-student enrolment. Although the hope is, as we have mentioned, to welcome them once again in person in Milan, these students can continue to attend lectures remotely in the upcoming semester.

University academics have recently, and obviously, undergone major and unexpected upheavals, such that we have had to reconsider, and at times accelerate, certain strategic pathways in response to recent events. It is, however, important to note that many of our forecasts have held strong, and we are on exactly the same trajectory, the current emergency notwithstanding, we embarked upon last year. Indeed, we wrote in 2019 that careful thought must be given to the interplay of distance and in-person learning, whilst at the same time developing the skill set of our faculty (including those who would teach online). This goal, already set in motion, has therefore been the one to take shape most quickly, without any structural update to the Strategic Plan required. There was also a plan to update classroom IT capability, which had been too-long ignored. Thanks to an eight-million-Euro set-side, the university will, beginning in 2020, inaugurate 51 classrooms equipped for distance learning.

These critical updates, including to our IT systems, have made it possible to design "hybrid learning" in a customised manner (in terms of organisation and programming) by the Faculties/ Schools, tailored to the particular content and academic needs of each Study Programme. Moreover, as we have said, all students will have the option to attend classes online, and to access their educational materials remotely. Special attention will be given to newly enrolled students, who will be provided orientation activities at the beginning of the semester. All distance learning will be provided in a way to ensure, to the fullest extent possible, that students are engaged and can actively participate in their learning. Lectures, skills-development work and practicals will either be broken up into multiple in-person sessions, or attendance will be permitted via web conferencing. Laboratory activities will take place in person, but in shifts.

Over the next few months, online lectures will generally be offered in real time, with the support of platforms made available by the University. However, some theory or preparatory teaching for those lectures and activities to be conducted in person may be delivered asynchronously (in recorded format). To help students stay on track with their studies, more intensive midterm assessments will be provided, to be administered online. The individual academic plans for the

various study programmes, which have been posted since August to the University website, specify the protocols for a return to in-person lessons in compliance with health regulations germane to classroom and laboratory occupancy rates, as well as occupancy levels for students and faculty at all campus locations. To that end, access to University spaces (classrooms, laboratories, libraries, offices, etc.) will be monitored and coordinated through a designated app, now available for download by all students and instructors. Finally, in addition to those produced in recent months, our faculty webinar series will continue with a view towards ensuring the requisite teaching standards for distance learning and in-person delivery methods alike.

The essential issue of the **right to a university education** has not been ignored, even during these very trying months. The goals we intend to pursue, irrespective of the pandemic, have led to a series of actions which it is incumbent upon us to review, however briefly, in this document. We have instituted a new tuition-rate system, one that is simpler whilst at the same time more progressive and fair. Put simply, 2021 ushered in an increase to the tuition-waiver threshold (which now stands at Euro 20,000, representing a significant change compared to the previous Euro 14,000). At the same time, we have lowered tuition rates for those with an ISEE under Euro 75,000 (with average savings of Euro 450 for the second tuition instalment). Finally, we have maintained the Euro 500 merit-based grant, and lowered tuition rates for the Faculty of Medicine (which historically have been the highest overall) to match those for other scientific disciplines.

We have also renewed our efforts to increase the available sleeping spaces and student halls of residences, an issue that had been all but ignored in the recent past. To make just a single, pertinent example that applies across the board: we have entered a ten-year lease for the Martinitt Campus complex, which will offer 433 sleeping spaces instead of the current 119 (available in October 2020). Thanks to new lease agreements, and with remodelling efforts underway at some university residences, in 2022 we will be offering approximately 1300 bed spaces, nearly double the number available during the 2018-2019 academic year, when there were only 775. Finally, we should note that a project is now at the planning stages with the Region of Lombardy to offer off-campus rentals to students who do not meet the income-based housing criteria (i.e. having an ISEE at or below Euro 45,000), who before now have had to lease flats at market rates, with the attendant economic difficulties and concerns about signing a lease for the entire academic year.

Research activities have, without a doubt, during the months in which only virus-related research was taking place in our laboratories, suffered a significant slowdown, albeit one impacting the country as a whole, and not just our university. All the same, this critical situation notwithstanding, our university ranked fifth globally, on both a quantitative and qualitative scale, for Covid-19 research. Furthermore, we have set aside funds for coronavirus research by marshalling knowledge and expertise within the university. These efforts have been rewarded with no fewer than fourteen Covid-related grants disbursed by both public and private entities. Additionally, none of the objectives delineated in the 2019 Strategic Plan had to be lowered in any meaningful way, as demonstrated by our Research Sustainability Plan, approved at the height of the lockdown. Moreover, as demonstrated by the recent Shanghai ranking, our University once again in 2020 ranked third in Italy, first in the Milan area, and amongst the top 200 in the world. The most significant elements allowing us to earn this recognition are the number of cited publications, and the number of highly cited publications, where we rank first overall in Italy.

With respect to University Innovation and Community Leadership, as forecasted last year, the reform of the UNIMI Foundation has recently been completed, a Deployment of Intellectual Property and Innovation Division has been instituted and tasked with, among other things, the implementation of the University's Third Mission (University Innovation and Community Leadership). The journey towards making the "University of Milan Press" a reality continues. The first editions will begin to be developed next year. The University of Milan plans to maintain its position as a cultural beacon for the surrounding area, and to hold fast to its strategic goals.

Our Health Policy has proven to be quite effective during the Covid-19 pandemic, reflecting once again the University of Milan's positive impact on the community. Our instructors, researchers, post-graduates, and all healthcare professionals and staff trained by UNIMI (first and foremost those who were permitted to graduate in April and May in order to make an accelerated entry into local hospitals) have been working for months without respite. They have been responsible for never-before-seen pathways into telemedicine, now slated to be implemented through targeted, innovative projects. As is well-known, the University boasts three teaching hospitals (Polyclinic, Sacco/Buzzi, San Paolo/San Carlo) and works with a number of public and private hospitals in the area, proving that major public universities can, and must, network with area hospitals and clinics. The shared goal must be to create a centre of research excellence to train the next generation of physicians. We must mention, of course, that the University is humbled to be a cornerstone of the area's public health infrastructure, but there's more work to be done on both the academic and research fronts. This pandemic has taught so many lessons, and we cannot forget that "university" hospitals have reacted and taken action at the highest levels, much to the chagrin of those who prefer to draw a line between academia and the hospital system. These ideological fences fall quickly away in the face of the zealous commitment to service of all those in the healthcare professions, whether in or out of the university system. I believe that this experience will allow us to write (once proper time for reflection has been taken) a new chapter on the kind of health policy we should pursue in the future, in the interest of public health which must naturally move from education into research, as the work of our post-graduates has reaffirmed.

As you will see in the following pages, the pandemic has forced us to modify a number of deadlines relating to MUR and ANVUR applications. Indeed, MUR will be redoing its three-year plan, since the metrics on which the merit-based grants were to be awarded would undoubtedly need to be revisited in light of recent events. Site visits by the ANVUR CER, scheduled for October 2020, have been postponed until March of 2021. The University must adapt, within the scope of its pledge for self-assessment and quality-assurance, to the changing demands of, first and foremost, the workplace, and to the needs of distance learning, but also with respect to the impact the pandemic has had on Research, University Innovation and Community Leadership, and Health Policy.

To that end, we have generated a report on all of our efforts during the Covid-19 health crisis in order to show that quality assurance, undertaken with a view towards constantly improving what we do, remains our unshakable goal.

If we read over the Strategic Plan, however, we note that neither the challenges we have set for our future, nor our objectives in terms of quality have come undone. Quite the contrary. As we have already mentioned, new possibilities for relating innovation in information technology to innovation in teaching have been explored, and in the future might serve the interests of working students, and at-risk students. New horizons for University internationalization and for the attendant explorations of delivery methods have likewise been discovered. The transition to smart-working, which we had only days to implement, has opened up previously unknown paths to administrative simplification and streamlining. To be sure, smart working can never fully replace the operational capacity of in-person work, especially with respect to student services.

We cannot fail to mention, and to reiterate, that the past few months have proven exemplary in terms of solidarity and collaboration, in an environment (academia) infamous for in-fighting. Ours should be used as a shining example for all public institutions. Differing viewpoints have abounded, to be sure, but these have been both framed and expressed in a collegial fashion: for this, a debt of gratitude is owed to the entire academic community - faculty, staff, and students. The response to the sudden upheaval has been perfect. There is no other word to describe it.

To direct our focus once again on the possibilities for the future, we should spend just a moment considering general policy. Emergencies and crises, as discussed herein, tend to reveal chinks in our governance. At the same time, they can show opportunities for innovation. These opportunities must be explored, as a matter of policy, in the upcoming months. For

example, the "departmentalisation" of the university system has clearly led to a proliferation of decision-making centres in terms of our academic programming. The attendant lack of functionality, especially in terms of consistent messaging, has proven to be the greatest risk for large universities. The Academic Senate itself, given its size, and the fact that Department Directors cannot serve thereon, means that it cannot act as an effective "crisis-management team", given the attendant gaps in communication and potential for misunderstandings, to govern the Rector's senior staff and team. The Management Board, despite being statutorily designated (Law no. 240) as the primary centre of administration for the University, has shown that its authority runs the risks of being deflated during a crisis, as academics do not specifically fall within its purview. An idea which has for the last two years been gaining traction at most Italian universities, but which now has become more urgent, and perhaps imminent, is the need for an ad-hoc Ministerial Decree (which, in point of fact, was ready as of last year but never promulgated) to enact Art. 1, paragraph 2, of Law no. 240. This would allow universities meeting certain merit-based criteria to tailor their governance to meet their specific needs. The administrative and organisational differences among the universities are too vast for a "one size fits all" approach, rather than one tailored to the institution's specific needs. CRUI [Conference of Italian Rectors], as it mediates the various social and cultural needs of Italian university campuses, has proven ill-equipped to tackle innovative scenarios, and issues of branding and messaging. These necessarily vary from school to school, transcending geographic distinctions. Indeed, multi-disciplinary universities have problems guite different from those with fewer departments or faculties, or those without a Faculty of Medicine.

MUR has made a huge effort to assist troubled universities. In that respect, we have enjoyed a clear advantage in Prof Manfredi, who has provided consistent and knowledgeable advice in that regard. By the same token, the current crisis has deferred resolution on certain structural problems within the University. Neither special funding nor Special Governing Plans for RTD/B [contract researchers] have proven sufficient to address them. Indeed, the results of the special RTD/B plans, after a three-year period, revert to the University's own budget. These appear to be nearly indifferent to the University's actual needs (the criteria used to set these are not transparent, to put it mildly). These must be borne for many years yet, without the possibility of expenditures or salary adjustments. Our plans for progressive developments, including those tied to regional and scientific-research needs (the latter of which, we will say again, presents the only viable option for a return to business as usual in this country) are hampered as a consequence. Following the crisis, the university system must make a commitment to capital projects relating to the system as a whole, sensitive to the differences amongst the players within the system. Until we understand how closely connected research and training are to our social and economic context, with a preference for a "sprinkler" type disbursement, one will not be able to conduct a merit-based evaluation, reducing the assessment process to a proforma bureaucratic exercise. This form, it goes without saying, is necessary and to be desired. Its absence has proven to be a serious lacuna at UNIMI in recent years, and must lead us to more stringent assessment requests, without however, leading to divergent visions for higher education across Italy.

Covid-19 has been a tragedy. The West, so used to thinking the world revolves around us, and with some indifference to the tragedies that beset the developing world each and every day, has not been spared. We have learned what Monsignor Delpini, during the Easter Benediction given to the university community in Milan, has called "a more modest way of thinking, a more accessible one", "science that helps people in their daily lives, giving meaning to what we do" for those of us who have been, and who are, "beggars of meaning".

A student- and scientific-research-centred university (which we are, and which we want to continue to be) must learn to make bold plans for issues big and small, attentive to individual needs as much as university-wide needs.

We have striven to give our students answers, although we recognise these were often inadequate or incomplete due to statutory and budgetary constraints. At the height of the pandemic we launched a series of new initiatives that marked a renewed collaboration with other area universities, in the conviction that only an "integrated" university might meet the

scientific needs of the contemporary world, where competition is used only as a means to achieve innovative, shared goals. Science is not merely technical. It requires dialogue and collaboration, and can never be profit-oriented. This is the reasoning behind our joint project with the University of Milan-Bicocca and the University of Pavia to launch a study programme in Artificial Intelligence. A number of other schools of higher education, likewise with the University of Pavia, and the Pavese IUSS, are presently in the planning stages.

I would like to conclude by announcing that, very soon, we will be hosting events to properly celebrate our centenary. The University of Milan was founded, as you undoubtedly know, following the Gentile Reform of 1923, when Luigi Mangiagalli, together with a group of local Milanese citizens, formed the Association for the Development of High Culture, thus giving tangible form to a dream ten years in the making. At that time, Milan did not lack for university options: the Academy of Science and Letters, founded in the 19th Century, provided the basis for today's Faculty of Humanities; the Palatine Schools, founded in the early 17th Century, boasted the likes of Paolo Frisi, Cesare Beccaria and Giuseppe Parini on its illustrious faculty; Secondary Schools of Veterinary Medicine and Agricultural Science; the Brera Astronomical Observatory, and the Clinical Institutes of Advanced Studies - founded in 1906 - geared towards young physicians, and the brainchild of Mangiagalli himself. The genesis of the University of Milan helps us understand that our centenary is now fully underway.

The project, indeed, began when in 1913 the University of Milan granted the use of a number of lots of land, located at the Eastern gates to the city, to be used for, as Mangiagalli conceived it, a "Città degli Studi", [University City], a name that remains in use, not only for the University itself, but for the surrounding neighbourhood. Ground was broken in 1915, and the works were completed over a decade later. Dating back to World War II, before the bombings took their devastating toll, was the idea to make Ca' Granda the central campus for the University. It is our duty to remember this history: examining our memory to build the future; this is the essence of our Strategic Plan, no matter what the future holds. History marches on, and its pathways, though winding, will not alter the goals we are pursuing - though at times they may be hindered, they will never be erased.

To celebrate Easter, whilst the pandemic raged across our region and throughout Italy, our University Orchestra played a virtual concert, which was captured in a moving video. They played the Intermezzo from Mascagni's Cavalleria Rusticana, a one-act opera that unfolds, in deference to the classic unity of time and space, all on Easter Sunday. A mournful intermezzo, full of memory and longing. The performance was accompanied by the hashtag #LaStataleEyesontheHorizon. This is what we want to recall as we issue this first revision to our Strategic Plan.



# The present and future of a great university

by Elio Franzini, Rector of the University of Milan

1.
On the horizon

#### 1.1 Foreword

A Strategic Plan is not a literary exercise; it is rather the attempt to position a specific type of project – a University campus – into the University system as a whole, with all its virtues, defects, contradictions, and dreams. One simple understanding, which Ortega y Gasset, a philosopher-rector in the 1930's, put best: the University cannot be an ivory tower. It must be rooted in everyday life, in its urgent needs and its passions. It must do so holistically, without leaving room for special interests and pedants. Rather, the focus must be on collective authority that might become a "key promoter of European history" using internal own cultural, professional, and scientific resources. Science, Ortega observed, represents the University's dignity and its soul, but this soul can only live if nourished by contact with the public, with history, with the realities of the present, and by seeking the potential which lead us into the future.

The challenges the University of Milan faces today are, in the near future, beyond the scope of the current "plan". Decidedly ambitious, they must be tackled immediately. To wit, there are historic locations to restore, and a scientific hub to build. This hub will be positioned in the area previously home to the 2015 Expo, now slated to become an "Innovation District" bringing prestige, science, and jobs to our region. By the same token, we must preserve and relaunch - drawing upon ideas which have, up until now, been scarce - the Città Studi area. This was after all, our birthplace (in 1924), and holds great sentimental value. Yet what truly binds us to that part of campus are the many accomplishments of our researchers in Città Studi classrooms and laboratories. The journey in that direction must start right now, so that we can analyse the problems that have arisen with a clear head, and with the understanding that a University's destiny is, in part, to "modify" its host city, the city of which it is a part. We cannot simply sit back and wait until 2025, when the new campus is slated to open.

The sciences, and the locations that will host its growth in various areas in the cities, have the goal of bridging past and present in a constructive détente. This must be done with the awareness that changes must be viewed and understood as they unfold over time. Solutions cannot come through short-sighted decision-making on the hunt for easy answers. Our objective is therefore quite clear, and must put in terms of an inevitable finish line. In 2024, on the centennial of the founding of our University, a new University must be built. This new University will harness the potential of its campuses into a powerful triumvirate: downtown Milan, the Innovation District, and the historic Città Studi, with a new face and a new mission. Science and knowledge must first and foremost act as the means through which to understand the journey through time. If we stop believing in what is to come, our past will no longer be fully our past, just the vestiges of a dead civilisation.

