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SCREENING REPORT

ENTREPRENEURSHIP, INNOVATION & STUDENTS TALENT DEVELOPMENT

UNIVERSITY OF HYDERABAD, INDIA

Integrating Talent Development into Innovation Ecosystems in Higher Education

586227-EPP-1-2017-1-BG-EPP

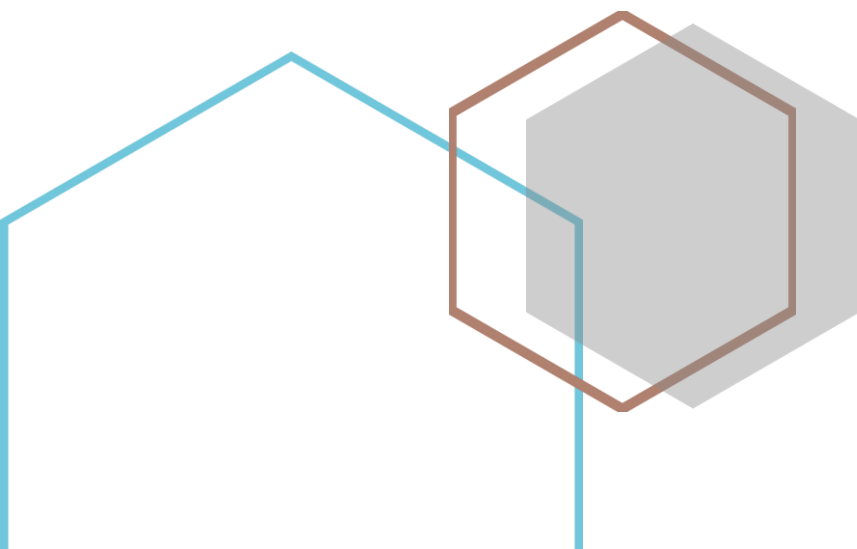


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The report aims at providing a clear picture of the University's starting conditions and capacities in the areas of graduates' employability, innovation capacity and talent development. The reports points out the strengths and weaknesses of the institution in these fields. It has been developed by external experts, representative of the INNOTAL partners.

The report can provide insights into the following broad elements of organizational performance of the University:

- organizational motivation, including mission, prevalent culture, incentive structures and support structures
- organizational capacity (structure, physical and financial resources, technology resources, human resources
- leadership, decision-making process, management and inter-organizational linkages);
- c) organizational performance (financial viability, efficiency, effectiveness, relevance)
- external environment (administrative, legal, social, cultural, economic, political, etc.)

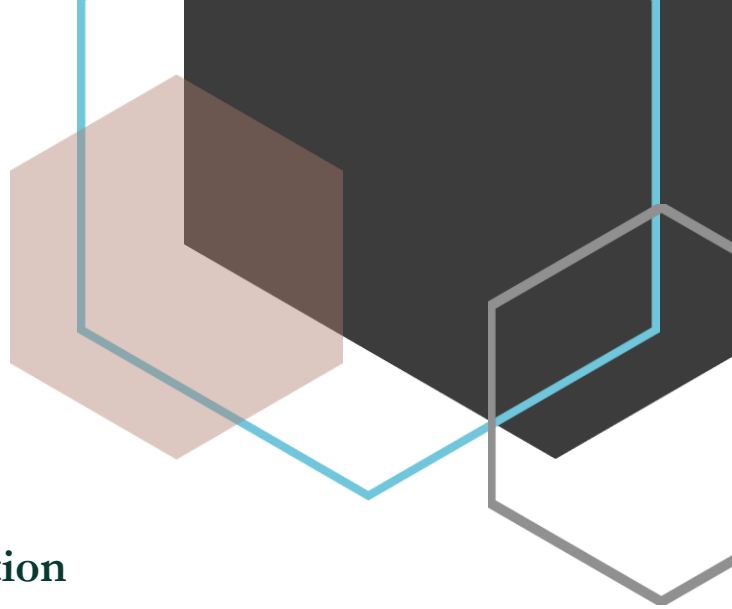
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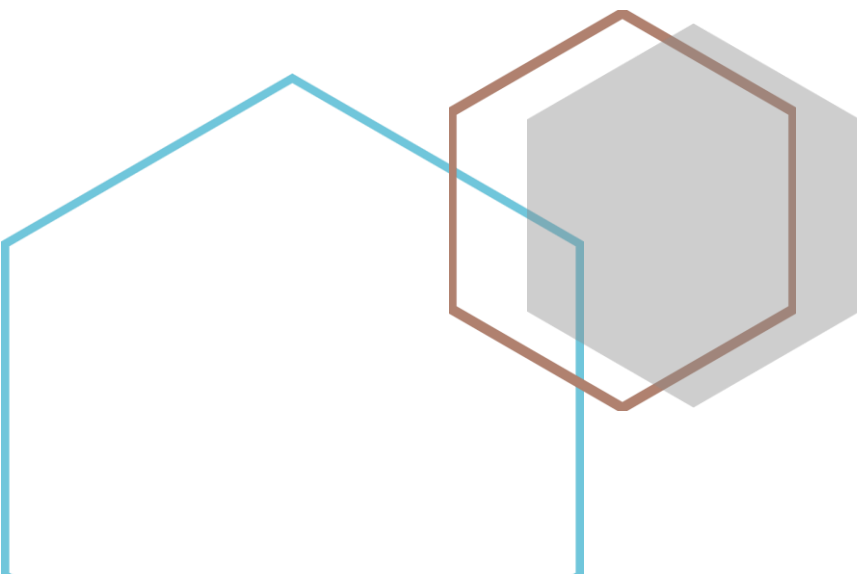


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Introduction



CONTEXT

This report is part of the project's overall attempt to build the capacity of University of Hyderabad to promote graduates' employability and talent and to engage in innovation benefitting both the institution itself and the broader society. It shall provide information and relevant data about the starting conditions and capacity of University of Hyderabad and it shall offer assessment and recommendations for future improvement.

The report has been developed on the basis of an in-depth interview with the project team that took place during the first capacity building workshop. Following this interview, concrete information and data has been collected from various University departments, as well as from published Annual Reports of the University, the published NIRF data and the University website. In order to allow both replication and update of the overall assessment, information is provided for each indicator. Where available, officially published data has been used. Where official information has not been available, data has been provided by responsible officials at the University of Hyderabad itself.

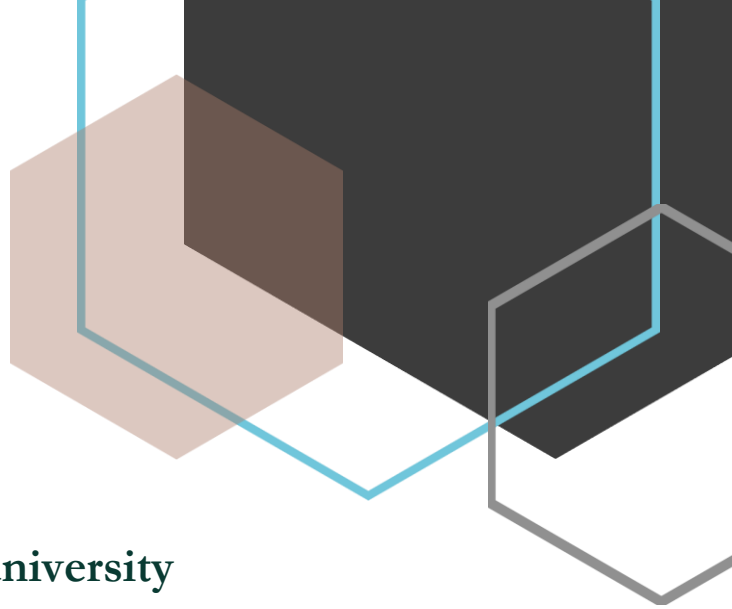
SCOPE

This Report is produced in the frame of the project's first stage, which is focused on preparatory research and understanding the context in which further capacity building activities shall take place. The purpose is to provide an external assessment of:

