



KALINGA INSTITUTE OF INDUSTRIAL TECHNOLOGY (KIIT)

Deemed to be University U/S 3 of UGC Act, 1956 Bhubaneswar, Odisha

FOREWORD

The launch of the New Education Policy, designed to provide a comprehensive framework for the education system in India, promises great change for the country's knowledge economy. Here, we will offer an international perspective on the new policy and discuss if paving the way for foreign universities to set up campuses in the country will transform the current, fragmented higher education ecosystem and give rise to lasting transformational change for universities. It is widely accepted that higher education plays a key role in the economic, scientific, social and human development of any country. Quality higher education is a pre-requisite for accessing the knowledge that guarantees economic development. Ensuring quality is a fundamental responsibility of every higher education institution, through the establishment of strong internal quality assurance systems. Recognizing this, the KIIT DU is committed to Quality Assurance as a means towards maintaining and enhancing the quality of the total student learning experience. It is in this context that the Quality Assurance and Management Policy of the KIIT University was conceived and instituted. The purpose of this Manual is to support the implementation of the policy.

Quality assurance is all about the need to promote and maintain quality, in our case the quality of higher education in our institution. Quality assurance is sometimes perceived as a suppressive instrument to academic freedom and institutional autonomy; as a punitive instrument against academic staff members or institutions. The National Education Policy 2020 has given emphasis on achieving Quality assurance in higher education to bridge the gap between Academia and the Industry, which is the largest employer of graduates in India, besides the Government. There are many stakeholders in higher education: Government & Public Sector; Private Sector Employers; Academic world; Students; Parents; and the Society. Quality assurance promotes accountability of our institution to our stakeholders. It promotes transparency of our systems. Quality should be the concern of everyone in our institution. It is, however, important that there should be a central structure that supports the implementation of our internal quality assurance system, hence the establishment of Quality Assurance Cell. I would like to express my firm support for this initiative. For effective implementation of the Quality Assurance (QA) process, the University Management fully supports the Quality Assurance initiative; and we undertake to create a conducive environment for effective implementation of our internal quality management system.

Vice Chancellor

ACKNOWLEDGEMENT

We acknowledge the vision of the Founder of KIIT DU to develop the Institution as a hub of quality education fulfilling global standards with a single minded focus on solving real life challenges for holistic development of human society. We feel gratified to note the perfect alignment of the KIIT-DU Vision with most of the objectives of the National Education Policy, 2020. All the heads of schools and departments are, therefore, called upon to use the Quality Policy, Manual and associated policies and procedures as a guidebook to understand and ensure quality in all routine as well as new activities, whether it is a small activity or a big event. Quality has to be inculcated as the DNA of every process that is followed at KIIT-DU. We hope that you will find this QA Manual useful we invite all concerned to use the Manual in evaluating and improving their divisional Quality Assurance systems, policies, plans and programs. The Internal Quality Assurance Cell (IQAC) shall continue to provide assistance for

capacity building in Quality Assurance to all KIIT DU constituencies. The Internal Quality Assurance Cell(IQAC) would like to acknowledge the following sources that were used in drafting this Manual: The Quality Assurance System for UGC; Quality Assurance in AICTE; the Standards and Guidelines for Quality Assurance in the Higher Education; (NBA) National Board of Accreditation; (NAAC) National Assessment and Accreditation Council; Criteria for Institutional Audit; and the inputs from various internal sources ranging from the highest to lowest authorities and functionaries at KIIT-DU including the schools and departments.

IQAC

ABSTRACT

Kalinga Institute of Industrial Technology (KIIT) Deemed to be University not only has a world class infrastructure alone but also possesses the quality of teaching and research illustrated by the accreditation of NAAC of UGC and NBA of AICTE that makes KIIT DU one of the most promising centres of excellence. KIIT Deemed to be University, Bhubaneswar has been placed among the top universities of the world (201-300) in the Times Higher Education (THE) Impact Rankings-2021. This ranking assesses universities against the United Nations Sustainable Development Goals (SDGs). KIIT achieved standout results across the individual SDGs, ranking 86th for 'efforts to reduce inequality within and among countries', 101+ for 'strengthening partnerships', 201+ for 'Quality Education and Peace and Justice' and 'Strong Institutions'. It is indeed a matter of pride that KIIT has been carrying out its social responsibility with sincerity and dedication, besides progressing with impressive ranks in quality teaching, research, publication, etc. Value addition and accountability, maintenance of high quality in teaching environment and ambiance are mandatory for all teaching and non-teaching staff and all are to be driven by the principle of students-parents visitors friendliness. The main purpose for Quality Assurance Manual (QAM), is to help ensure continuous improvement in the mandated activities across all the schools and across all the functions and activities conducted centrally in the University. It helps to have a coordinated system of internal quality assurance that is adhered to consistently across the institution, while recognizing school and discipline wise variations on the basis of different external and internal stakeholders' expectations. The Quality Management System (QMS) envisages the quality of inputs, the quality of processes and the quality of outputs. It assures the adherence of the National level of Accreditation bodies (NAAC/NBA/UGC) and International level of Accreditation bodies (IET, ABET), Rankings (NIRF, IoE, Times) criteria/sub-criteria as cited in respective web portal. QAM focuses on the 5Ws &1H (why, what, when, where, who, and how) elements of the Quality Assurance, aligning various activities from planning to implementation with timelines, measures and accountability spelt out with clarity.

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Sustainable Development Goals

GOAL 1: No Poverty
GOAL 2: Zero Hunger
GOAL 3: Good Health and Well-being
GOAL 4: Quality Education
GOAL 5: Gender Equality
GOAL 6: Clean Water and Sanitation
GOAL 7: Affordable and Clean Energy
GOAL 8: Decent Work and Economic Growth
GOAL 9: Industry, Innovation and Infrastructure
GOAL 10: Reduced Inequality
GOAL 11: Sustainable Cities and Communities
GOAL 12: Responsible Consumption and Production
GOAL 13: Climate Action
GOAL 14: Life below Water
GOAL 15: Life on Land
GOAL 16: Peace, Justice and Strong Institution

GOAL 17: Partnerships for the Goals



CHAPTER 1 ADMINISTRATIVE AND ACADEMIC SUPPORT SYSTEM

CHAPTER 1 ADMINISTRATIVE AND ACADEMIC SUPPORT SYSTEM

Name of the Institution and Address (Telephone, Mobile, E-Mail)-Kalinga Institute of Industrial Technology (Deemed to be University u/s 3 of UGC Act 1956) AT/PO-KIIT, Bhubaneswar, Phone: 8114382202, Email: kiit@kiit.ac.in Name and address of the Trust and the Trustees Address including Telephone, Mobile, E-Mail-Name and address of the Trust-Kalinga Institute of Industrial Technology (KIIT) Society, AT/PO-KIIT, Bhubaneswar, phone: 8114382202, email: kiit@kiit.ac.in Trustees-Mrs. Saswati Bal, President Mr. R N.Dash, Secretary Mr. Umapad Bose, Member Prof. (Dr.) Achyutananda Samanta, Founder Name and Address of the Vice Chancellor-

Prof. (Dr.) Sasmita Samanta, Vice Chancellor AT/PO-KIIT, Bhubaneswar, phone: 8114382202, Email: <u>vicechancellor@kiit.ac.in</u>

Name of the affiliating University- Not Applicable

1.1Governance- Members of the Board and Their Brief Background A. Members of Board of Management

S1. No.	Name	Designation
1.	Prof. Sasmita Samanta, Vice Chancellor & Chairperson	Chairperson
2.	Prof.(Dr.) M. C. Mishra, Emeritus Professor, J P N Apex Trauma Centre, AIIMS, New Delhi	
3.	Prof. Saswat Chakraborty, Professor, G. S. Sanyal School of Technology	Three eminent academics (External)
4.	Prof. (Dr.) Shankar Acharya, Sr. Consultant, Sri Gangaram Hospital, Delhi	
5.	Prof. Saroj Kumar Mohapatra, Director, School of Management	Two Deans/ Directors of
6.	Prof. Biswajit Sahoo, Director, School of Computer Engineering	Faculties

7.	Maj. Gen. (Dr.) P. K. Pattnaik, Director General, KIMS	Two teachers of the
8.	Prof. Mrutyunjay Suar, Director General, R& D	Institution
9.	Mr. S. Samir Panda,	
	Vice President, Corporate Relations	Nominees of the
10.	Mr. D. N. Diwedy,	Sponsoring body
	Vice President, IT & Operations	
11.	Prof. J. R. Mohanty,	Member Secretary
	Registrar & Secretary	

B. Members of Academic Council

Sl. No	Name	Designation
1.	Prof. Sasmita Samanta, Vice Chancellor	Chairperson
2.	Prof. Faizan Mustafa, Vice Chancellor, Nalsar, Hyderabad	
3.	Prof. Amol A Gokhale, Professor, IIT Mumbai	External Member as
4.	Dr. Sanghamitra Pati, Director, ICMR	Vice Chancellor
5.	Dr. Bhimaraya Metri, Director, IIM Nagpur	
6.	Mr. M. Sasikumar, Executive Director, C – DAC, Mumbai	
7.	Mr. Indrajit Sanyal, Head – Ericsson Global India, Kolkata	
8.	Mr. Amit Sharma, VP & Head HR, Volvo Group India, Bangalore	External Member as from other field nominated by Vice
9.	Mr. Suraj Chettri, Head – HR, Airbus Group India, Bangalore	Chancellor
10.	Mr. Kumar Amarendra Narayan Singh, Director, KPMG	
11.	Mr. Sambit Sahu, Vice President, IoT Group	
12.	Prof. Sudarsan Nanda	Research Head
13.	Prof. Mrutyunjay Suar	Director General, R & D
14.	Prof. Gopal C. Kundu	Director, R&D
15.	Prof. Damodar Suar	Chairman, Social Science Research
16.	Prof. Asish Kumar Sen	UG Chairman

17.	Dr. Santosh Kumar Pani	Controller of Examinations
18.	Dr.Ambika Prasad Mohanty Principal, Kalinga Institute of Medical Sciences	
19.	Prof. Saranjit Singh Director, IEC	
20.	Prof. Saroj Kumar Mohapatra, Director, School of Management	
21.	Prof. Nishit Parida, Director, School of Rural Management	
22.	Prof. Veena Goswami, Director, School of Computer Applications	
23.	Prof. Bhavani Prasad Panda, Director, School of Law	
24.	Prof. Soumyendu Shankar Ray Director General, School of Architecture	
25.	Mr. Himansu Sekhar Khatua Director General, KSFT	
26.	Prof(Dr) Sudhir Kumar Satpathy, Director, School of Public Health	Deans of the Schools / Head
27.	Prof. Jayanta Kumar Parida, Director, School of Social, Financial & Human Sciences	of the Departments
28.	Prof. Biswajit Sahoo, Director General, School of Computer Engg.	
29.	Prof. (Dr.) Beerendra Pandey Dean, School of Language	
30.	Prof. Prasant Rath, Dean, School of Applied Sciences	
31.	Prof. Satya Narayan Mishra Dean, School of Management	
32.	Prof. Sanjib Moulick, Dean, School of Civil Engg	
33.	Prof. Byamakesh Nayak Dean, School of Electrical Engg	
34.	Prof. Bharat Chandra Routra, Dean, School of Mechanical Engineering	
35.	Prof. Suprava Patnaik, Dean, School of Electronics Engg	

