# Incremental Improvements

Between

2018-23



## 6.5.3: Incremental Improvements made for the Proceeding Five Years with regard to Quality (*in case of first NAAC A/A*)

#### Fact Sheet

Quantum University received approval from the Uttarakhand Government under the Quantum University Act of 2016, officially published on November 3, 2017. The university commenced operations on January 1, 2018, with the establishment of the Internal Quality Cell on June 23, 2018. The inaugural batch of students enrolled on August 14, 2018. Since its inception, the IQAC has been instrumental in formulating various policies, SOPs, and procedures concerning the teaching-learning process, student administration, and faculty management. Through its relentless efforts in enhancing quality across academic and administrative domains, the university has witnessed a remarkable increase in growth metrics

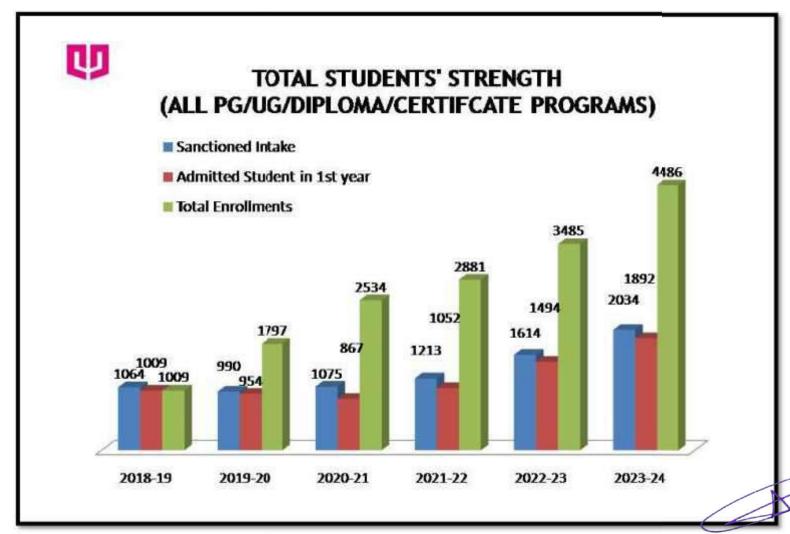
- A. General Prospective
- B. Governance
- C. The Curriculum and Teaching learning Process
- D. Research Profile of the Faculty Members
- E. University's Initiative for Holistic Development of the students
- F. Graduate's Outcome
- G. Infrastructure

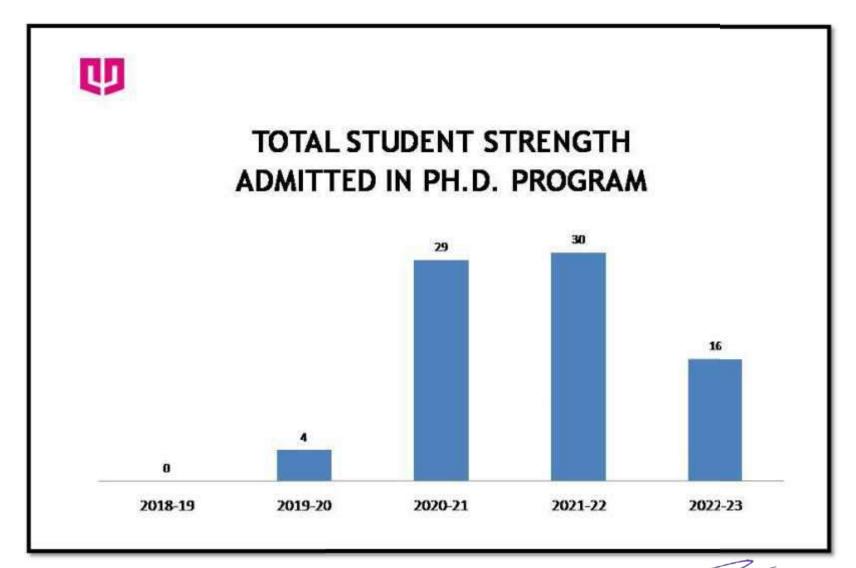
#### A. General Prospective

Since 2018, student enrollment and faculty numbers have steadily risen, reflecting the university's dedication to growth. This trend continued in subsequent years, with a consistent increase in both student body and faculty strength. Notably, in the 2019-20 academic session, the university initiated Ph.D. programs across five disciplines, enhancing its academic repertoire and catering advanced research opportunities. This expansion underscores the institution's commitment to academic excellence and its pursuit of providing diverse educational pathways for students and scholars alike. The following table shows data regarding the growth trends if leaves COVID Years