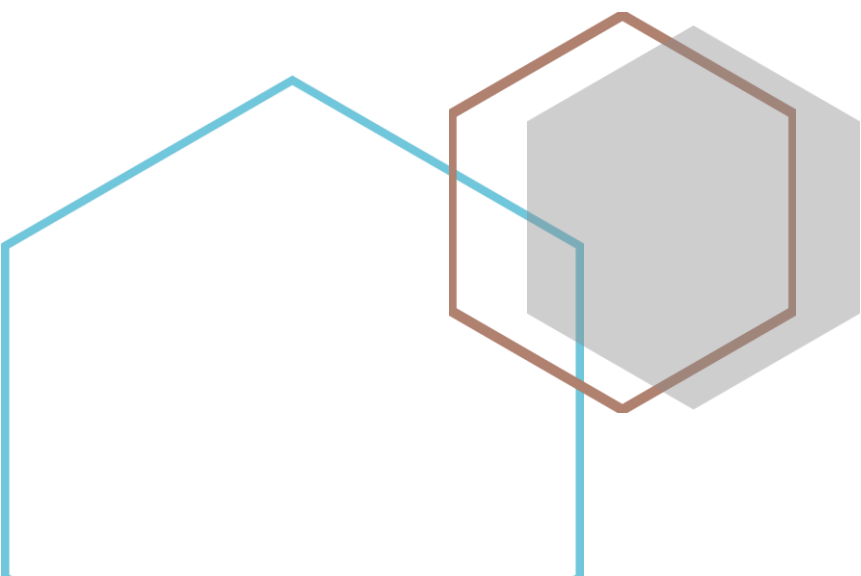
- University capacity to provide entrepreneurship education across various disciplines
- University capacity for innovation
- University capacity for promoting graduates' employability and developing students' talent

The reports aims to provide a clear picture of the University's starting conditions and capacities related to graduates' employability, innovation and talent development. The report has been developed on the basis of the scorecards developed in the frame of the INNOTAL project.





Profile of the university



ESTABLISHMENT

The University of Hyderabad, founded in 1974, is currently one of the leading institutions of higher education in India. It is a public institution and is wholly financed by the University Grants Commission. It stands out as a university that is strongly research-oriented and is known for its excellence in research. It has been ranked 4th best among the Universities in the country by the National Institutional Ranking Framework (NIRF) of MHRD for 2016, 7th best in 2017, and 5th best in 2018ⁱ. It was declared as the Best Central University for the year 2015.

In the early 2000s, the university was designated by India’s University Grants Commission as one of the ‘Universities with Potential for Excellence’ in the country. As a result, the University has received increased education and research funding.

Following a rigorous evaluation by the National Assessment and Accreditation Council (NAAC) of the University Grants Commissionⁱⁱ, the University of Hyderabad received the top score of 3.72ⁱⁱⁱ (based on a continuum from 0 to 4^{iv}).

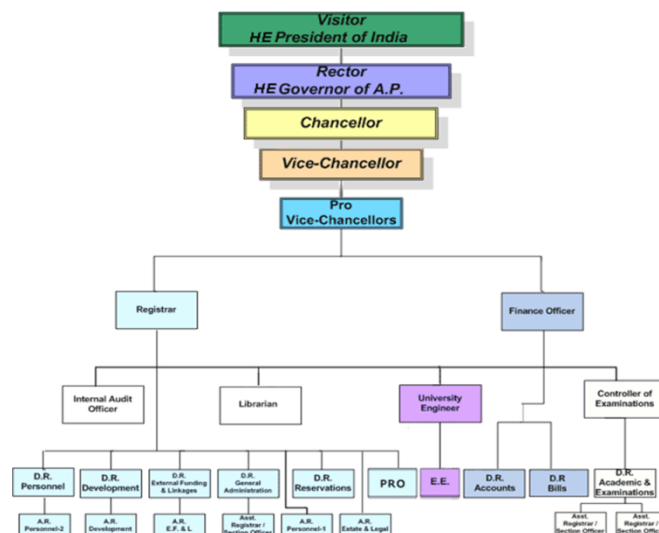
The University has been rated by the National Information System for Science and Technology of the Department of Scientific and Industrial Research in the Government of India, as the only University under the ‘High Output – High Impact’ category among the top 50 institutions in India with publications in citation-index journals.

Under its Fund for Improvement of Science and Technology, the Department of Science and Technology of the Government of India has provided generous support to the four Science Schools of the University to augment research facilities.

MISSION AND VALUES

The mission of the University of Hyderabad is to disseminate and advance knowledge by providing instructional and research facilities, and in particular to make special provisions for integrated courses in humanities and science and promote inter-disciplinary studies and research.

Organizational structure



The university has 46 Departments and Centres organized in 12 Schools:

- School of Mathematics and Statistics
- School of Physics
- School of Chemistry
- School of Humanities
- School of Life Sciences
- School of Social Sciences
- Sarojini Naidu School of Arts & Communication
- School of Management Studies
- School of Medical Sciences
- School of Engineering Sciences & Technology
- School of Economics
- School of Computer and Information Sciences (SCIS)

In addition, there are 19 specialized centres focused on particular fields of study:

- University Centre for Earth and Space Sciences
- The Centre for Neural and Cognitive Sciences
- Advanced Centre for Research in High Energy Materials (ACRHEM)
- Centre for Modelling Simulation and Design (CMSD)
- Health Psychology
- Integrated Studies
- Buddhist Studies
- Nanotechnology
- Knowledge & Innovation Studies
- Endangered Languages
- Research & Education in Ageing
- Indian Languages
- Great Indian Thinkers
- Foreign Language
- Dalit & Tribal Literature
- Women's Studies
- Knowledge and Innovation Studies
- Centre for Classical Languages, Telugu



- Centre for Advanced Studies in Electronics Science and Technology (CASEST)

The University also operates the following Research Institutes

- National Institute of Animal Biotechnology
- Institute of Health Science Education and Translation Research
- Institute of Life Sciences
- C R Rao Advanced Institute of Mathematics, Statistics and Computer Science
- Association of Management Development Institutions in South Asia (AMDISA)

Degree of autonomy (decisions concerning academic affairs and financial issues, e.g. student fees, non-public funding, management of real estate)

In line with the recent trend toward strengthening accreditation and increasing university autonomy, in 2018, the University Grants Commission approved full autonomy (Autonomy Grade I^v) for the University on account of its high standards of excellence. University of Hyderabad was among the 5 Central Universities in India to be granted full autonomy. The preservation of Grade I autonomy is preconditioned on the university maintaining a score of over 3.5 in the NAAC accreditation or being ranked among the top-50 institutions in the NIRF rankings for the two previous years^{vi}.

The ‘full autonomy’ status means that the University is free to determine its admission procedure, fee structure and curriculum, introduce new courses (including skill courses), create new departments, launch new programmes, create off campuses and research parks, appoint foreign faculty, accept foreign students, offer variable incentive packages for faculty, introduce online distance learning programmes, and enter into cooperation and collaboration agreements. It should be noted that the full autonomy is largely preconditioned on the university not demanding funds from the government, which could result in situations in which – being unable to fully finance a new activity – the university would still need government approval.

-
- Number of students

For academic year 2016-2017: 5028

For academic year 2015-2016: 5089

For academic year 2014-2015: 5249

- Number of academic staff (teaching and research)

Number of faculty:

As of NIRF ranking in 2018: 396, of which 377 (95.2%) with PhD degree

SIZE OF THE UNIVERSITY



As of NIRF ranking in 2017: 369, of which 341 (92.41%) with PhD degree

As of NIRF ranking in 2016: 389, of which 369 (94.86) with PhD degree^{vii}

Average for 2016-2018: 385

- Number of administrative support staff (non-teaching staff)

As of 31st March, 2017: 823

As of 31st March, 2016: 867

As of 31st March, 2015: 904

- Budget

As of 1.4.2016: 1,879,085,000 Rs. (27,941,994 USD)

As of 31.3.2017: 1,748,871,000 Rs. (26,005,712 USD)

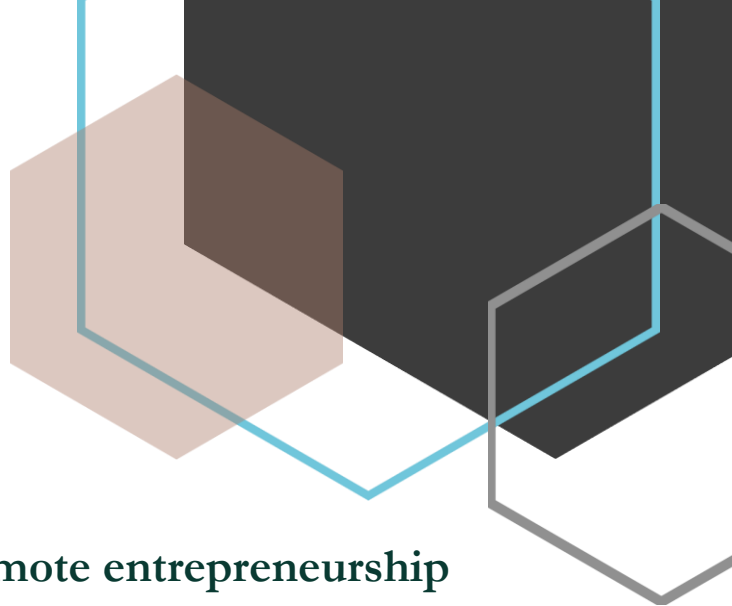
ROLE OF THE UNIVERSITY IN ITS REGION

The University is crucial for the region. As one of the top five educational institutions in the country and among the top 10 in South Asia, it has an important role to provide innovative academic programmes and high quality research that will improve the region's competitiveness. The University of Hyderabad focuses on quality. It is among the most sought after educational providers in the country, in all disciplines. Over 60,000 students compete for only 2,000 admissions every year. The university's reputation attracts talent from all over the country and the world (as part of our Study in India Programme).