36.	Dr. Srinivas Patnaik, Dean, School of Biotechnology	
37.	Prof. Biswa Bandita Kar, Dean, School Of Yoga	
38.	Prof. P. K. J. Mohapatra, Head, Department of Public Policy	
39.	Dr. Aswini kar Principal, KIDS	
40.	Prof. Niyati Das Principal, KINS	
41.	Academic Head KISS	
42.	Prof. Nirmal Kumar Rout Professor & Director (SRC) School of Electronics Engineering	
43.	Prof. Pradip Kumar Sarkar Professor, School of Law	
44.	Prof. Koustubh Kanti Ray Professor, School of Management	
45.	Prof. Arun Kumar Ray, Director, Academics	Protessors
46.	Prof. Ashok Kumar Sahoo, Director, R & D (Technology)	
47.	Prof. Chinmay Kumar Panigrahi, Director, QA Cell	
48.	Prof. Samaresh Mishra, Director, Student Affairs	
49.	Prof. Benu Gopal Mohapatra, Director, Consultancy Services	
50.	Prof. Suresh Chandra Satapathy, Professor & Dean, R&D, School of Computer Engineering	
51.	Dr. Pramod Kumar Das, Professor, School of Applied Science	Professors
52.	Dr. Ram Chandra Das, Professor, Dept of Psychiatry, Vice Principal, KIMS	
53.	Dr. Shruti Vishal Dev, Professor, KIDS	

54.	Dr. Krishna Padarabinda Tripathy Department of General Medicine, KIMS	
55.	Dr. Amaresh Mishra, Department of General Surgery, KIMS	
56.	Dr. Kabi Kant Samantaray, Department of ENT, KIMS	
57.	Dr. Dayanidhi Meher, Department of Endocrinology, KIMS	
58.	Dr. Tribikram Mohanty, School of Civil Engineering	
59.	Dr. Anita Pati, Dean, International Students Relations, School of Applied Science	
60.	Dr. Arindam Deb, School of Electronics Engineering	
61.	Dr. Visakha Raina, School of Biotechnology	Associate Professors
62.	Dr. Arup Abhinaa Acharya, Dean, School of Computer Engineering	
63.	Dr. Amulya Ratna Swain, Dean, School of Computer Engineering	
64.	Dr. Bhabani Shankar Prasad Mishra, Dean, School of Computer Engineering	
65.	Dr. Debashis Mishra, Department of Orthopedics, KIMS	
66.	Dr. Santosh Das, Department of Neurology, KIMS	
67.	Prof. Tanmoy Roy Chaudhury, School of Electrical Engineering	Assistant Professors
68.	Prof. Rishi Khanna, School of Electronics Engineering	
69.	Dr. Sanket Nayak	
70.	Ms. Nidhi Singh	Alumni
71.	Mr. Dipankan Bandopadhyay	
72.	Ms. B. Swetali Subudhi	Student
73.	Ms. Zikshita Patni	
74.	Prof. Jnyana Ranjan Mohanty, Registrar	Member Secretary

Frequency of the Board Meeting and Academic Advisory Body:

- Board of Management meeting is held Three times in a year.
- Academic Council Meeting is held thrice a year.

1.2 Organizational chart and processes



1.3 Nature and Extent of involvement of Faculty and students in academic affairs/improvements

- The University has framed a system of updation and preparation of curriculum in consultation with stake holders, Faculty members, experts from the academics and industry of repute. Feedback from the students and alumni are also taken.
- Faculty members are with around 30 students to whom he/she is responsible for the whole period of their stay and act as a tutor mentor.

1.4 Mechanism/ Norms and Procedure for democratic/ good Governance

- The Chancellor of the University, Prof. Ved Prakash, is a renowned academician
- Vice-Chancellor is appointed on the basis of open advertisement in newspapers and by constituting search committee. Noted academicians have been appointed as Vice-Chancellors.
- No family member of the Founder is holding any executive post in the University
- Board of Management of the University comprising faculty members and eminent academicians/industry personnel is chaired by Vice-Chancellor.
- Only one representative is from the sponsoring society
- All the statutory bodies- Academic Council, Finance Committee, Board of Studies are constituted as per UGC Regulations2010

- The University follows decentralized governance system and maintains out-most transparency
- The University has a mechanism of Academic, Administrative and Financial Audit
- Grievance re-dressal mechanism is also in place.
- Student Feedback on Institutional Governance/ Faculty performance: Online feedback system in place.
- Grievance Re-dressal mechanism for Faculty, staff and students: Established and functioning.
- Establishment of Anti Ragging Committee : Established and functioning. Details available at<u>https://kiit.ac.in/antiragging/</u>
- Establishment of Online Grievance Re-dressal Mechanism: Established and functioning. <u>https://kiit.ac.in/grievance/</u>
- Establishment of Grievance Re-dressal Committee in the Institution and Appointment of OMBUDSMAN by the University: Established and functioning.
- Establishment of Internal Complaint Committee (ICC): Established and functioning.
- Establishment of Committee for SC/ST: Established and functioning.

1.5 Different Cells

1.5.1 Compliance Cell

Every school will have its own Compliance Cell consisting of two/three faculties, HR and Administrative Personnel of the School. While, an Administrative Compliance Cell is solely responsible to keep all the information about the students, staff, research, etc. and coordinate between the office of the Vice-Chancellor, Registrar, Controller of Examinations and the respective schools.

1.5.2 Event Management Committee

Numerous state-level, national and international-level events are organized in KIIT DU and KISS DU round the year. These include seminars, conferences, workshops, sports events, etc. organized directly by KIIT DU and KISS DU as well as events of external organizations hosted in KIIT DU and KISS DU premises. For the purpose, an Event Management Committee is constituted.

1.5.3 Training & Placement Cell

The Central Training & Placement Cell is looking after Training & Placement activities of students of KIIT DU and KISS DU. Every school will have its own Training & Placement Cell headed by Dean (T&P)/Associated Dean (T&P). This Cell will keep all the information about the students and companies for placement related matters & coordinate with the Central Training &Placement Cell from time to time.

1.5.4 ICT Cell

The Head of ICT Cell along with his team is totally responsible for the entire ICT and IT Technology related matters of KIIT DU and KISS DU. The Cell will ensure smooth functioning of all CCTV cameras installed in entire KIIT DU & KISS DU for round-the-clock surveillance. The resources of ICT Cell of KIIT DU should be co-bindingly utilized.

1.5.5 SAP

KIIT DU is the first educational institution in the country to implement SAP in its entire department. SAP Cell provides support to the users.

1.5.6 Human Resource Department

The HR Department is totally responsible for the HR activities of KIIT Group of Institution.

1.5.7 Finance and Accounts Department

The Finance and Accounts Department is responsible for policy planning of finance, communications with statutory financial bodies, day-to-day transactions, disbursement and coordination with Chartered Accountant.

1.5.8 Central Purchase Committee

Central Purchase Committee is formed to procure Electrical Equipment & Fittings, ICT Equipments (including computer, laptops and accessories), Books & Stationery, Furniture &Fixtures, Clothes/ Uniforms and other items. The procurement will be done on yearly/ half yearly basis. Exception to the procurement schedule can be made only in case of emergency needs. Technical Purchase Committee is formed for the purchase of laboratories and research equipments for Schools of Technology and other technical Laboratories.

1.5.9 Maintenance Cell

The Electrical Maintenance Cell is responsible for all types of Electrical work in different campuses and regular maintenance of the same. The A.C. Maintenance Cell provides support to the works related to air conditioning (including new installations) in different campuses. All other maintenance works with respect to furniture and fixtures, electric equipments, buildings, etc. are taken care of by the Central Workshop.

1.5.10 Transport Department

This Department is responsible for safe-keeping and maintenance of all vehicles.

1.5.11 Security Department

The Security Department is to ensure proper safety, security and discipline in all campuses of KIIT DU & KISS DU.

1.5.12 Legal Cell

A Legal cell provides support to review all legal issues and finalize the modalities with respect to legal matters.

1.5.13 Parents, Students and Public Grievance Cell (PSP Grievance Cell)

Roles and Responsibilities of the PSPG Cell are to access and receive all the mails of Online Grievance ID, to have close vigilance on different Social Media of KIIT DU & KISS DU, to reply to all the grievances received through Social Media promptly and to get the problem solved from the person(s) concerned as soon as possible and reply to the parents, students and public within 24 hours.

1.5.14 Community Engagement Cell (CEC)

Roles and Responsibilities of the CEC are **t**o assist during any prestigious / mega function at KIIT DU and KISS DU, to facilitate the students of KIIT DU to perform the outreach activities at KISS, to mmotivate the students to involve in different outreach activities, conducting the awareness programmes, to coordinate all types of social outreach activities including Art of Giving (AOG) and Kanya Kiran, facilitate NSS wing of KIIT, conducting counseling session and developing short programmes to provide platform to the students to involve themselves in different social activities, inculcate sense of social responsibility and to assist any other assignment given from time to time.

1.5.15 Social Media Connectivity Cell

The Cell will facilitate connectivity of the staff and students to Social Media of KIIT DU and KISS DU related entities. It will also facilitate guest visits and link one and all to our Social Media. Social Media Connectivity Cell will be monitored by Director, Relationship Management, Deputy Director - Student Services and Liaison Officer, KIIT DU.

1.5.16 Library Committee

KIIT DU Central Library has taken interim strategic initiatives to benchmark several library programs, operations and services that include the Library's IT, web services, and repository development functions by assigning responsibilities among experienced and sincere staff members to ensure tangible output with respect to the investment.

1.5.17 Admissions Cell

The Admission Committee, headed by the Director (Admissions), will oversee admission wings of KIIT DU, including conduct of KIITEE in time. KIIT DU admits students through a rigorous and transparent selection process from within the country as well as from abroad. The domestic student candidates are required to qualify through the All India Entrance Examination (KIITEE) conducted by KIIT DU, Bhubaneswar for admission into various courses of KIIT DU. Besides, for admission into Management, Medical and Law, the reputed All India

1.6 Internal Quality Assurance Cell (IQAC)

The IQAC is a Nodal Agency for monitoring the working of the Institution and is committed to overall quality enhancement in the Institution.