Strategic Plan 2020-2022

With this perspective, it is therefore crucial that we not be short-sighted in reaching for easy wins, giving into a stultifying present. Likewise it is futile to bemoan the underfunding of the university "system", a problem with little chance of going away. Each University "mission" suffers from this deep-seated problem. The problem becomes especially acute in terms of social effects, and takes on greater visibility, in terms of the broad theme of "the right to an education". Therefore, it becomes a priority for us to cultivate, using our own resources, services for our students, who are our key stakeholders. Student residences, cafeterias, and services for an increasingly national and international population: these goals were not mere lip service - we immediately placed particular attention on this need. This focus must be ongoing in the years ahead, and it must yield results. We place early emphasis in this writing on the right to an education, and here's why: each and every part of the Strategic Plan must have the student at its centre. To pursue quality and excellence in teaching and research is not a self-serving goal; rather, it is the sign that only in so doing might we attain what has for many centuries been the goal of a University: to teach students, and to contribute to their ethical, cultural, and social growth. A university is only a university if it can become a place focussed on those who dwell within it - the students, first and foremost, but also the

faculty and staff - with the goal of improving everyday interactions, and instilling both team spirit and critical thinking in its students. The University has always been a dialogue, an exercise in interactions with others. Each of its players, regardless of the position they hold, must be seen as "persons", individuals whose personal freedom, in all its diversity, contributes to the complex construction of an organic whole.

In a separate section of the Plan we will take a look at the "stats" that denote UNIMI. Statistics are by no means irrelevant; however, because the University is "person-centred", they must be used (within the scope of a Strategic Plan) as key indicators, starting with both objective, quantitative data, to analyse those changes intrinsic to a University, along with its weaknesses, and its potential for improvement and development.

#### 1.2 Unimi 2040

20

We often say that the university is the oldest institution known in the Western world after the Catholic Church. Yet over the last thirty years, universities have changed at breakneck speed, perhaps more quickly than any other institution. The slow pace it enjoyed for years allowed academia to adapt seamlessly to new situations, integrating them little by little. Today, on the other hand, the speed and pervasiveness of change (both in terms of the performance of its key functions, higher education and research, as well as in its governance) have triggered a sense of disorientation, of a breathless chase towards destinations without enough time to fully internalise them. Therefore, we are obliged to adapt at a moment's notice to short-term trends, right at a moment in history when a more long-range view is needed to forecast the future, and to ready oneself for it in time. To that end, we have formed a "UNIMI 2040 Working Group". This group will be with us for a number of years, and throughout a number of strategic plans. This group is a manifestation of the campus' intent to look up and take a longer-range view in the most systematic and professional way possible.

Indeed, UNIMI 2040 is a group tasked with identifying potential scenarios in terms of teaching, research, and governance for what UNIMI will become in the next few years, using, as a model, the paths other similarly prestigious universities have charted for their future. The identification of Universities benchmarks has been facilitated by UNIMI's membership (the only university in Italy) in LERU, the network of 23 of the most dynamic and prestigious of Europe's research universities. The networking LERU provides with these universities makes sharing strategic planning easier, as we work toward a common goal.

#### 1.3 Internationalisation

The path towards internationalisation of both culture and knowledge represents one of the pillars of the European educational system, in which we must become increasingly engaged.

Introduction 21

Europe calls upon its universities to play a central role in training the new generations, including through the institution of shared educational tools and pathways that might educate university (and other) students on those major issues that promote European values and identity. The new generations to whom we look will be made up of persons able to cooperate and to get along within a multi-cultural and multi-lingual environment, building a shared culture amongst the citizens of Europe. These are the ambitions behind the project launched by the European Commission to build a knowledge network amongst Europe's universities. The idea is to construct an integrated model for education and research to transcend those barriers that remain a hindrance to the free circulation of teachers and students within Europe. In January 2019, our University joined a large network of six universities, spearheaded by the Sorbonne in Paris, which includes the Universities of Heidelberg, Copenhagen, Warsaw, and Prague. This network will allow for new teaching methods, and new systems of mobility, which may become a way to develop the educational system in Europe as a whole. The project, called 4EU+ Alliance, is funded by the European Union; it gradual implementation is another multi-year strategic goal for our University.

#### 1.4 Education

Within a large, multi-disciplinary University, and in our ongoing quest for quality, and with careful attention paid to our processes, forecasts of the future must embrace a wide range of possibilities. Some of these touch upon programmes which are presently underway; others present an array of avenues for development, some of which in stark contrast to the others. For example, to explicitly cite some of the parts of this Strategic Plan early on, the forecasts on education must first and foremost tackle issues such as digitalisation, and the best ways to assess student performance. In a nutshell, a new relationship between in-class and remote learning must be conceived and then constructed. This work must be carried out in a way that takes into account trends taking place elsewhere. For example, the institution of dedicated skills-centres providing a support to faculty in terms of teaching methods (quite popular in the UK), or the requirement that instructors attend specific courses to certify the subject areas they might teach (like in the Netherlands), especially at the hiring stage. UNIMI must also contribute to building a kind of "European training ground" focussing attention our the areas in which our country is lagging behind the rest of Europe. This involves not only the paltry success of a tertiary, professional education channel (which, to a large extent, explains both low graduation rate and the high attrition rate), but also the failure of multiple administrations and the University itself to education and re-train adult learners. Therefore, developing Master's and post-graduate courses is both a cultural and a social objective which our University must implement on a much greater scale than what it is presently doing.

We must also pay close attention (again, with a view toward having a student-centred approach) to obvious problems in our teaching, where the top-level problems involve the high rate of attrition and the pace students maintain toward graduation. As resources allow, special focus will be given toward funding a greater number of scholarships. There is certainly room to increase the appeal of our Master's degrees programmes, which in fact are in much shorter supply compared to those offered at comparable institutions. To that end, over the next few months time will be spent on assessing the wisdom of the "limited-space" model, an issue given short shrift up until now. Likewise requiring attention are the post-grad options. The doctoral programme needs to be the flagship of a research-intensive university. We must therefore increase the quality of the doctoral students we admit, and increase the appeal of our programme offerings. Master's programmes are the bellwether of our ties to the economic system and the professional workforce: our market share must be more fully developed. To overcome these "emergencies" we must improve the administrative-management side of the post-grad programming; moreover, we need to build a strategic design that integrates it into the University's academic programming. By the same token, study-abroad options (especially for Master's degree programmes and single-cycle degree programmes) must be improved. This will not only bolster the University's international reputation, but it is a key component for the student's own cultural development.

As the University can no longer be a "static" environment, its interaction with the world at large must lead both to a discussion on how to structure its course of study and the methods of accessing the same, as well as how to develop new teaching initiatives. This must in turn arise from a strategy, a joint effort with the Academic Senate, inspired by the efforts of the Quality Commission and the Assessment Board.

#### 1.5 Research

Instructional and research needs must be in sync. This is especially true because both basic and applied research identify the cultural and social trends within the learned community. The Strategic Plan must therefore identify problems and seek sequential solutions: from the need to identify comparable methods for assessing the work of the scientific community (wherein radically diverse practices and theories of knowledge are utilised), to the need to incentivise interdisciplinary approaches to scientific problems, creating synergy amongst the various communities within academia. Education and research intersect at the PhD. There is no denying that a reform of laws regulating these types of programmes is now, on a national level, fully on the discussion table. As we await further developments on that front, UNIMI intends of its own impetus to alter the composition of its faculty in order to better position our PhDs on a national level. At the same time, thought must be given to the scientific-academic activities that make up their lives, in order to harness the potential of the scientific persons and personalities of our PhDs. With a view toward the quintessential issue of training persons for research, other, thornier problems crop up. The more cutting-edge universities have broached a discussion on these topics, brainstorming ways to reconcile the needs of raising the bar on the quality of science, with that of creating international centres of excellence that might attract the world's best talent and successfully compete for grants and for standing. Another fundamental question will be the ever-more pressing one of balancing the need to provide knowledge which is "useful" to the economy and to the society in which the University operates, with the need to ensure total research independence. To that end, a new administrative office dedicated to Knowledge Transfer has been created, and will become operational over the first few months of 2020. We should also note that the University, in accordance with the strategies of the other university-members of LERU, has undertaken a civic-minded project to support Open Science, and to include it in the everyday lives of researchers. This journey will continue and indeed expand over the next few years, as will the University's efforts in terms of Research Integrity, beginning with a wide-spread dissemination of the Code of Ethics and Research Integrity, which was approved in January 2019.

Regardless, to bolster research efforts within the University, its already considerable bent towards scientific innovation, and to increase the University's competitive edge and visibility on both a national and international level, new measures intended to increase synergy and cohesion amongst the many, diverse skill sets amongst us are needed.

To that end, an internal call for tenders will be launched in order to identify, amongst the most pressing social, ethical, environmental, and health problems of our time, a number of "top challenges", which the University hopes to provide a decisive contribution in resolving through interaction and networking amongst its own community. The proposals selected will not just be used "in-house", but rather will be brought to the attention of the proper scientific, political, and social interlocutors, in order to build consensus, thereby accessing funding from both the public and private sectors from all stakeholders, thereby establishing the intellectual bases for solving the problems.

#### 1.6 Third Mission and Health Policy

It is incumbent on us to note that the university's third mission (University Innovation and Leadership), the germ of which is in this document, is still being defined, and that it includes

elements which are sometimes quite disparate. This is therefore a prospect that the University must build, develop, and learn to assess in terms of impact on the public: Technology transfers, cultural interactions with the region, implementing post-graduate courses, ad-hoc training programmes (such as for secondary-school teaching), cultural programming which is of special importance: all of these are, doubtless, "traditional" University missions, but they must be better organised and promoted. The University is a cultural hub: it is therefore both a public and a social sphere. Finding ways to emphasise those elements means not only bridging the gap between "town and gown", but also connecting to the future of production, the workplace, volunteerism, cultural dissemination, and sustainability as they exist across the region.

23

To those missions (which are amongst the general, defining elements of the instant Plan) we should add the issue of Healthcare, even though it does not, strictly speaking, fall within the scope of "University Innovation and Leadership". Indeed, we should note that UNIMI, through its researchers and instructors, maintains a presence in major public and private healthcare institutions in the Region of Lombardy. Furthermore, the scientific activities they carry out has contributed, in an essential way, to six of these facilities being designated IRCCS [Italian Research Hospital], meaning they represent centres of excellence in regional health care. The scientific development of those healthcare facilities therefore sees in our University a hub of innovation and development. Furthermore, public healthcare programmes, albeit not directly led by the University, are managed day-in and day-out by UNIMI instructors and researchers. These projects, taking place at various hospital locations where UNIMI maintains a presence, place the University in a constant dialogue with the Region to connect scientific goals and healthcare services in an ever-more organic way. A university like ours, which has a Faculty of Medicine that boasts nearly 600 instructors and researchers, plays an absolutely fundamental role in society, in science, and in education. That is the foundation from which to engage in curricular design which does not take how coursework in medicine and healthcare are being taught for granted, in order to make sure they match the increasingly changing world of medical science. We should also note that a major project to organise the International Medical School, with coursework entirely in English, is presently underway.

#### 1.7 University Administration: Departments and Programming

Finally, the components of university governance have undergone major changes in Italy over the last thirty years, just as they have in Europe, albeit taking sometimes contradicting approaches to do so. All the same, the university system was the first to try out an unorthodox method of governance, and indeed began to develop in a more forward-thinking way, one that did not always go unchallenged internally. The crux of the problem is trying to balance the need for a more efficient, managerial approach to running a university (which, across Europe, led to a top-down decision-making paradigm) with the bottom-up approach of seeking active input from the intellectual talent present in academia. This is a topic that raises any number of questions, and indeed goes to the very heart of this Strategic Plan. To summarise, a strategic plan cannot be blind to the fact that a top-down model has no place in a University trying keeping pace with the times, even though that is what Law 240/2010 requires. The governing bodies must, no doubt, operate independently; however, ongoing, constant contact with the University must be pursued. That means, the very ways in which decisions are made must be rethought: we need better engagement from faculty, staff, librarians, and students.

A true reorganisation of the University's infrastructure means, first and foremost, vesting greater authority and responsibility in the departments, whilst trying at the same time to reconcile the goal of transferring greater degrees of autonomy with the need to follow the strategy set by the University Bodies, as well as complying with the legal and economic strictures incumbent on us as a public institution. This is in turn based on a weighted analysis of those paths taken by universities similar to ours in terms of size and academic-scientific infrastructure. Without a doubt, each level of independent decision-making identified prompts a need for strategy and controls exercised through governance. This also means, however, that the University's Strategic Plan must jibe with department plans, and their specific planning documents. These must be in constant sync, duly monitored as a priority task by the University.

24

Introduction

The Strategic Plan is the key tool through which to reflect, as a community, on our objectives for the future, and our internal and external stakeholders. In so doing, we can build the foundation of knowledge needed to create buy-in for strategic development over the medium to long term. That strategy will engage, according to a timetable to be set by the Governing Bodies, each and every component of the University. The idea is to create an organic alignment between the actions of the individual parts so that the Strategic Plan might become a tool through which the departments and the central organisation are joined in a robust and proper manner. This is not a bureaucratic undertaking, or a means of cobbling together shifting, contingent interests. Rather, it must be a concerted, well-planned effort to generate a strategy that is shared for the future developments of our University. To summarise: greater independence for the departments (which also refers to the attribution and use of "staffing points"), and moreover general goals in terms of programming, may be ensured in a manner that the law defines as "restricted". That is, one must take action at the legislative and regulatory level in order to deploy Department design and autonomy, with the sole restriction of compliance with the directives and general guidelines provided by University governance and its Central Administration. To that end, an ad-hoc commission has generated, in terms of planning for the University's faculty needs, a new algorithm and a system of "restrictions". This will be described in greater detail in a different section of this Plan: passed by the Governing Bodies in July of 2019, that model will be subject to a compliance check after a year. Likewise, the effects on recruiting with respect to the needs for staff and faculty as submitted by the Departments will be reviewed. Also launched was a working group for distributing resources which, disassociated from the "staffing points" model, must lead to positions as a fellow and RTD/A [contract researcher], which are in some respects overlapping positions. These figures, who are among the least "protected" in academia, are also those who carry out scientific operations of extraordinary scope. There are therefore essential for the management and future of research. The University must therefore take all necessary steps to foster the talent of these young scholars, finding ways to deploy resources that might ease their transition into more permanent forms of employment within academia that might ensure their future and harness their potential.

The "restricted" autonomy model, which renders the organisational choices of an entity not subject to judicial review, may be applied both to the management of economic resources as well as to aspects relating to teaching and research. There is certainly room for greater flexibility within the latter two areas, whereas on the purchasing front there is the burden of over-regulation (public procurement - Legislative Decree no. 50/2016 and ANAC Directives), and high fines.

In order to incentivise departmental autonomy, the University must likewise integrate certain high-quality, efficient services vertically so that the Departments might easily avail themselves of them. Integrated services able to reach contemplated objectives means, in terms of the department's infrastructure, not only cost savings, but savings in terms of red tape (CIG, CUP, DURC, DUVRI, ANAC compliance - these are the bane of any Department Administrator's existence). Thus, constant attention must be reserved to having centralised structures which keep pace with growing administrative and planning complexity.

#### 1.8 Questions for the Future

A major university, like ours, must be fully cognisant that a University's task is not simply to interact with the community solely on an "event" level. Indeed, much more attention must be given to social responsibility, international cooperation, ongoing cultural initiatives, equality under the law, sustainable campuses, all with a view to maintaining UNIMI's position as a beacon for the greater community. Next to the two fundamental dimensions of Research and Teaching, our University must moreover make a commitment to rethinking and further developing (in a concerted, holistic fashion) its University Innovation and Community Leadership mission, for the good of society.

Thus, questions relating to training, research, and University Innovation and Community Leadership need not be (as the UNIMI 2040 has shown) considered contingent concerns.

Indeed, everyday problems can only move toward a qualitative resolution if they are part of a more general vision. That way, the Strategic Plan is not a snapshot in time, but a work in progress, shared with the entire UNIMI community, other area universities, with our city and our region, discovering other ideas and suggestions along the way. We will then create a common language and vision, which may well lead to a very positive federation of universities. What we are talking about is a shared way to view the future. It cannot, and in fact it must not, trump the various perspectives. Rather, just as with the scientific method, it must oblige a dialogue among them, and the search for empirical confirmation. The University is not, even though we are prone to forget it, a political party, nor is it a social club, a place to hob-nob with likeminded people. The University is just that - *universitas* - precisely because one must dive into diversity, variety, dissent, and all of the components that it comprises. Together we carry the torch, with each of us an essential part of the life we share, regardless of our specific role. With that understanding in mind, we must work not toward an artificial compromise, a conciliation-solution, but to spark new dialogue, grateful for the many viewpoints as we seek knowledge, giving a voice to various types of consciences.