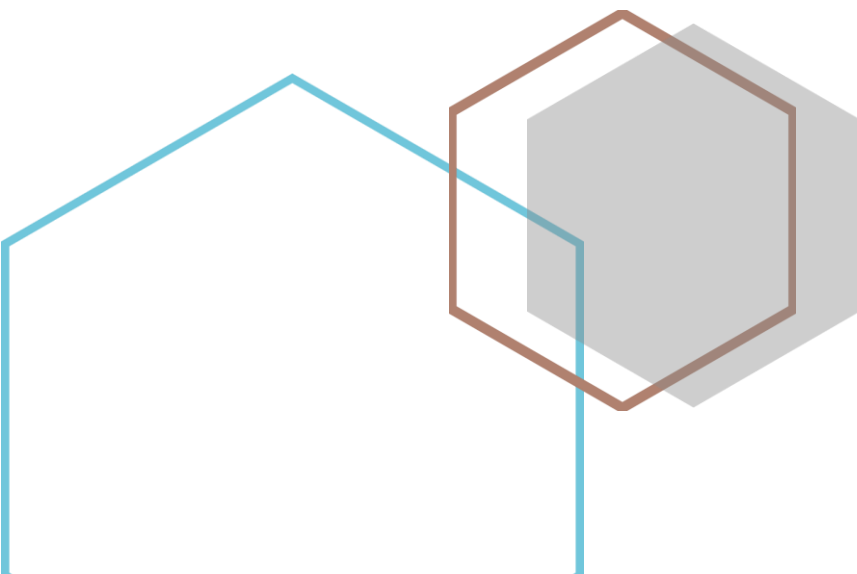
In addition, the University of Hyderabad has recently been asked to mentor a new central university coming up in the region until it stabilises in terms of both infrastructure and academic programmes.

Both the state and central governments place the university in high regard for its outreach and its contribution to policy frameworks, etc. The University of Hyderabad does its best to respond to this trust with strenuous efforts to work for the benefit and wellbeing of the region and the whole country.





Capacity to provide and promote entrepreneurship education



**PERFORMANCE IN
THE AREA OF
ENTREPRENEURSHIP
EDUCATION**

2.1. Relative number of bachelor/master/post-graduate programs offering entrepreneurship courses/training

The University does not have a dedicated Entrepreneurship Program. It offers only individual courses within relevant study programs.

2.2. Relative number of students in bachelor/master/post-graduate entrepreneurship programs

n/a

2.3. Relative number of staff teaching entrepreneurship

Only 5% of the teaching staff is involved in offering such courses.

2.4. Relative number of entrepreneurship-related research projects

2016-2017:

Research projects explicitly related to entrepreneurship or employability 1/95 (1%)

Research projects sponsored by industry: 2

2015-2016:

Research projects explicitly related to entrepreneurship or employability 0/75 (0%)

However, it should be noted that many of the research projects pertain to technology or very concrete scientific fields, and their results, if commercialized, could impact entrepreneurs.

A number of events held at University of Hyderabad pertained to entrepreneurship or employability, or were organized in collaboration with, or with the participation of, industry. Examples include:

School of Engineering Sciences & Technology:

- Workshop on “Advanced Engineering Materials: An Industry Perspective”, 25 November, 2016; International Workshop on “High Entropy Materials (IWHM-2017)”, 11-12 March, 2017.

School of Physics:

- Workshop on Sensors in Systems was organized on 25 March, 2017
- School of Life Sciences:
- Bioquest 2016, 20-21 October, 2016
- Bioquest 2015,
- Workshop on “Innovation and Entrepreneurship”, 6 September, 2016
- UPE-II Distinguished Lecture on “From Incremental to Disruptive Innovation” by Dr. R. A. Mashelkar, 13 October, 2016.



School of Management Studies:

- National seminar on “Changing Role of Health Care Management Professionals: Industry Perspective” , 9th September, 2016
- Conference “HR-Meet on Industry Expectations and Student Preparedness”, 30 October 2015.

Crescendo-2015 – An All India B-Plan Competition, 4 December, 2015 (organized in association with the Entrepreneur Zone (TEZ- an Entrepreneurship Training and Incubation Centre)

2.5. Relative number of bachelor/master/post-graduate entrepreneurship courses in which case studies or study visits are used to enhance learning

These methods are used in 100% of the existing Entrepreneurship courses.

2.6. Inclusion of support for entrepreneurship and entrepreneurship education in the mission or core strategy of the university

There is no unified document that would state out in detail the mission, vision or long-term strategy of the whole university. Explicitly, expanding knowledge on entrepreneurship is included only in the mission of the School of Management Studies.

However, given that the university maintains structures aimed at technology incubation and entrepreneurship development, it is fair to say that Entrepreneurship is de facto treated as part of the development strategy of the university. Yet a stronger and more explicit commitment at university level would increase the impact on graduates.

2.7. Existence of an institutional strategy on entrepreneurship education

There is no such strategy explicitly developed. In particular, there is no strategy for including elements of Entrepreneurship education (e.g. specialized Entrepreneurship modules) across many study programs. There are also no foundational courses on Entrepreneurship. A more clear strategy is available at the School of Management Studies, where Entrepreneurship is taught as part of the study program and students can choose Entrepreneurship as a specialization.

2.8. Involvement (official or unofficial) of employers or labour market institutions in:

- curriculum development
- teaching

- participation in decision-making or consultative bodies at institutional level

The university involves employers or labour market institutions:

- In curriculum development (at School level, in the form of Curriculum development committees).
- In teaching, as guest lecturers in relevant courses

The university does not involve employers and labour market institutions in decision-making or consultative bodies at institutional level.

2.9. Relative number of staff that has participated in entrepreneurship training

Around 40 faculty members have received training in Entrepreneurship. In relative terms, this is about 10% of all faculty members.

2.10. Relative number of industry or business practitioners involved in delivering entrepreneurship courses in bachelor's/master's/post-graduate degree study programs

Over 50 industry/business practitioners/ NGOs are involved in Boards of Studies that frame the curriculum, cutting across all disciplines. They also find a place in governing bodies such as Academic Council, Executive Council (the highest decision making body of the university).

A number of business practitioners have delivered lectures at the university (School of Management Studies), including:

- Dr. Murali Padmanabhan, Vice President, HR VIRTUSA, Hyderabad, 17 March, 2017.
- Mr. Raghu Punnam Raju, Senior Director – Software Engineering PAREXCEL International Hyderabad, 9 November, 2016
- Mr. Nick Mitchell, Managing Director, Phenomenex, India, 23 August, 2016
- Shri. Ravi Puli CEO/Managing Partner, Geomeme, USA and the founder of International Solutions Group (ISA), 24 August, 2016
- Dr. Rachel Chatterjee, IAS (Retd), former special Chief Secretary, Govt. of A.P. & former Chairperson APPSC, 1 March, 2017.
- Dr. Vishwanath Kokkonda, Yagnaum Consulting Hyderabad, 19 October, 2016.

2.11. Relative number of university employees who also have (temporary) work contracts in industry/business

Faculty members are not allowed to have work contracts in industry. While not on leave, faculty is only allowed to provide consultancy for business.

2.12. Existence of opportunities for staff mobility (including adjunct faculty) across the university-business divide

Faculty is allowed leave, during which they can work in industry. It is not unusual for faculty to take this opportunity.

