

Higher Education in Management: The Case of Portugal

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Introduction

Formal management education started in Portugal by 1759 when the Board of Trade, with the support of the Prime Minister, Marquis of Pombal, founded the School of Commerce in Lisbon. ISEG Lisbon School of Economics and Management, Universidade de Lisboa (ISEG Lisbon University) actually integrated in the University of Lisbon, is the heir of this eighteenth-century venture.

The present structure of higher education (HE) in Portugal was revised and established in 1977. Two types of institutions offer management education—universities and polytechnics. There are four different legal statuses for those institutions—public, private institutions, cooperative institutions and the Catholic University. Until the 1980s, management

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education had been confined to public Institutions and the Catholic University as a result of the concordat signed with the Holy See on the May 7, 1940 and revised on May 24, 2004.

During the 1980s, government policy on HE generated an expansion of public institutions in size and number, spreading institutions all over the country, and the private sector was also allowed to participate in this expansion.

The present situation is substantially different from that decade. The national demand for academic education is expected to decline, considering the ageing of the population, which has already been occurring during the last seven years (Table 11.1).

This is a threat for higher education institutions (HEI) that are less competitive. Some private universities have already been closed and several public institutions, in our view, need new business approaches and restructuring to positioning themselves differently and ensure their sustainability, attracting more national and international students and being more cost effective.

The market share for undergraduate management studies is 53 % for public universities, 20 % for public polytechnics, 24 % for private universities and 3 % for private polytechnics.

At the master's level, public institutions are even more prominent, with 76 % of market share, while the private sector account for 10 % and the Catholic University 14 %.

These market shares reflect the fact that public universities and the Catholic University have better reputations and perceived quality, which may also explain the lower percentage of management students doing master's degrees in the private sector. Reputation may also explain

Table 11.1 Evolution of the number of students in bachelor degree programmes in management and economics

	2006/2007	2013/2014	CAGR
Economics	6,827	4,646	–5 %
Management	11,566	9404	–3 %
Economics & management	18,393	14,050	–4 %

Source: <http://www.dges.mec.pt/>

the high ratio of demand to offers (95.8 %)¹ at public universities in comparison to public polytechnics (65.4 %) or private universities (34.5 %) and private polytechnics (16.7 %), which may raise the issue of sustainability of some of the institutions with lower demand.

In 2009 there was an attempt to introduce public policy reform to public universities and polytechnics, giving them foundation status (equivalent to a private institution with a long-term contract with the state for providing public services) and an option to carry out voluntary mergers. However, so far only three institutions have adopted foundation status—University of Porto, University of Aveiro and the ISCTE-IUL (Superior Institute of Business and Labour Sciences)—and it was not until 2014 that the first merger occurred. The merger between the “Classic” University of Lisbon and the Technical University of Lisbon, adopting the name University of Lisbon (UL), had an immediate impact in the major international rankings (in Center for World University Rankings system the UL went from 278th to 257th position and in the Quacquarelli Symonds World University Ranking from 501st to 351st).

A recent movement of restructuring in the private sector is occurring with the entry of Laureate International Universities, a worldwide group of HEI based in USA, which is present in 28 countries that also offers online courses. After acquiring several small private HEI, this international group subsequently requested and obtained, in June 2013, university status, named as Universidade Europeia.

The Supply Side of Higher Education in Business

Universities are organized by various designations—faculties, schools or institutes. Management education is usually integrated within schools of economics and management that offer a range of academic management degrees, but polytechnics are not allowed to offer doctoral degrees. However, the present government has this issue under discussion. Besides

¹ Demand to offer ratio was calculated as the number of enrolments divided by number of “*numerus clausus*”.