1.6.1 Vision

To promote quality culture as the prime concern of Higher Education Institutions through institutionalizing and internalizing all the quality-enhancing and sustaining initiatives taken with internal and external support.

1.6.2 Mission

The IQAC ensures improvement in the Institution with the active cooperation of all the stakeholders. IQAC is expected to create healthy and meaningful academic practices

in the Institution. Not only does it plan and implement the good academic practices but also measures the extent of its implementation.

1.6.3 Objectives

- To develop a mechanism to promote conscious, consistent and catalytic action plans to improve the academic and administrative performance of the institution.
- To promote institutional quality enhancement and sustenance through the internalization of quality culture and institutionalization of the best practices.

1.6.4 Functions

- Development and application of quality benchmarks;
- Setting parameters for various academic and administrative activities of the institution;
- Facilitating the creation of a learner-centric environment conducive to quality education and faculty development to adopt the required knowledge and technology for participatory teaching and learning process;
- Collection and analysis of feedback from all the stakeholders on quality-related institutional processes;
- Dissemination of information on various quality parameters to all the stakeholders;
- Organization of intra- and inter-institutional workshops and seminars on qualityrelated themes and promotion of quality circles;
- Documentation of various programmes/activities leading to quality improvement;
- Acting as a nodal agency of the institution for coordinating quality-related activities, including adoption and dissemination of the best practices;
- Development and maintenance of institutional database through MIS for the purpose of maintaining and enhancing institutional quality;
- Periodical conduct of Academic and Administrative Audits along with their follow-up activities; and
- Preparation and submission of the Annual Quality Assurance Report (AQAR) as per the guidelines and parameters of NAAC.
- ✤ Internal Quality Assurance Cell continuously monitors the academic activities of the University.
- Analysis of Feedback collected from all stake holders.
- Initiatives for capacity building of the faculty members.
- Financial Audit, Academic Audit, Green Audit, Electrical Protection Audit and Administrative Audits periodically.
- ✤ 360° appraisal system

1.6.5 Execution Plan

- To fulfill the vision and mission of the university in the light of its quality policy
- To develop a system for conscious, consistent and catalytic action to improve the academic and administrative performance of university Departments.
- To promote measures for functioning of entire university towards quality enhancement through internalization of quality culture and implementation of best practices.
- To implement sustainable Quality Management System (viz. ISO, NIRF, NAAC, NBA etc) to enhance Quality in Education

To ensure an enhancement and integration among the various activities of the university and institutionalize many good practices.

1.6.6 Institutionalization of Quality Assurance Strategies

- Enhancement of Collaboration and Networking
- Implementation of Outcome Based Education
- Inclusion of Activity Based Learning as a part of Curriculum
- Conduct of Faculty Development and Staff Development Programs
- ✤ Organisation of Seminars/Workshops/Symposia etc.
- Strategies for Slow Learners and Advanced Learners
- ✤ Use of ICT mediated tools in Teaching and Learning
- Conduct of Academic Empowerment for Quality Improvement
- Assessment through Administrative, Environment, Energy, Safety, Gender and Accessibility audit
- Formation and implementation of Research, Consultancy, IPR, Innovation, Startup, IT, Antidiscrimination, Ant ragging, Anti Harassment, Environment policies etc.
- Strategic Planning for Significant Growth in Research And Innovations output
- Strengthening Sponsored Research and Consultancy
- Development of an ecosystem for Interdisciplinary / Multidisciplinary Research
- Provision of Seed money to Faculty members for Research
- Undertaking Faculty Appraisal Process for Faculty Award and Promotion
- Analysis of Stakeholder's feedback and subsequent Plan of Action
- Ensuring Alumni/Students participation in Governance
- Coordinating with NSS, NCC, Red Cross and Student Activity Centre for Outreach Activities
- Motivating for Institutional Distinctive Programs like Art of Giving, Kanya Kiran, Education Submits etc to achieve SDG goals
- Implementation of Best practices

1.6.7 IQAC Functional Diagram



1.6.8 Internationalization

Kalinga Institute of Industrial Technology (KIIT) is a leading global university engaged in inter- and multi-disciplinary research. KIIT was established in 1992 and within a short period of time became a model for higher education institutions across India. KIIT University takes pride in its achievements thus far in internalizing the university through attracting students as well as faculties from all over the world. It has incorporated several strategies to implement an ambitious goal to,

- Rank itself amongst India's top 10 Universities on internalization parameters
- Become internationally renowned for academic freedom, experiential and service learning
- Attract and retain the best and brightest students, academic staff in the country and from across the world
- Become a leading centre of advanced learning and research
- Imparting value based quality education of international standard and imbibing skills for solving real life problems

Our mission

1. Imparting value based quality education of international standard and imbibing skill for solving real life problems.

2. Inculcating global perspective in attitude.

3. Creating leadership qualities with futuristic vision

4. Encouraging and supporting creative abilities and research temperament

5. Establishing and promoting close interaction with industries and other utility sectors and keep abreast with state-of-the-art technology.

6. Fostering spirit of entrepreneurship and realisation of societal responsibilities

7. Cultivating adaptation of ethics, morality and healthy practices in professional life. Mission of International Relations Office:

The mission of the international relations office at the university is to

1. Empower students to experience and exercise universal freedoms through the acquisition and application of knowledge with the world as their learning ground;

2. To prepare students to become global leaders with a universal outlook and to help them embrace, imbibe and assimilate fundamental unity of core human values as well as understand and appreciate the diversity across the geographies, societies, and cultures; and

3. Help the academic communities expand the scope of human understanding and contribute to the betterment of the world by mutual exchange of people and ideas. Indicators of Internationalization

1. Proportion of international students

2. Proportion of students going for study abroad, international work experience, internship, service projects, volunteering etc.

3. Proportion of international faculty/staff

4. Proportion of research published with an international co-author

- 5. Proportion of research earnings from international sources.
- 6. Proportion of students going for graduate studies abroad (KIIT Specific)

1.6.9 Objectives delivered

- ✤ All UG curriculums updated to integrate international focus and perspectives throughout the curriculum, across all departments and programs.
- Foreign Languages Minors/Certificate Programs have been introduced in collaboration with KIIT School of Languages (KSOL)
- Have invested heavily into establishing a world-class and industry leading Central Research Facility with state of art equipment and technologies to attract all kinds of international research collaborations, joint research program opportunities for students, faculties, industry researches etc.
- Actively recruited international visiting faculties from various countries and institutions of eminence.
- Exchange programs and academic cooperation have been updated by tapping modern technologies and connecting students and faculties to create virtual global experience opportunities.
- Provided leverage from KISS University's goodwill and resources to expand international students' global experience and network
- Established need based scholarships, for students meeting particular criteria of need or country of origin, and/or increase financial aid to international students with demonstrated need.
- Engaged the professional services of national recruitment organizations such as EdCIL, and take help from Indian Embassies, and Missions abroad for creating a credible image and for recruitment of international students.

- Have focused student recruitment from developing countries and regions to ensure diversity of perspectives and world views across a broad array of programs at the University.
- Participated in international student recruitment fairs worldwide, with particular emphasis on developing countries.
- Established strong, personalized advising system for international students by assigning individual Tutor-Mentors.
- Developed International Student Counseling Committee to deliver a variety of assistance services including strong career development services for international students.
- Established joint or dual degrees with two way student mobility. Increased institutional partnerships, with a focus on those that involve student exchanges.
- Enhance the visibility of internationalization initiatives and stories at the university through various communications channels, including social media.
- Improved the efficiency of International Relations Office people/process/technology
- Created a friendly and welcoming campus environment for international students, faculty, and staff.

Entrance examinations, recognized all over, are the basis for students intake. The International student candidates are selected through the International Office of KIIT DU, following norms applicable to International students.

Incorporation of NEP 2020 Policy Recommendations			
NEP 2020 Recommendation	Way in Which It Is Incorporated		
Vision: Inculcate Ethical and Constitutional	Socio-Political Environment is a social		
Values	science elective.		
	Professional ethics and code of		
	conduct to be covered by each School		
	as part of its professional core subject.		
	Research Ethics is a compulsory		
	subject for B. Tech. (Res.) students.		
Curricular structures to be flexible and	Elective options are available		
imaginative with creative combinations of	throughout the study period. The		
disciplines.	curriculum provides for subjects like		
	Yoga, vocational courses, Universal		
	Human Values, Science Electives,		
	Social Science Electives, Professional		
	Electives, and Open Electives.		
More HASS subjects to science and	10-credit subjects related to Writing		
engineering students and science subjects to	and Speaking and Human Values,		
Arts students.	and 11-credit subjects related to		
	Social Science		
Local/Indian or bilingual medium of	The University has to take a decision		
instruction	on this issue.		
Education to provide opportunities for	Research projects in last three		

1.6.10 Incorporation of NEP 2020 Policy Recommendations

multidisciplinary work in academia,	semesters.
government, and industry.	Open electives will allow choosing
	subjects related to industry and
Europeire continue for stadaute	government.
Engaging course options for students	subjects
Multiple-entry and multiple- exit options	Allows studying for 10 different
through Academic Bank of Credit	programmes
Rigorous specialization in one area	To be done in the last six semesters
Open-Distance Learning and Online	If needed, it will be done.
Programmes	
Integrate science, social sciences, and	The curriculum combines aspects of
professional, technical, and vocational skills	humanities, science, social sciences,
with humanities, arts, ethics of social	engineering science, professional,
engagement and soft skills	technical, and vocational skills, and
	allows social engagement and
	seminars, oral presentation, team-
	based laboratory experiments and
	projects
Pedagogy - communication discussion	Thinking Perspectives is an elective
debate, research, and opportunities for cross-	subject. Group Projects allow for
disciplinary and interdisciplinary thinking.	discussion and debate. Seminar
	presentations and project reports to
	help in developing rhetoric and writing
	skills.
Options: Language, Literature, Music,	Technical Writing, Scientific Writing,
Philosophy, Indology, Art, Dance, Theatre,	Universal Human Values, Yoga,
Education, Mathematics, Statistics, pure and	Thinking Perspectives, and many open
Applied Science, Sociology, Economics,	electives (especially, K-Explore
Sports, Translation, and Interpretation.	subjects based on Students' Activity
	Centre) in these areas are provided for
Credit-based courses and projects in the	III III Cullicula.
areas of community engagement service	Group Projects allowed as option in
environmental value-based and dobal	the first year. Open electives allow
citizenship education, and internship	multiple options to choose subjects in
	these areas.
Continuous evaluation	Laboratories and Projects are plenty.
Choice-based credit system to be replaced by	Already in use for evaluation in KIIT
a criterion-based grading system that	-
assesses student achievement based on	
learning goals for each programme.	
Ph.D. students to take credit-based courses	Curricula for PhD are not developed
	yet.
Technology platforms such as	To be done selectively.
SWAYAM/DIKSHA for online training of	