Sl.No	Parameters	2018-19	2019-20 (Covid Even Sem)	2020-21 (Covid Both Sems)	2021-22 (Covid Odd Sem)	2022-23
A	General Prospective					
(i)	No. of Courses Taught	261	707	1180	1410	1585
(ii)	No. of Students Admitted (including	1009	954	867	1052	1494
	Diplomas)					
(iii)	No. of Students Admitted in Ph.D. Program	0	4	29	30	16
(iv)	No. of Students on Roll (Including Diplomas)	1009	1797	2534	2881	3485
(v)	No of Faculty Members Appointed	66	109	152	174	202
	(including Diploma)					

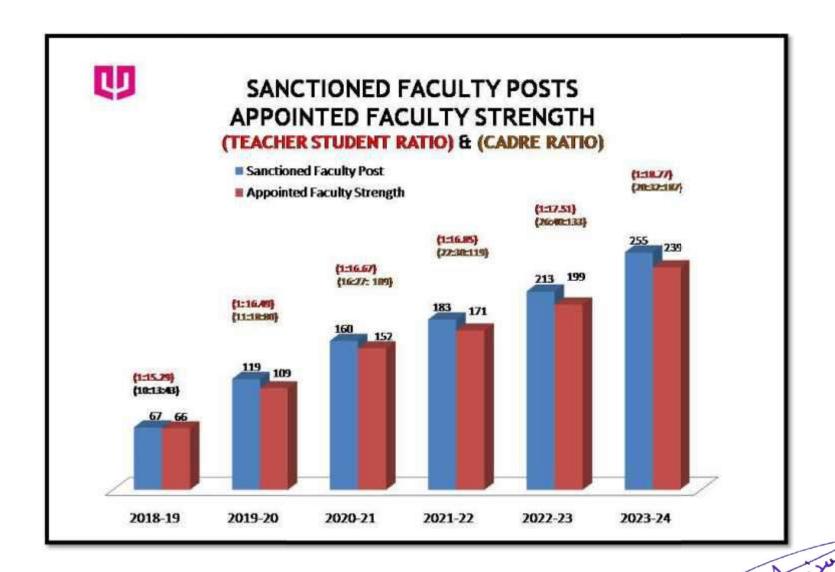
#### **Graphical Representations (General Prospective)**





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#### B. Governance

Effective governance in Quantum University ensures transparency, accountability, and quality assurance. It facilitates strategic planning, resource allocation, and stakeholder engagement while upholding ethical conduct and integrity. At Quantum University, the regular conduct of meetings of statutory, regulatory bodies, preparation of agendas, and documentation of decisions in accordance with university statutes played a pivot role in the Quality assurance. This is worth mentioning that the active participation of members in statutory and regulatory bodies to promote best practices in various aspects of university operations. The governance top-down and bottom up approach in governance ensures and reflects the university's commitment to transparency, inclusivity, and adherence to established guidelines and best practices in decision-making processes.

Academic departments follow a structured decision-making process involving both junior and senior faculty members within common domains. Known as the 'Sub-Specialty Group,' this departmental-level body concentrates on specialized areas within the university's academic framework. It discusses and decides on matters relevant to their fields, ensuring informed decisions that influence departmental operations. The following table and graphical representation are reflection of how the university priorities good governance to the lowest level which merits to be presented as measure of growth

Sl.No	Parameters	2018-19	2019-20 (Covid	2020-21 (Covid	2021-22 (Covid	2022-23
			Even Sem )	Both	Odd Sem)	
				Sems)		
(i)	Successfully Organized Meeting of Statuary	YES	YES	YES	YES	YES
	Bodies i.e Board of Governors, BOM, AC, FC,					
	BOF and BOS					
(ii)	Number of Regulatory Bodies Formed and	19	05	1	1	1
	implementation of their Business Functions (26)					
(iii)	Formation of Sub Speciality Groups in the	No	Yes	Yes	Yes 🥌	Yes
, ,	Department and their implementation					Registrar
(iv)	Academic and Administrative Audits	Yes	Yes	Yes	Yes	Quantum Uni