2.13. Existence of university entrepreneurship centres supporting university-business relations and entrepreneurship in general

Technology Incubation and Development of Entrepreneurship (TIDE) is a support structure maintained at Centre for Advanced Studies in Electronics Sciences and Technology (CASEST). It is sponsored by Department of Electronics and Information Technology.

TIDE aims at exploiting University of Hyderabad’s excellent track record of high quality research. It intends to contribute to the creation of a favourable eco-system for technological innovation, to impact the marketplace and benefit society. It aims at providing potential entrepreneurs with innovative ideas in technology. Activities of TIDE include:

- evaluation of ideas and business models
- estimation of market potential
- provision of infrastructure, mentorship or seed funding
- prototype development
- networking
- organization of technical workshops.

The Department of Information Technology (DIT), Government of India, offers support for potential entrepreneurs in the areas of Electronics, Information Technology and Communications.

In 2016, the TIDE signed a Memorandum of Understanding with the Start-up India initiative of the Government of India, with the objective to build an eco-system to foster innovation and entrepreneurship, with the following three companies 1. Neoscript Technologies Pvt Ltd, 2. Sapphire Technologies LLP, and 3. Aapka Painter Solutions Pvt Ltd. In 2017, TIDE was awarded certification to the 3rd batch of budding entrepreneurs/start-ups that successfully completed the 6-month Program on “Entrepreneurship Development”.

The technology business incubator at University of Hyderabad was established in 2006 by National Science & Technology Entrepreneurship Development Board (NSTEDB) of the Department of Science & Technology (DST). The Incubator is a joint program by University of Hyderabad and Department of Science and technology (DST) and is sponsored by the latter. The structure provides incubation facilities for new entrepreneurs to transfer their innovative technologies to the market.

The technology business incubator at University of Hyderabad focuses on the Pharmaceutical Biotech and Renewable Energy industries. It aims at promoting and accelerating the development and growth of entrepreneurial technology-based small enterprises through a variety of business support resources, expertise and facilities. The incubator concentrates on providing opportunities for product development, commercialization, and new business models. Its broader objectives are to foster local development and employment of highly skilled graduates. Among the notable successes of the incubator is for example the inclusion of Vitas Pharma, a company focused on developing drugs and diagnostics to detect and treat multidrug resistant infections. The company has received a Discovery Award (in the form of a seed grant) from the Longitude Prize committee, to develop its diagnostic product for the rapid detection of bacterial infections.

2.14. Provision of support to bachelor/master/post-graduate students for access to internship and/or placement schemes

In all study programs, the completion of an internship and/or a placement scheme is a requirement. In some cases, faculty can accompany the students during their training placement.

2.15. Inclusion in entrepreneurship teaching of real case studies provided by business/enterprises

Real case studies are included only in relevant programs, such as Management, or elective courses within programs (e.g. Business Anthropology)

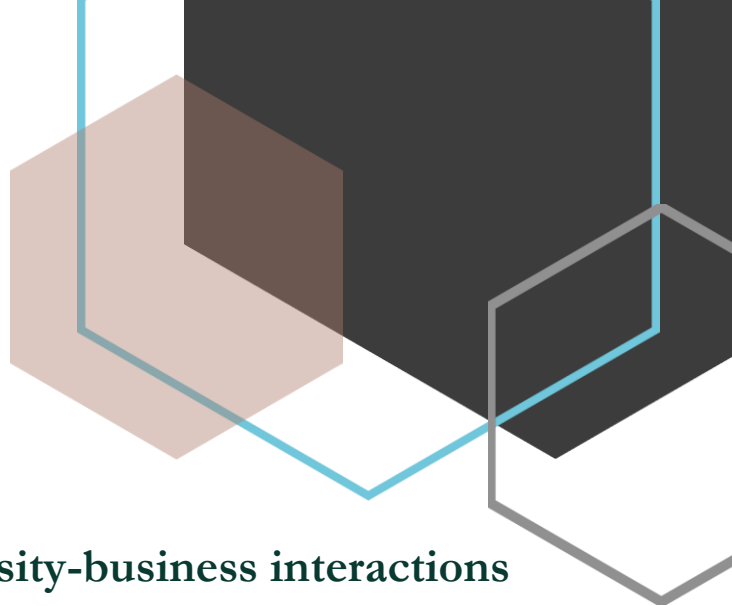
2.16. Use of competency-based approach in assessing the results and impact of studies

There is no explicit competence framework employed. However, assessment is based on indicators.

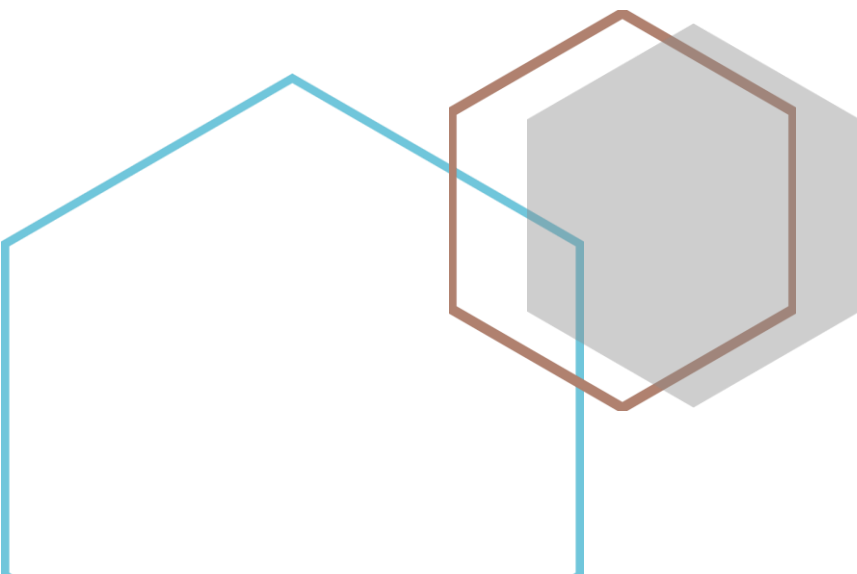
2.17. Monitoring and support of the development of students' soft skills (leadership, teamwork, communication, etc.)

The development of students' soft skills is supported through teaching and training at undergraduate level.

Soft skills training is also covered in Integrated Masters Degrees (delivered at College for Integrated Studies).



Innovation capacity and university-business interactions



3.1. R&D expenditures as a share of total university's budget

The share of R&D expenditures within the total University budget is approximately 60% (over INR 40 crore). The budget changes annually depending on the financial support the University receives from the Government.

3.2. Ratio of total grant funding and funding from external sources to full-time employed academic staff

In view of the purposes of the evaluation, total grant funding (in USD) is calculated as funding for sponsored research projects and consultancy projects:

2016-2017: 7,042,209

2015-2016: 11,961,458

2014-2015: 7,554,059

Ratio of total grant funding to full-time employed academic staff:

2016-2017: $7,042,209/396=17783.36$

2015-2016: $11,961,458/371=32241.13$

2014-2015: $7,554,059/404=18698.17$

3.3. Relative number of spin-off firms supported by the university per full-time employed academic staff

Exact numbers are not available.

3.4. Proportion of academic staff holding international and national research grants

Over 55% of the total academic staff

3.5. Proportion of academic staff holding industry research grants

Over 65% of the total academic staff

3.6. Number of weighted publications per full-time employed academic staff (averaged over the last 3 calendar years)

2016-2017: $1202/396=304\%$

2015-2016: $1095/371=295\%$

2014-2015: $1196/404=296\%$

Average for the 3 years: 298.33%

3.7. Number of citations in Scopus and Google Scholar database per full-time employed academic staff (averaged over the last 3 academic years)

Number of citations:

- Web of Science:

2014-2016: $12458/402=3099\%$

- Scopus:

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2014-2016: $10507/402=2613.68\%$

Number of top 25 % Highly Cited Papers:

- Web of Science: 704
- Scopus: 649

3.8. Relative number of intangibles in the form of patents, licenses, copyrights, trademarks, policy recommendations, etc. per full-time employed academic staff

Four patents have been granted.

For the period 2014-2017: 4 (patents granted) = $3/390=0.77\%$.

3.9. Inclusion of support for innovation and regional development in the mission or core strategy of the university

Support for innovation is not explicitly included in any existing University strategy. However, innovation appears to be prioritized at the University given the research priorities, the overall focus on excellent research, and the organized events. There is no unified document that would state out in detail the mission, vision or long-term strategy of the whole university. Notably, the short presentation of the university's mission notes commitment to promoting inter-disciplinary studies and research, which is a prerequisite for the promotion of innovation.