teachers	
Identify specific skills that the students must	Defined as Graduate Attributes in the
acquire	Report.
Frame expected learning outcomes (graduate	The individual syllabus for every
attributes) for higher education programmes	subject to write about the expected
	learning outcomes.
Formulate a national Higher Education	Vocational courses are incorporated in
Qualification Framework in sync with	the Curricula as compulsory course,
National Skills Qualification Framework to	where a student has many options to
integrate vocational education into higher	choose a vocational course.
education.	
HEIs to move away from high-stake	Being done for Laboratories and
examinations to continuous evaluation	Group Projects. Can also be applied
	selectively even to theory subjects.
HEIs to provide funds to set up topic-centered	K-Explore subjects based on Students'
clubs and organize events for students to	Activity Centre) form a compulsory
earn academic credits.	subject.
Holistic education, inclusion of research and	The curriculum integrates aspects of
internship in curriculum	all branches of knowledge, provides
	skills to address real-world problems,
	includes internship as a compulsory
	requirement, and provides
	opportunity to take up research-based
	projects
Credit-based courses for PhD students in	Not yet done.
teaching/education/pedagogy/writing	B. Tech. (Res.) students have to go
	through courses related to Scientific
	Writing, Research Methods, and
	Research Ethics, other research-
	oriented courses.

CHAPTER-2 TEACHING AND LEARNING PROCESS

Chapter-2 Teaching and Learning Process

2.1 Introduction

The teaching-learning process is the most critical process, the ultimate test of quality for any academic institution. It is like the heart of the academic system. With a view to guide faculty members on quality of teaching and learning, a set of standards are presented here. 'Quality' would mean excellence and reliability. In the corporate world, a work of 'Quality' is explained in a simple phrase, "Right first time, and Right every time". Setting standards of excellence is 'doing right things' and following the standards of excellence diligently without any compromise is 'doing things right'. In other words, by meeting the required quality standards, we will enable our students to excel on a continual basis. Good communication skills, listening skills, friendly attitude,good deal of patience, strong work ethic, organizational skills, discipline skills, student friendly teaching environment, respectful attitude are the essential quality components of a teacher. Six factors - context, intended learning outcomes, content, communication, teaching & learning activities, assessment & evaluation, serve as the foundation of quality standards for the teaching-learning process.

2.2 Quality Framework for Curriculum

The curriculum shall be learner-centered, inclusive and developmentally appropriate, relevant, responsive and research-based, culture-sensitive, be contextualized and global, pedagogical approaches that are constructivist, inquiry-based, reflective, collaborative, and integrative, adhere to the principles. Each school of the university sticks to any amendment/revision of curriculum by different central board/council. Scope of curriculum design exists for add-on courses to bridge the gaps between industry & academia and 'health care services' and academia (applicable to medical, dental, public health and nursing). Scope is to incorporate new courses addressing socio-economical context/industry internship/ electives/ student exchange programme/ choice based credit curriculum. Feedback from all stake holders with proper documentation for actionable plan for designing curriculum. Feedback from teachers towards ease or difficulty in deliberation, scope to address recent trends, adequacy of pre-requisite, pedagogy, etc. The Board of Studies deliberation aligns the context at School level, and the Academic Council deliberations align the context at the University level with all other factors in the teaching learning process.

2.3 Standards for Setting Session Plan

Each course shall have a session plan covering a brief introduction, intended learning outcomes, number of sessions with time duration, learning methodologies, session-wise coverage, evaluation plan and content text reading & reference materials. A sample session plan shall be made available at the school website for ready reference of faculty members.

2.4 Periodic Control and Monitoring

On a regular basis, say, on a fortnightly basis each course will be evaluated on progress considering the targets set for teaching learning and assessment and the actual performance. Due variance analysis will be done and necessary corrective action will be taken by the faculty member. Latest developments in the field of study and technological upgradations in pedagogical methods, shall be incorporated as a measure of course correction and a variance of 20% from the original intended outcome shall be reasonable change on-the-go to accommodate a dynamic environmental context of education without waiting for a formal syllabus revision. However, when there is no change in context, the variance should be zero for the particular course outcome.

2.5 E-Learning

A learning system based on formalized teaching but with the help of electronic resources is known as e-learning. The faculty members may upload the class videos and study material independently. However, they may note that to use University name and logo in the materials they need to process the materials for a quality check School of e-Learning and be mindful of copyrights and credit through acknowledgement for excerpts and quotes taken from external sources. In such case they may follow the procedures illustrated to float featured courses. As a philosophy, the School will offer necessary help to improve the quality if required. The materials loaded independently are not under strict purview of the School. Therefore, the Instructor must declare through a disclaimer taking full personal responsibility for the e-document shared with students for the purpose of learning. The faculty members are expected to maintain the information correct, original and appropriate. If the study material uploaded independently does show deviations the University may initiate corrective suggestions as well as actions deemed fit for situations. The Faculty members are entitled to cent percent revenue from their newly designed courses during first two years of delivery, for delivery outside the School as Visiting Faculty. Beyond this time the rules applicable for consultancy services will be applicable (Annexure 1).

2.6 Peer Learning

Students learn a great deal by explaining their ideas to others and by participating in activities in which they can learn from their peers. They develop skills in organizing and planning learning activities, working collaboratively with others, giving and receiving feedback, and evaluating their own learning. Peer learning is becoming an increasingly important part of many courses, and it is being used in a variety of contexts and disciplines in many countries. Students learn faster through peer learning due to higher degree of acceptance for a peer standing side by side instead of a platform.

2.7 Activity Based Learning (ABL)

The activity based learning (ABL) is an instructional approach that emphasizes students' active learning through various participatory activities within the class room. The following points may be taken care while designing Activity Calendar course wise during a semester.

- a) Something to build confidence
- b) Something that can be done in a short duration of time
- c) An activity that fits in the space available

- d) Something with A/V aids
- e) Something for slow learners
- f) Something that is all inclusive
- g) Something that encourages students to learn
- h) Something that helps students interact and learn as a group
- i) Something that helps build students' understanding of concepts
- j) Something that helps students with comprehension of other subjects
- k) Something that uses a combination of elements
- 1) Something that can be conducted on a regular basis
- m) Something whose important points could be memorized
- n) Material should be provided to the school for conducting ABL
- o) An activity that encourages teachers to develop a friendlier, kinder attitude
- p) Something that could be repeated by students
- q) An activity that has a training element
- r) Something that includes a performance element
- s) Stories with morals and should be fact based
- t) Something that grasps students' attention
- u) Something that incentivizes learning
- v) More time should be allocated to ABL
- w) Super natural elements should also be a part of the stories
- x) Quiz should be included in the ABL activity
- y) Stories that are related to course material
- z) Activity should be entirely curriculum based

The activities are to be designed to facilitate/strengthen the learning among the students. 30 marks out of total 100 marks have been assigned to the activity category in each course. The activities are to be designed such that the assessment can be done in the following components. During the submission of activity marks, the course coordinator has to ensure the availability of data base about following activity based components.

Activity	Components of ABL	Weightage
Activity 1	Problem Solving (Individual)	05
Activity 2	Critical Thinking (Individual/Group)	05
Activity 3	Creation (Short questions and answers)	05
Activity 4	Interactivity Focus (Group based evaluation)	05
Activity 5	Quiz	05
Activity 6	Reflection	05

2.8 Feedback Collection

To get an overall idea on curriculum and other relevant aspects, the University has established feedback system through the close ended structured questionnaire via Google Form /SAP Portal. Feedback are collected from Stake holders which include Students, Faculty members, Alumni, Employers and Parents. Feedback is collected from the Students twice in a year through SAP on course content and course outcome, Course teacher and institutional facilities. Feedbacks are collected from the faculty members on design and outcome of the course they are teaching. Feedback from Recruiters, Alumni and Parents are taken once in year on curriculum development and overall improvement of Teaching Learning process. The Feedback is collected through a questionnaire in a scale of 5. The quantitative analysis is done on the basis of the score while the qualitative analysis is done on major opinions and suggestions given by different Stakeholders. The feedback on curriculum includes the course content and its depth, coverage, applicability, learning value, clarity and relevance.



2.9 Feedback Analysis

The data collected by the IQAC was sorted and consolidated for drafting the analysis report. The data entered in the selected format was then converted into chart form and decoded for the proper comprehension of the matter. The analysis is done year wise as well as parameter wise. The aspects pointed out by all the stakeholders are considered with special care and attention. The teachers discussed and evaluated the suggestions received from different spheres regarding the curriculum. The suggestions were consolidated to communicate to the teachers who are members of various Boards of Studies and Syllabus Revision Committees, and those who participated in the Syllabus Revision Workshops conducted by the University. Proper suggestions are formulated to be communicated to ensure the proper redressal of the grievances.

CHAPTER-3 RESEARCH & CONSULTANCY

Chapter-3 Research & consultancy

3.1 Introduction

Research is a scholarly and creative activity that provides the core around which the entire education system revolves. If education is the superstructure then research is the foundation. Research is at the heart of "Creation of Knowledge". The development of human civilisation has taken place due to Research, Innovations and Extension activities. Every academic institution has a fundamental duty to promote a 'research culture'. The institution has the responsibility to enable faculty to undertake research projects useful to the society. Serving the community through extension, which is a social responsibility and a core value to be demonstrated by institutions, is also a major aspect of research. Research at KIIT is very much connected with the Vision and Mission of KIIT-DU, to focus upon solving real life problems for serving the society and people. This is in sync with the National Education Policy 2020 as well.

3.2 Standard of the Thesis

The quality of research is often referred to as the standard of the thesis.

- The principal purpose of the thesis is to demonstrate the students' capability to make fruitful use of research methods appropriate to the problem and to develop and handle evidence satisfactorily. Hence, the thesis should contain a statement of (a) the research procedures employed, and (b) the extent, nature, reliability and suitability of the evidence gathered.
- ♦ The thesis should contain report of finding of original theory or methodology, discovery of new facts or novel interpretation of known facts and/or independent original design and development of equipment/material.
- ♦ Clarity, conciseness and orderliness of writing and presentation are required. References to others work must be included. Eeach thesis must be scanned through "turn-it-in" software to avoid plagiarism even inadvertently. It is necessary to include sufficient evidence to support the reasoning and conclusions so as to permit other scholars to build upon them, wherever possible. The length of the thesis will vary with research topic pursued and evidence required.
- ♦ Scholars will be generally urged to actively participate in national/international seminars/conferences. Before submitting the doctoral draft thesis, Scholars will be ordinarily expected to have at least two research articles accepted for publication in referred Journals of National/International repute based on their research work.