After Bologna Agreement Implementation

Universities	Bachelor's degree	Master 90-120	Doctoral 180
	180		
Polytechnics	Bachelor's degree	Master 90-120	
	180		

Fig. 11.1 Structure of management degrees in Portugal

general degrees in economics and management (bachelor, master's and doctoral), business schools also offer specialized master's degrees, post-graduates and executive education on marketing management, banking and finance, strategic management, management information systems, human resources management, transport and logistics management, real estate management, sports management, actuarial sciences and others. Bachelor degrees offered by polytechnics related to management are more focused on commerce, accounting and taxation, hotel and restaurant management, marketing and advertising, transport and logistics management, and tourism and leisure.

In accordance with the Bologna convention, management education in Portugal has generally adopted the bachelor-master's-doctorate structure, as well as the corresponding number of ECTS per degree (30 ECTS is equivalent to a semester of study) (Fig. 11.1).

Main Suppliers of Management Education

The three major players in number of students in business education in Portugal are ISEG Lisbon School of Economics and Management (University of Lisbon), Nova School of Business and Economics (Nova University) and ISCTE-IUL. The second tier is formed by Porto University Faculty of Economics, Coimbra University—Faculty of Economics, Minho University—School of Economics and Management and Catholic University—School of Business and Economics (Lisbon).²

All of these schools are public, except the Catholic University.

²Catholic University has also a smaller business school in Porto.

Typical Programmes Offered

Undergraduate

The distribution of applicants to the various academic degrees has been more or less constant over the last few years. Management absorbs around 10 % of the total undergraduate students in the country and economics 5 %. The access to undergraduate studies is based on a national ranking of students. The average grade of candidates for management studies is quite good at 16 out of 20.

Each school has a *numerus clausus* for each undergraduate programme, and applications for the public system are run through a national competition. Foreign candidates are subject to similar requirements. Portugal has been very active in the European mobility programmes attracting students coming mainly from Spain, Italy, Switzerland, France, Belgium and UK.

While bachelor degree programmes are generally offered on a full-time basis, many of postgraduate and master's programmes are on a part-time basis in order to fit around professional duties. The distribution of students in management bachelors is as follows (Table 11.2).

It is worth noting that the majority of graduates in 2014 were women. The situation was the same with the number of enrolments (see Table 11.3).

Despite the number of schools and programmes, the largest eight schools attract 43 % of undergraduate students (Table 11.3). These seven schools and the Catholic University are known for their high standards of teaching, high quality of research, high marks in world rankings and are the most influential in economic and business activities in the country.

Table 11.2 Number of students in bachelor degree programmes in management in 2014

Management	Women %	Men %	Total
Polytechnics	58.2 %	41.8 %	2,121
Universities	53.3 %	46.7 %	7,283

Source: OCES- observatory of science and higher education, 2015

Table 11.3 Enrolment of undergraduate students in management by major players

Schools	Women	Men	Total	%
Nova School of Business and Economics	428	340	768	8.2 %
ISCTE-IUL	414	353	767	8.2 %
ISEG—Lisbon School of Economics & Management University of Lisbon	402	349	751	8.0 %
Porto University—Faculty of Economics	249	190	439	4.7 %
Coimbra University—Faculty of Economics	172	152	324	3.4 %
Minho University—School of Economics and Management	160	126	286	3.0 %
Sub-Total	1,825	1,510	3,335	35.5 %
Other schools	3,223	2,846	6,069	64.5 %
Total	5,048	4,356	9,404	100.0 %

Source: OCES—observatory of science and higher education, 2015

The three largest schools of economics and management are equivalent in number of management students. These figures evidence the level of concentration in Lisbon. Nova SBE, ISEG Lisbon University and ISCTE-IUL hold almost 25 % of the undergraduate management students.

Master's Programmes

There are 48 master's degree programmes in general management and specialized fields such as finance, marketing, information systems, human resources, operations and logistics, entrepreneurship, innovation and technology, health management, management of sports and international management.

In 2013–2014 there were 11,299 students in master's in management (9.6 % of total master's students). In comparison, in 2006/2007 there were approximately 2,000 master's students in management (8.5 % of total master's students). The reason for the increase of master's students was largely the Bologna process. From the perspective of students, the greater demand for master's degrees is seen as a response to the fact that the duration of the degree courses have been shortened from four or five years to 3 years due to the Bologna reforms.