#### **Governance (Empowering the Lowest level)**



#### C. The Curriculum and Teaching learning Process

In Quantum University, the growth is evidenced through curriculum enrichment, skill development, and innovative learning strategies adopted in subsequent years. We focused on curriculum enrichment which in turn shaped as continuous improvement, interdisciplinary education and integration of emerging technologies. Skill development initiatives include industry collaborations, soft skills training, and experiential learning opportunities. At Quantum, learning strategies focus on innovative teaching methods, digital resources, and developing critical thinking through pan university and domain specific strategies. These measures signify an institution's commitment to providing quality education, preparing students for the workforce, and developing lifelong learning.

Subjects such as emerging technologies, sustainability, global perspectives, ethics, data analytics, entrepreneurship, communication, and cultural studies are included to complement the comprehensive education model. They enhance students' skill sets, employability, and prepare them for diverse career paths and societal challenges. The following table demonstrates the data sets which depicts growth in teaching learning process and its mechanism for enrichment in a structured way.

Sl.No	Parameters	2018-19	2019-20 (Covid Even Sem)	2020-21 (Covid Both Sems)	2021-22 (Covid Odd Sem)	2022-23
(i)	CO-PO and BL Levels incorporation and their mapping in Curriculum	Yes	Yes	Yes	Yes	Yes
(ii)	CO-PO Attainment Calculation and Automation and its feedback in curriculum design	Yes on Excel	Yes on Excel	Yes on Excel	Yes on ERP	Yes on ERP
(iii)	Focus on Local, National and Global Issues in Curriculum	Partially	Partially	Partially	Fully	Fully
(iv)	Incremental Progression on Learning Strategies	Yes	Yes	Yes	Yes	Yes

	at pan University level and Domain specific					
	Learning Strategies					
(v)	Mentor-Mentee System	Yes	Yes	Yes	More cohesive	More cohesive
(vi)	Feedback System for all stakeholders Analysis followed by incorporation of it in curriculum updation	Students and Teachers Feedback taken Analysis and ATR	Students, Teachers and Company Feedback taken and ATR	Students, Teachers, Company and Alumni Feedback taken, Analysis and ATR	Students, Teachers, Company and Alumni Feedback taken, Analysis and ATR	Students, Teachers, Company and Alumni Feedback taken, Analysis and ATR
(vii)	Number of Minor Specialization Programs offered for elevating the curriculum as interdisciplinary and lifelong learning	5	6	7	8	9
(viii)	Number of Value Added Program for Communication Skill and Analytical Skill Offered	1	4	7	9	12
(ix)	Incorporation of IKS and UNDP Program in all UG Program	No	No	No	No	Yes
(x)	Use of Online Learning Management System (OLRC): Progressive Growth	No	Yes	Yes	Yes	Yes
(xi)	Use of ICT for Teaching Learning Process in courses	20%	0%	100% (Online, Covid)	100% (Online, Covid)	70%
(xii)	Number of Value Added Courses Offered	13	40	34	19	28
(xiii)	Learning Management System through ERP was incorporated (Progressive Growth)	No	No	No	Yes	Yes

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#### **Some Graphical Representations**

#### (The Curriculum & Teaching Learning Process)



#### FEATURES OF THE CURRICULUM

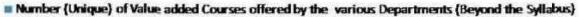
- 1. Comprehensive and Interdisciplinary Education Model
- 2. Emphasis on Soft Skills and Specialization
- 3. Adaptable Curriculum Frameworks
- UG Degree Programs with major Specializations and interdisciplinary Minor specializations
- 5. Flexible Program Durations and Certifications
- 6. Immersive 4-Year Bachelor's Degree Program
- 7. Incorporation of Credit-Based Valued Added Courses
- 8. Internship Opportunities
- 9. Focus on Competency Cultivation
- 10. Restructuring for Multidisciplinary Learning
- 11. Integration of MOOC in Curriculum