25

The different potential scenarios for the future of university governance, as we have mentioned (noting the centrality of the same) cannot be dictated by a pre-fabricated vision. Rather, each scenario must be assessed in terms of its strengths and weaknesses. A historical analysis would show just how much the University's infrastructure has changed over the last thirty years, if for no other reason than the traditional model of governance became untenable in light of the spike in enrolment, the drop in public funding, and the increasing demands on the University to play a new role in the economy and in society. All of these trends now call upon us to make discerning choices, pushing each campus to identify its own strategic position, and to pursue it in a consistent way.

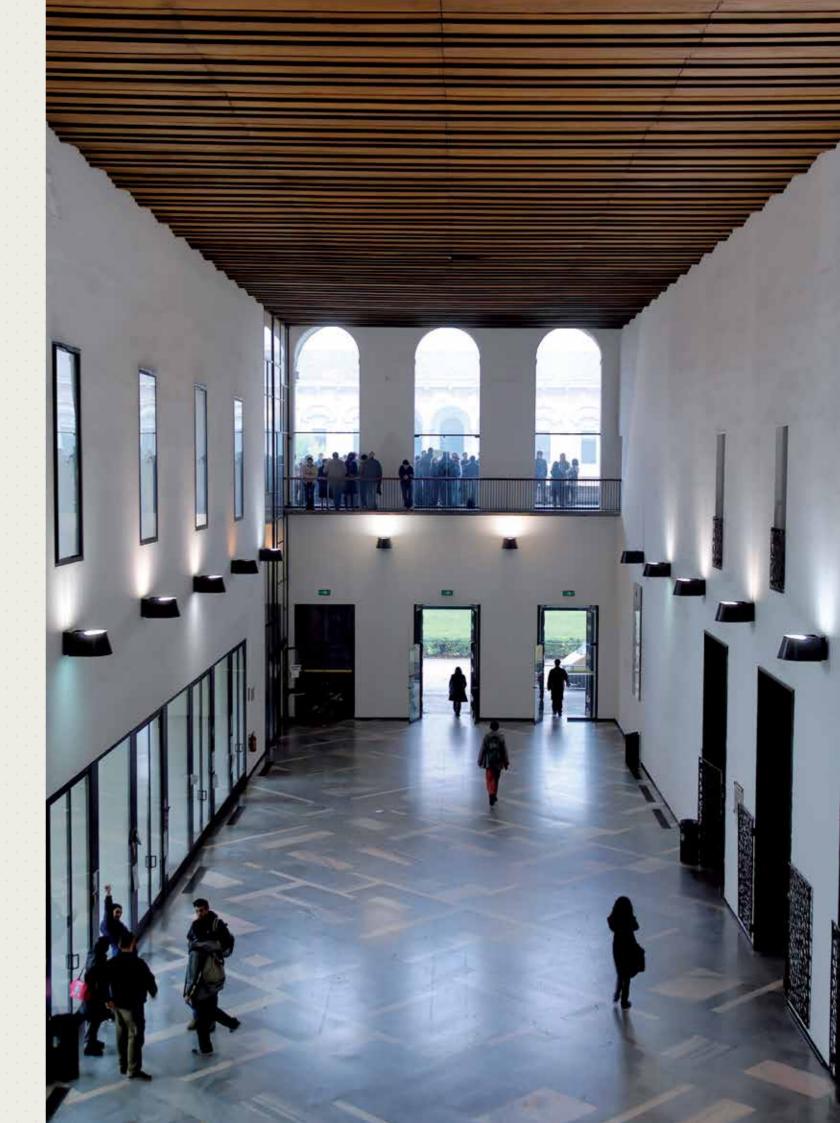
The idea, of course, is not to follow a corporate model, but rather to experiment with new methods. The goal is to brainstorm new types of governance with sufficient buy-in, acknowledging the shortcomings of the corporate model, but without denying the ongoing crisis that has afflicted the traditional university-governance model, which begs the need for change on a quality-management, performance, planning, and organisational level.

A helpful model to pursue this objective may be that of seeking shared responses to certain objective university-management dilemmas. The presumption is that a trade-off is inevitable: no solution offers benefits without costs. Therefore, the goal should be to maximise the former and minimise the latter. The corporate governance model (which inspired, to greater or lesser degrees, the various European university reform efforts over the last thirty years) assumes that decisions need to be made not by representatives of those to whom the related advantages or disadvantages will flow (the academics), but by persons representing more general interests within society, those who fund the University, and therefore wishing to ensure the utmost benefits are secured. The goal would be to seek new ways of reaching consensus: with an eye on the greater society, to be sure, but without dispensing with internal dialogue entirely. There must be an awareness that only those situations borne of interactions amongst university players might truly enhance not only the social and cultural heft of the institution, but also its ability to impact external policies, which all too often appear dismissive of the push towards innovation from within the University. The Plan therefore opens the door to questions that are by no means rhetorical: how do we balance efficient, business-like management of our universities with the desire to receive an active contribution from the intellectual energies within academia? How do we reconcile the need of restricted governing bodies which include (and in some countries, are primarily composed of) persons from the outside to make discerning rather than divisive development decisions, with the need to predicate these choices on expertise disseminated within a university? Then there are the other quandaries, no less important, tied to this central dilemma. How can we make sure that certain collective/national goals are pursued and attained without infringing upon the institutional independence of individual schools? How do we define the roles of middle management (Department Heads, for instance) in a way that does not limit their being a conduit of questions posed by their colleagues to University Leadership, but that the reverse holds true as well: that they might work to effectively implement leadership decisions within their own span of control? And further still: how do we balance the need for centralising administrative personnel (in order to achieve economies of scale) with the need to have them Strategic Plan 2020-2022

26

take part in processes (teaching, research, University Innovation and Community Leadership) occurring at the departmental-unit level? And how to be reconcile the need for streamlining departmental units (a problem ostensibly resolved in Italy with the quashing of Faculties) with the need to provide teaching which is increasingly inter-disciplinary, and therefore increasingly complex? Finally, how do we balance the need for the independence and discretion inherent to academic operations, with a technical/administrative coordination sufficient to manage a large, complicated, public institution?

These questions, as we said above, are not merely rhetoric. They implicate a need, over the next few years, to provide a series of detailed and logical answers. The starting place is an amendment to the University's Articles (a process which is indeed already underway). At the same time, they need to spark a reflection on the functions the University performs internally, and the sociopolitical and cultural context in which it operates. Furthermore (and again, precisely because these questions are not meant solely as a mental exercise, as helpful as that might be), we need to implement a profound reorganisation of the internal administration. If we properly raise awareness and create buy-in amongst all interested parties, then the project can be completed in around two and a half years. Both of these paths - trying out new organisational models, and the administrative reorganisation - are an integral and substantive part of this Strategic Plan. We are, indeed, convinced that the future of university governance depends, first and foremost, on just how much effectiveness, logic, and buy-in the responses to these dilemmas can garner. These potential responses (which must take into account the advantages and disadvantages, conflicts and compromises intrinsic to each) are the shared destination where this Plan is simply the start of the journey, one in which each and every part of the University is to be involved. In a nutshell, the Strategic Plan is born of the need to tackle these challenges. Indeed, discussions on these issues began more than a year ago: the Plan has gathered and developed the initial ideas with the awareness that its output (as we have said) is not set in stone, but is a project that remains open, subject to review and updating, and available to everyone through the University website.



Introduction

29



#### 2.1 Genesis of the Strategic Plan

The Strategic Plan was born out of concrete needs: we can elucidate these by providing a brief chronology of its genesis.

The Plan took shape from a single document, submitted by the Rector to the University on the day he took office, 1 October 2018. Article 25 of the Articles tasks the Rector (with the advice and counsel of the Academic Senate and the Management Board) to generate a planning and development document to briefly delineate the medium- and long-term strategies and objectives that would guide both the choices and the priorities of action in various fields of activities. The document in its first iteration was subject to discussion in November-December 2018 and January 2019 with the entire University. In fact, all thirty-three University Departments (in their expanded structure) along with all technical, administrative, and library staff, met for the discussion. The planning lines (taking into account the comments and requests submitted) were supplemented with the comments from the Governing Bodies, Senate, and Management Board, before being submitted for their consideration in February 2019. The guidelines set forth in the planning document are the very fabric of the initial Strategic Plan. They remain a touchstone for University assessment and control operations, and for purposes of applying the provisions of the three-year plan. At the conclusion of the Departmental site visits, in December 2018, an executive summary was generated. Based on that executive summary, a quality-assessment document was prepared. Finally, in January 2019, the viewpoints of the technical, administrative, and library staff (not members of a specific Department) were solicited. Within that framework, the starting point was invariably that the Rector is tasked with ensuring concerted efforts amongst the University's central Governing Bodies, and to monitor how University departmental units and services are operating, providing direction (to the extent of his authority under the law) for purposes of statutory and regulatory compliance, as well as compliance with the University Articles and Bylaws, to ensure the efficient operation of its departmental units and services, and to delineate roles and responsibilities for the same. To discharge this statutory role, however, it is necessary (as we have noted) to engage in a dialogue with members of the academic community and learned society. Therefore, we believe it to be indispensable for those who govern to engage in teamwork at a very intricate level. Through this teamwork, the authority vested in them (finding in the Rector, elected by the entire university community, a clear guide) becomes quite straight-forward in terms of operational goals. This further allows for an ongoing dialogue at all levels of the organisation, informed by the conviction that efficiency and plurality are synonymous. To that end, this Plan includes the active input of each designated Vice Rector.

Within an organisation as complex as UNIMI, there are no delegations of authority that become absolute or not subject to discussion. Therefore, generally speaking, one must render the decision-making process fluid, clear, and shared, in order for everyone to do their best work, and to hold our own against any major Italian or international university. One must also equip oneself with a rulebook. The situation discovered in October of 2018 relating to the internal regulatory framework was, without a doubt, seriously deficient. For this reason, over the past few months the internal apparatus was shored up, with the understanding that the lacunae were such that increased scrutiny needed to be given to this issue (one of substance and not just form).



30 Strategic Plan 2020-2022

We should also note that the planning lines were subject to discussion with a number of leaders from industry, trade, research foundations both public and private, social organisations, National Health, the Region, the Municipality, and obviously with the Ministry of Higher Education and Research (MIUR). Indeed, these relationships remain in place, and are nearly always vital, providing ongoing stimulus for the development of UNIMI.

The periodic Accreditation Site Visit by ANVUR, next scheduled for October 2020, is certainly a further impetus to complete this documentary framework, but it is moreover a thoughtful way to launch a quality-control process aimed at increasing, and achieving general buy-in for a new vision of university teaching and research, providing support to all institutional bodies in the drafting of the strategic plans.

#### 2.2 Objectives

The Strategic Plan therefore includes, as essential components and as discussed above, certain objectives which then correspond to the "missions" which the University is understood to pursue. The general objectives (already briefly described herein) will need to be built through specific tactics and goals, which in turn are a response to needs within the university community, and which at the same time can look beyond those specific needs. Across these tactics and goals run "transversal" themes that touch upon each area of interest of the Strategic Plan. We would note two of fundamental importance, in which the University is already investing with resources and projects: IT innovation (meaning both experimenting with new methods of educational delivery, as well as administrative streamlining); major issues relating to legal compliance, transparency, and fighting corruption, which must engage all areas of work within a public institution, designing the structures and goals for the same from within. There are many ways to construe the idea of "compliance". Our University has long been renowned for its scientific projects, encompassing not only legal sciences, but sociology, history, and philosophy on these issues, and within its academic programme, offering a number of courses specifically on this topic. We would like, however, to implement a series of tactics aimed at demonstrating to every component of the university, that following the rules and working in a transparent manner is not only a duty, it is indeed a fundamental aspect of being a member of the community.

The scenarios delineated by the Strategic Plan set forth (especially these latter ones) emphasise that this document cannot be merely self-referential. If, as we have noticed, the Strategic Plan has sprung from the planning guidelines provided by the Rector, as amended following the period of public comments, the document need not be construed as a stand-alone document. After all, from the outset, it gathered in expertise and suggestions culled from other documents generated in the past few months, and which are the fruit of a joint effort by University Governance and Administration. This is not simply a question of abiding by formal deadlines (something, indeed, not always accomplished at UNIMI), but to draw upon them, and from what they produce in terms of the written page, instructions for the future. To wit, we would note that this strategic project must accord with the Integrated Performance Plan, slated to be approved by the end of January 2020, meaning the three-year planning document which develops, in a systematic fashion, the planning for administrative and technical operations relating to performance, transparency, and fighting corruption. That plan (which discusses, on a conceptual and operational level, a number of the objectives which lie at the heart of the Strategic Plan) whilst bearing in mind compliance with ANVUR requirements, will be generated in harmony with the recommendations from the Assessment Board (AB). The very documents which the AB, in its "third" role, generates before submitting them to the University for review, must provide an essential line for the UNIMI project. The "intake" of the findings submitted by the AB to the University is a constant touchstone, as it shall remain in the future, for this Plan.

#### Introduction in the state of th

31

#### 2.3 Quality Policies

By the same token we must note that, since it is the through line for this entire discussion, the true starting point for a Strategic Plan comes from the need for "Quality". The Document on Quality Policies is, indeed, the tool to create the Strategic Plan. The issue of Quality, as we noted in the introduction, is by no means an abstract one, even though it is interpreted in a variety of ways, analysing the dispositions, the capacity, and weaknesses that arise around processes. One must keep in mind that quality (and the system that might be built up around it) cannot be blind to the circumstances, that is the overall environment, in which the University operates, within a specific national and international context. If, for example, the public expenditure on students in Germany is approximately Euro 15,000 per capita per year, whilst Italy spends only Euro 5,000, one cannot deny that on a "service" level, the playing field is anything but level. This holds true even within advanced university systems, connected to countries that are economic powerhouses. Yet, and based on that same premise, Quality Policies are essential because they imply a deeper look into where and how to use resources, thereby building a nexus with the budget, a budget which indeed cannot be divorced from a Strategic Plan, and which are indeed the operational manifestation of the same. And it is precisely on that operational level that the Strategic Plan has its mission, that indeed encompasses all the others, which is to place the topic of Quality front and centre, and to apply it across the full spectrum of University activities (teaching, research, University Innovation and Leadership, to be sure, but planning and recruiting as well). Administrative services and a project for managing and salvaging spaces, a theme on which the "University system" overall is increasingly called upon both nationally and internationally to have as its management strategy. Working in Quality, setting a shared way of pursuing objectives, the tactics to achieve them, and the ways to monitor them and assess the results achieved, will allow the Departments and the University to grow, with a view toward ongoing improvement. This can only arise from within a Strategic Plan, which provides instruction on where to invest, and with what expectations. All the same, one needs to understand that if the objectives which we will enumerate below, might be achieved in the next three years, the achievement would take place in a difficult environment, one not fully within the University's own control. Forecasts on resources that might be acquired by the university system (both generally and in terms of specific programming) remain uncertain, subject each year, as we know, to the Ordinary Financial Fund (OFF) and its variances.

Within a framework that is essentially devoid of certainty from a university-funding standpoint in Italy, a university must still aim for priority objectives, striving to implement a path toward quality. Although resources must in large part be set aside for "maintenance" (both with respect to personnel costs, as well as for services, and to keep facilities in a habitable condition), this does not mean that innovative positions, or fine-tuning the quality of programmes which are already under way, cannot happen. Based on the Integrated Performance Plan, and the Quality Policies Document, therefore, a general administrative-restructuring plan for UNIMI has been launched. This project is indeed a substantive part of the Strategic Plan, rather than simply a step in preparation for the same. To summarise, the standards set in the Document on Quality Policies, the actions undertaken for Recruitment, the Financial Statements, the Performance Plan, the Three-Year Building Plan, the Three-Year Plan, the re-design of the University's administrative organisation, are essential steps to show "how" UNIMI might reach the objectives set forth in this plan. To wit, the Three-Year Plan plays a significant role, and must be defined beginning with the Strategic Plan, and the Economic-Planning Documents, playing a central role at a time in which UNIMI is preparing to undertake some major projects and funding activities.

Introduction

33



3.

#### Potential Scenarios

#### 3.1 Strategies

The ends, as we have noted, need a means through which to be achieved. The Strategic Plan represents a sequential project that arises from a series of documents in which problems and solutions are identified. This has the benefit of showing, both within the University and to the outside world, what a prestigious university, cognisant of its scientific, instructional, cultural, social, and political standing, might in fact build in the next few years, reflecting on its past (discovering its strengths and weaknesses), and looking toward a future which it cannot but help design. A Strategic Plan therefore cannot forgo a general "vision", even in terms of what a university system is meant to be overall, within an environment which is often neither clear nor comforting. Indeed, the outlook remains somewhat tremulous in light of some major, unresolved issues (from assessment, to insolvency proceedings) as well as problems relating to planning and survival.