The University maintains a Center for Knowledge Culture and Innovation Studies, whose research programme is explicitly aimed at a thorough understanding of the innovation process and the dynamics of knowledge production, the economic, social, legal, environmental and ethical implications of research and innovation, policy issues such as IPR regime and stakeholder participation in innovation, the national system of innovation and other sources of innovation (e.g. indigenous knowledge systems). The Technology Incubation and Development of Entrepreneurship/Technology Business Incubator at the university also attest to a strong commitment to the promotion of innovation.

3.10. Existence of an institutional strategy on innovation, innovation support or knowledge transfer to the external environment

There is no explicit and comprehensive strategy on innovation at central level at the university.

3.11. Implementation of research and research training planning and policy

The University of Hyderabad is a research university. The Research and Development Director collaborates with all disciplines in order to shape the university's research policy.

The Research and Development Director is a senior management

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member responsible for research or the Research Policy at the University. There is a Research Ethics Committee in charge of Research Integrity and Ethics policies guidance and procedures. Researchers are encouraged to disseminate research and provide public access to research results through research publications, popular articles in local newspapers and electronic media.

3.12. Provision of financial resources in the form of seed funding

Provision of seed funding is listed as one of the activities of the Technology Incubation and Development of Entrepreneurship (TIDE). In practice, considering that the TIDE is financially supported by the Government of India, the seed funding is public funding, even if distributed through the university structures.

The science faculties at the university maintain a Start-up Research Fund for new faculty members (faculty that joined the university no earlier than a year before the application). Grants are disbursed on a competitive basis.

3.13. Existence of a clear IPR policy followed by the university in its relations with economic agents

The University does not have such policy in place as yet.

3.14. Existence of faculty attestation rules that envisage rewarding of applied research for industry/local development

The University reports that attestation and promotion schemes reward applied research for industry/local development. No details have been provided.

3.15. Existence of rules about modernization of curricula in view of new challenges, national priorities and business needs

Curriculum is revised or updated almost every year

3.16. Existence of university structures facilitating links with industry and local community or structures in which the university is collaborating with external economic actors or the local community

- university research laboratories (owned or shared with other entities)
 - ✓ The Indira Gandhi Memorial Library (with fully computerized in-house Library operations and a collection of over 430 000 books, e-journals, e-books, reference books, serials, theses and dissertations, back volumes of journals, maps, over 2500 Braille books for visually challenged students and separate book bank for SC/ST students)
 - ✓ A digital library: A Centre of Competency in Digital libraries and e-learning was established to undertake R&D activities by using Open Source Software and to create digital content

SUPPORT
STRUCTURES AND
LINKAGES
FACILITATING
INNOVATION AND
UNIVERSITY-
BUSINESS
INTERACTIONS



at the University. The Library is a member of Universal digital library project of Carnegie-Melon University, Pittsburgh, USA (Million books to the Web) and is digitizing rare books under his project. The Library also digitizes and uploads full-text Ph.D. theses submitted to University of Hyderabad.

These facilities can be used by scholars from other Universities and research laboratories. Five Research and Development Centers & Corporate organizations have become institutional members and are paying an annual membership fee to make use of the Library resources and facilities.

- ✓ Campus network Facility: the entire campus has 1 Gbps NKN connectivity, Wi-Fi enabled, with 14 Wi-Fi towers erected at different locations to create wireless hotspots. The coverage of the University Campus Network is extensive with more than 4,000 network points. Students can easily connect to the campus network and Internet in student residential halls. All the residents of University Campus are provided with access to Internet via ADSL modems.
- ✓ Central Instruments Laboratory: a centralized instruments facility with the state-of-the-art analytical equipment to cater to the research needs of Science/Engineering/Medicine schools of the university. CIL offers educational visits to the participants of short/long term courses conducted at science schools of the university and the Academic Science College.

The Labs of the Advanced Center of Research in High Energy Materials: the center has specialized Lab facilities for research in the area of Physics and Chemistry. ACRHEM has collaborations with various schools and research institutes across the country and focuses on both fundamental and applied research.

Only organisations that have an agreement with the research labs and resource centres, such as our Centre for Digital Learning Studies and Resources, can utilise the facilities.

- ✓ The Institute of Life Sciences has 32 Research Labs and 12 Support Labs, a Knowledge Centre and Library and Animal House & Preclinical Biology Labs. The Institute is open to pursuing industry sponsored research as well as basic research centred around in-house ideas.

- technological parks

The University reports having access to and ability to cooperate with technology parks in Hyderabad. No details have been provided.

- technology transfer offices

The Institute of Life Sciences has plans to open an Intellectual Property Management Cell and a Technology Transfer Cell in order to manage links with industry and the scientific community.

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- Incubators
As described above
- Accelerators
The University does not own or have access to accelerators
- Applied research centres
The University reports maintaining research centres. No details have been provided.
- Research and development units
 - ✓ Since 2004, the University operates an innovative interfacial studies and research programme – the Centre for Modelling, Simulation and Design (CMSD). The Centre's work is at the intersection of Science, Engineering and Technology. It receives financial support from the Government of India through the DST.
 - ✓ There is a Networking Resource Centre (NRC) at School of Physics. It received public funding and is aimed at upgrading the quality of research in various less endowed Institutions/ Universities. The centre promotes collaborative research, provides access to advanced research facilities and organizes training for young researchers in frontier areas in the field of Physics.

3.17. Legal possibility for researchers to become engaged in research supported by industry

It is permissible for researchers to become engaged in research supported by industry.

HUMAN RESOURCES
CAPACITY FOR
INNOVATION AND
UNIVERSITY-
BUSINESS
INTERACTIONS

3.18. Proportion of students in bachelor's/master's/post-graduate programs involved in research projects (averaged over the last 3 academic years)

All students are involved in research, since it is an integral part of all academic programmes.

3.19. PhD degree completions per full-time employed academic staff (averaged over the last 3 academic years)

2016-2017: 267 PhD completions, ratio=267/396= 67.42%

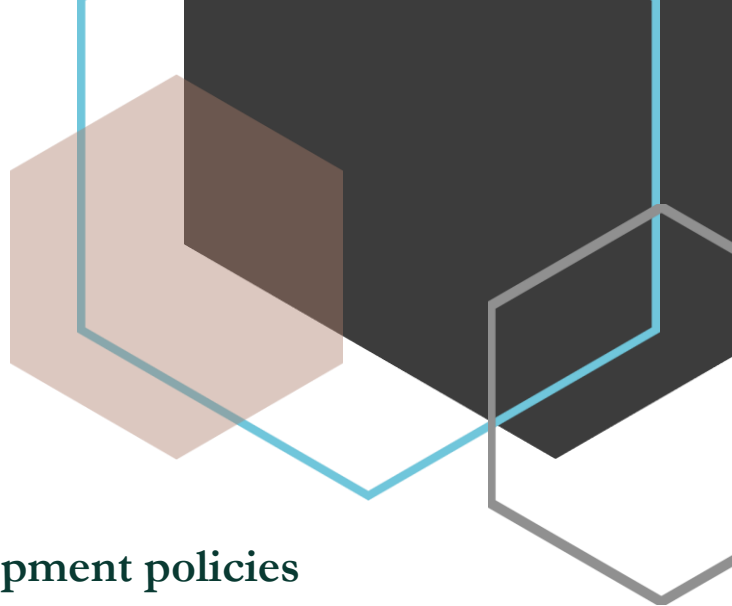
2015-2016: 193 PhD completions, ratio=193/371= 52.02%

2014-2015: 183 PhD completions, ratio=183/404= 45.3%

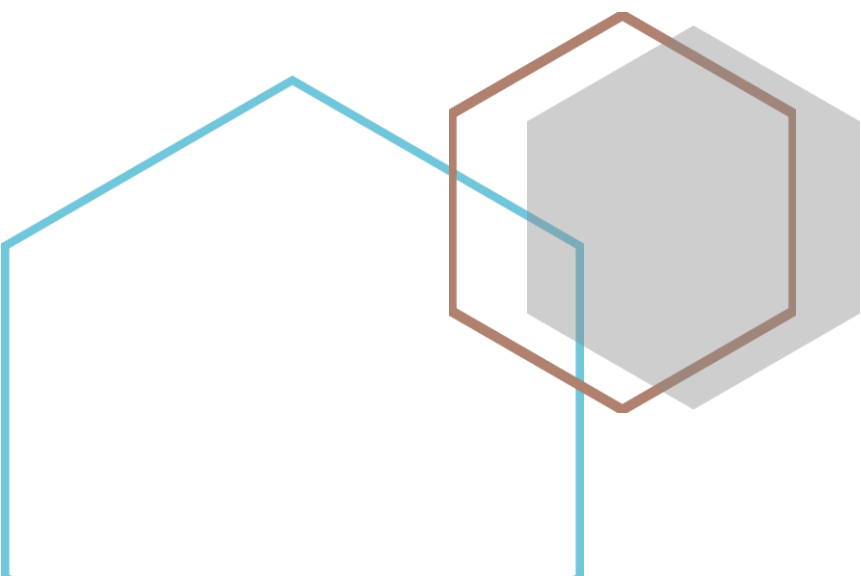
3.20. Proportion of PhD completions within planned schedule (averaged over the last 3 academic years)

Over 60%





Student talent development policies



**CAPACITY TO
ATTRACT AND RETAIN
TALENT**
4.1. Existence of a marketing strategy for attracting talented students

The university advertises admissions in all national newspapers across the country, on its website, and in social media. Alumni and current students also circulate the advertisements.