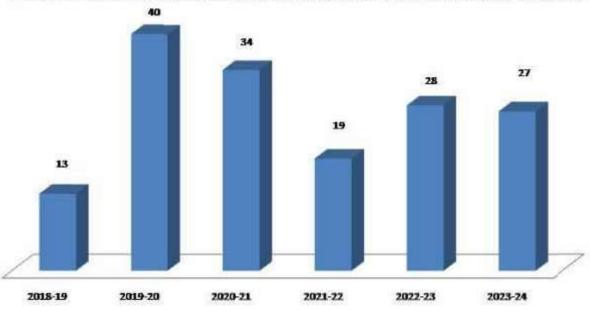


#### INCORPORATION OF VALUE ADDED COURSES

(Domain Specific and Interdisciplinary)

#### Number (Unique) of Value Added Courses offered by the various Departments (Beyond the Syllabus)





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#### D. Research Profile of the Faculty Members

Quantum University has experienced significant advancements in its research landscape, driven by proactive measures. The institution empowers its Research Board to cultivate a dynamic research environment, progressively the density of the collaboration and innovation across disciplines. Seed Money and Research Promotion Funds incentivize faculty and students to manifest on pioneering research ventures, while awards recognize excellence and encourage further exploration.

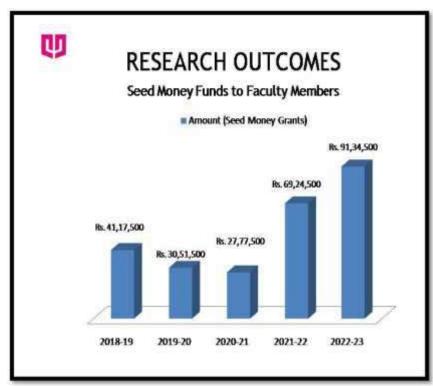
Moreover, Quantum University actively seeks extra-mural research funding and engages in consultancy projects to broaden its research scope and impact. By involving advanced students in research publication, patent filings, and book chapter writing, the university promotes experiential learning and nurture a culture of scholarly achievement with a growth pattern.

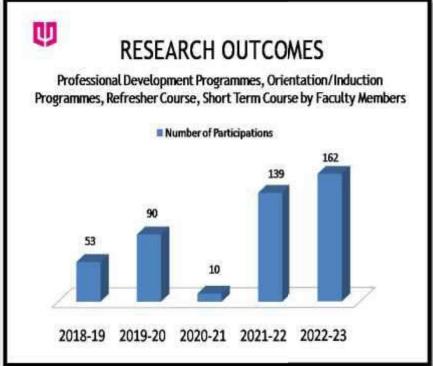
Furthermore, Quantum University is dedicated to promoting and evolving its innovation ecosystem by facilitating collaborations, providing funding opportunities, and supporting entrepreneurial endeavors. Through these concerted efforts, the university continues to strengthen its position as a hub for groundbreaking research and innovation. The following data sets are the evidence of growth in research profile of faculty members.

Sl.No	Parameters	2018-19	2019-20	2020-21	2021-22	2022-23
			(Covid	(Covid	(Covid	
			Even Sem )	Both Sems)	Odd Sem)	
(i)	Research Promotion through Seed Funding	4117500	3051500	2777500	6924500	9134500
	through University Research and Advisory					
	Board					
(ii)	No. of Research Projects	0	1	0	25	1015
(iii)	Research Grants in INR	0	800000	0	900000	103362431
(iv)	Research Consultancy Fund Received from	346000	370000	348000	226000	27161930
	Consultancy in INR					
(v)	Number of Patent Published	1	14	19	51	100
(vi)	Number of Patent Granted	1	0	4	19	19
(vii)	MoUs	7	10	18	29	31
(viii)	Total Publications in UGC and Scopus Indexed	38	51	21	42	182
	Journals					7
(ix)	International / National Seminar Conducted	15	28	29	36	86

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	/Participated					
(x)	FDP Attended by Faculty Members	53	90	10	139	162
(xi)	Book Chapter published by Faculty Members	52	51	30	86	1010





#### E. University's Initiative for Holistic Development of the students

The growth of the university is apparent through its proactive initiatives aimed at nurturing the holistic development of students. These initiatives encompass a wide array of activities focusing on skill development, life skills, soft skills, and inculcating values related to humanities, nation, and culture. Additionally, the university actively engages with corporate and social stakeholders in these events, enriching the overall learning experience.