3.3 Similarity Index

In the event of a research scholar, who has been found by a committee that the scholar has copied a research work, the Ph. D. dissertation of the scholar will be rejected and the concerned registration will be terminated. Also, such a student will be debarred from registering for any other program in KIIT DU.

3.4 Publications

Each faculty member to publish 2 numbers of SCI index/ Scopus/UGC Care/ Web of Science journal for a academic session as per the University policy.

3.5 Interdisciplinary Research/Projects

KIIT DU is committed to high-quality research and provides outstanding facilities and a supportive environment for our academics and students. KIIT DU's research portfolio extends across many different areas including, but not limited to, biotechnology, medicine; rural management; physical activity and nutrition; education; and social and mental health. Keeping focus on development of entrepreneurship, research at KIIT DU is multi-dimensional and interdisciplinary. Evaluation and attainment of student outcomes

3.6 Bloom's Taxonomy

- It is a classification of educational objectives and outcomes by using action verbs.
- Bloom's Taxonomy can be used for everything from lesson planning and Rubric making to curriculum mapping andmore.
- ✤ A Rubric is a guide listing specific criteria for grading or scoring academic papers, projects, and tests.
- ♦ Bloom's Taxonomy begins with lower-order thinking skills (LOTS) with



Remembering, and ends with higher-order thinking skills(HOTS) with Creating.

Bloom's Taxonomy of Learning

3.7 Overview

The program assessment plan is prepared which includes assessing the student outcomes with the autumn and spring semester of the academic session for each Program (students' batch wise). The Program Assessment Committee (PAC) at School level conducts meetings to review the annually collected data to realize the assessment components for any changes, either to specific courses or to the course outcomes. In addition, the committee may suggest changes to the means of the assessment, the desired standard of achievement, and assessment findings. If changes are favored by the majority of the committee members, the changes will be recorded and implemented in the next assessment cycle. 3.8 Evaluation and Attainment of ABET Student Outcomes (EAC and CAC)

To map the different courses with ABET student outcomes, two intermediate measurable/recognizable parameters: performance indicators (PIs) and graduate attributes (GAs), are to be taken into consideration. The ABET student outcomes and the corresponding performance indicators and graduate attributes for EAC and CAC have been given in Table 1 and Table 2, respectively.

ABET Student Outcomes(EAC)	Performance Indicators (PI)	Graduate Attributes
1. An ability to identify formulates and solves complex engineering problems by applying principles of engineering, science and mathematics.	PI-1.1: Identify key issues associated with engineering problem, formulate and propose solutions to the same.	Engineering knowledge Problem analysis
	PI-1.2: Analyze complex engineering problems using principles of engineering, science and mathematics.	
2. An ability to apply engineering design to produce solutions that meet specified needs with consideration of public health, safety, and welfare, as well as global, cultural, social, environmental, and economic factors.	 PI-2.1: Identify an engineering problem associated requiring a design solution with constraints and provide design solution using prerequisite knowledge, supplemental materials, and effective use of modern engineering tools. PI-2.2: Perform risk analysis of the solution to ensure no or minimal damage to public health and environment. PI-2.3: Perform cost analysis and validate the solution with respect to relevant global, cultural, and social factors as well as similar solutions to the problem. 	Engineering design, modern tool usage Project management, Environment and sustainability Project management, Engineer and society
3. An ability to communicate effectively with a range of audiences.	PI-3.1: Deliver an oral presentation	Communication

Table 1- SOs and the corresponding PIs and GAs (ABET-EAC)

	 PI-3.2: Provide data to support claims or inform audience PI-3.3: Prepare technical report (prepare various technical reports including experimental report, project report, research based report 	Communication Communication, project management
4. An ability to recognize ethical and professional responsibilities in engineering situations and make informed judgments, which must consider the impact of engineering solutions in global, economic, environmental, and societal contexts.	 PI-4.1: Identify the global, economic, environmental, and societal context of an engineering situation. PI-4.2: Describe ethical and professional responsibilities related to an engineering project. PI-4.3: Explain the impact of engineering decisions in a global, economic, environmental and accietal 	Environment and Sustainability, Engineer and society Ethics and Environment and sustainability, Engineer and Society
5. An ability to function effectively on a team whose members together provide leadership, create a collaborative	PI-5.1: Establish a collaborative and inclusive ambience for teamwork under an effective leadership.	Individual and team work
and inclusive environment, establish goals, plan tasks, and meet objectives.	PI-5.2: Fulfill individual duties and contribute to the objectives of the team.	Individual and team work
	PI-5.3: Define the goals of the team, set deadlines, plan tasks, and coordinate team meetings and deliberate on the progress of the work.	Individual and team work, Project management.
6. An ability to develop and conduct appropriate experimentation, analyse and interpret data, and use engineering judgment to draw	PI-6.1: Follow the design of an experiment plan and acquire data on appropriate variables.PI-6.2: Compare experimental	Conduct investigations of complex problems
conclusions.	results to appropriate theoretical models. PI-6.3: Offer explanation of observed differences between model and experiment.	Conduct investigations of complex problems Conduct investigations of
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		complex problems
7. An ability to acquire and apply new knowledge as needed, using appropriate learning strategies.	 PI-7.1: Identify necessary techniques, skills, and tools for a new situation. PI-7.2: Explain the use of the new techniques, skills and tools. PI-7.3: Apply the new techniques, skills and tools to the given situation. 	Lifelong learning, project management, modern tool usage Lifelong learning, project management, modern tool usage Lifelong learning, project management, modern tool usage

Table 2 SOs and the corresponding PIs and GAs (ABET-CAC)

ABET Student Outcomes(CAC)	Performance Indicators	Graduate Attributes
1. Analyze a complex computing problem and to apply principles of computing and other relevant disciplines to identify solutions.	PI-1.1: Analyze a complex computing problem.PI-1.2: Apply principles of computing and other relevant discipline to identify solution.	Engineering knowledge, Problem analysis Engineering knowledge ,problem analysis
2. Design, implement, and evaluate a computing-based solution to meet a given set of computing requirements in the context of the program's discipline.	PI-2.1: Recognize design and development principles. PI-2.2: Implement and evaluate the designed solution for a given problem.	Engineering design Engineering design, conduct investigation of complex problems, Modern tool usage

3. Communicate effectively in a variety of professional contexts.	PI-3.1: Produce a variety of documents for technical and nontechnical audiences. PI-3.2: Prepare and deliver oral presentations.	Communication Communication
4. Recognize professional responsibilities and make informed judgments in computing practice based on legal and ethical principles.	PI-4.1: Identify professional, legal, and ethical issues. PI-4.2: Understand professional, legal, and ethical responsibilities.	Engineer and society Engineer and society
5. Function effectively as a member or leader of a team engaged in activities appropriate to the program's discipline.	PI-5.1: Share work in team. PI-5.2: Fulfill duties of team roles.	Individual and team work Individual and team work
6. Apply computer science theory and software development fundamentals to produce computing- based solutions. [CS]	PI-6.1: Demonstrate and apply knowledge of mathematical functions to analyze a given algorithm. PI-6.2: Recognize appropriate algorithm to solve a problem.	Engineering knowledge, problem analysis, conduct investigation on complex problems Project management, lifelong learning

3.9 Assessment of Student Outcomes

The assessment of student outcomes will be performed in the following two ways: Direct Method and Indirect Method. The details of these two methods along with mapping formats to evaluate the PIs and SOs and subsequently ascertain the SO attainments are provided in the subsequent sections.

Continuous Improvement Cycle- It is as follows.



Fig 1 Continuous Improvement Cycle

3.10 Direct Method

The direct method of assessment of the Student Outcomes (SOs) is associated with the evaluation of the PIs linked to the course outcomes. The performance indicators in turn are evaluated through the performance of the concerned batch of students in the assessment components (concerned task/learning activity/questions/examination component) directly mapped to the performance indicator.

3.11 Format for establishing linkages/mappings between Student Outcomes, Performance Indicators, related course and assessment component

The format provided below in Table 3 is for SO1. It is to be followed for other SOs as well. Different programs can choose the concerned courses and assessment components judiciously following the procedure given in previous section. Every PI is to be mapped to one or more compulsory courses and associated assessment components. This will be taken care of by the Program Assessment Committee and information to be maintained in the School examination Cell, School Quality Assurance Cell and the office of the Dean.

Table 3 Mapping of SOs and PIs (Course and its assessment components)

Student OutcomesPIPerformance IndicatorsCoursesConcerned Assessment Component	Admitted batch of students (Year of admission):				
Outcomes Assessment Component	PI Performance Ind	icators Courses	Concerned		
Component			Assessment		
			Component		
SO1 PI-1.1 Identify key issues Course name1 To be detailed	PI-1.1 Identify key	issues Course name1	To be detailed		
associated with engineering	associated with	engineering			
problem, formulate and Course name2 To be detailed	problem, form	ulate and Course name2	To be detailed		
propose solutions to the	propose solution	ons to the			
same.	same.				
PI-1.2 Analyze complex engineering Course name3 To be detailed	PI-1.2 Analyze complex	engineering Course name3	To be detailed		

Name of the Program: Admitted batch of students (Year of admission

problems using engineering,	g principl science	es of and		
mathematics.			Course name4	To be detailed

A standard form consisting of four levels of coverage is to be supplied to course coordinators for mapping the courses with each PI. A sample form for SO1 is given below in Table 4. The mapping of courses with PIs should be carried out by the respective course coordinators and should be proctored by Program Assessment Committee and School Quality Assurance Cell. They should select one course, along with the assessment component which causes mapping, for each PI of each SO based on the maximum coverage of that particular course with that particular PI.

Table 4 Level of coverage for SO1 by the courses.

SO1: 1. An ability to identify, formulate, and solve complex engineering problems by applying principles of engineering, science and mathematics.

Name of the course	Performance Indicators	Description performance indicator	Indicator Explicit	Demonstrative Competence	Formal Feedback	Not Covered
	PI 1.1	Identify key issues associated with engineering problem, formulate and propose solutions to the same.				
	PI 1.2	PI-1.2: Analyze complex engineering problems using principles of engineering, science and mathematics.				