Thus, the Strategic Plan will describe the individual scenarios which the University of Milan will be tackling in upcoming years. We will start with planning, for each individual point. Yet, in order for a strategic trajectory to be credible, and so that it might operate within the context of "Quality" - pursuing it, and making it manifest - it must be integrated into a University "concept". Not a pipe dream, but rather an idealised project that becomes a utopia as the philosopher Ernst Bloch defined it: a vision of the future rooted in the concrete realities of today, with all possibilities explored.

The Italian University can only compete on the international scene if it is mindful of its own shortcomings. Aware, for example, that in a competitive-hiring and admission system where litigation is on the rise, making changes to better govern the National Scientific Certification "ASN" and the function of the sciences and disciplines, may serve to change the outlook, increasing the integrity of the system, the transparency of processes, and the weight given to merit. For its part, UNIMI will be watching its own assessment procedures closely, paying careful attention to feedback from the candidates, and employing all those methods the law allows to ensure that competitive admissions and hiring are carried out with the utmost transparency. We should also not forget that a University that produces research and teaching must carry out a dual function, that is, optimising its internal resources (who, indeed, have contributed in an essential way to the University's growth), whilst giving a chance to those, whether young or less young, and coming from a different background, able to offer new avenues for growth. The succession of "Special Governing Plans" for RTD/B [contract researchers] over the past few years are changing the face of the University, injecting youth onto the faculty. Thus, once again, one needs to find ways to foster growth for the young (PhD's, fellows, contract researchers) as well as other researchers and instructors who have achieved merit in the classroom and in the lab. The University is a chorus in which a number of voices must sing, each of whom has the right to respect and attention. The attention that has been, and will hereafter be, reserved to recruitment must therefore think about the general guidelines that the Strategic Plan is pursuing: merit, the search for quality, commitment to the project. The attempt to create a straight-forward, transparent, and shared set of rules must always acknowledge its own history, and the tradition that has become rooted during that history, which is now part of our heritage. It must be revitalised, but it certainly cannot be abandoned.

Once gain, the goal is not to create mythology, but to look to the university system as a reality able to bridge (as its history proves) time periods, through a development that can set strategy for the short, medium, and long term, in which planning objectives are defined according to a methodology not swayed by contingent solutions within easy reach.

#### 3.2 Assessment

If on the one hand the University must be subject to assessment (and indeed the Strategic Plan itself is an instrument for such assessment), the processes that lead to achieving its ends must be subject to scrutiny, and thereafter implemented, in a way that avoids ideological stances, which obviate the problems of pre-fabricated "vestments of ideas" within an abstract semiotic system. This exercise is perhaps more difficult than the assessment itself. And it is this exercise which must engage all the actors in the process, avoiding the lionization or vilification of anything in the status quo. As though it were enough to wave a magic wand and make the Gelmini reforms, passed at the end of 2010, and the institution ANVUR which dates back to 2006 (although it was not actually implemented for a number of years) disappear.

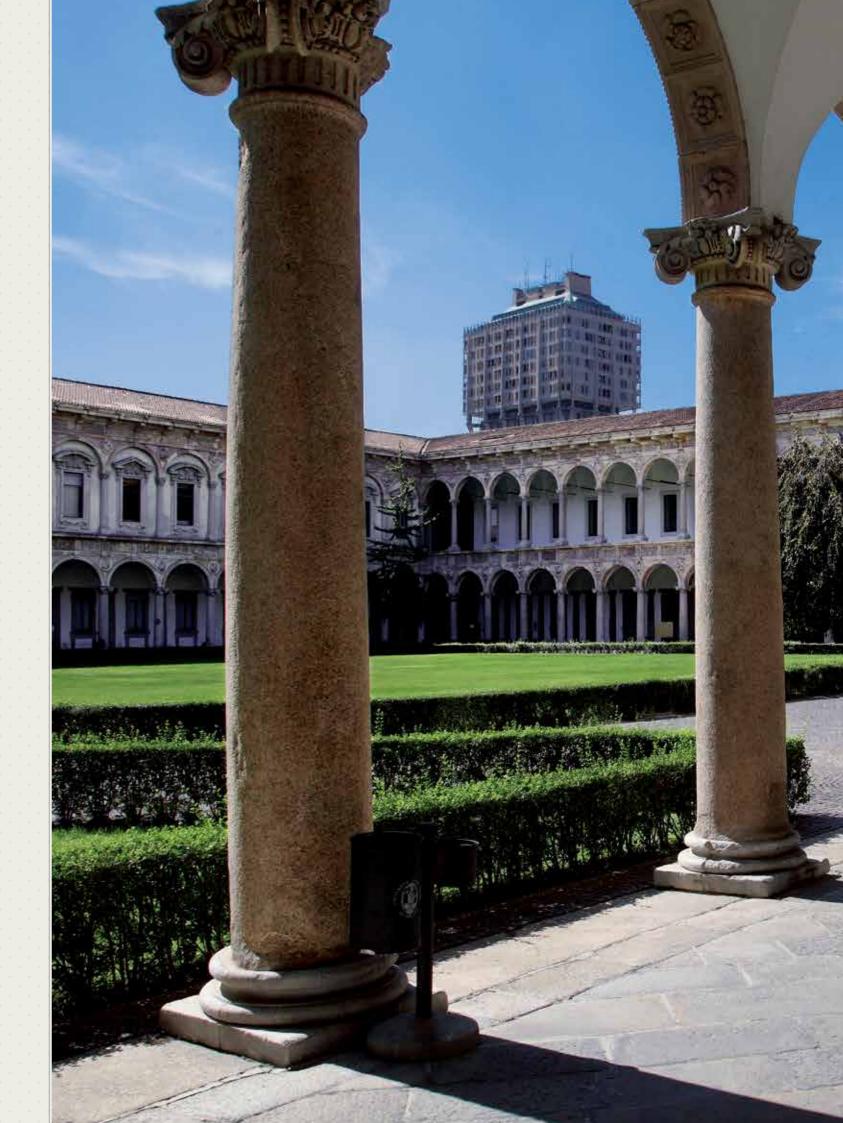
There is no magic pill that comes in the form of a document. There will always be someone calls it poison, and who counters with another document. The University is a melting pot, after all, and total consensus can rarely be achieved. Therefore, one must seek out common ground. The choice between short-sighted and long-term solutions is an important preliminary step, to be sure, if for no other reason that to analyse the various "social" impacts the University's various results might achieve, including with respect to building complex cultures. In this context, the individual contribution may only be understood when viewed holistically and over time, that is, along a timeframe that a "quick" process like an assessment tends not to consider, with the consequence that the specific historical meaning of the sciences are dissipated. With the prospect of that Hobson's choice (to carry out a more thoughtful, far-reaching assessment that embraces past and future, or perform an assessment that provides immediate, but merely incidental results), the responsibility for errors, the critical issues found, the endless fighting cannot be pinned on ill-conceived legal or ideological system. Rather, they arise from a broader identity crisis which the University is battling. It is a crisis which one must take time to reflect upon, starting with, as we have mentioned, internal systems of governance, and the design of its three missions of teaching, research, and University Innovation and Community Leadership. We must consider that the University has changed not because of a self-referential process of involution, but because society as a whole has changed, and because the systems of communication and the very ways in which knowledge is transferred have been revolutionised. The web, Open Access, for example, has changed the way research and teaching are done. This happened long before ANVUR set its assessment procedures. If the way knowledge is built gradually changes its structures, often by highlighting the difference amongst disciplines, one must instead attempt to set a shared basis of knowledge, if for no other reason that to avoid presenting them as a series of exceptions for which there is no general rule, accepting the complexity of the wordplay that is implied, as the option of constructing, as Wittgenstein would call it, new "forms of life". If one posits a downstream analysis, ensuring that the individual locations implement straightforward, transparent, tested processes, models which have been subject to discussion, documentation, which lend themselves to comparison, that they institute research observatories, efficient Quality Commissions and Assessment Boards with very active operations, and are thus proactive rather than passive or polemical touchpoints: that would allow us to lay the foundation for a type of assessment that more faithfully mirrors the work of the individuals within the structure of which they are a part. The judgements would then not be mere theory, but would be rooted in the objectives given to both research and teaching.

A weighted analysis of the "products", of their cultural and social impact, of the different typologies, onsite investigations, assessments amongst peers: these are processes that require longer timeframes, and the ability to compare different models, which are not limited to a mere Impact Factor statistics, or measuring citations. Trial and error without retribution; trying out ideas using different models, albeit with a common purpose, testing the findings and the facts, means to use assessment without violence, and to build complex models for complex times. To move beyond ideological frameworks, and to propose and thereafter implement assessment models that take into account the specificity of what is being assessed: that is perhaps the path to choose, a way to interrogate the process without expecting immediate answers. And, in the interim, to work in sync, with constructive and perhaps even sharp criticism, whilst maintaining civility and avoiding demagoguery with those who, by law, require immediate feedback. Long-term and short-terms solutions obviously have a different relationship with time, yet time remains the common denominator, the plane on which the détente takes place.

Introduction

There are no miraculous solutions, and if there were, this Strategic Plan would not be the one to offer them. Rather, there is an international debate we need to tune into, considering that this type of debate puts a variety of solutions into play, without foisting any one solution on the players. Assessing the quality of research and teaching does not mean ascribing a "value" to them. The assessment process need not be an exercise in axiology. By conducting this assessment, therefore, we are not on a pre-ordained, metaphysical path, in which ultimate, supreme values are being discussed. Rather, the proposal is a series of experimental tactics which, first and foremost, evaluate the circumstances on which value might be constructed, rendering judgements in a way that is relevant to the actual social and historical context. In the humanities, for example, the assessment weighs an incidental "social" impact, not the historical meaning of the value of a research study or the product of the same. Yet this means that what philosophers refer to as "axiology" does not rely on a single scale, which becomes manifest through monumental "exercises" which transform an incidental (and often fact-specific) assessment into value, but rather follows a series of layered paths. An assessment of research refers solely to the first level of that scale, that is, to a value that has an immediate effect on a specific socio-cultural context. Thus, this first level must be evaluated "well", but without any illusions as to what it really is. A seque in time, therefore, and not a legend set in stone. Just as this Strategic Plan is a segue.

Assessment, therefore, is not ontology, not mythology, and therefore can never aim to spark a theoretical discussion on the meaning of research, teaching, and University Innovation and Community Leadership. This is the potential misunderstanding into which, ironically, often both those assessing, and those being assessed, fall. Perhaps we are not always aware that we are not facing a closed system in which deep meaning, be it apparent or latent, exists. Rather, we are looking at a "genesis of meaning" in which specific processes must be described, rather than pinning down the eternal "essence" of a thin. It is simply a means of looking at them, with all its inherent limitations. The assessment process, or the self-assessment of the same, as a Strategic Plan is or would hope to be, can never be self-referential, positioned in a world of closed-off entities who remove it from the subjective and inter-subjective experience of research (as it is increasingly appearing to be to those who actually conduct research). The present need is therefore (hardly a battle stance, but nevertheless a useful one) of finding common ground, setting aside conventional wisdom and systems that attempt to commandeer truth. All the same, this finding of common ground requires, before it can become a reality, a period of experimentation. This may also require a "neutralisation" of current processes, which might also implicate transitional phases which are merely quantitative in nature, and yet not always less valid than an expensive, self-referential exercise. If, on the other hand, one finds assessment to be a mere technical procedure, and the site visits a test to be adjudicated according to pre-fabricated parameters, rather than truly listening to what is being assessed, according to a "scientistic" approach, a true discussion on its ways and means cannot happen. Ways and means that can only be accomplished by capturing those "inter-subjective" and "communal" aspects, considering assessment to be a "joint" experience wherein a "discussion" is made to happen - a logos that is not quite so distant from what we see occurring in the last pages of Plato's Sophist. Describing the quality of something reveals, at the same time, the social "commonality" underlying all inter-subjective processes. Assessments are not technical exercises, and much less quantitative ones. Rather, they are efforts to make a research product or an instructional path one's own. Assessments cannot fall into the naturalistic obviousness of an immediate empiricism, far removed from any genesis of being, nor into the veiling of a loss of meaning within the actual research communities in the face of will, or the system of things, of false knowledge that presents itself as renouncing knowledge in the lauding of the list or fact. Acknowledging the fallacies that lie at its base, we therefore move beyond the myth-building idea of what is inevitable, and instead we have the courage to observe the ways in which we conduct our scientific research, its timeframes, its contents, its identity crises, presenting models that might allow for work to be repositioned onto a new foundation.



Introduction



4.

## Conclusion

To conclude, it is no mean task to set a unified strategy for a multi-disciplinary University. The only option comes from an approach that attempts to transform specific objectives into a common purpose, wherein our differences become our strengths, provided they are harnessed using shared, guiding principles that flow from a single source of inspiration, without one trumping another, and without ambition which exceeds our means. Precisely for this reason, we should note, in conclusion, that we must equip ourselves with a system of periodic reviews and updates for those objectives set forth in the Strategic Plan. All of this makes the Plan a living, breathing document, one that can learn from the challenges that the strategic-planning process breeds. A recent work by Giorgio Donna (Universities that create public value. A strategic, governance, organisation, and financial model for Italy's universities. Bologna: Il Mulino, 2018, p. 123-158) underscores certain strategic challenges on which the Italian university must focus. Challenge is therefore the operative word, to be embraced without alarm, but striving to build one's own objectives in accordance with a concrete strategic model. We should therefore note, in conclusion, that the University which strives towards innovation, under what are not always the easiest of circumstances, must pursue and monitor the tools that ensure the right to an education, student educational pathways, an interdisciplinary approach to the sciences (as a true challenge for the future), curriculum design that ensures a complementarity between three-year and Master's degree programmes, greater internationalisation able to establish relationships with European universities, attract students, and encourage mobility. Developing technological platforms for an increasingly unique sharing of research, pursuing excellence through hiring practices which aim to encourage recruitment, establishing partnerships with other Italian universities, especially in the region and with the healthcare industry, promoting open research and the sharing of research findings - not only with other scientists, but with society at large these are goals UNIMI must set for itself. At the same time, the University must (both internally and externally) communicate its work, and its pursuit of quality.

In an extraordinary speech in anticipation of Vatican II (11 September 1962) John XXII noted that an institution's vitality comes from its ability to set clear internal goals - vitality from within. Yet an institution will only truly achieve its mission if it adds "vitality from outside", one that is focused "on the needs and yearnings of the people". Hence the need for "inclusivity" within a University: the quality of its educational and scientific pathways within have the ultimate goal of improving a society's and a culture's general wellbeing.





## Internationalisation

A major, multi-disciplinary University like ours must promote the free circulation of persons and ideas, and develop a means of disseminating knowledge within an international space for study and research.

As duly noted in the introduction to this Strategic Plan and, nationally, in the (2018) CRUI document entitled "The Internationalisation of Higher Education In Italy. The Universities," the actual building of a multicultural, multi-lingual, and transnational space within a University remains an open challenge, one that becomes reality by setting concrete objectives subject to monitoring, whilst at the same time shoring up what has already been achieved.

The public-health emergency that is Covid-19 has not shifted this intention; rather, it will make it all the more urgent and important, especially during this historic moment when the pandemic has curtailed so many opportunities for international exchanges and dialogue. Our universities are best positioned to provide the engine for this kind of change, to re-open the door to other countries. UNIMI wants to play a leading role in these efforts.

The objectives defined infra aim to promote the creation of a European- and international-educational area in which UNIMI might fully realise its potential as a research-intensive University, improving its standing on leading international rankings as well. In this context, our membership in LERU (a network of twenty-

improving its standing on leading international rankings as well. In this context, our membership in LERU (a network of twenty-three research-intensive European universities, of which UNIMI is the founder and the only Italian member) has sparked debate and given rise to the sharing of policies and best practices in the field of research, teaching, and administration. It has opened the door to a dialogue around a common goal.

Strategic Plan 2020-2022 Internationalisation

## Becoming a beacon for university education in Europe

In addition to maintaining an active presence in the LERU network, UNIMI hopes to play a leading role in the efforts (at a European level) to build a European Space for University Education. The University is active in the area of tertiary education in Europe in a variety of fields, and with projects that boast important university partners from Europe and across the globe. The planning objectives for our University within the field of internationalisation align with European Commission standards. The goal is to sponsor and develop projects aimed at creating a European space for teaching, and to foster a European cultural identity.

From this viewpoint, in January 2019, our University joined a large, multi-disciplinary network, spearheaded by the Sorbonne in Paris, and six-universities-strong (members also include the Universities of Heidelberg, Copenhagen, Warsaw, and Prague). This network experiments with new teaching methods and new systems of mobility, which may become a model for enriching the educational system in Europe. The project, called 4EU+, was funded by the European Commission through the Erasmus+ European Universities, and will be gradually implemented over a three-year period beginning in November 2019.