Doctoral Programmes

According to the Directorate General of Education and Science Statistics (Direção Geral de Estatísticas da Educação e Ciência), the total number of students enrolled in doctoral programmes in management in 2014–2015 was 1,021. The market share of the public system in doctoral management programmes was 95 %. Management represents 5.3 % of all students in doctoral programmes. It is worth noting that universities are not compelled to offer formal courses in order to award a doctoral degree. Some schools award their doctoral degrees based exclusively on the discussion of a dissertation. In that case, a student may enrol in the degree as long as a qualified supervisor accepts his project and the school's scientific committee approves the research project.

The first formal doctoral programme in management was launched by ISEG Lisbon University in 2001, followed by ISCTE, and the Universities of Coimbra, Minho, Beira Interior and Lusíadas (this is a private university). Nova University has the ancient formal doctoral programme in economics. They subsequently launched a doctoral programme in finance and recently decided to merge both into a PhD in economics and finance.

Non-academic Courses and Executive Education

Three public universities (ISEG, ISCTE and Nova) and the Catholic University offer the majority of postgraduate programmes and executive training. Porto University has created the Porto Business School to offer executive education and an MBA, the latter of which is the most popular programme in the country. This segment of non-academic courses and executive education is very important for those five schools in terms of their revenue generation and reputations.

The other public higher education institutions (HEIs) have a very small market share in this segment and private HEIs have remained almost dedicated to academic studies, with very few exceptions. Private companies, including international consulting firms, also offer management training.

Tuition and Registration/Entry Fees

Portuguese law sets maximum tuition fees for undergraduate education and each school decides its own policy under these rules. In general, tuition fees of polytechnics are lower than those of universities (Table 11.4).

ISEG Lisbon University, Nova SBE, ISCTE-IUL and the universities of Coimbra and Aveiro are the most expensive, charging above €1,000 per year for their bachelor programme.

We did a survey on the pricing of MSc degrees from top business schools in Portugal ranging from €5,000 euros to €16,000. For the MBA, the Lisbon MBA is the most expensive programme (€36,000). According to the news, the class of 2016 is the most international ever with 45 % international students of 16 different nationalities. Other internationally accredited MBAs of equivalent quality in other prestigious business schools, but with lower levels of internationalization, are available from €17,000.

Top business schools price their doctoral programmes from €8,000 to €15,000.

Internationalization and Similar Trends

The previous analysis reveals that ISEG, ISCTE, NOVA SBE, Porto University, Catholica SBE and Minho University are the major players in management education. All these schools are implementing strategies for internationalization, attracting foreign students and contracting foreign professors. NOVA SBE adopted, English as the language for its academic programmes several years ago, while the other schools are delivering some programmes in English and others in Portuguese.

Table 11.4 Structure of fees in management higher education

Typical fees (€)	Bachelor (per year)	Master's (per programme)	PhD (per programme)
Min.	965	5,000	8,000
Max.	1,063	16,000	15,000

Current Development of Pedagogy

Most business schools offer generalist programmes in management (such as the MBA, the MSc or bachelor in management, PhD in management etc.) and also functional programmes (bachelor or MSc in finance, master's in marketing, PhD in economics and finance etc.) as well as industry-based programmes (master's in banking and insurance, master's in real estate etc.). They all offer open executive programmes as well as tailor-made ones.

Distance learning has not developed much yet. Universidade Aberta (Open University) is an exception, as this is a public university specialized in this segment. Some other universities have incipient experiences in blended learning.

Business Models of Business Schools and Their Sustainability

As previously mentioned, business schools are facing a potential reduction in the number of Portuguese applicants due to the ageing of the population. The largest and most competitive schools are looking to internationalization as they have the qualities required by international students. The Global Competitiveness Report 2015–2016 (World Economic Forum 2015), which provides an overview of the competitive performance of 140 economies, ranked Portugal 26th in the pillar of “higher education and training”.