The institution has progressively developed a system, which meticulously records all co-curricular and extracurricular activities, closely monitoring the progress of each student. This data-driven approach ensures that every student's growth contributes to his or her overall development. Moreover, the university emphasizes the quality of each event outcome, ensuring that they align with predefined objectives. Through these concerted efforts, the university cultivates a vibrant learning environment where students thrive academically, socially, and ethically, preparing them for success in their future endeavors. These are some facts, which deserve mentioning to showcase the growth

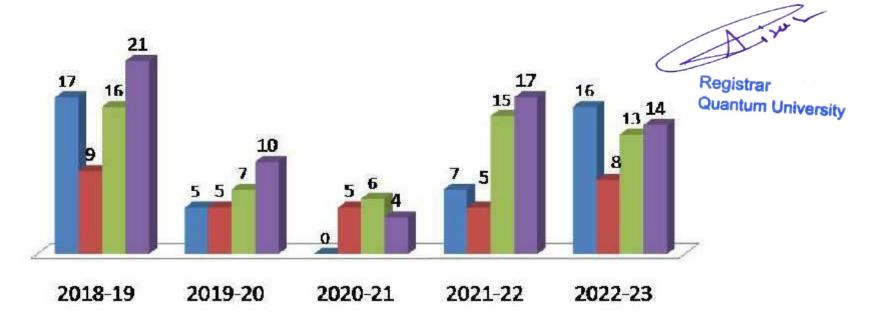
Sl.No	Parameters	2018-19	2019-20 (Covid Even Sem )	2020-21 (Covid Both Sems)	2021-22 (Covid Odd Sem)	2022-23
(i)	Use of structured system for General Proficiency System for Holistic Development		Manual and Structured	Manual and Structured	Automated and Structure	Automated & Structured and focus on individual
(ii)	Extra-curricular Activities for the students	41	27	15	44	51
(iii)	Capacity Building Programs for students	31	26	21	24	36
(iv)	Initiatives for constitutional, Institutional values and social responsibility	64	36	13	33	67

#### University's Initiative for Holistic Development of the students



### FOR STUDENTS

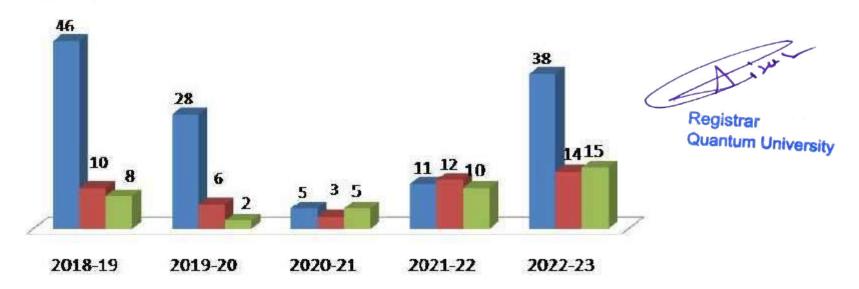
- Sports Events Organised Cutural Event Organised
- Technical Events Organised
   Club activities Organised





# INITIATIVES FOR CONSTITUTIONAL, INSTITUTIONAL VALUES & SOCIAL RESPONSIBILITY

- Outreach Extension Programs through Pahal and Uttant Bharat, NSS
- Programs for Sensitization for responsibility of a citizen and Nationality
- Programs Senstization for inclusive environment



#### F. Graduate's Outcome

The growth of the university is indisputable, as evidenced by its significant impact on graduate outcomes. The institution's proactive efforts in realizing the industry connections have resulted in a robust placement record, with graduates securing positions in renowned companies nationwide. Furthermore, a substantial number of students pursue higher education in prestigious institutes, reflecting the quality of education provided.

The average packages offered to graduates have seen a steady increase, indicative of the value placed on their skills and expertise. The university's proactive approach to inviting companies for recruitment drives has resulted in a diverse range of job opportunities, particularly in design and development sectors.