The 4EU+ network aims to build an advanced model of cooperation in teaching, research, and administrative and library services. We will develop, and gradually share, our approaches, teaching modules, and laboratories with the goal of building a transnational university education (through the use of innovative tools, better curricular harmonisation, and teaching methods). We will experiment with a mobility model based both on in-person and remote attendance for students, instructors, and staff, who will share an educational itinerary centred on major issues including health, human and social sciences, information and computational technology, sustainability, and biodiversity.

Our participation in major university networks is more important than ever under Covid-19. Our memberships have allowed us to present a united front, with the motto: *Universities are not closed- they have adapted.* 

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
International students at the University (counting students in the first and second cycle who earned their previous degree abroad, as well as Incoming Students on an exchange programme)	+5%

## A university open to international mobility (objective shared with the Departments)

Our University, the Covid-19 pandemic notwithstanding, intends to keep mobility in both directions for students within the scope of study-abroad projects and internships or placements, with a particular focus on the mobility of incoming students, the statistics for which have held more or less steady over the past three years. In this regard, we are planning more targeted advertising of our course offerings and accommodations/services for international students. This will be done in part through a more effective engagement of student organisations, strengthening our relationships with area institutions, and greater visibility on the University website and dedicated platforms. In terms of mobility outside the EU, we are moving forward

with implementing certain international agreements (with more than 1200 already in place) involving not only student mobility, but also that of university teaching staff. As a powerfully multi-disciplinary university, the University of Milan maintains strong ties to international universities, as well as Italian cultural institutes and institutions abroad. We plan to further develop and strengthen these ties, especially in terms of the geographic areas which have already yielded very promising results (including the Balkans, Russia, North and South America, countries in the Mediterranean and Middle East, Central Asia, India, China, and Japan). At the same time, we want to open ourselves up to founding programmes of that same high quality, but which require greater social commitment (for example, by establishing orientation programmes in areas which are politically or socially unstable).

In addition to promoting mobility, UNIMI intends to place special focus, the present health emergency notwithstanding, on ensuring that its own students get the most academic value out of their study-abroad experience. Any barriers to fully transferring such experiences into the student's course of study should be removed.

The mobility of students, instructors, and staff represents, as we know, the most well-honed tool for internationalisation, and one that is made possible through European (Erasmus+), Italian, and University funding. The University pledges to foster and support these efforts. In terms of the current epidemic, there is now the option to use a "blended" delivery method. This has allowed students on the Erasmus exchange during the second semester of 2019-2020 to complete their course of studies remotely. Furthermore, for the 2020-2021 year, the European Commission and the National Erasmus Agency have approved "blended" mobility, meaning partly in person and partly through distance learning.

Support for English-language teaching, and the promotion of the courses offered by the central division of the University of Milan overseas is predicated on having personnel with international experience, with a view towards opening up our own campus to the process of internationalisation. From that point of view, the goal (as the changing conditions of the pandemic permit) is to make it easier for University instructors, as well as that of technical-administrative and library staff, to work abroad, as well as to increase the influx of foreign instructors to teach and train our students.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
The number of CFU [Credit Units] earned by full-time students per academic year abroad (FFO).	+5% (increase in the absolute number of students)

## Increasing the appeal of our international academics

The course offerings for international coursework at our University fulfil a dual objective of making our University more appealing to international students and preparing Italian students to open their horizons to the international job market and to international science. The development of English-language coursework is mainly geared toward the Master's degrees programmes, a phenomenon that is now sweeping Italian universities, and which has come to represent an indispensable feature to maintain an international appeal. The Master's programmes featuring international coursework have the highest employment rates: the unemployment rate is 5% compared to 14% of those who did not take those types of classes (source: AlmaLaurea). In designing the new course offerings (with an intensification of services, including library access, offered to international students something to work towards), the University has identified as a priority, within the Master's coursework, both English-language coursework, and dual-degree programmes.

6 Strategic Plan 2020-2022

The shoring up of the course offerings, and the international appeal of UNIMI Courses, will aim to gradually increase the number of enrolled international students as well (in the 2017-2018 academic year these totalled 3,800 approximately, with 4,100 approximately in 2018- 19, that is, 6.8% of the total student body).

We should note that international students are interested in both English-language and Italian-language offerings at the University, as the data for the 2018/2019 academic year show: 58% of foreign students are enrolled in Degree Programmes with coursework in Italian.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Number of International Study Courses (CRUI definition)	+10% over the current number

## Fostering department internationalisation within the greater University

(QA objective)

The University Departments are an indispensable player in the process of internationalisation, and interactions with companies operating internationally.

The role Departments play in the internationalisation strategy will be bolstered through projects intended to map out (and to share with the entire University) all of the agreements and collaborations pending within the thirty-three departments. Even in terms of disciplinary specifications, there are currently some out-of-sync elements.

Within this context it is important to reinforce centralised support services for drafting agreements, automating procedures, improving alignment between the Departments and the deputised central administrative entities, as well as bolstering the role of the Department's Deputy for Internationalisation. An area parallel to that mentioned above relates to programmes for promoting visiting students and scholars, within the scope of Departmental research and training programmes, as a means of cultivating both science and culture within the University.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Mapping and monitoring all executed contracts, implementing standard, automated procedures for their effective management, University-wide.	Streamlining and automating contract management.



## Education

The coursework offered by the University of Milan is marked by two distinctive elements: a multi-disciplinary approach, which draws its origins from the liberal arts and sciences background of the University, with its many cultural and disciplinary options that converge into University-wide initiatives and projects, helping to foster and facilitate an integration of the disciplines; and its designation as a "Research-Intensive University" which is increasingly aligned with the most advanced knowledge acquired through research, including with respect to national and global production needs.

Our firm commitment to education at the University of Milan is to be present with a high degree of direct interaction between pupils and students. From that vantage point, the distance learning we successfully implemented during the emergency may provide an impetus for methodological innovation, and a greater focus on learning processes. This in turn may contribute to strengthening and innovating the educational infrastructure at our University. Based on these peculiarities, and the strengths and weaknesses we have assessed, the following strategic objectives were identified. The specific goal was to enhance the quality of our academic offerings by implementing and then further developing student-centred learning and skills-acquisition practices, whilst carefully planning a roster of innovative academic programmes. These are intended to meet the needs of an increasingly complex and dynamic workplace. This is done using tactics that strive for continual improvement in services offered to students. Our focus on teaching is reaffirmed by the decisions to include performance indicators for the same into the distribution algorithm for staffing points to the Departments.

# A pledge to ensure continuity of service during the 2020-21 academic year using hybrid learning as required during the Covid-19 pandemic

For the 2020-21 academic year, our priority is to identify and to support blended learning, which will allow us to respond to the educational and learning needs of our students, whilst abiding by all safety and health regulations intended to keep students, staff, and the greater community safe. The strategy implemented during the second semester of the 2019/2020 year will continue, predicated on:

- educational programming in terms of lectures, exercises, and exams which are compatible with the evolving public-health situation;
- setting up, and continually improving, online-learning platforms that allow for distance or hybrid learning;
- faculty support with tangible assistance in using these online platforms, as well as soliciting feedback and offering training on teaching methods and lesson planning;
- ongoing monitoring of the activities provided by the study programmes, including surveys to assess student satisfaction;

Additionally, the University has set up a special capital fund to equip classrooms for distance learning and other technological needs; these funds will allow us, by the Autumn, to equip over 50 classrooms with the technology needed to manage hybrid learning whilst this delivery method is in effect.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
	At least fifty (50) classrooms by the end of the 2020-21 academic year.

## Meeting the demand for education

(objective shared with the Departments)

The University of Milan, in addition to setting an objective to be a key player on the European and international scene, intends to maintain and reinforce its position as a beacon for university teaching in Milan, Lombardy, and Italy. To provide a concrete response to the economic challenges arising from the initial stages of the pandemic in early 2020, the governing bodies have passed a resolution to provide tuition breaks for students from lower-income families. UNIMI is a major, multi-disciplinary university able to offer a wide array of degree programmes, ones in which students can become experts in a specific field without sacrificing a multi-disciplinary approach. Within this context, there is room for new teaching programmes, especially at the Master's level, to strengthen our academic offerings, providing a response to the growing demand for university education in Milan and throughout Lombardy. More generally, all Master's coursework must reinforce the University's appeal to graduates of other Italian and international universities.

A number of tactics must work in concert in order to reach this objective. First, a renewed focus on academics within the University's policies; second, a closer look at the use of "limited-space" courses; third, greater care in designing and administering degree programmes; fourth, enhancing student services; fifth, greater attention to integrating the needs expressed by the cultural and economic environment in which the University operates into both teaching and educational requests.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Job-placement performance	Keep the same numbers as the 2019/20 academic year for the coming three-year period
Percentage of students enrolled in Master's degrees who are graduates of other institutions	+5% of the total number of students from other universities

## Fostering an inter-disciplinary approach within the course offerings

The accelerated changes that have marked this period in history require us to be agile and to adapt to change. This, more than ever, makes a multi-disciplinary approach to learning essential. We intend to bolster and to promote an inter-disciplinary approach which is predicated on precisely those elements that make our University special. The goal with our course offerings, for instance, is to prepare the next generations to tackle complex problems from a variety of viewpoints, and to develop skills, and implement new ways of thinking that transcend traditional disciplinary borders. To that end, we intend to place special focus on the paths to a degree, promoting a personalisation of one's educational path and the journey to knowledge. The idea is to provide point and counterpoint on a series of issues, without sacrificing the foundations of a proper education. The goal will be pursued by promoting "cross-fertilisation" amongst various disciplines, and incentivising synergy amongst the many University Departments. The nature of a large, multidisciplinary University offers opportunities which other universities lack. For this reason, any re-planning for the degree programmes, as well as all new initiatives, must pay careful attention to, and foster, multi-disciplinary knowledge and skills, thereby fully optimising the skill sets within UNIMI, overcoming the trends toward fragmentation and siloing that the departmentalisation process introduced by Law no. 240/2010 triggered.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Number of Newly Instituted Courses which met the following criteria: number of credit awarded by different departments other than the proposing department at or above 24 CFU for each new three-year programm and 12 CFU for each new two-year programme	≥ 12 CFU for each new two-year

## Support student learning in order to increase students staying on track to graduate

(objective shared with the Departments)

Reducing attrition, a focus on staying on track with coursework, and support for learning, are all part of the University's social responsibility. These objectives are pursued by the University through a series of different tactics linked to various strategic objectives, such as programmes on academic tracks within the disciplines, greater sharing of greater information and reporting of any critical issues, updated teaching methods, disseminating best practices, in addition to specific orientation tools and mobile tutoring. The latter will be coordinated with the Departments and the Academic Colleges, based in part on an analysis of the ongoing monitoring of our teaching efficacy within the individual courses, in order to identify and schedule interventions and support for students which are tailored to their specific needs.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Percentage of students continuing into the second year of coursework having earned at least 20 CFU in the first year of study.	+5%

## Strengthening the right to study in its various forms

Educational growth is the sole foundation on which to build an effective "economy of knowledge" and a future of progress and wellness for society as a whole. The model from which the University takes its inspiration is that of "students as world citizen". One who thinks and acts with a global perspective; one ready to face the challenges that society throws their way.

Within such a framework, the University has a responsibility to maintain a level of Services that guarantee students the possibility of carrying out their studies under conditions which are most favourable to reaping the benefits of what they have learned. Consequently, Student Services take on strategic value, in terms of viewing orientation, lodging, and the right to an education holistically, along with disability services, library services, adequate classroom, instructional, and laboratory facilities, services to support innovative teaching methods, all with the goal of opening up the door to a university education to a broader swath of students, whilst at the same time stemming the tide of attrition and students falling behind in their studies.

The "right to an education" must be an actual, and not just theoretical, opportunity. It must allow motivated pupils to be ensured sufficient preparation that meets European standards. Education must be accessible to everyone, must respect and foster the characteristics of each individual, with all their virtues and vulnerabilities. The goal is not merely to comply with the law, but to make an even greater commitment in this regard. All of this requires new policies to develop and implement student services. One must certainly foster the excellence, the aptitudes, and the talent of the brightest students, whilst carrying the torch of a shared social mission, one that opens its arms wider than ever before towards the previously disenfranchised within society. We must work to welcome students from other regions, and other countries, in the spirit of a true vocation, and a real commitment.

The fact that the Region of Lombardy has vested the University directly with authority regarding

the "right to an education" only heightens the University's responsibility to ensure all youth have access to an education. This needs to extend beyond scholarships for at-risk youth, and include spaces and lodging allowing students to live on campus and feel like they are part of the community. No surprise then that amongst the crucial issues and urgent actions, identified in the planning document is student housing. The ability to attract international students, to be sure, depends on a "packet" of services (admission, housing, meal plans / benefits) the University is able to offer.

Within that context, and pursuant to the strategic objectives assumed in terms of opening up to internationalisation, and attracting students, the number of sleeping spaces available to students is of special importance. That measure, furthermore, allows us to bring together the benefit of the campus' Milan location, with making it accessible to students from other regions and countries, regardless of their family's socio-economic status.

The "student-centred" approach can be seen in the University's commitment to remodel its library spaces, and make them more functional. The libraries must be differentiated in order to meet both traditional needs, and new ones. Access to collections (hard-copy and digital alike) is ensured at the library, as well as to various library services meant to support classroom and laboratory work. IT services are provided by specialised staff, and other educational-support equipment is available. For this reason, libraries remain the quintessential study space. All the same, a shift is needed as learning methods have changed so drastically over the last few decades. In addition to the traditional (silent) reading rooms, libraries must offer spaces which are conducive to group studying and other collaborative-learning methods. Finally, informal spaces for conversation and trading ideas are needed as well. We hope to offer spaces which are aesthetically pleasing, comfortable, and safe. These spaces must be easy to get around, and be more accessible, thanks to longer opening hours, made possible through the use of technology and optimising points of access.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Number of sleeping spaces available to students	+30%
Library spaces slated for retrofitting and remodelling	At least 300 spaces to be subject to retrofitting and remodelling

## Improving job-placement rates for new graduates, along with the key skills needed to transition into the workforce

Sudden changes in the workplace and the professions, and the swiftly evolving socio-economic landscape, all serve to ratchet up the difficulty in choosing a course of study, and in discerning potential job paths for the professions we help cultivate at the University.

Knowing our graduates' occupational destiny is of fundamental importance in terms of making decisions about education, orienting our stakeholders, and to help families and students make sound decisions in terms of a course of study that matches their own career expectations. It also helps us guide graduates in their approach to the job market.

Unpaid internships and placements, whether in the service industry or the production sector, knowledge of foreign languages, and job-related computer literacy and information-gathering skills (i.e. the ability to locate, assess, and properly use sources of information, which is indispensable in any arena: school, work, civic) are of crucial importance for our graduates to find employment.

The University has launched a programme for all courses of study intended to cultivate and ensure the language skills of all our students. By the same token, specific programmes (managed on a campus-specific level) intended to ensure all students gain IT proficiency (both for using IT tools, as well as skills in digital communication) have been launched.

The period immediately after graduation represents, for the university graduate, a period marked by choices that will condition not only their professional (and, to some degree, personal) future, but also the timing and ways in which they tackle the job market. The first choice (and perhaps the key one, given that it cannot easily be reversed) is whether to continue one's studies or to consider the options offered by the job market. A number of studies show that a university education guarantees a privileged path into the job market. On the other hand, the three-year findings from ISTAT on university graduates confirm that the transition from earning one's degree to entering the workplace comes in stages, and is often slow. From this perspective, the University believes it of crucial importance to design activities through which our students and upcoming graduates might learn transferable skills for the workplace, through specially designed educational programming.