Almost all universities and polytechnics have student residences, and others are investing in new ones. Between 1998 and 2013 the number of beds available increased by 48 %, however these beds cover only 4.8 % of students in public HEIs (Rodrigues and Heitor 2015). These beds are allotted to those students needing more financial support. There is a lucrative market in renting rooms and apartments for students. In Lisbon, Porto or Coimbra a room may cost €200–350 a month, while in Covilhã (Universidade da Beira Interior) or Braga (Minho University) the cost varies in the region of €120–150. It is easy to find a room through the internet or from advertisements published at the universities.

Public transport is quite good in most cities. Prices vary widely from city to city as does distance, but with less than €20 a month it is possible to get the appropriate transport to school.

In relation to meals, most schools report a monthly cost of €100–250, but it all depends on the student's lifestyle. All HEIs have canteens and lunchrooms for students that serve meals at reduced prices (€2.0–2.5).

Management Research

ISEG Lisbon University is leading research in terms of number of publications and citations, followed by the faculties of economics of Porto University and Nova SBE (Figs. 11.2 and 11.3). The second cluster includes the Universities of Minho and Coimbra. ISCTE, and the universities of Évora, Aveiro, Católica (in Lisbon and Porto) and Algarve are in the third cluster.

All these schools are renowned not only for the quality of their research but also for the quality of their faculty in teaching, number of new applicants admitted as their first choice, top-class infrastructure, well known alumni in business and government, robust and rigorous curricula, executive programmes and for executing studies for industry and government.