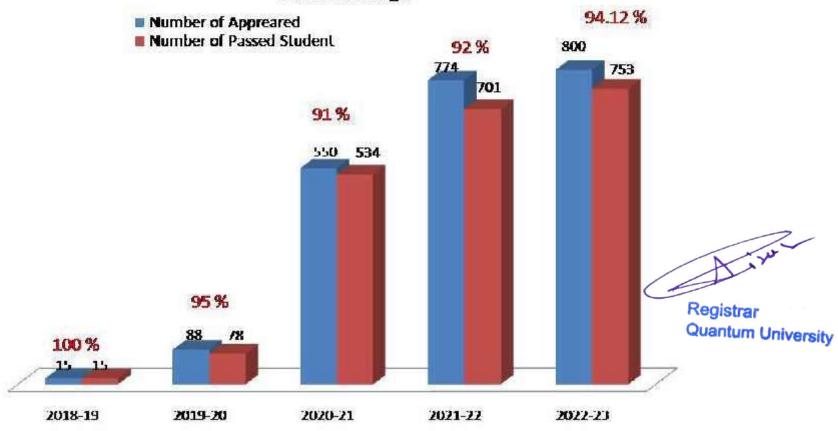
Additionally, the university takes pride in its students' achievements, with numerous awards garnered in national and state-level competitions. Furthermore, a high number of students qualifying for national and international-level examinations for higher education speaks volumes about the caliber of education imparted. These collective outcomes underscore the university's commitment to excellence and continuous growth.

Sl.No	Parameters	2018-19	2019-20 (Covid	2020-21 (Covid	2021-22 (Covid	2022-23
			Even Sem )	Both	Odd Sem)	
				Sems)		
(i)	Results Percentage (Graduated/Appeared)	100%	95%	91%	92%	94.12%
		(15/15)	(78/88)	(534/550)	(701/774)	(753/800)
(ii)	Percentage of Students Above 7.5 CGPA	0	15.38%	38.20%	50.65%	41.38%
(iii)	Students' Progress Placement Numbers	15	45	359	533	517
(iv)	Students' Progress in Higher Education	0	33	65	164	95
(v)	Salary Distribution in Mean/Highest in Lacs	1.8/1.8	3.2/12	3.7/14	4.2/17	4.76/24
(vi)	Company Visited	1	5	112	213	287
(vii)	Qualified in national and international	0	0	8	29	43
	Examinations					7
(viii)	Awards won in inter University/State/National	0	28	0	171	232
	Level Competition				N. Y.	



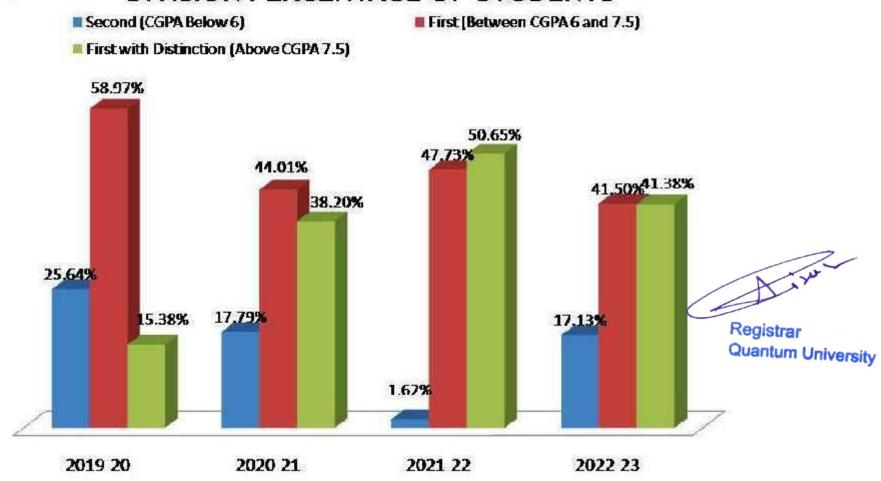
### RESULTS (PASSING OUT STUDENTS) (FINAL YEAR PASSING %)