3.12 Direct Assessment /Attainment Method

The percentage of students (P) scoring more than 70% in the assessment component are used for SO attainment calculation. The threshold limit for the assessment is now 70% and it may be changed in the successive year depending on the performance of the students. The said percentage of students is converted to grade points (GP) on a scale of 1 to 5 based on the following rubrics as shown in Table 5. The performance indicators and corresponding rubrics will be developed for each Student Outcome (SO). The indicators will be used to define and evaluate the SOs using course data. Sample indicators and the corresponding rubrics are mentioned as follows.

Percentage of students (P)	SO attainment level/	Action
scoring more than 70%	Grade point	
90 ≤P≤100%,	5	No action required
80≤P≤90%	4	Review actions
70≤P<80%	3	Review actions
70≤P<80%	2	Reframing actions
60≤P<70%	1	Major action required

The assessment /attainment process is outlined below in Table 6 for SO1. The same process and documentation is to be carried out for the other student outcomes as well. The attainment table below will be completed by the School of Quality Assurance Cell and provided to the Program Assessment Committee for deliberation among the members, concerned course coordinators, invited members(if any) to decide on the remedial and revised action plans.

Table 6. Attainment grade points and conclusions for SO1

Name of the Program:

Admitted batch of students (Year of admission):

SO1-PI attainment:

SO1: ability to identify, formulate, and solve complex engineering problems by applying principles of engineering, science and mathematics.

PI	Courses	Assessment	Percentage of stu	ıdents	Grade	Conclusion
		Component	(P) scoring more	than	point	
			70% marks in	the		
			assessment comp	onent		
			Guideline:			Guideline:
			If 90 ≤P≤100%,	grade		If GP=5, no action
			point=5			required
			If 80≤P≤90%,	grade		If GP=4, review
			point=4			actions
			If 70≤P<80%,	grade		If GP=3, review
			point=3			actions
			If 60≤P<70%,	grade		If GP=2, reframe
			point=2	_		actions
			If 50≤P<60%,	grade		If GP=1, major
			point=1			action required
			If P<50%,	grade		If GP=0, major
			point=0			action required
PI-1.1	Course	Assessment	P1%		GP1	

	name1	component			
	Course name2	Assessment component	P2%	GP2	
PI-1.2	Course	Assessment	P3%	GP3	
	name3	component			
	Course	Assessment	P4%	GP4	
	name4	component			

The target SO attainment level is 5 for all courses. The remedial and revised action plans are to be finalized by the respective course coordinator in consultation with Program Assessment Committee and School level Quality Assurance cell. The assessment of each SO and remedial measures are to be documented and stored in the School level Quality assurance cell for implementation in the next academic session. Program Assessment Committee should ensure its implementation.

Target for each SO: All PIs should have grade point of 5 for all courses and assessment components mapped to it. The remedial and revised action plans are to be finalized by the respective course coordinator in consultation with Program Assessment Committee and School level Quality Assurance cell. The assessment of each SO and remedial measures are to be documented and stored in the School level Quality assurance cell for implementation in the next academic session. Program Assessment Committee should ensure its implementation.

From the above Table 2.4, is the target achieved? (Yes/No)

Remedial and Revised Actions plans:

1. To be filled in and implemented next time/cycle

2. To be filled in and implemented next time/cycle

3. To be filled in and implemented next time/cycle

Add rows as deemed necessary

3.13 Indirect Method

The indirect method of assessment is associated with the percentage of students providing satisfaction response level on a Liker scale to concerned questionnaires in the Graduate Survey form linked to the student outcomes.

The indirect SO attainment is to be ascertained from the responses obtained through the Graduate Survey to questions associated with the different Student Outcomes on a Liker scale of maximum rating of 5 (1-indicates very low proficiency and 5-indicates very high proficiency). If 'P' indicates the percentage of students responding to questions associated with any SO with rating of 4 and above on a scale of 5, then the SO attainment on a scale of 5 can be obtained as:

- If 90 ≤P≤100%, grade point=5
- If $80 \le P \le 90\%$, grade point=4
- If $70 \le P \le 80\%$, grade point=3
- If $60 \le P < 70\%$, grade point=2

- If $50 \le P \le 60\%$, grade point=1
- If P<50%, grade point=0

Guideline:

- If GP=5, no action required
- If GP=4, review actions
- If GP=3, review actions
- If GP=2, reframe actions
- If GP=1, major action required
- If GP=0, major action required

Outcome Based Education



Integrated Teaching-Learning Process







CURRICULUM REVISION PROCESS





3.14 Action to be followed for Slow Learners

3.14.1Understanding Slow Learners

Slow learners have suboptimal cognitive development; they are not mentally retarded or learning disabled. Their intelligence quotient score ranges from 70-85, they are below the average level of intelligence, and are about 13% in the population. They learn at a slower than the average rate. They are educated in the regular classes without special provisions except an adaptation of the regular class programme to fit their slower learning abilities. At the adult level, they are self-supporting, independent, and socially adjusted. With substantial care and support of teachers, students, parents, staff, and administration, they can learn and be as good as majority others.

A. Identification of Slow Learners

Following strategies may be adopted for identifying the slow learners:

Steps	Contents
Step 1	Entry rank analysis
Step 2	Identification of the student(s) having high absenteeism (can be done by
	analysing class attenuance)
Step 3	Identifying the students not submitting assignment(s) for a long time OR
-	chronically delay in submitting the assignments (identification by tracking
	assignment submission date).
Step 4	Identifying the students having inadequate class participation (identification
	through observation).
Step 5	Finding out the students having inadequate socialising skill (not mixing with
_	batchmates or making themselves isolated) [identification through observation
	and interaction]

Note. It must be ensured by the School and the faculty members that the student being a slow learner must not be communicated that he/she is a slow learner, a dull, or a back bencher. Utterance of such words will lower his or her self-esteem, confidence, and further anxiety and depression.

B. Ten action points to facilitate the educational success of slow learners

Point no	Action to be taken	
Action 1	SWOT analysis of each individual student.	
Action 2	Allocating extra hours to help the student by the faculty concern in flexible	
	mode (extra hours should not be reflected in normal class timetable).	
Action 3	Providing basic materials on fundamental of the course concern by	
	respective faculty member. Faculty members should also advise students	
	to go through available online study materials to create interest towards	
	study.	
Action 4	Conducting group exercises with space for leading and appreciation.	
Action 5	Facilitating peer learning.	
Action 6	Facilitation for engaging slow learners in extracurricular activities.	
Action 7	Focused counseling by the identified faculty member(s).	
Action 8	Promoting behavioral and attitudinal discipline through special session.	
	Connecting parents as and when required to know more about the	

	student's behavior and attitude and also seeking their support in pursuing their son/daughter to adopt behavioral and attitudinal discipline— following a self-made time-table daily for different activities, attending classes, submitting assignments, participating in different club/societies				
	activities, retraining from friend circle that hampers his or her academic				
	success, etc.				
Action 9	Connecting slow learners with the select alumni and senior(s) student who				
	had educational difficulties and subsequently succeeded and are doing				
	well in their professional life.				
Action 10	Facilitating self-appraisal of the student. Monitoring the progress of the				
	student(s) by the faculty concern.				

C. Outcome Assessment

Constant monitoring of the student achievement in subjects taken and the progress made compared to his or her past performance. The semester grade point average, number of credit opted for, number of credit completed (from ERP) should be made available and accessible to the faculty mentor and an action plan can be made with the involvement of the mentor and mentee how to progress towards educational success.





Measures Taken by IQAC for Quality Sustenance & Development

- Curriculum
- ✤ Teaching-Learning
- Research and Consultancy
- Extension Activities
- Student-Centric Learning
- ✤ Governance, Innovative Efforts
- Innovations & Best Practices

Curriculum Design & Development

- Up-to-date Curriculum with Continuous Improvement
- Periodic revision of Curriculum
- Recommendations from accrediting bodies and National Education Policy-2020
- Guidelines of statutory bodies
- ✤ To address UN SDGs

Flexible Curriculum

- Core, diverse & interdisciplinary domains through Electives (Program, Open, Industry), Major-Minor, Hons., Research, online courses
- Internships and Interdisciplinary project
- In tune with the emerging national and global trends and satisfying the local, national, regional and global needs as well as skill based.



Role of IQAC for Quality Consciousness Among Stake





University Academic Calendar

Course Committee

Review of Quality of Question papers

workshop on Core & Niche Area

- University Academic calendar for all programs
- ✓ University Guideline for setting up of question papers satisfying CO and Blooms Taxonomy, Question Moderation
- ✓ Periodic review of courses through Course Committee

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Role of IQAC for Quality Consciousness Among Stake

Process for calculation CO/PO Attainment

Conducting Academic Audit

Periodic Training on use of ICT during COVID

Well Structured Exam System

Tutor Mentoring & Counseling

Project Expo for Final Year Students

Conducting Administrative & Financial

Collecting Annual Report(Schools/Units)

Audit

Preparing AQAR

- Defined the process of calculating course outcomes with rubrics and PO, PSO
- Academic Audit along with Action Taken Report at the end of each Academic Year through External Experts

 Periodic Training on use of ICT in Course Delivery & Evaluation

- ✓ Smart Classroom
- ✓ Use of LMS for ABL (Google Classroom, Moodle)

✓ Use of Moodle, Ediquity, Myperfectice for Well_EŞatluyg;thred Exam System with E, אם לאפיס # לא אוד באף לאלא מאר לא לא לא לא Review/Feedback and Result Analysis

 Periodic Tutor Mentoring & Student Counselling



Session

 Project Guideline & Project Expo for final Year Students

 Conducting administrative & financial audit on yearly basis

✓ Collecting Annual Report from all Schools & Units

 Preparing AQAR (Annual Quality Assurance Report)

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Academic Audit – Focal Area Curriculum Design & Development Teaching & Learning Process Ensure course outcomes, program outcome Assessment process and student engagement Examination System Research, Project, Consultancy & Faculty Development Student Support



Times Higher Education Impact Ranking 2022





Major initiatives/activities towards SDG 10: Reduced Inequalities





Major initiatives/activities towards SDG 17: Pertnerships for the Goals



3.15 Quality Initiatives

Rankings

- QS 5 Stars in QS World University Ranking 2021
- 201-250 in Times Higher Education Asia University Rankings 2022.
- Ranked No.1 in Atal Ranking of Institution on Innovation Achievements (ARIIA)
- 20 in NIRF Ranking
- Accreditations
 - IET, UK
 - ABET, USA (In Process)
 - NBA (Tier 1 Washington Accord)
 - NABL accredited Hospital Laboratories

International Visibility

- 1773 Students from 35 Countries in 2020-21
- 204 number of International Collaborations in the field of Academics, Research, student Exchange and Faculty Exchange programs.