The University has launched a programme for all courses of study intended to cultivate and maintain the language skills of all our students. Greater attention, along this vector, must be paid to bolstering those study programmes primarily focused on preparing students for a career, in terms of giving them the professional skills they need.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Percentage of students enrolled in a degree (whether three-year or single-cycle) programme managed by SLAM [University Language Centre] who have reached English-language proficiency by the second year	>80%
Number of active placements in off-campus entities or businesses	13.000 placements
Job orientation and career fairs for students and recent graduates	200 events

## **Strengthening Master's-level course offerings**

In terms of the first- and second-cycle Master's programmes (which are indeed the bellwether of our ties to the economic system and the professional workforce), UNIMI's market share must be broadly developed. This must take place in a coordinated fashion by developing course offerings (especially at the Master's level) wherein a student can easily discern the path to graduation and a career.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Number of students enrolled in Master's courses (Cycle I and II)	+15%

## Strengthen the third cycle for upper-level education and increase its appeal

Pursuant to its vocation as a research-intensive university, UNIMI intends to reinforce the potential of its doctoral programme in order to render its support of University research more effective whilst transitioning PhDs into the marketplace with a high level of training, thereby impacting the country's economic and cultural development. Training persons who are able to operate independently in a research setting is indeed fundamental in order to promote and support a research environment, as well as University Innovation and Community Leadership. From this perspective, the doctoral programme represents the intersection of the University's missions. The transition of PhD's into the workforce will make the action of transferring knowledge into society all the more apparent. The bolstering of our doctoral programmes will see an additional uptick in the quality of doctoral students admitted thanks to the increase in the appeal of our programme offerings. From that point of view, and given the high cost of living in Milan compared to any number of other Italian and international locations, and further given that our scholarships are not nearly as competitive as other European universities (this in spite of readjustments we have already made) an economic incentive geared towards rewarding a limited number of high-merit candidates at the admission stage was deemed indispensable. We intend to take further actions, in accordance with policies set by MIUR, ANVUR, and the European Commission (e.g. Marie Sktodowska-Curie Actions) over the last five-year period, aimed at offering more stimulating laboratory and classroom environments open to collaborating with research institutions and the workplace, both nationally and internationally. From that perspective, our intention is to increase the number of innovative PhD programmes which are international and inter-sectional in nature. For a second round of injecting more life into our PhD programmes, we may institute executive doctoral programmes with an ad-hoc training programme designed by the doctoral student and a company or an entity reserved exclusively to their employees. These types of programmes lead to greater shared knowledge, and spark profitable scientific collaborations. In addition to bolstering the University's research activities, of crucial and strategic importance for the future of the country is succeeding in transitioning our PhDs into the jobs that make full use of their skill set. We intend to intensify collaborations with the world of industry and business associations in order to integrate certain transferable skills into our academic programmes, raising awareness on how third-stage academic training might contribute to business innovation and growth. The hope is to create workshops in collaboration with companies which engage doctoral candidates, instructors, and business leaders first hand. The anticipated outcome is a positive, iterative process with academics and doctoral

candidates on one side (giving them the opportunity to increase their understanding of, and appreciation for, the challenges of the business environment) and business leaders on the other (to improve their understanding of how advanced academic training can lead to innovation and development).

Finally, we also intend to develop a series of tactics aimed at improving the efficiency of the entire "doctoral training" process, viewed from the prospective of administrative action. We plan to implement a *horizontal* reorganisation (as opposed to the vertical organisation of the divisions) which contemplates a *single administrative director* to oversee the entire process. We also plan on subjecting the internal rules to a thorough analysis in order to streamline procedures, and introduce sufficient flexibility, to facilitate interactions with institutions in other countries.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Number of innovative - interdisciplinary PhD programmes	+50%
Number of innovative - international PhD programmes	+25%

## Promote teaching efforts, and experimentation with new "student-centred" teaching methods

Promoting and developing the skills and encouraging the professional growth of our teaching staff, and modernising our teaching methods, are priorities for the University, pursuant to the tactics contemplated under the Declaration of Bologna. Such activities would aim to promoting active participation amongst the students, so that they might better acquire the knowledge and develop the skills needed to tackle future professional challenges. The public-health emergency occurring during the first semester of 2020 has proven a crucible for UNIMI instructors' ability to utilise new teaching methods. Student feedback on our handling of the crisis has been roundly positive (over 85% of students said they were either satisfied or very satisfied with the response).

The objective for the three-year programme is to develop training initiatives that must involve newly hired contract researchers in particular. This will be done, in part, to off-set the fact that competitive-hiring procedures favour candidates with a diploma in the sciences. The educational programme intends to build basic skills relating to the curricular design, and to provide an understanding of the pedagogical aspects of university teachings. The idea will be to promote experiences for the management of methodological and technological approaches that might properly supervise and assess student learning, providing information on those library resources available to support academic activities. Along with basic instruction, there will be educational programming targeting specific learning objectives, as set by the individual instructors. The webinar series organised in June of 2020, entitled "Online Education. From Phase 2 to the Return to the Classroom", received 800 views, reflecting UNIMI faculty members' willingness to take a risk, to be able to tackle contingencies and to work with forecasts.

The experience acquired as part of activities undertaken with LERU (League of European Research Universities) will play an important role in this regard.

One important objective is to consolidate, and thereafter formalize the efforts made during the pandemic, as a means of expanding opportunities for courses offered in "blended" mode. E-learning programmes will likewise be developed and implemented. These will be offered in both asynchronous (online classes intended to deploy the University's strengths on a national and international level, as well as to reach students who cannot attend classes on campus on

a daily basis) as well as in a synchronous format (online classes allowing students to attend lectures occurring in real time at various campus locations). These will include courses available through UNIMI, as well as through partnerships with other international universities (presently under development). Within that context, we intend to place special focus on experimenting with cutting-edge online-communication technologies, including 5G connections for e-learning on one's mobile device; human-machine multi-modal interaction and artificial intelligence as a support for online assessments of student learning, just to name a few concrete examples which have already gone live.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Percentage of B type contract researchers involved in academic training	At least 80% engagement of new hires
Produce a webinar/seminar series open to the entire academic community, dedicated to teaching and innovations in teaching	At least 15 events over the three-year period

## **Constant improvement of our educational offerings** (QA objective)

The features of a University with long-standing traditions, one which is able to join a multidisciplinary approach to academics with high-level research, can only be maintained by constantly re-tooling the academic offerings. Students' cultural and professional development must come first, but a great deal of attention must be paid to developments affecting the national and international economies as well as their requirements.

Constant improvement of our various courses of study is achieved, first and foremost, by implementing suitable measures for monitoring and (internally or externally) assessing teaching quality and effectiveness. From this point of view, and pursuant to the university Quality Assurance model set by ANVUR, we intend to conduct a thorough analysis of the annual monitoring worksheets developed by the courses of study. This effort will be coordinated with the Departments, Academic Colleges, Management Committees, and Student Council. Particular attention will be paid to any shortcomings, and rooting out the potential causes for the same, with the goal of planning suitable corrective actions.

Special attention will be paid to creating the conditions to ensure that the Joint Student-Instructor Committees might act as the party tasked with stimulating academic processes, encourage active student participation in the Quality Assurance process. UNIMI's intent is to move toward interpreting the QA process as an occasion to generate substantive improvement for our academic offerings.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Reinforcing the QA system within the University (an indicator tasked to the Assessment Board for review)	Qualitative Judgement by the Assessment Board on the status of the QA system within the University. The opinion will take into account the judgement rendered by the CEV [Accreditation Commission], and to what extent any issues found during the site visit have been resolved.

## Research

experiences, adopting a multidisciplinary mindset and breaking down the borders separating the disciplines: these are the only tools enabling a major university like the University of Milan to enhance its own research capabilities, becoming increasingly competitive on a national and international level. To promote inter-departmental interactions amongst researchers from different disciplines, the University hopes to identify 5- 10 "Top Challenges" and then strive for a medium-to-long term. The goals: to set the 2020-2024 research agenda, and the areas of strategic specialisation for the university; strengthening relationships with external partners; optimising the impact research at the University has on the most pressing challenges in modern society. The University's "Top Challenges" which most clearly fall within those objectives set by the European Commission as part of "Horizon Europe", and the 17 objectives set by the United Nations (SDGs), as incorporated by the Commission (https://

ec.europa.eu/europeaid/policies/european-development-policy/2030-agenda-sustainable- development\_en) will be identified based on an open internal call for tenders,

Integration and cross-fertilisation amongst different skills and

which will seek far-reaching project suggestions aiming to promote interactions and networking amongst different areas of the University. This can only become a reality if networking amongst researchers and professors of different but complementary departments is encouraged. Discussions will be based on issues culled from the bottom-up, an effort which has received a shot in the arm recently thanks to the SEED project. Furthermore, a central role is given to the Departments. Based on those priorities set forth in the three-year plan, they will be tasked with identifying the measures most appropriate to creating a microcosm suited to the harmonious development of their lines of research, as permitted by, and indeed taking full advantage of, the tools placed at their disposal by the University.

At the same time, accelerating the alignment between the University's research-quality and transparency policies with those of the European Research Area (Responsible Research and Innovation and Open Science) has become a "must". The intermediate objectives and tactics listed below are in service of that goal.

Strategic Plan 2020-2022

## **Fostering an environment that stimulates research** (objective shared with the Departments)

The University aims to maintain and to further foster a simulating environment that is research-focussed. In addition to those measures that each Department, pursuant to its own three-year plan, will be launching, UNIMI will bolster further measures to foster, fund, and spark scientific research. This will be done through earmarked funds, as well as by shoring up the human resources allocated to research support in the Departments, and in the central structures (Department research-reference network; UNIGEST and OfficinaH2020).

Pursuant to the new algorithm for the distribution of staffing points which contemplates, amongst other performance indicators, the meeting of ASN (National Science Certification) targets by each instructor and researcher, a University-wide objective shared by the Departments will be to spur the entire faculty to attain or to continue with high-quality scientific production.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
R1 indicator of the algorithm implemented to distribute staffing points: meeting two out of three ASN targets in one's own role, applicable to all positions except RTDA, RTDB, and RU (1 out of 3)	More than 90% of professors and researchers
Resources allocated by the University to promote researcher competitiveness	Allocation of at least Euro 14 million

## Bolstering researcher competitiveness, promoting networking amongst various scientific areas

On an international level, research is predicated on competitive mechanisms that lead Universities to vie both for grants as well as for top researchers. Despite the high potential, and the support provided by Research Services Management Office, some areas and departments still have room to grow in terms of writing international grants. The introduction of internal-funding mechanisms can stimulate the pooling of talent within the University in order to then submit applications for external grants. By the same token, support and incentive measures for the individual scientists facing the daunting task of writing highly competitive EC grants, including ERC and Synergy grants.

Implementation steps:

- Issuance of University-wide calls: to that end, the SEED grant programme will be fortified in the coming years.
- Bolstering support tools (transition grants) for individuals undertaking ERC projects (who were invited to interview, but not awarded grant funding) or in other European projects;
- Inclusion of a provision (in contracts with other entities) that grants written by, and awarded to, UNIMI as host institution must be supported.

Research

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
No. of grants written for external competitions seeded by a transition grant	At least 50% of the transition-grant award winners will write an external grant

## Attracting the most competitive scientists and scholars

The issue of human resources for research is an important one, just as with funding. The outgoing flow of researchers from the University toward other research entities in Italy and internationally must be better offset by the draw of top-notch scientists to the University. Bolstering the tools and means to promote direct calls for applications is necessary, along with steps to facilitate the onboarding of new scientists into the very fabric of the University and the city (including through service packets funded with internal resources, or in partnership with institutions in Milan (Cariplo Foundation, businesses). Our intent is to increase the University's appeal for outside scientists, through efforts including a University policy aimed at attracting outside research talent. Implementation steps:

- Creating awards for Departments which are ERC and Rita Levi Montalcini grant winners;
- Institution of an inter-office task force for hiring, welcoming, and supporting recruited researchers.

TARGETS FOR THE THREE-YEAR PERIOD
+9 recruits

Strategic Plan 2020-2022 Research

# Implementing the use of UNITECH and departmental / institutional use of new, low-cost platforms for interdisciplinary projects

The existing UNITECHs are cutting-edge technology platforms born out of the need to facilitate interactions amongst the various research sectors, and to bolster both University competitiveness (nationally and internationally) as well as its ability to attract outside resources in order to make research activities self-sustaining. We need to encourage use of the platforms, through efforts including raising awareness amongst the University community of their potential, and more generally the departmental tools for inter- and multi-disciplinary projects, whilst at the same time optimising and pooling existing human, technical, and logistical resources to create other low-cost, shared platforms. Implementation steps:

- Promoting the use of UNITECH platforms and University tools;
- Supporting existing UNITECH and the technological updating of the same, including through investments in application, training, and human resources.
- Introducing assessment measures for high-value technology tools within the Departments, including through aggregation, and by making clusters of instruments available.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Number of funded interdisciplinary SEED projects that use UNITECH.	At least 8

# Implementing instruments pursuant to international-level best practices for research quality and Open Science

(objective shared with the Departments)

The University of Milan subscribes to the standards of the Declaration of Berlin for open access to scientific literature, and the Declaration of San Francisco on process transparency, and research-assessment criteria and indicators. The University further believes full access to research data pursuant to FAIR standards to be an unwavering goal in order for results to be replicated. For this reason, the University will maintain its commitment to programming and activities that promote and support open data and publications, both in terms of a "green" as well as in terms of a "gold" and "diamond" model. To that end, and in collaboration with the Open Access Committee, the University has set aside one third of the places to PhD students and fellows (with up to Euro 1,500 available to cover the costs of publication) and one third to researchers (with 80% of all publication expenses covered, up to Euro 1,500), and one third to PO without grant funding (up to 60% of publication costs covered, up to Euro 1,500). The University will further bolster actions to support data management under the FAIR model, along with the other operations in support of the Data Management Plan.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Percentage of Open Access (gold and green) publications over the yearly total	65% of open publications over total publications

## Bolstering scheduling / monitoring abilities within the departments

(QA objective)

The University analyses research and University Innovation and Community Leadership both at a University level as well as at a Department level. An especially relevant function in that regard is the monitoring of the Departments' Three-year plan, in existence since 2018. As part of the launch of the 2020-2022 strategic-planning programme, monitoring will take place quarterly, and then once per semester beginning in 2021.

Monitoring must be seen as an opportunity to consider Departmental performance at the activity level, and to take corrective steps if and when needed. Furthermore, we need to take note of any intervening changes during the period in question which might prompt an update or remodulation of the objectives undertaken. In keeping with University programming, Department-level planning must likewise have a dynamic quality. It must become, increasingly, an effective tool for guiding and coordinating department activities. Therefore, well-founded updates to the plan must be considered physiological, and the mark of programming which is both dynamic and reactive to environmental stimuli.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Routine monitoring by the Departments of the three-year plan	90% of deadlines met (calculated across 33 UNIMI departments)

# Third Mission (University Innovation and Community Leadership) and Technology Transfer

University Innovation and Community Leadership is the set of activities through which the University enters into direct contact with society, planing an active and entrepreneurial role. Essentially, it means positioning oneself as a cultural engine for the region, and for one's own community, promoting dialogue and interaction with the citizenry, and both public and private institutions in the service of a path towards innovation for an open and sustainable society.

Unlike research and teaching activities, which are the institutional duty of each and every instructor and researcher, University Innovation and Community Leadership is an institutional call which each University will heed in a different way, as its resources and disciplinary areas allow. The University carries out these activities as a means of deploying research (management of intellectual property, spin-offs, commissioned projects, brokering entities), as well as the production of public assets (managing cultural heritage and events, public-health activities, lifetime learning and public engagement).

The management, centralised monitoring, and the implementation of this "third mission", as diversified as it is within a University with as staunch an inter-disciplinary approach as UNIMI has, presents heightened complexity and difficulty. Therefore, including with respect to the growing importance assumed by these

increasing need not only for knowledge transfer, but for accountability to the public at large, the University has identified four prevailing strategic objectives on which to concentrate its efforts in the short-to-medium term.

To that end, the University has passed a resolution to activate and implement a Deployment of Intellectual Property and Innovation Division, tasked with all cultural and social events, and for the economic deployment of knowledge. In addition to new forms of internal organisation, special attention will be paid to the use of instruments equipped with that agility and efficacy indispensable to both deploying and transferring knowledge to civil society, tools which are more streamlined than university ones (UNIMI Foundation System)

## The Civic University

The social management of knowledge must permeate every activity within the University. It must constitute one of its central functions, and be a source of innovation for the University, one able to spark reflection, decisions, and ultimately actions, in order to attain development which is both sustainable and competitive. This must take place through the effective and productive use of one's knowledge, experience, capabilities, and resources, a process that can only happen by implementing a new level of social responsibility within the University. UNIMI must sponsor actions which, thanks to input from society, help to generate public assets which are social, developmental, or cultural in nature.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Number of University or Department events/ activities for the promotion of science and culture	+20% events compared to the initial value

### Deploying and transferring knowledge

For research findings to be deployed, including with respect to their economic exploitation, it is essential that the process of deploying University patents, and the promotion/fostering of new knowledge-based businesses (university and academic spin-offs) be provided proper support. To that end, a structural synergy must be promoted with the "technology-transfer system" and with the UNIMI Foundation in order to allow for, and indeed to facilitate, the meeting of research supply and demand within the region. As part of University Innovation and Community Leadership, it is crucial that we create a dynamic nexus with those key economic players. We must develop the University's ability to shore up and cultivate an entrepreneurial spirit, and a civic-minding "economic and social deployment" of research, whether in the sciences or the humanities. These efforts will be carried out in cooperation with private entities through the UNIMI Foundation system. In implementation of the Foundation's new industrial plan, the goal of optimising technology-transfer operations will be closely linked to the process of integrating the functions of support to researchers within the University, and the activities of the UNIMI Foundation, which should not be viewed as an outside entity, but rather one that generates services of value for the academic community itself.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Absolute number of patents with a positive research-to-patent ratio per year	Increase the number of patents with a positive research-to-patent ratio

### **Engaging in dialogue with the economic** and social context

(objective shared with the Departments)

An unwavering objective for a major University, located in one of the most dynamic regions in Europe, is to foster lifetime learning, and to promote exchange networks with private and public institutions. To be able to develop this strategic objective, and to follow it through, one needs to develop robust relationships with the worlds of economics and finance, and the associations formed in support of the same. These efforts must include promoting and strengthening our alumni network. The goal is to build a network of companies and persons that offer up their own expertise in order to create sustainable business models. University Innovation and Community Leadership represents the bridge between the University and the business world. It must be the engine for reaffirming our respective responsibilities in education and production, in terms of how knowledge evolves and is added to, and how human capital is developed. Optimising our offerings in terms of post-graduate work, continuing education, and lifetime learning is one of the core directives for the University. A portion of our efforts will be plied toward creating the conditions to generate new, and to strengthen existing, opportunities in this arena. Finally, the University Innovation and Community Leadership Office, with the support of the UNIMI Foundation, could represent the ideal vehicle for promoting and managing lifetime-learning efforts in the community, through businesses, and within the population as a whole.