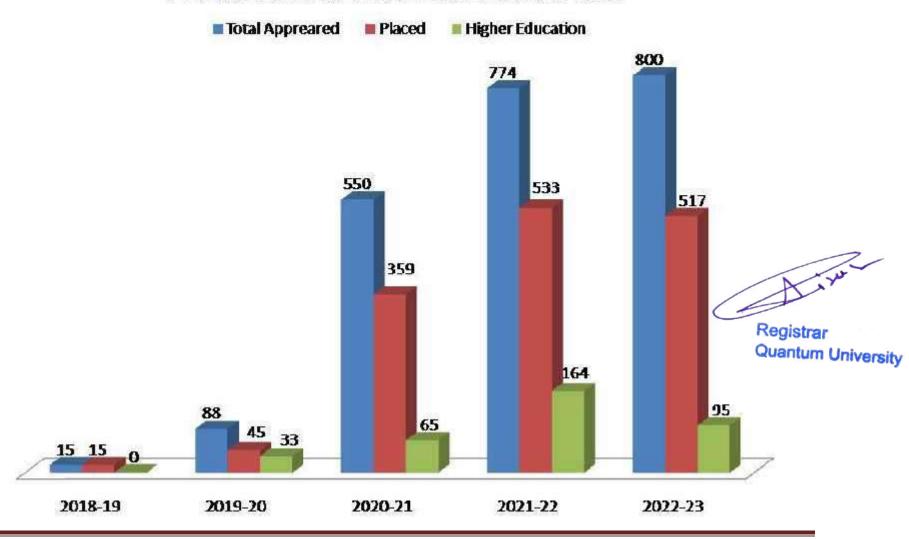


#### **DIVISION PERCENTAGE OF STUDENTS**





## STUDENT PROGRESSION PLACEMENT/ HIGHER EDUCATION





#### **SALARY DISTRIBUTION (2022-23)**

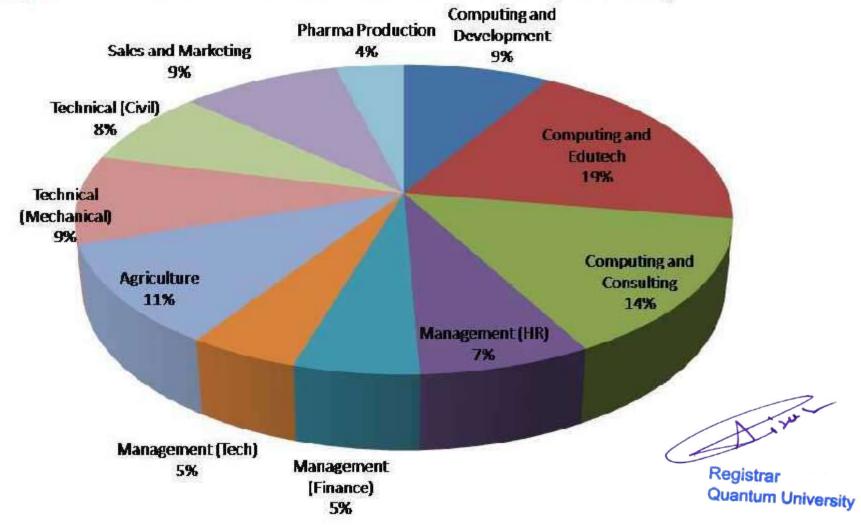




Salary Offered (Average : 4.76 Lacs) 2022-23

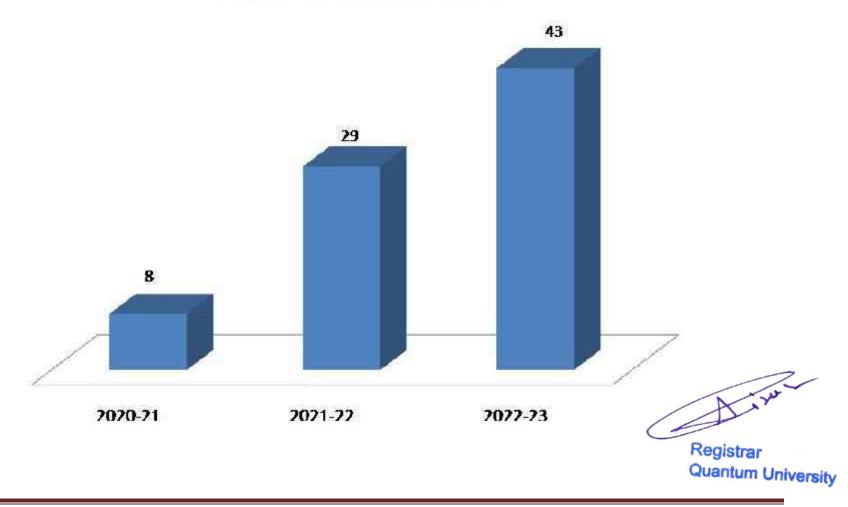


#### **PROFILE OF COMPANIES VISITED (2022-23)**



## QUALIFIED IN NATIONAL / INTERNATIONAL LEVEL EXAMINATIONS

■ Number of Qualified Students



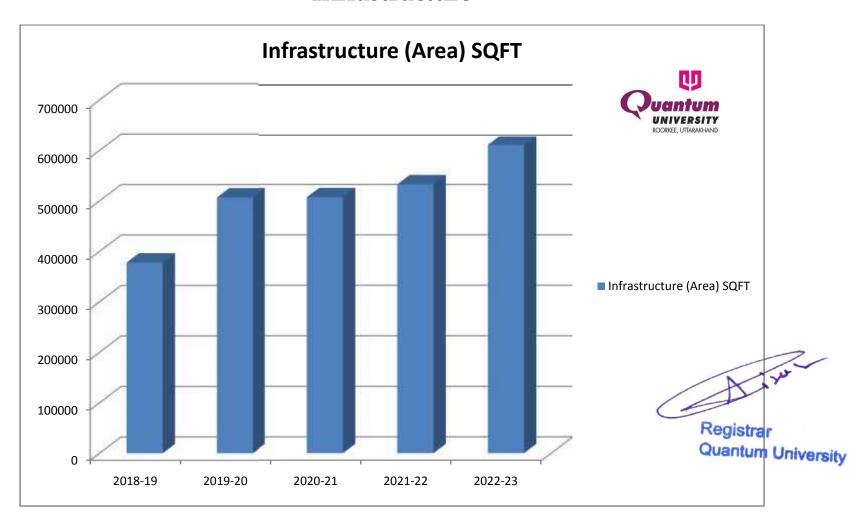
#### G. Infrastructure

The infrastructure of the university has seen substantial growth to accommodate the increasing number of students and enhance their academic experience. This expansion encompasses academic facilities such as laboratories and central instrumentation facilities, providing students with access to state-of-the-art equipment for practical learning. Additionally, there has been a significant increase in the number of computers and learning resources, facilitating digital learning and research.

To streamline administrative processes, an effective Enterprise Resource Planning (ERP) system has been implemented, enabling efficient data management and control mechanisms. The university has also prioritized the development of amenities and recreational facilities within the campus, promoting student wellness and emerging a vibrant campus community. Furthermore, residential spaces have been expanded to accommodate the growing student population, ensuring comfortable living arrangements. Through these infrastructure developments, the university is committed to providing a conducive environment for holistic student development and academic excellence.