Some student groups visit undergraduate colleges during the summer holidays and talk about the university's achievements, encouraging young people to apply.

Specifically for foreign students, the Study in India Programme (SIP) of the University provides an opportunity to experience and study not only the various aspects of Indian society, history and culture but also sciences and information technology. The program hosts around 200 students. SIP has tailored programs for partners such as Dartmouth College, Duke University, and the Nordic Centre in India—a consortium of 15 Nordic universities. The University Grants Commission has identified the program as a good practice. In 2014 the SIP Programme was selected for consideration for the IIE Andrew Heiskell Award, which distinguishes innovative models for internationalizing the campus, study abroad, and international partnership programs.

4.2. Share of foreign students in total number of students enrolled

For academic year 2016-2017:

$$41/5028 = 0.82\%$$

For academic year 2015-2016:

$$59/5089 = 1.16\%$$

For academic year 2014-2015:

$$65/5249 = 1.24\%$$

4.3. Share of students that started work in their field of study within 6 months after graduation/or board exam

The University does not have such statistics.

4.4. Student-teaching staff ratio

For academic year 2016-2017:

$$5028/396 = 12.7$$

For academic year 2015-2016:

$$5089/371 = 13.72$$

For academic year 2014-2015:

$$5249/404 = 12.99$$

4.5. Existing students' enrolment and services office

The Office of the Dean, Students' Welfare looks after the welfare of the students with active support from the elected representatives of



the students, faculty and administration.

4.6. Existence of a quality management system for academic excellence

The University reports that such a system exists. No details have been provided.

4.7. Existence of options for part-time/distance /flexible learning at the university

There is a Centre for Distance and Virtual Learning. Currently, it offers 14 one-year Post Graduate Diploma Programmes, which are employability and knowledge oriented and focus on skills development. These programmes are offered through distance mode, i.e. through correspondence mode and a limited number of contact hours. Most of the students are employees of various state and central government offices, lawyers, magistrates; some are executives from multinational companies, local firms, NGOs. During the 2016-2017 academic year, 761 students were admitted in these programmes.

4.8. Existence of a strategy for residential environment improvement, including dormitories for students, active student welfare office, sport facilities

The Chief Warden's Office is the responsible officer in charge of managing residential environment improvement.

During the 2016-2017 academic year, the university provided accommodation to over 4408 students in 21 hostels, including 1656 women students. All the women students who needed accommodation, especially those from outside the State, were provided hostel facilities on priority.

4.9. Existence of health service at the university premises

The University has an on-campus Health Centre with a 24-hour outpatient and inpatient facility and emergency services. Its laboratory has advanced investigation equipment. The center is operated by three Chief Medical Officers and one Medical Officer with supporting staff. IT also has consultant facility of Physiotherapist. It operates a round the clock ambulance service in addition to the service provided by the government of Andhra Pradesh.

The University has introduced a Health Insurance scheme for students, which covers approximately 5000 students. This group medical insurance scheme offers cashless admission in corporate and reputed private hospitals for better medical care in case of emergencies.

4.10. Share of approved applications for university dormitories or for provision of support for student accommodation

90% of the students are provided hostel accommodation on campus. Some disciplines have made it mandatory for their students to reside on campus.

4.11. Existence of support service for reducing debt load of students

There are options for students to receive fellowships, but only for students engaged in research studies. They are open to MPhil and PhD students only.

Students can also apply for Scholarships provided by the Government of India and the Government of Andhra Pradesh. Apart from merit-based scholarships, there are scholarships for students belonging to the underrepresented categories “Scheduled Castes (SC)” and “Scheduled Tribes (ST)”, “Physically Handicapped (PH)”, “Listed backward classes” and other categories such as children of deceased Government servants who died while in service and Ex-Servicemen/Freedom Fighters' children and children of Political sufferers.

Students are also eligible for funding to participate in conferences abroad.

4.12. Share of students who receive financial support (scholarships, student loans, etc.)

During the 2016-2017 academic year, of the 5028 students enrolled, 3158 (62.80%) were provided with some form of financial support including Fellowship under Revised Scheme of Contingency, UGC fellowships, fellowships from Council of Scientific and Industrial Research and other organizations, M.Tech scholarships, M.Sc. Biotechnology scholarships, scholarships from the Andhra Pradesh Government, the government of India and from other states and Union Territories and from student Aid Fund and VC's discretionary fund. In addition, 75 research scholars were given fellowships from the research projects taken up by the teachers of the University with financial assistance from the UGC, Council of Scientific and Industrial Research, Department of Biotechnology at the Ministry of Science and Technology, etc.

During the 2015-2016 academic year, of the 5089 students enrolled, 4109 (80.74%) were provided with some form of financial support (sources as above). In addition, 55 research scholars received fellowships (sources as above).

During the 2014-2015 academic year, of the total of 5249 students enrolled, 4029 (76.75 %) were provided with some form of financial support (sources as above). In addition, 57 research scholars received fellowships (sources as above).

4.13. Existence of options for legal advice for students

The University reports that there are such options but no specific information has been provided.



4.14. Share of mature students in total number of students enrolled

Over 200 of the 1000-odd research students are over the age of 29.

4.15. Share of students with disabilities in total number of students enrolled

$140/5028 = 2.78\%$

4.16. Existence of specialized support for disadvantaged groups of students (students with disabilities, mature students, minority groups, etc.)

The university has a special policy for encouraging the admission of underrepresented groups. 15% and 7.5% of seats in various courses were reserved for candidates belonging to the categories “Scheduled Castes (SC)” and “Scheduled Tribes (ST)” respectively, with a provision for interchangeability between these two categories. 19 111 candidates from SC, ST & “Other Backward Classes (OBC)” categories^{viii} applied for admission to various courses. The minimum eligibility conditions for admission were relaxed for SC, ST and PH candidates to enable them to appear for entrance tests. Merit lists were drawn up separately for these candidates. Together with the SC, ST and OBC candidates that fulfilled the educational qualifications on par with the open category, the total percentage of SC, ST and OBC admissions for 2016-2017 was 17.00%, 7.79% and 34.59% respectively of the total admitted.

The University had been organizing remedial classes for SC/ST students and those from rural areas since 1989. Classes were also conducted for improving their communication skills.

There is an active Gender Sensitisation Committee against Sexual harassment at the University, constituted in response to the Sexual Harassment of Women at the Workplace (Prevention, prohibition and redressal) Act 2012. The Committee addresses issues/grievances/cases of sexual harassment and recommending their redressal. It also organizes various events and awareness raising campaigns.

4.17. Existence of built environment with universal design for students with disabilities

- Lifts/Ramps: in all buildings
- Walking aids, including wheelchairs and transportation from one building to another: in all the buildings
- Toilets equipped for people with disabilities: only in some buildings.

At the Center for Integrated Studies, a Resource Room for Differently Aabled Students has been established with 15 PCs and JAWS AND Kruezeil software , 2 Braille Printer, High-end Zoom-X Scanner and 120 books in braille print for the academic purpose

of visually challenged students. Jaws reading software has been installed for hearing-impaired students. In 2018, a Digital Resource Centre for Visually Impaired was launched at the School of Humanities. It has 25 computers, two Braille printers and Scanners.

An Empowered Committee for Differently Abled Persons exists at the university. It represents the interests of students and employees with disabilities, including the procurement of specialized facilities and support equipment. Several students are represented on the Committee as members.