Research & Innovations

- Total number of research publications in last 5 years- 11123
- Total number of Functional MOUs- 324
- Sponsored Projects in last 5 years- Rs 350 crores
- Consultancy Projects in last 5 years- 635 crores
- Patents in last 5 years- 120

Technology Business Incubator

- 230+ Start-ups Incubated
- 79 Start-ups Graduated
- 250+ Engagement Programs
- 90+ IP Created
- %000+ jobs Crated
- 65+ Women Entrepreneurs
- Grants From BIRAC BIG, NIDHI EIR, SIIP, NIDHI PRAYAS and HDFC CSR
- Total Investment Raised For Start-ups- Rs 4,389,200,000/-

CHAPTER-4 STUDENTS DEVELOPMENT AND EXTENSION ACTIVITIES

Chapter-4 Students Development and Extension Activities

4.1 Introduction

Student development is a holistic process and includes many methods of grooming going far beyond the curricular structure. The student support services are adequate. The University provides support for Personality enhancement through soft-skill training including Yoga. Students are encouraged to develop Communication skills, Leadership skills, Teamwork, Discipline, public relations, etc. by giving them opportunities for special training though Career Advisory & Augmentation School (CAAS), and to organize different student events, conferences, conclaves, competitions, hackathons, workshops, seminars and webinars. KIIT DU has 28 Students Societies and Outreach Programs for the students to showcase, expose and develop their talent and skill. Students are groomed and different platforms are provided to showcase their talents and rewarded on their success. World class sports facilities including coaching for many outdoor and indoor sports including Hockey, Cricket, Soccer, Rugby, Basketball, Volleyball, Lawn Tennis, and archery etc. are available for students of all the schools of the University. The institution is having adequate facilities for sports and recreation, as already mentioned above. Besides the healthcare facilities, student hostels facilities, and student guidance and counseling services, are best in class. The social welfare policy aims at enhancing the quality of student life.

4.2 Community Engagement

Community engagement is a way of ensuring that community members have good opportunity of education, skill development and access to opportunities for meaningful work and contribution and develop functional capabilities that enable them to participate fully. Community engagement is about gaining empowerment through right education for taking decisions, developing a productive network through relationship development, and capacity building Community engagement comes naturally to Faculty, Staff and Students of KIIT-DU as the Kalinga Institute of Social Science (KISS), promoted by same Founder, is located in the immediate neighborhood of KIIT-DU campus.

4.3 NSS, NCC, Red Cross, Rotaract

Students are encouraged to take membership of these prestigious national and international organizations, which are known for their passionate social service. NSS trains the body and mind of young men and women to rise to help otherrs in distress, voluntarily, without being asked or without a personal motive. NCC trains students to stay disciplined and united in all the tasks they undertake. The Red Cross and Rotaract Club have the spirit of NSS with a global vision and local or cross-border volunteering work. These forums help in developing the students' empathy and appreciation for other people's need and also to show consideration towards other living beings which in turn could help them contribute towards society.

The volunteers work for a cause not for applause. However the volunteers are recognized and motivated at different levels. Also, it gives students an opportunity to apply and if selected partake in Youth Delegations visiting different countries. Each of these volunteering schemes have certain unique aspect and some common aspect like leadership development, relationship development, passion for social service, team working, dutifulness, developing personal integrity and authenticity and above all character building. The footprints of Volunteers always have a deeper impression.

4.4 Sports and Yoga

The learning of Yoga is mandated at every School in the Campus. Yoga has been a non-credit course earlier, but it has been made a 1-Credit course since 2020 to encourage more and more students towards Yoga. Yoga practice and sports help to develop a healthy mind along with a healthy body. Sports and Yoga have been an integral part of extracurricular activities since the foundation of KIIT-DU. These initiatives will be immensely helpful to attain work-life balance and a stress-free life in a demanding 21st Century.

4.5 Student Training

Information Technology is the driver of the 21st Century for all kinds of work professions and for living a healthy and happy life. Therefore, the University has created extensive opportunity for Software training of all students as per their inclination and choice. Foundation Course using C, C++, Programming with Data Structure, Object Oriented Programming Using JAVA with Minor Project, Full stack Web development using J2EE (including Hibernate & Spring), Android Application Development with Project Web Development using HTML 5 & Web Development with PHP My SQL with Project Advance PHP using framework (Code Igniter, cake php) are offered. Besides, ASP.NET using C+ Programming with Project Big Data with Hadoop with Project CLOUD COMPUTING (AWS) AR/VR. Embedded Systems Robotics with Project, IOT with Core Embedded, Python Programming using D'JANGO framework are also offered. Machine Learning with Python with Project Data Science using Python & R Programming, Deep Learning, Artificial Intelligence (AI), Block chain, Oracle DBA, Oracle PL SQL, Oracle JAVA, Oracle AI are also offered. The KIIT DU has set up a research lab in its campus and has been working on futuristic research with help of faculty and students. CAAS trains and prepares students for various competitive exams in the Public Sector Units (PSUs), Banks and the Government. CAAS pprovides training to all the Schools in the University every year in areas like quantitative aptitude, logical reasoning, data interpretation,

Computer Proficiency, verbal fluency and other soft skills for Group Discussion and Personal Interviews, to face the required written tests and viva voce effectively.

4.6 Student Progression

The students progression follows an internal path and an external path. The internal path is defined as per the curricular structure for different programmes and progression from semester to semester or year to year is on the basis of performance in examination and regulations. The external paths are three. Either the student goes for higher education or gets into some income generating occupation or becomes an entrepreneur by incubating his/her ideas while in campus using programmes on entrepreneurship development and programmes conducted by Entrepreneurship Cell of the KIIT TBI. The annual entrepreneurship summit at KIIT DU is one of the grandest and largest student organized entrepreneurship conclave in Eastern India.

4.7 Student Counselling

Down time in the life of students vary ranging from emotional disturbances and anxiety in normal times to a feeling of alienation during COVID times. In this context counseling intervention become effective in supporting the students emotionally to remain a part at the main stream duly empowered. Virtual Counseling sessions have been organised for students of all the schools, all the years regularly and for the parents in Saturday's and Sunday's to make them feel a part of KIIT DU.

4.8 Tutor Mentoring

A mentor is more oriented to give advice to the mentee in a general way like career guidance, academic guidance, professional relations and networking, personal development, professional specialization choices, among others according to its professional and life path. Mentoring should be trust-based and can be informal and longer in duration.

A tutor would be more focused on professional improvement of the student, acting more as an expert that can teach, supervise, help solving problems, share techniques and strategies, etc. according to its professional experience and in order to attain more defined objectives and expectations. Tutoring is more formal and time framed.

4.9 Alumni Engagement

The success and reputation of alumni enhances the public stature of their alma mater. All the reputed academic institutions maintain a strong symbiotic relationship with the alumni, by forming an Alumni Network, usually batch wise and school wise. The alumni groups also form school wise network across geographical regions as well as across Industry sectors. The alumni network helps the members develop strong affinity which eventually work as an enabling support system and helps the individual members in a variety of ways. The KIIT Alumni Association and Chapters at Six locations in India - Delhi, Mumbai, Kolkata, Chennai, Bangalore and Hyderabad are active and vibrant, as the KIIT DU's grand network of alumni. The dynamic Alumni portal helps to enhance networking, job posting, sharing news and information's. In the virtual mode the Alumni LIVE series and Web series are conducted to make the alumni and current students connect with one another. Each School maintains strong association with the school alumni for more intensive engagement with faculty apart from batchwise or region wise communication. The Alumni are encouraged to share their experience and new learnings with the current students in campus in various ways. They are invited as speakers for seminars, webinars, conferences, conclaves; as sponsors, idea-partners, and/or judges for creative and competitive events; as visiting faculties and corporate mentors. There is no limit to the relationship building between the alumnus and the alma mater at KIIT-DU including all associated schools and faculty.

4.10 Extension Activities

Community Engagement Cell (CEC) is an active body, which constantly strives towards the welfare of the society, especially the downtrodden people. The Cell

provides opportunities to the entire students under the KIIT University to take part in various government led community based activities and programmes. CEC aims to provide hands-on experience for students in delivering community service. The cell organizes and participates in various extension activities with a dual objective of not only sensitizing students about various social issues but also to contribute to the community and strengthen the community participation.

4.10.1 Objective

- To assist during any prestigious/mega function at KIIT and KISS
- ✤ To facilitate the students of KIIT to perform the outreach activities at KISS
- Motivate the Students to involve in different outreach activities
- Conducting the awareness programmes
- To coordinate all types of social outreach activities including Art of Giving AOG and Kanya Kiran
- Facilitate NSS wings of KIIT
- Conducting counseling session and developing short programmes to provide platform to the students to involve themselves in different social activities to inculcate sense of social responsibility.
- ✤ To assist any other assignment given from time to time.

Rural India has been facing many issues like uncleanliness, malnutrition and open defecation. Lack of awareness is noted among the villagers regarding these issues. To solve such problems, CEC through NSS have adopted Madhusudanpur Dadha Panchayat, Padmakesharipur, Pada Sahi, Kesura Village from Basughai Panchayat. Our vvolunteers have conducted various types of sensitization programmes related to social issues like Road Safety Awareness, Menstrual Hygiene Awareness through Transgender Community, Swachh Bharat Abhiyan, Awareness on Sanitation and Hygiene, Yoga Sessions, Drugs and Alcohol Abuse, Plantation drive, Diwali Awareness Campaigns, Awareness on Protection of Children from sexual offences, Self Defense and Water Conservation Awareness. In events like International Women Day and Yoga Day students take up activities to spread awareness.

All these extension activities help students come in contact with their society and community and find solutions to many social problems. Under these programmes, various awareness rallies are organized to keep students aware of their personal and societal roles and responsibilities. Swachh Bharat Abhiyan is organised by the volunteers to aware the villagers about the cleanliness campaign and initiatives were taken to make them understand the concept of hygiene. Diwali Awareness campaign was done with the prime motive to target kids for reducing pollution and making people understand how important it is to avoid firecrackers as it may lead to many diseases. Several other events like self-defense and good and bad touch campaign are of prime importance and were duly conducted by the vvolunteers to aware the kids about the circumstances where they need to use these skills to protect themselves.In Special Camp volunteers made sure that they talk about sensitive topic. These programmes help students in their holistic development and induce in them leadership quality, feeling of oneness and cooperation. Working together with other individuals, students learn to negotiate, communicate and lead others. Such programmes sensitize the student volunteers towards the social issues and take

challenges of the lesser privileged sections of the society. By involvement in these extension and outreach activities, the students develop critical thinking skills and time management. Working outside the college campus and with diversified social groups of people, allow students to gain more self-confidence and be a responsible citizen. Presently, in this Covid-19 pandemic situation, NSS Volunteers are playing a major role being the front liners by helping people, taking all the necessary precautions and safety measures as well.