Third Mission (University Innovation and Community Leadership) and Technology Transfer

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Number of persons enrolled in Post- Graduate Courses, Continuing Education, and Lifetime Learning	+15% increased enrolment

## Strengthening how cultural heritage is safeguarded, promoted, and accessed

The promotion and dissemination of the University's vast cultural heritage (including through its scientific and technological evolution) is a primary objective for the University. We must ensure the conservation, safekeeping, ordering, exhibition, accretion, study, awareness, public enjoyment, and accessibility for our museums (including the botanical gardens), as well as our collections. This needs to take place through a variety of specific cataloguing, conservation, education, promotion, and research operations. Therefore, in addition to building a university museum system, and drafting an ad-hoc guide for each "product", we will have temporary and/or permanent museum installations and exhibits, and (thanks to the use of customised ICT technologies) a virtual museum to build capacity and access to UNIMI historical and cultural heritage. The goal will be reached through the proper training of interested personnel as well.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Launch of the Virtual Museum	Museum to be founded by 2022
Number of access to University Press publications	+ 10% increase in admissions

## Healthcare

The University plays a key role in the regional health system. In some respects, it plays a predominant role compared to the other six campuses in the Lombardy region that have a Faculty of Medicine. With its nearly 350 professors providing clinical services (with 152 in supervisory and strategic positions) in 23 healthcare facilities across Milan and the Region of Lombardy, half of which are designated IRCCS [Research Hospitals], the University of Milan contributes in a consistent way to the running of a top-quality healthcare system. The relationships with that system are even more intensive if one takes into account the teaching facilities (over 100) for the degree programmes and the postgraduate programmes. With a view toward constantly improving the quality of the education in the medical degree programmes, and post-graduate programmes, and because of that indispensable connection between the University's academic activities, and the hospitals and clinics of the Regional Health System where residencies and other professional experiences take place, the goal in terms of Healthcare Institutional Relations will be to fortify the institutional relationship with the Region of Lombardy and the various (public and private) hospitals and clinics which are already a part of the academic network, whilst at the same time reaffirming the University's institutional mission of teaching and research. In that respect, one of the primary objectives will be to execute a framework agreement with ASST and IRCCS that maintains, and in fact improves, the relationship between the hospitals and clinics identified by the Region of Lombardy as satellite campuses for the needs of the Degree Programmes. The policy for a hospital to develop as a satellite for a degree

programme must set a series of minimum academic elements, which should never infringe upon any business policy within the hospital.

Specifically, Operational Units (OU) which are functional to a degree programmes cannot be eliminated; tutors must always be in sufficient supply, and have adequate professional experience.

Amongst the objectives in this arena is following through on projects like the one already launched with the Aldo Pontremoli Department of Physics / Faculty of Science and Technology (producing a conference to present research activities and subsequent joint application for a regional research grant), to encourage exchanges amongst the various disciplines, to generate organic moments of debate, to exchange ideas on topics or research projects and to foster internal synergies which are so often sought outside the university, with little success, or with lesser results. The instructors of the Faculty of Medicine have for some time been involved in public engagement activities, in collaboration with NGOs in Italy and abroad, in international-cooperation programmes in Africa, Asia, and South America. These efforts include prevention and training operations undertaken in collaboration with volunteer associations.

Within the University Innovation and Community Leadership programme there are, furthermore, conferences and training opportunities for "lay persons", including lifetime learning, clinical trials, international cooperation, and programmes for working students.

Activities within the Faculty of Medicine will unfold, over the next few years, according to policy and strategic lines which we summarise below.

Strategic Plan 2020-2022 Healthcare

# Strengthening the English-language degree programme offerings in Med

In October 2019, a framework agreement was executed with Niguarda Hospital, so that it can become the anchor-hospital for the International Medical School (IMS), with the goal of launching the first professional-training activities by year's end. At the same time, the Niguarda Hospital will see the launch of an "academic and administrative office" under the auspices of the University in order to coordinate those activities. Over the next two years, at Niguarda, an area intended for the four-year clinical coursework in English will be created. With a number of classrooms spacious enough to accommodate 100 students each, we will be able to host a student population expected to grow steadily. We also need to work on instructional recruitment and/or placement at Niguarda, given these new academic needs.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Institution of the new IMS campus	Number of admission-test applications; Increase in the number of students/year requesting a transfer to the IMS Course.

# Strengthening the Italian-language degree programme offerings in Medicine

Over the next few years, the degree programme in Medicine will be subject to some major changes. The Degree Programmes must take into account the changing needs of healthcare and new understanding within the field, innovative educational options (laboratories to create virtual-reality libraries, 3D educational materials), as well as innovative professional training (simulation centre) as part of an overall digital-innovation overhaul. The goal will be to offer students the possibility of spending less time in the classroom, and more time in the halls of a hospital. Over the next few years, we must consider the option to consolidate the three current degree programmes into a single one, for reasons including the opportunities afforded by the new campus.

# Degree programme in Dentistry as a training programme for orthodontists ready to enter the workforce, and establishment of the new location

Within the established three-year timeframe, the new School of Dentistry is set to be completed, and the new logistical setting where the Single-cycle Master's degree programme in Dentistry and Prosthetics will be located, along with a dental-hygienist Bachelor's degree programme, and three specialisation schools in dentistry, and finally the research labs connected to the same. That single location will need to be located, preferably, at one of the hospitals acting as a satellite campus. It must be agreed upon with the Region of Lombardy in light of the significant professional coursework to be undertaken (at both the post-graduate and pre-graduate stages). The ultimate goal is to provide new, modern academic and professional-training offerings in Dentistry, and moreover to render the single-cycle Master's degree in Dentistry and Prosthetics even more competitive, on a national level.

# Degree programme in Healthcare Professions: improving and streamlining education

It is perhaps in the healthcare-professions degree programmes that the nexus between academia and the healthcare system becomes, in some respects, even more powerful.

The University of Milan, with its Bachelor's Degree programmes and Master's degree programmes, represents a training hub at both a regional and a national level. Indeed, it is the only Italian university to have launched all healthcare degree programmes, including the Master's degree programmes. Bearing in mind the powerful inclination towards hospital work on which most professional healthcare training is based, the goal for the next three years must nevertheless be to complete our review of these programmes in order to optimise the quality of the training offered. This cannot come without adequate university engagement. The tactics to be used are as follows: increasing the university component for the various courses; reducing the number of contracts given to Regional Health Service instructors over SSD who do not contribute to professional development; decreasing, overall, the number of paid contracts as well as (if needed) shutting down certain courses, or consolidating them at a regional level.

We will also need to work on identifying general-education requirements for all Programmes, especially for pre-clinical programmes. Efforts will include amendments to regulations, and using innovative teaching methods.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Number of external contracts	-10%

# Post-graduate programmes as a training hub for well-trained specialists ready to join the workforce

The goal is to bolster the quality of the training offered in the Post-Graduate Medical and Healtl Sciences programmes. Those enrolled in these courses represent, for the Faculty of Medicine, veritable "asset". After all, during their training, they are a direct conduit with the communit and the hospital system. With its instructors, and with the post-graduate students, the Universit of Milan represents the biggest "hospital" in Milan and in the Region. The number of contract for specialty-medical training assigned by MIUR has been on the rise over the past few years In the most recent competitive-hiring process alone, 550 contracts amongst the 47 curren schools (for a total, over 4-5 years, of more than 2000 medical students training to become specialists) were awarded. In the immediate future, the University must vest itself with a quality control system (the software purchase is currently pending) for the Specialisation Schools (a contemplated under Law-Decree no. 402/2017). This system will allow for an online course register for the student to be generated, in which they can have their clinical practice and acquired skills validated. An even more interesting front for the Post-Graduate Programme is the project launched with the Region of Lombardy and the Region of Lombardy's Observatory or Specialist Physician Training, to ensure that a physician-in-training be ensured the possibility of increasing levels of responsibility and autonomy through a "defined and protected path within the university". This means that the specialist-in-training will be put in a position to perforn certain medical tasks independently. These will be monitored, whether in-person or remotely by the student's own tutor. In this way, the specialist-in-training will have the option not only to implement the provisions of Law-Decree no. 402/2017, but also the opportunity to begin to carry out, in an independent manner, those activities which all too often are thrust upon then the first day after graduation. Specifically, the Post-Graduate Programmes must vest themselve with detailed handbooks (standardised at the regional level) in which specialists-in-training an given a means of sequential levels of autonomy in clinical practice.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Number of specialists-in-training who will complete the online student register to validate their clinical practice, and the skills they have acquired	A third of the specialists-in-training

2		
h		
a cy cy ts ss.		
e /-		
r as d d e		
n of n		
m y, ly o m		
m es re		

# Organisation, reducing red tape, rights, and transparency

The Administration must manage its resources in a streamlined and efficient manner. These include: human, economic, financial, and capital resources. The Administration must develop its capacity to generate innovative projects, better matched to the needs and expectations of stakeholder both within, and outside, the institution. To that end, over the course of 2019 an ambitious reorganisation project was launched (set to become fully operational in 2020), based on a means of optimising a more transversal approach to setting strategies and processes across various functions, and to overcome a top-down-only model within the chain of command.

223

The reorganisation process is taking shape gradually. The component involving infrastructure of the Central Administration is already complete.

On the other hand, the departmental component will become fully operational by the end of 2020, with the implementation of the "network system", an organisational model which contemplates "embedding" certain professionals from Central Administration into the department offices, tasked with quality management and assessment for certain essential University-wide functions.

Some of the hallmarks of this new organisation models are:

 greater autonomy for work teams, with ongoing collaboration among them;

- a faster, more effective, and more efficient processing of user requests, whether from inside or outside the University;
- greater interaction and transversality amongst various sectors.
- improving the quality of interactions between centralised and decentralised components.

During the first few months of 2020, with the advent of the Covid-19 crisis, the University Administration – in compliance with evolving emergency legislation at the national level – needed to take action in order to ensure continuity of service. Specifically, the University began utilising flex-work options, including telework and smart working. To respond to these flex-work requirements, and in light of the epidemiological emergency, infrastructure and tech support for online learning were quickly implemented. For all urgent, non-deferrable operations needing to take place in person, proper security measures were put into place.

Certain strategic objectives set prior to the public-health emergency fell into this category.

To these were added the content of the Three-Year Building Plan, which in point of fact had already directed its efforts – with a sizeable economic investment – to bolstering the technological services available in the classroom, in the libraries, and in various arenas in which the Administration operates.

# Pledging quality standards for services rendered, and providing these to users

(QA objective)

The quality of both services and administrative action is a parameter of fundamental importance, not only for assessing the organisation, but also the merit of the organisation's executives and staff, who by now see their own work recognised on such bases. The centrality, and the strategic relevance of Quality Policies with respect to setting strategy and objectives for intervening in various arenas within the academic context has already been subject to analysis in the "2018-2023 Planning and development document" generated pursuant to Art. 25, paragraph 1, subpart (a) of the University's Articles, and approved by the Management Board on 26/02/2019. The University's Administration intends to equip with a structured quality-management system to apply to administrative and management processes, in accordance with national and international standards. The Quality-Management System, which conforms to UNI ISO 9001 standards, identifies those tools needed to reach the stated goals, and to strive for ongoing improvement of administrative action, for the purpose of ensuring increasingly high performance levels, which meet the expectations of all users, and such that satisfaction might be gradually raised with respect to the various services offered. To that end, suitable initiatives aiming to raise awareness amongst executives and technical/administrative staff on process-quality issues must be undertaken. This would be done in part to assess their competencies, thereby raising the bar on the quality of the results achieved through administrative action. The final result of that policy will be to set a University Charter of Services which, along with the Charter of Services for each unit or office (relating to the various administrative and management policies) will constitute a means of guaranteeing the guality of the administrative services offered, improving trust with each type of user.

The Charter will constitute a reference for the quality of services provided by the University, and by the individual departmental and other units. It will be a kind of "pact with our users", paving the way for the implementation of objective self-assessments on performance at the departmental or office level. This will in turn foster a culture of accountability and awareness.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Implementation of a University Charter of Services	Achievement within three years

## Organic review of the IT services system for a simpler and more modern university capable of ensuring remote service delivery

Aspects tied to IT and telecommunications play a central role, in that they constitute a facilitating and/or enabling element for any number of the challenges this University is set to face. As stated in the introduction to this Strategic Plan, IT innovation is an issue in which the University is already investing, to leverage it for the purpose of introducing innovative-learning techniques and to remove red tape (Introduction § 2.2 - Objectives). In a general sense, references to IT are peppered across this Plan.

All of this has come to the fore because of the Covid-19 emergency. For further information, please consult the report generated by the University Governance unit, which describes every step taken by UNIMI during the Covid-19 pandemic.

From an organisational point of view, the IT situation within the University varies widely. Central administration generally relies on the Information Systems and Telecommunications Management Office, recently born of the merger between the Information Systems Management Office and the Telecommunications Division for the University. The goal was to harness the natural synergies and potential resource optimisation between these two sectors. On the other hand, the Departments (which historically have enjoyed a great deal of autonomy) are difficult to pin down in terms of a coordinated vision of IT planning efforts. This has, over time, led to a rather hit-or-miss situation, often tied to the (perhaps temporary) availability of specialised IT staff acting as the IT Director for the Department in question. The result is a situation in which a number of disparate technological choices and plans have proliferated, with either partial or total redundancies amongst them.

Organisation, removing red tape, rights, and transparency

The need to rethink how IT services were organised, in order to move towards a centralisation of the ICT responsibilities already active within the system, became evident following the public-health crisis. In just a few short hours, the University was called upon to implement IT solutions that would allow for its work to continue, uninterrupted, remotely.

The public-health emergency meant that IT would be positioned in an even more central role in University functions. Consequently, the need to provide technical support and supervision to an increasing number of users was required: not only did the number of users increase, but so did the traffic and storage needs, in a somewhat exponential way, especially during certain peak times.

The creation of an SPOC (Single Point of Contact) will be a further step toward creating a high-quality technical-support service, in which problem-solving and managing new needs as they arise will be governed by standard operating procedures, and monitored in terms of predetermined service levels.

Following the sudden need to utilise IT to deliver educational programming, the University established a SPOC dedicated to these issues, in the form of a series of webpages with manuals, a dedicated email address, and a hotline number. The wisdom of the choice, both in the shortand in the medium- and long-term (encompassing broader issues as well), was borne out by the efficacy and positive feedback of this service.

Important ripple effects may be generated with respect to digitisation, to shoring up management tools for the integrated management of objectives and budgets in support of the decision-making process, and the streamlining and reduction of red tape as between University Administration and Departments, the access to infrastructure for macro-calculations, and fostering collaborations with outsourced professionals in order to provide innovative and remote learning options.

Administrative procedures, managed digitally, will allow for new means of communication and interaction with our user base, plus the option to control every phase of the document-management cycle properly (from document creation/acquisition until its final filing). This will also allow us to manage all document-review compliance (validations, approvals, reviews, signatures, etc.) properly.

Further activities to which attention will be paid to integrate and improve IT services are as follows:

Ulteriori attività su cui sarà posta attenzione per integrare e migliorare i servizi informatici saranno:

- launching a data centre for the digital storage of administrative and research data, and digitalised files;
- coordination of the digitalisation of materials in University collections;
- supporting the design and development of the virtualisation of the University's Museum System (see the objective identified in the section on University Innovation and Community Leadership).