Sl.No	Parameters	2018-19	2019-20 (Covid	2020-21 (Covid	2021-22 (Covid	2022-23
			Even Sem)	<b>Both Sems</b> )	Odd Sem)	
(i)	Infrastructure (Area) SQFT	378000	507000	507000	532620	610620
(ii)	Infrastructure (Academics) SQFT	255000 built for	255000	255000	255000	333000
		1st 4 years				
(iii)	Infrastructure ERP (Modules for Faculty Administration, Student admission, Student, Faculty Profile, TL Process Progress, Feedback, CO-PO Attainment Student, Mentor-Mentee, LMS, Academic Administration, Minor, Domain Specialization Management, VAP management, HR, Grievances, Continuous Evaluation, Training and Placements, Company Profiles, Attendance, Examination, hostels, Sports, General proficiency, Event Management, Records, Verification and Transcript, etc)	19 Modules	21 Modules	24 Modules	25 modules  Registrar Quantum Ur	28 Modules

#### Infrastructure



# Contribution Done by Internal Quality Assurance Cell 2018-23

- 1. Generation of IQAC Reports
- 2. Generation of Annual Reports
- 3. Feedback Analysis and ATR
- 4. Academic & Administrative Audits
- 5. Course and Learning Outcomes and ATRs
- 6. Review Meetings
- 7. Teaching Learning Process Review and Analysis
- 8. Result Analysis
- 9. Collaborated Programs Review
- 10. Development of Systems and Regular updation
- 11. Organizing Internal and External Quality Programs
- 12.Development of SOPs and Policies, their circulations and ensuring their adherence
- 13. Development of University Annual Reports and various other Reports

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