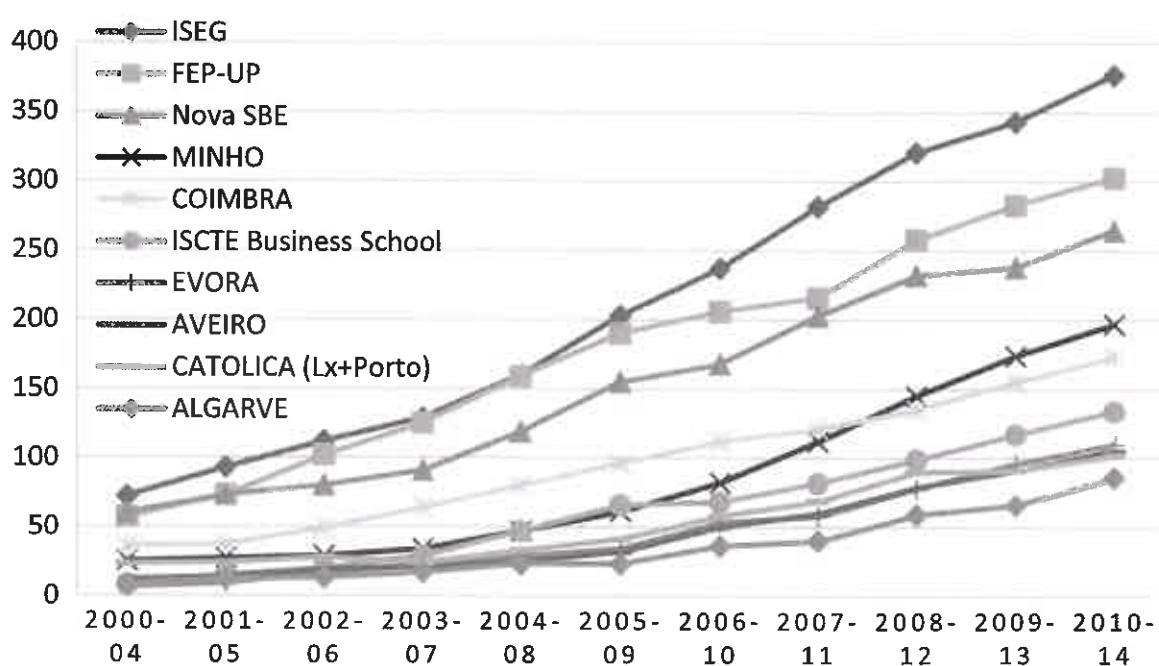


Fig. 11.2 Leading universities – number of publications

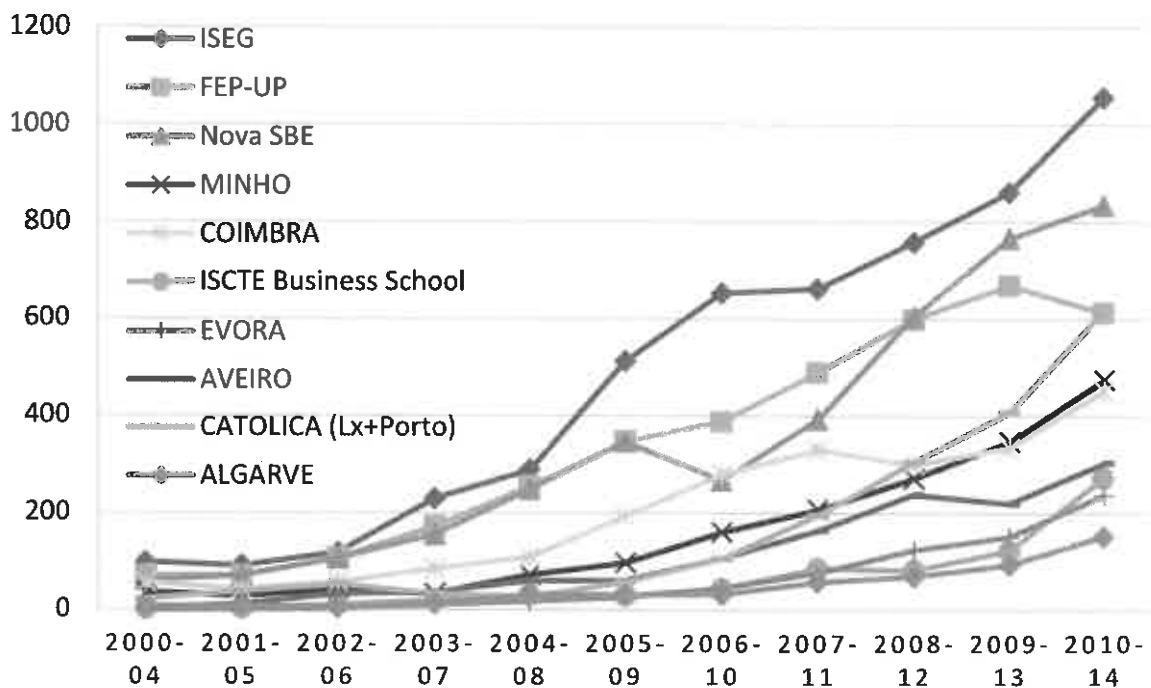


Fig. 11.3 Leading universities – number of citations

Faculty

PhD Requirements

PhD candidates need to hold a master's degree or equivalent. The selection process varies from school to school; schools with formal courses tend to require the presentation of a research project, evidence of research capabilities, an interest in academic life, recommendation letters and an interview. Formal courses usually occur during the first year, followed by two years of research and the writing of a dissertation.

The requirements for a PhD dissertation allow full dissertations or a dissertation in the form of three papers. Top business schools are encouraging students to follow the latter format.

The profile of candidates is typically split in two—students in full-time and professionals who are part-time.

Dissertations are subject to discussion by a panel appointed by the scientific council and the jury includes the rector (or someone delegated by him) and a minimum of four faculty members with doctoral degrees and a minimum of two people representing other business schools. The writing and the discussion of the thesis can be in Portuguese or English.