4.18. Existence of adapted teaching process for disadvantaged students

The Empowered Committee for Differently Abled Persons has established guidelines for adapting the teaching process for differently abled persons, including the provision of teaching materials for braille printing and distribution, extra time for tutoring, use of library resources, training in Braille and in the use of software for Visually Challenged for interested faculty, etc. All departments have the facilities required for differently-abled students.

4.19. Existence of adapted assessments and examination process for disadvantaged students

The Empowered Committee for Differently Abled Persons has established guidelines for adapting the examination system, including options in answering certain questions involving drawings/graphics; duration of time etc.

**PERFORMANCE IN
DEVELOPING
STUDENT TALENT**

4.20. Share of students engaged in practicing entrepreneurship skills (e.g. teamwork, leadership, project management, business plan development and competitions, idea competitions for solving community and social issues, elevator pitch contests, public speaking, network creation)

Such data is not available at the University.

4.21. Share of students who participated in internships in professional settings

Over 80% of the students choose to become interns in professional settings. The others manage to get internship in research-based work.

4.22. Share of students included in coaching/mentoring programmes

Over 30% of the students are coached/mentored during the year to enable them to appear for competitive examinations.

4.23. Share of students who participated in study tours (domestic and/or international)

Such data is not available at the University



POLICIES/STRUCTURES FOR DEVELOPING STUDENT TALENT

44.24. Public financial support is provided to (partially) cover the costs of practical training

There is no such funding available.

4.25. Existence of policy/structure in support of student talent development (e.g., initiatives for business/product development, local and/or global community partnership, arts-based ventures, etc.)

There is no codified policy in this regard.

4.26. Existing dedicated place to showcase and collect innovative ideas from students, staff, faculty, community members

The University is in the process of setting up an Innovation Centre.

EMPOWERING STUDENTS AS STAKEHOLDERS IN UNIVERSITY GOVERNANCE

4.27. Student participation in official decision-making bodies at the university (e.g. Academic Council, Department Council, Student Council, etc.) (Yes/No) – please specify

Yes. Student participation in Senate and Student Council; student involvement with Directorate of Student Welfare.

4.27. Student participation in official decision-making bodies at the university (e.g.

Academic Council, Department Council, Student Council, etc.)

There are two elected student representatives and two student observers at the Academic Council. Students are represented at Department councils.

4.28. Existence of clear and transparent procedures for student involvement in decision-making bodies at the university

The University reports that there are clear and transparent procedures for student involvement in decision-making bodies at the university, but no specific information has been provided.

4.29. Engagement of students as expert members of quality assurance bodies at the university

There is no such practice at the University of Hyderabad.

4.30. Are students are asked to provide information (e.g. through surveys) on the following core aspects of student experience:

- design of the curriculum
- quality of the teaching
- student learning
- assessment methods



- student resources available to support them?

The University reports that students are asked to provide information and opinion on all of these aspects of university performance. No specific information has been provided to support this claim.

4.31. Are students asked to provide information (e.g. through surveys) on additional aspects of student experience:

- student support services
- university social life?

The University reports that students are asked to provide information and opinion on all of these aspects of university performance. The feedback provided by students is confidential. No specific information has been provided to support this claim.

4.32. Is information about quality assurance (procedures, schedules, results) published and available to students?

The University reports that information about quality assurance (procedures, schedules, results) published and available to students.

4.33. Motivation for student involvement with quality assurance:

- Monetary compensation
- Credits
- Other types of motivation

Only credits can be used to motivate student to get involved with quality assurance. No specific information has been provided.

4.34. Is training or support materials/database/web portal etc. about quality assurance provided to students

Training or support materials about quality assurance are not provided to students

4.35. Organization of events (briefings, discussions, quality forums) to inform students about the practice of quality assurance

Events to inform students about the practice of quality assurance are not organized at the University of Hyderabad.

4.36. Does the University monitor the career paths of former students?

The University reports that it is able to do this only partially.

4.37. Does the University carry out or use student and graduate surveys, where students and/or graduates provide details on their transition to the labour market?

The University does not carry out or use student and graduate surveys.

4.38. Is career guidance available throughout the whole student lifecycle?

Career guidance is available throughout the whole student lifecycle but only at the department level.

4.39. Is career guidance available to all students?

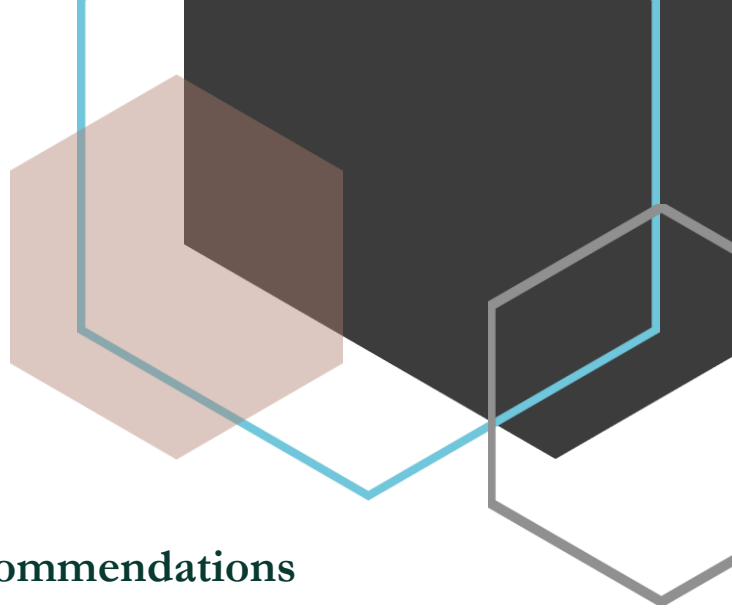
Placement activities at the University of Hyderabad are coordinated through the placement Cell which is advised by the Placement Guidance and Advisory Bureau (PGAB). All Schools/Departments are represented at the Bureau. The PGAB publicizes information about employment opportunities to the students. Placement talks are arranged and facilities are provided for Campus interviews.

4.40. Provision of career guidance specifically targeted at disadvantaged students

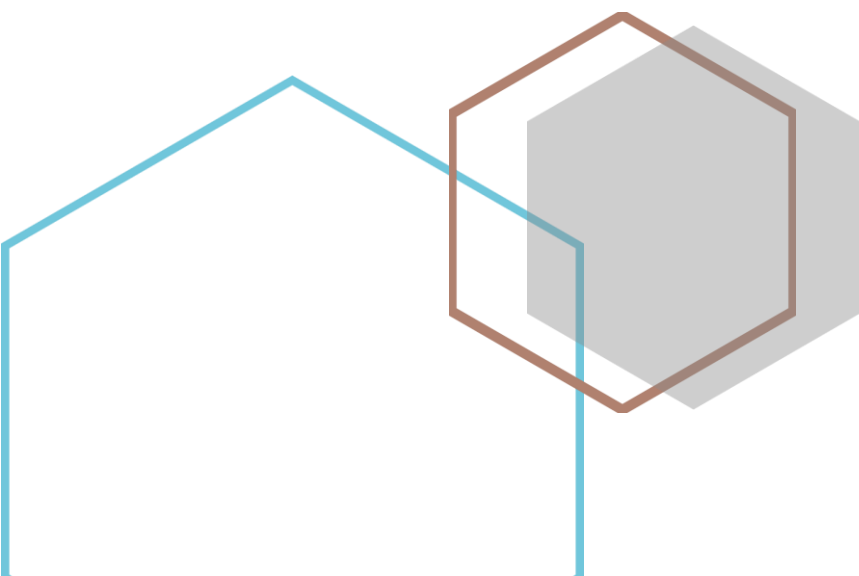
The Empowered Committee collaborates with the departments in providing such guidance.

4.41. Provision of career guidance services for graduates/alumni

Graduates and alumni do not receive career guidance services.



Conclusions and recommendations



CONCLUSIONS

The University of Hyderabad appears to have an advantage in both teaching and research. Nevertheless, innovation, technology transfer and direct links to business development have more potential to be developed further. The same can be said about entrepreneurship education, which appears underdeveloped at the University. Considering the teaching and research potential at the University of Hyderabad, this is a suboptimal outcome.

The following observations and recommendations for improvements can be made on the basis of this report:

Strengths

The University is strongly focused on research and it appears that a lot of research is related to the needs of industry. It has also created mechanisms to involve employers in curriculum development and teaching. This trend should be continued and more efforts should be made to clarify and point out the practical and mutually beneficial aspects of the collaboration. This, together with the existing provisions for frequent update of curricula, should be able to guarantee that the educational output of the University is relevant even though employers are not involved in governance.