At the end of the current crisis, a new path will be taken to establish an overall development plan for IT services and personnel, facilitated by a series of preliminary steps, including organisational modifications, undertaken during the 2020-2021 year.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Activation of a regional network, a SPOC, the data centre, and coordination of dematerialisation and digitisation efforts	Launching the programmes within the three-year period

## At the forefront of legality and transparency (QA objective)

The focus on lawfulness and transparency cannot, in an academic and scholarly community like UNIMI, be understood as mere compliance, or worse, being yoked to a series of laws and regulations often seen to ill-accord with the specific needs of the modern university. For this reason, in the future, the University will need first and foremost to raise awareness and commitment to following the rules from amongst the faculty, staff, and students. Compliance with the rules, and transparency in how one conducts one's work, in fact, should not only be considered a duty: they should become one of the defining characteristics of membership in an academic community. With its skills on both the scientific and administrative/organisational front, UNIMI plans to become a role model in terms of institutional relations at the regional and national level. The idea is to tackle the themes and issues that are part of conceiving and implementing laws on anti-corruption and transparency, whilst promoting and supervising the implementation of best practices. A significant objective is this regard is the institution, over the next three years, of a standing regional roundtable which brings together the local institutions, the other universities in the Region of Lombardy, and stakeholder representatives.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Founding a standing roundtable with the Municipality and the Region	Going live with the table within three years

## Inclusive UNIMI

(QA objective)

An inclusive community need not only dedicate ample space (as is already the case within UNIMI) to the study of subject areas involving fundamental rights, anti-discrimination, gender and disability studies. It must also implement concrete actions which specifically aim to overcome those differences, whether of gender, disability, culture, race, or sexual orientation. For this reason, in the future, the trend will be to delve even further into what is already being explained by instructors, and the ways in which, from the inside out, we might implement standards to ensure equal rights at all levels and across all roles (faculty, staff, students).

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Publication of the Report on Gender	Publication in accordance with guidelines suggested by CRUI
Development of disability and DSA programmes	Creation of a dense network of contact persons within the Departments, and programmes to educate and raise awareness amongst the faculty in terms of disabilities and DSA

## **Optimising internal and external communication**

The field of Institutional Communication, as it unfolds through various channels on the website, through internal communication, on social media, and through media relations, faces challenges today which add to the growing complexity of a large, public, multi-disciplinary University with locations across the region, in terms of the profound transformations of the new media ecosystem. The central strategic objective in this regard is the need to set rules for communication, that is, to manage it in a way that meets standards in terms of programming, pro-action, and well-thought-out integration of the various (distinct, but necessarily coordinated) aspects that define it. We must engage resources and creativity in a reasonable way in order to disseminate the University's objectives in terms of development, with a focus on building a common identity, and avoiding any special interest, discordances in conveying a unified image, and losses of efficiency. These objectives must be followed without dampening the multiplicity of voices present on campus. Quite the contrary: their contributions must be celebrated with a view toward fostering relationships and a sense of belonging.

The extraordinary changes in terms of the media system, the nearly unlimited proliferation of the sources of information produced by Web 2.0, the inevitable information overload afflicting the public, which in the meantime has become both producer and user, call upon the University to reinforce the impact and efficacy of its own message, and to inaugurate new types of relationships with all its stakeholders, setting aside self-aggrandising rhetoric, and opting instead for placing the user and his or her needs front and centre. Amongst the tools needed in this context, and to be further developed, are the following: an analysis of the current communication ecosystem; a clearer functional distinction between channels of communication, the drafting of publishing plans and policies for web, social media, and media relationship, implementation of structures and processes to oversee risk management and crisis communications. The work of streamlining and systems-engineering is to be shouldered by all departments and offices within the University, including through staff training. What will be strategic at this phase, and something to reinforce, is in fact the issue of internal communication. By this we mean the design of actions that promote collaboration amongst the offices and departments, the sharing of common values, and raising awareness amongst the community in terms of the impact of each individual act of communication. Within this context, everyone in the system needs to adhere to the visual branding already available through the site. Amongst the various communication-performance-monitoring systems, the ones that promote engagement and impact should be prioritised.

These same channels of communication furthermore represent strategic environments for listening to, and soliciting feedback from, our users. The analysis of external perception (especially that of students) is fundamental for a reputational analysis. It is also important in

terms of recalibrating instruments and strategies with a view toward continually improving the services we perform, and may indeed include online-reputation analyses, surveys, analysis of the content posted to social media, and sentiment analysis in some form.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Website: bounce rate	-6%
The University's presence in the media and (AVE) (the meaning of the finding should be correlated to the magnitude, including numeric value, of the initiatives sponsored for University Innovation and Community Leadership, and producing scientific research)	+5%

## Sustainability

(QA objective)

The University has made a strong commitment to environmental sustainability in terms of reducing plastic, recycling, energy savings, sustainable mobility, which comes in part from specific planning documents (e.g. Energy Plan, Three Year Building Plan, Minerva 2030) and from the suggestions of the University Network for Sustainable Development (RUS). A deputy for sustainable development has been appointed by the University, and working groups have been established and tasked with specific actions. Specifically, in the years to come, the University will concentrate on a sequential and gradual reduction in the use of plastic, and specifically decreasing student reliance on plastic bottles by supplying aluminium bottles, and on implementing the water kiosks and refill stations at various points on campus. The University is likewise engaged in raising awareness on environmental sustainability issues directly within the curriculum, and promoting initiatives for such purposes.

PERFORMANCE INDICATORS	TARGETS FOR THE THREE-YEAR PERIOD
Litres of water distributed by the water kiosks and refill stations, and their conversion into number of plastic water bottles saved	Doubling the equivalent in 1/2 litre bottles saved

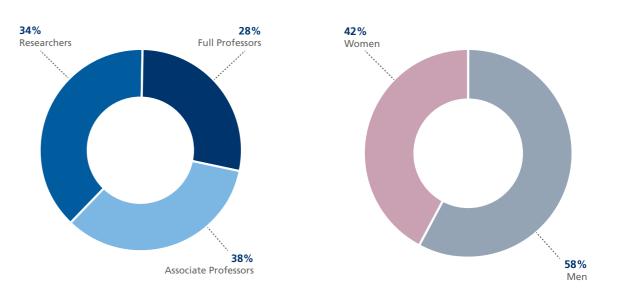


# The University in Numbers

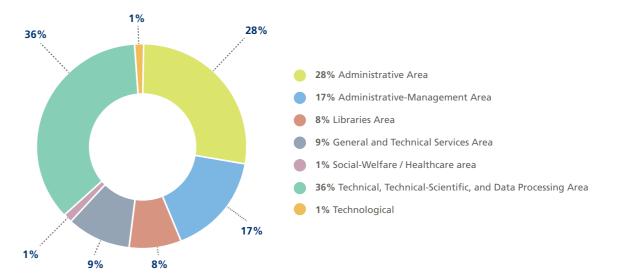
## The community

## People

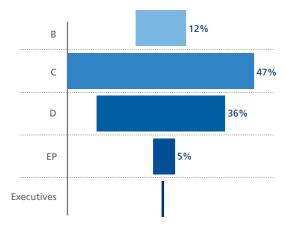
Teaching faculty and personnel at 31/12/2019 2,142

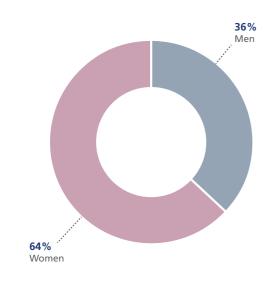


Technical and administrative staff at 31/12/2019: 1,943



#### Personnel categories

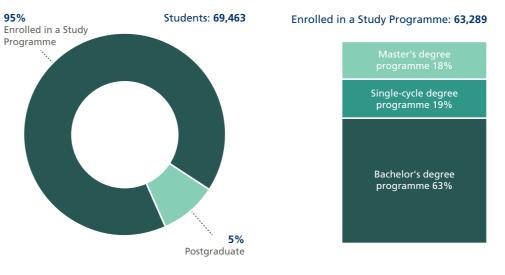




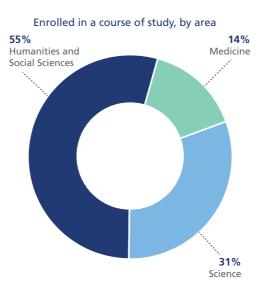
Appendix

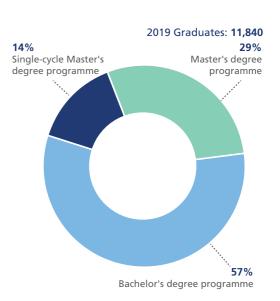
#### Students enrolled in the 2019-2020 academic year graduating in 2019:

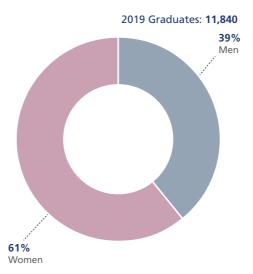
- 14,881 enrolled in a course of study, of which 60% women
- 69,463 enrolled in a degree programme or postgraduate programme
- **11,840** graduates (2019)











Strategic Plan 2020-2022 Appendix

#### Campus facilities and organisational units

60 locations with over 450,000 m<sup>2</sup> in real-estate holdings, including:

- over **65,000 m²** for research laboratories
- over **9,000 m²** for instructional laboratories
- over **50,000 m²** in classroom spaces

#### **33** Departments

**10** Faculties/Schools

15 Administrative offices

#### The University Library System (2019)

#### 17 libraries:

- over **3,600** in seating capacity and **7,200** in average daily traffic
- 1.8 milioni in printed books and 27,000 hard-copy periodicals
- over **130,000** loans and over **200,000** books and periodicals consulted in 2019

#### **Digital Library:**

- 220 databases
- electronic periodicals: over 36,000 by subscription and over 49,000 select open-access periodicals; over 2 milioni articles downloaded in 2019
- over **500,000** e-books, over **450,000** chapters downloaded in 2019

#### **Academics and Student Services**

#### Academics: courses offered during the 2020-21 Academic Year

- **77** Single-cycle degree programme
- **64** Master's degrees
- **32** Doctoral programmes
- **75+** Master's and advanced coursework
- **69** Specialisation programmes

#### The international side of teaching

As part of its course offerings, the University offers 23 English-language course tracks and 4 course tracks with one curriculum in English; there are 21 joint/double degrees available. Furthermore, the University is part of the 4EU+ European University Alliance together with other five public European Universities: Charles University in Prague, the Sorbonne in Paris, and the Universities of Heidelberg, Copenhagen, and Warsaw.

#### In 2019-20:

- 4,596 (7.2%) international students enrolled in a course of study;
- **740** incoming exchange students (Erasmus, Erasmus Placement, Mundus, Science without Borders)
- **1,280** outgoing exchange students (Erasmus+ studio, Erasmus+ Traineeship, thesis study-abroad programmes, Stream, Exchange, Double Degrees)
- over **1,200** international agreements for studying abroad and earning dual degrees

#### The right to an education 2019-20

- **5,000** Regional "Right to an Education" scholarships
- **750** University service scholarships
- **160** University merit scholarships
- 50 new "Excellence" scholarships for international students enrolled in Master's degrees

#### 2020-2021 Student Housing

**1,088** sleeping spaces, with the possibility of allocating 797 places \* broken down as follows:

- 598 for "right to an education" recipients
- 150 for incoming Erasmus students
- 24 for international students of which some reserved to refugees, and other for doctoral students
- 11 instructor residence halls
- 14 student residence halls
- \* due to the health emergency it has been necessary to assigning double rooms for single use

#### **Cafeterias**

- Nearly 300,000 meals provided in 2019, of which 225,000 to scholarship recipients
- 8 indirectly managed cafeterias
- 30 in-network snack bars and cafés

#### **2019 Orientation Programmes**

- **24,104** orientation activities participants (area meetings, University Open Days, Welcome Day for international students, school-specific orientation, new-student welcome)
- **3,000** participants in a working-student programme as part of **26** projects coordinated by COSP [University Study and Career Guidance Service] with **115** networked schools

#### **2019 Job Orientation**

- 4,700 participants at meetings, seminars, job-orientation laboratories, and Recruiting Day
- over **70** businesses, professionals, and associations involved
- over **3,000** participants at the University Job Fair which involved **106** companies, with **11,888** job interviews carried out

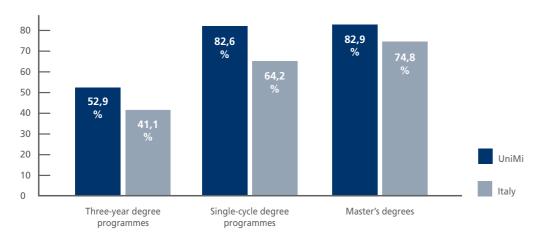
#### **Job-Placement Operations in 2019**

- 18.678 companies registered on the CV Bank of which 2,871 were newly accredited businesses
- **73,439** curriculum vitae postings
- 28,518 curriculum vitae downloaded by registered companies
- 10,126 requests for posting adverts to the job board, of which 94% were published
- **52,193** job applications submitted by University students and graduates

#### Graduate employment one year after graduation

(ISTAT definition of workforce)



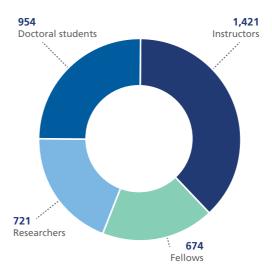


Appendix

#### Research

The University of Milan is the only Italian University to join LERU, the League of the European Research Universities.

#### People (at 31/12/2019): 3,770



#### **Facilities and Departments**

- 33 Departments (of which 8 "Departments of Excellence")
- 53 Coordinated Research Centres (CRC)
- 4 "UNITECH" Technology Platforms (COSPECT, INDACO, NOLIMITS, OMICs): latest-generation equipment used by research groups University-wide

#### 2015-19 Publications

- # of publications: **54,451**, of which **36% open access** (source: AIR)
- over **50 University open access scientific journals** on the Open Journal System
- Field-Weighted Citation Impact: 1.67 (source: SCIVAL)
- Outputs in Top Citation Percentiles<sup>1</sup> 2014-18: **19.9%** (source: SCIVAL)
- International Collaboration<sup>2</sup>: **45.2%** (source: SCIVAL)

<sup>&</sup>lt;sup>1</sup> Publications in top 10% most cited worldwide <sup>2</sup> Publications co-authored with institutions in other countries

Ranking 2019	Italy	World
ARWU	3	179
QS	7	302
THE-WUR	8	337
Leiden*	5	179

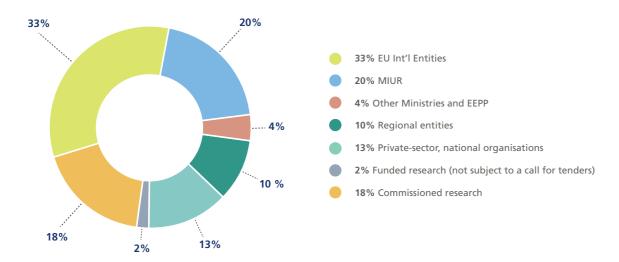
<sup>\*</sup> Parametri: all sciences, scientific impact, P (top 10%), Calculate impact indicators using fractional counting.

Strategic Plan 2020-2022 Appendix

#### **Research Funding 2017-2019**

- 823 funded research projects (of which 144 funded by the EU and by international entities)
- **1,096** commissioned research contracts

#### Total research funding 2017-2019 €142.7 mil



#### **EU Funding (2014-2019)**

Horizon 2020: 122 funded projects of which 27 ERC Projects (for a total of €75.2 mil) and 10 projects at an advanced stage of negotiations.

#### **ERC** directed calls

**Since 2011**, the University of Milan has launched:

- 5 directed calls from an associate professor for the winners of ERC Starting and Consolidator at the University of Milan who were not yet in that position;
- 14 directed calls from an associate professor and ordinary professor for winners of ERC hosted by other Italian and international entities welcomed through the portability mechanism.

#### **Archaeological Digs**

In 2019, €300,000 was allocated for digs at 15 archaeological sites: Acilia (Rome), Calvatone (CR), Caverna Generosa - Val d'Intelvi (CO), Colombare di Negrar (VR), Desenzano del Garda/Lonato (BS) Gravina in Puglia (BA), Monte Zara (loc. Is Obias), Nora (CA), Erbil Plain – Iraqi Kurdistan, Selinunte (TP), Tarquinia (VT), Tebtynis (Umm-el-Breigat – Egypt), Terramara S. Rosa di Poviglio (RE), Travo S. Andrea (PC), West Aswan – Egypt).

## Third Mission and Technology Transfer

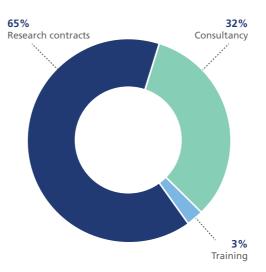
#### Patents and spin-offs

- approximately 300 patents filed since 1992
- 12 active spin-offs (2020)

#### 2017-2019 commissioned research

• 1,096 commissioned research contracts

Total commissioned research funding 2017-2019: €25,4 mil



Concept: Università degli Studi di Milano

*Graphic design:* Andrea Rovatti *Artwork:* Lara Angonese

October 2020