Faculty Career Development

The career of faculty members in universities has the following path and minimum requirements for entry:

- Trainee assistant—bachelor degree;
- Assistant—master's degree;
- Assistant professor—doctoral degree;
- Associate professor—doctoral degree and a minimum of five years' service in the area;
- Full Professor—aggregation and a minimum of three years' service in the category after the aggregation.

Aggregation is a special public assessment where a jury constituted by full professors from various universities evaluates the candidate based on his CV (publication is the most relevant criteria), a class session (written and a presentation) and the organization of a course (written and discussed).

It is possible to have permanent contracts at all levels of professorship depending on the CV evaluation, but it is only commonly occurs at the associate professor level.

Faculty careers in polytechnics follow a similar path, however with slightly less exigent requirements for progression.

Each school, depending on their needs and budget, may open vacancies for faculty placements. Career progression or recruitment in universities or polytechnics is decentralized to each school. They only have to comply with the law in the terms of announcements. One of the requirements is that all positions must be advertised publicly in Portuguese and English in order to give access to foreign professors.

There is still a slight gender inequality in the management faculties but it is approaching a 50/50 ratio:

	2001/2002	2006/2007	2013/2014
Women	40.8 %	43.2 %	44.4 %
Men	59.2 %	56.8 %	55.6 %

Source: <http://www.dgeec.mec.pt>

Most teachers are 40–49 years old.

Professors and associate professors represent, in 2014/2015, 70.4 % of the total faculty in the university sector, while coordinator professors and adjunct professors represent 65.5 % of the polytechnics' faculty. Of professors in public universities 69 % hold doctoral degrees while in private universities the figure is 54 %.

Evaluation of faculty members is mandatory and is considered *apropos* renewal of contracts or for career advancement. Each school must have an internal regulation approved by the scientific committee for this annual evaluation.

The gross annual salaries of teachers in the public system with exclusivity contracts are as follows, depending on their seniority in each level:

- Full professor: €60,085–69,572
- Associate professor: €46,761–60,085
- Assistant professor: €41,766–54,814

Professors wishing to do independent consulting or executive training may sign a non-exclusivity contract, with a reduction of one third of gross salary.

Remuneration in the polytechnics is almost equivalent to that in universities for most senior teachers in a given category. Those who have been in the category for less time may earn between 85 % and 90 % of those in the equivalent university category.

Personal tax rate varies from 10.5 % to 42 %, depending on annual gross salary, marital status, number of children and deductible expenses such as health, housing, education and so forth.

Executive training and applied research for the industry usually pay a fee to the professor according to his involvement in each course or project. These courses and projects pay commercial rates which are financially more attractive than research for publication in journals. However, some schools also pay a fee or attribute time for articles published in the best-ranked journals. These schools have their own lists of journals that publish internally.

The required teaching load is between a minimum of 156 hours to a maximum of 234 hours per year. In addition, it is common to see a policy

of teaching load reduction for faculty members with management positions in the school, late teaching or publication in high-ranked journals.

The best management schools have their management research centres financed by public funds (from FCT—Foundation for Science and Technology) under a multi-year programme. The amount depends on the centre's evaluation. FCT ranks research centres using international expert panels. The rank has a five-degree scale from excellent to poor. The panel also makes recommendations for strategic orientation, future investments and the centre's activity plans. Financing is discontinued if a centre is classified as poor quality.

The available annual funding by FCT is €77 million for the period 2015–2020. In recent years (2011–2014) the average annual funding paid to 319 units for research and development was €52 million.

Some schools also have centres dedicated to applied research and community service, developing projects for a fee, for enterprises, industry associations or the government.

The Demand for Higher Education in Business

The demand for undergraduate studies in management in major business schools has always exceeded the supply capacity (Table 11.5).

The demand for master's degrees in management also exceeds the number of vacancies available at the best business schools.