Despite restrictions on faculty ability to hold official work positions in industry (which limits mobility across the business and education sectors), there is still possibility and relative freedom for faculty and researchers to engage in research affecting the economy and society. Such engagement should be encouraged further.

Considering the variety of teaching subjects covered (some of which are not directly related to Entrepreneurship), the University appears to have a strong human resource capacity for entrepreneurship education.

The University has structures in place to facilitate links with society and business. It appears that these structures are active and are looking for synergies with government initiatives. Such activities should be encouraged further.

The University is performing well in terms of promoting internships, as well as the acquisition of transferrable skills. In all study programs, the completion of an internship and/or a placement scheme is a requirement. This is an important step toward promoting graduates' employability. The focus should now be on improving quality of internships and the effectiveness of soft skills training.

The University is performing very well in terms of grant funding, as well as publication activity and research impact. There is an impressive number of staff members who hold industry grants. It is commendable that research grants are provided for new faculty as this encourages a culture of research excellence and quality.

The reported 100% rate of involvement of students is commendable. The rate of production of PhD degrees is also substantial, which is in line with the research focus of the university.



The University avails of a satisfactory number of research laboratories and research centres, which puts it in a very advantageous position to not just excel in research but also engage more actively in knowledge transfer to the economy and society. There is a satisfactory focus on interdisciplinary research and teaching.

Considering its size, the University has a very satisfactory student-teaching staff ratio. Structures supporting students (admission, welfare, health services, legal services, accommodation, etc.) are very well developed. The 90% rate of provision of university dormitories is quite impressive. It is commendable that female students are given priority in the provision of hostel accommodation.

The University offers distance and flexible learning options, which significantly increases its capacity to cater to the needs of non-traditional students.

A variety of scholarships and fellowships are available to support students financially, although these are funded from government sources rather than any internal funding initiatives. It should be noted that the most substantial support is primarily provided to the economically most disadvantaged students and PhD students, which is a reasonable policy. The rate of scholarship provision is very satisfactory, despite a decline during the last academic year.

According to the provided information, disadvantaged students receive substantial support at the University– both financial and in terms of assistance during their studies (e.g. remedial classes). The University has a special policy for encouraging the admission of underrepresented groups and there is a special committee to represented disabled persons. Gender issues appear to be given due attention. The University has provided built environment with universal design for students with disabilities in all of its buildings.

RECOMMENDATIONS

The University is recommended to:

- Explore the possibility of further developing entrepreneurship education. While the lack of a separate Entrepreneurship program in itself is not a great drawback, the University should increase the number of entrepreneurship courses offered within other programs. This should be done not just for programs related to management and commerce, but also for programs relevant to Engineering, Medicine and the Arts and the Creative Industries. The number of staff that is engaged in teaching entrepreneurship is rather low and there is scope for increasing it. More staff should receive training in the field of entrepreneurship in order to be able to incorporate entrepreneurial learning in teaching. The University could also consider engaging in more research projects focused on Entrepreneurship.
- Formulate, regularly update and implement a strategy for



institutional development: The University would benefit from formulating and implementing a coherent explicit strategy for growth and development.

- Formulate, regularly update and implement short-term to medium-term strategy for entrepreneurship education, strategy for innovation and strategy for knowledge transfer to the external environment, setting clear goals and allocating resources: Developing such strategies at institutional level would streamline the university's efforts in these areas, strengthen the commitment of all staff members and ensure that available resources are used optimally to achieve maximum results. Considering that the Government of India is prioritizing entrepreneurship education, innovation and developing links with business and society, and that substantial public financial resources are likely to be invested in these areas, such strategies could contribute to improving the overall performance and recognition of the University.
- Review and strengthen the outreach and communication strategies of the incubator and kick-start technology transfer via the planned new structures: It appears that more information needs to be provided in the public domain on the activities of the university's incubator. It is recommended that the structure develops a strong communication strategy in order to ensure that it reaches out effectively to a variety of interested actors in the local and regional economies. This support structure does not maintain a strong web or social media presence. The University also needs to focus on implementing the plans to open an Intellectual Property Management Cell and a Technology Transfer Cell, and ensure that these structures commence their work back up by a strong communications strategy.
- Develop and introduce competency-based frameworks for assessing students' knowledge and skills: Despite the commendable focus on training in soft skills, it is recommended that the university explore the possibility of developing and introducing a competency-based framework for assessing students' skills, including both soft and professional skills.
- Diversify funding: The University gets most of its funds from research projects and block grants from State Government. In addition to this type of funding, efforts to increase the number of consultancy projects, applied research sponsored by industry and other funds from industry should be stepped up, especially in view of improving the financial situation and allowing the University to take advantage of its recently increased autonomy from the University Grants Commission.
- Formulate and implement strategies aimed at retaining students and improve monitoring and quality assurance: The University appears to have a basic marketing strategy aimed at attracting

students and boasts high competition for student enrolment, which ensures that it can select talented students. However, more actions focused on direct contact with potential students could arguably be developed, at least in the region surrounding the university (e.g. presentations in secondary schools or achieving visibility through public programs or outreach). It appears that if there are any efforts at attracting foreign students, those efforts are not bearing much fruit, so devising new approaches to attracting students from abroad may be beneficial. In addition to the marketing strategy, however, the University would especially benefit from devising and implementing a strategy aimed at retaining students. This applies to retaining both Indian and foreign students. To achieve this, the University needs to step up monitoring and quality assurance activities in order to be able to ensure the quality of study programs. Monitoring could also help the University to better present the support and opportunities that students receive when studying at University of Hyderabad. It is notable that the University does not use tracer studies, is not well aware of its graduates' transition to the labor market and does not keep track of the entrepreneurial learning activities available to its students. This limits the University's ability to market itself and to motivate enrolled students.

- Intensify internationalization efforts: The University does not appear sufficiently internationalized, considering the substantial educational and research potential that it exhibits. More foreign students should be attracted and the possibilities for international mobility of students should be improved.
- Develop an IPR policy and improve monitoring of the University achievements with regard to promoting innovation and entrepreneurship in the economy. The lack of an IPR policy is a serious drawback, especially for a research university like the University of Hyderabad. This weakness needs to be addressed with high priority, preferably in parallel with the development of technology transfer cells.
- Improve relations with alumni: The University would definitely benefit from more extensive engagement with alumni and graduates, in particular with regard to monitoring the career path of graduates and providing career guidance services to alumni.

ⁱ <https://www.nirfindia.org>

ⁱⁱ The governmental agency in India that determines and monitors standards for higher education

ⁱⁱⁱ <http://pib.nic.in/newsite/PrintRelease.aspx?relid=177751>

^{iv} The NAAC assesses universities on seven parameters — curriculum, teaching-learning and evaluation, research, infrastructure, student support, governance and leadership, and institutional values. Each parameter brings a score out of maximum 4.

AUTONOMY & AUTONOMY	
CATEGORY I INSTITUTIONS	CATEGORY II INSTITUTIONS
Automatically eligible for central assistance without UGC inspection	Same as Category 1
Can open off-campus centres without UGC nod, but must arrange funds	Need UGC nod, but inspection not needed. Subject to conditions
Can open research parks, incubation centres, society linkage centres	Need UGC approval
Can hire without UGC nod foreign faculty, with conditions	Same as Category 1
Can admit foreign students on merit, with conditions	Same as Category 1
Can collaborate with world's top 500 universities, without UGC nod	Will continue to need UGC permission
Can offer distance learning without UGC approval, in line with rules	Will have to seek UGC approval

v

Source: “Simply Put: What ‘autonomy’ will bring for UGC’s chosen ones”, The Indian Express, May 09, 2018 (<http://indianexpress.com/article/explained/what-autonomy-will-bring-for-ugcs-chosen-ones-prakash-javadekar-higher-education-5107849/>)

vi University Grants Commission (Categorisation of Universities for Grant of Graded Autonomy) Regulations – 2017 Notification, May 2017 (https://www.ugc.ac.in/pdfnews/9837591_Public-Notice-regarding-draft-Regulations-and-Guidelines.pdf)

vii The numbers slightly diverge from those published in Annual Reports of the University, likely due to the different time of counting.

viii A collective term used by the Government of India to designate groups that are socially or educationally or economically disadvantaged for reasons other than belonging to a caste.