Table 11.5 Demand and supply in major business schools for bachelor degrees in 2014

Schools	Women	Men	Vacancies
ISEG—Lisbon School of Economics and Management	931	931	233
ISCTE	891	876	244
Nova School of Business and Economics	723	697	234
Porto University—Faculty of Economics	776	713	132
Minho University—School of Economics and Management	407	342	87
Coimbra University—Faculty of Economics	454	398	108

Source: <http://www.dges.mec.pt/guias/indcurso.asp?letra=G>

In terms of executive education, at least five business schools excel nationally and internationally, most often using a specialized institution for the delivery of such training: IDEFE from ISEG Lisbon University, INDEG from ISCTE-IUL, the Catholic SBE, Porto Business School from Porto University, and NOVA Forum from Nova SBE.

Regulatory Bodies

Accreditation

The Accreditation Agency for Higher Education (A3ES) is a private foundation created in 2009 and recognized by the government as doing a public service. A3ES ensures the quality of HEIs in Portugal through the evaluation and accreditation of study programmes. Schools that require accreditation must pay a fee for each programme under the accreditation process. A3ES publicizes the results of each accreditation process. The agency also plays an advisory role to the Ministry of Higher Education and Science to ensure high quality teaching standards and participates in the European system for quality of HEI—EQAR (European Quality Assurance Register) of which Portugal is a member through the Ministry of Higher Education and Science.

There are also several international accreditations pertaining to Portuguese business schools:

- Two business schools, Catholic SBE and Nova SBE, have had the triple-crown of accreditation (Association to Advance Collegiate Schools of Business (AACSB), European Quality Improvement System (EQUIS) and Association of MBAs (AMBA)) since 2009. Their first accreditation was in 2004.. ISEG Lisbon University is an associate member of AACSB in the process of accreditation and others are following the same path;
- Five MBA programmes are accredited by AMBA: Porto Business School, Nova SBE, ISCTE Business School, ISEG Lisbon University School of Economics and Management and Catholic SBE;

- Three executive MBAs are accredited by EPAS: AESE Business School, the Magellan MBA and Porto Business School.

Rankings of Business Schools

Rankings may influence the preferences of students in some considerable way. This is why schools are always looking for the best position. Fifty-two master's programmes at Portuguese business schools are listed in the top 50 of Eduniversal Best Masters ranking worldwide in 2014. Nova SBE and Catholic SBE are ranked by *Financial Times*, with their master's in management respectively at 48th and 59th. The international full-time Lisbon MBA is the 15th-best in Europe and the 40th best in the world according to the 2016 Financial Times Top 100 Global MBA Rankings.

Conclusion

The quality of management schools in Portugal is positively evaluated by the latest "Global Competitiveness Report" published by the World Economic Forum, ranking Portugal in 26th among 140 Organisation for Economic Co-operation and Development economies. Management education in general started within economics schools, following the same path as ISEG, the original Portuguese school of economics and management. Management departments within these schools have increased in terms of numbers of students, numbers of faculty members and volume of research in comparison with their economics departments. Nowadays, management courses generate the majority of revenues at the five major schools of economics and management. As a consequence of this growth, the management faculty profile has been changing towards more full-time members and graduates with PhDs.

Most career progression contests show a higher weight for research in comparison to teaching and management tasks, assuming that research-based universities have a better quality of teaching and better public image. Tenure is also more likely to be given to those faculty members that are more research oriented. Many schools have created financial

incentives for faculty members who produce high quality publications. This strategy has resulted in a higher quantity and quality of management research. The challenge management schools are facing is to maintain these aspects in tandem, keeping the same level of quality of teaching and attendance of students.

In the past, faculty career progression was mainly within the same school where the faculty member started studying and teaching. Today there is more mobility among faculty members; both senior and younger professors search for a chance to progress their careers when places open up at other schools.

Imbalances in the pyramid age structure, reflecting that there are fewer young people, tends to reduce demand for higher education especially in small towns, which is a challenge for the survival of universities and polytechnics in such places. The five major players in management education are minimizing this problem in some way with their internationalization strategies. It is, however, too early to analyze the success of these strategies.

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