Thus, students not only propel in education and career rather become responsible citizens for a better society and community,developing themselves physically, cculturally and spiritually. Hence, it has been seen that students under these programmes develop holistically and for which the college also stands to abide by.

The outreach activities like Kanya Kiran, Art of Giving and specially interaction of the students with the KISS students make the young minds more confident and real human being to serve the society in much more scientific manner.

4.10.2 Smart Campus



Asset management and Tracking

Hardware Specifications

Technology	Devices	Range (in meters)	Tracking Condition and Devices	Network Requirement	Electrical Connectivity
Passive RFID	Passive RFID Tags & UHF Reader, Buzzer.	10-15	Indoor movement / Rarely moveable assets with fixed entry and exit.	LAN/ WIFI	230v, 50Hz / 120v, 60Hz
Active RFID	Active tags & 2.4Ghz Reader, Buzzer	80 - 150	Indoor movement / Frequently moveable assets.	LAN/WIFI	230v, 50Hz / 120v, 60Hz
BLE	BLE beacons & Customized beacon gateway, Buzzer	80 –150	Indoor movement / Frequently moveable assets.	LAN/WIFI	230v, 50Hz / 120v, 60Hz
GPS	Vehicular GPS Tracker	-	Outdoor / Fleet	GSM	230v, 50Hz / 120v, 60Hz

4.10.3 Digitization of Financial Management

- ♦ The vision of Financial Management function of KIIT DU is to create a high standard of financial probity and accountability through robust and efficient financial processes. We provide outstanding financial supports to enable the delivery of the University's strategic Plan and vision. We strive to protect the financial integrity of the University in changing regulatory & technological environments.
- ♦ The mission of KIIT DU's Financial Management function is to provide fast, accurate, real time and quality report on the financial information of our departments. business activities for various organization. its and constituenciesincluding Students, Legislators, Regents, Trustees. Government Agencies, Rating Agencies, Auditors, Creditors, Grantors, Donors and others who may have a vested interest in the financial activity and health of the Organization.
- ♦ KIIT DU's financial management functions have embarked on digital transformation keeping students centricity at its core over the past few decades through emerging technologies including currently used SAP platform. The University has been catering to educational needs of National and International students pertaining to social and global issues. The introduction of digital accounting has revolutionized the finance management of the University. The present digitization system emphasizes on highly personalized service, intuitive interfaces, to enable automation, increase data quality, collect and structure data, backed by robust security and transparency.
- ♦ The presently implemented SAP digitization has four pillars namely Financial Integration (FI), Material Management (MM), Human Cycle Management (HCM) and Student Lifecycle Management (SLCM) to provide the best services to our stakeholders. Student Lifecycle Management (SLCM), the digital platform for our students, ensures a hassle-free digital financial management system through which the students can pay their dues at any time & any where through online access from Laptop/Mobile and get acknowledgement copy on real time basis. It is a platform where the students and their parents are able to get their details on financial transactions like various fees paid (through automation of Bank), fees due etc and make plan for future payment. On the other hand, the students and parents can also access details on non-financial transactions including admission status, attendance, admit card, marks, semester wise performance and exam registration etc.

4.10.4 Material Management

Successful implementation of the following in digital platform:

- ♦ Indent Management
- \diamond Purchase requisition
- \diamond Purchase register
- \diamond Supplier payment
- \diamond Vendor details and history of transactions
- ♦ Data integration, sharing and automation between material management and accounts department.

4.10.5Digital Evaluation Process

- Digital evaluation is a process of evaluation of answer scripts of students written in the exam. It is evaluated online i.e through the software. The evaluator log in through their credential and evaluate the answer script. The mark which has been awarded by the evaluator through software is saved in the data base. After that mark is generated through the server and result publication happens. Then it is handed over to the respective client or organization.
- However there are many processes in the e-evaluation which can be varied department to department of KIIT DU. Process of end semester is as follows.
- There are mainly 2 types of evaluation process during end semester examination. (Type 1 evaluation → student view → recheck evaluation → chief evaluation → result publication; Type 2 evaluation → chief evaluation → student view → recheck evaluation → result publication).
- The above process is followed by each and every department of KIIT DU, subject to minor variations in some departments.
- The above process is absolutely managed by eduquity software.

4.10.6 E-Cell Activities

Conclave of Entrepreneurship Leadership and Technology (CELT)- It is the latest initiative of KIIT E-Cell where in ideas from all over the university and the state are called in to pitch in front of an investor jury and top three problem solving/business ideas are awarded cash prizes.

4.11 Academic and Administrative Audit

The Academic and Administrative is conducted to evaluate the performance of various Schools/Departments/Sections of the University and to give suggestions for further improvements in Quality of teaching, Research, Administration and Curricular and Extra-Curricular activities.

4.11.1 Objectives

- To promote self reflection of the units / schools being audited
- To promote self improvement measures among units / schools being audited
- To conduct quality checks on different activities undertaken by units/ schools to meet expected outcomes
- To promote adoption of best practices
- ✤ To evaluate the efficiency and effectiveness of the Administrative procedure

4.11.2 Outcomes

- Development of learning outcomes, Design and Development activities in curriculum, teaching-learning process, student learning assessment process and student engagement programs.
- Assessment of the quality and quantity of research outcomes during last three years
- ✤ Assessment of Examination process including question paper quality

4.12 Energy Audit

Energy audit is a survey and analysis of energy flows for energy conservation in a building or campus.

4.12.1 Objectives

- ✤ To balance the total energy inputs with its use.
- ✤ To determine ways to reduce energy consumption
- ✤ To lower operating cost through energy conservation and planning

4.12.2 Outcomes

- Identification of energy use among various services and provides opportunities for Energy conservation
- Energy substitution (Electrical energy to Solar energy)
- Energy balance (Resource distribution)

4.13 Green Audit

Green Audit is conducted for systematic identification, quantification, recording, reporting and analysis of components of environmental diversity of various establishments.

4.13.1 Objectives

- ✤ To assess the environmental quality and the management strategies being implemented in the Campus which has an impact on eco-friendly ambience.
- To assess the liquid and solid waste generation and management plans in the campus for controlling pollution
- To assess the carbon foot print of the campus and the measures implemented to reduce the Carbon Footprint

4.13.2 Outcomes

- Ensuring legislative compliance, Reducing environmental impacts and providing a proper Environmental Management System
- Observations and future planning on Energy conservation (Renewable sources), Rain water harvesting, Waste water treatment, Solis waste management, Hazardous and E-waste management, Reduction of Carbon footprint, Plantation etc.

4.14Gender Audit

The Gender Audit is an attempt to study whether the organization has good gender balance and whether it follows the rules, policies and actions formulated for upgradation of women in society.

4.14.1 Objectives:

- ✤ To assess and check the institutionalization of gender equality into organization
- To understand the relationship between men and women, their access to resources, their activities and the constraints if any

4.14.2 Outcomes

- Examination of the policies, manuals and standards that governs the gender sustainability
- Assessment and verification to assure both women and men enjoy the same opportunities, rights and obligations in all spheres of life.

4.15 Finance Audit

It is the official inspection of the financial records of an organisation.

4.15.1 Objectives

To provide an objective independent examination of the financial statements which increases the value and credibility of the organization.

4.15.2 Outcomes

- Ensuring that the financial records are an accurate representation of organization's financial performance
- Ensuring that the balance sheet, income statement, statement of cash flows and the footnotes and disclosures are correctly classified, complete and accurate within materiality.

CHAPTER-5 ACCREDITATION AND RANKINGS

Chapter-5 Accreditation and Rankings

5.1 Accreditation Board for Engineering and Technology (ABET)

ABET aims to build a better world— one that is safer, more efficient, more comfortable and more sustainable.

Criterion Students	1.	Student performance must be evaluated. Student progress must be monitored to foster success in attaining student outcomes, thereby enabling graduates to attain program educational objectives. Students must be advised regarding curriculum and career matters.
Program		that are consistent with the mission of the institution, the needs of
Educationa	1	the program's various constituencies, and these criteria. There must
Objectives		be a documented, systematically utilized, and effective process,
		involving program constituencies, for the periodic review of these
		program educational objectives that ensures they remain consistent
		with the institutional mission, the program's constituents' needs, and
		these criteria.
Criterion	3.	The program must have documented student outcomes that support the program educational objectives. Attainment of these outcomes
Outcomes		prepares graduates to enter the professional practice of engineering
outcomes		Student outcomes are outcomes (1) through (7), plus any additional
		outcomes that may be articulated by the program.
		✤ An ability to identify, formulate, and solve complex engineering
		problems by applying principles of engineering, science, and
		mathematics
		✤ An ability to apply engineering design to produce solutions that
		meet specified needs with consideration of public health, safety,
		and welfare, as well as global, cultural, social, environmental, and
		• An ability to communicate effectively with a range of audiences
		 An ability to recognize ethical and professional responsibilities in
		engineering situations and make informed judgments, which must
		consider the impact of engineering solutions in global, economic,
		environmental, and societal contexts
		\clubsuit An ability to function effectively on a team whose members
		together provide leadership, create a collaborative and inclusive
		environment, establish goals, plan tasks, and meet objectives
		• An ability to develop and conduct appropriate experimentation,
		analyze and interpret data, and use engineering judgment to draw
		COLICIUSIONS.
		appropriate learning strategies
Criterion	4	The program must regularly use appropriate documented processes
Continuous	-T. S	for assessing and evaluating the extent to which the student
Sontinuou;	3	ior assessing and evaluating the extent to which the student

Improvement	outcomes are being attained. The results of these evaluations must be systematically utilized as input for the program's continuous improvement actions. Other available information may also be used to assist in the continuous improvement of the program.				
Criterion 5. Curriculum	 The curriculum requirements specify subject areas appropriate to engineering but do not prescribe specific courses. The program curriculum must provide adequate content for each area, consistent with the student outcomes and program educational objectives, to ensure that students are prepared to enter the practice of engineering. The curriculum must include: A minimum of 30 semester credit hours (or equivalent) of a combination of college-level mathematics and basic sciences with experimental experience appropriate to the program. A minimum of 45 semester credit hours (or equivalent) of engineering topics appropriate to the program, consisting of engineering and computer sciences and engineering design, and utilizing modern engineering tools. A broad education component that complements the technical content of the curriculum and is consistent with the program educational objectives. A culminating major engineering standards and multiple constraints, and 2) is based on the knowledge and skills acquired in earlier course work 				
Criterion 6. Faculty	The program must demonstrate that the faculty members are of sufficient number and they have the competencies to cover all of the curricular areas of the program. There must be sufficient faculty to accommodate adequate levels of student-faculty interaction, student advising and counseling, university service activities, professional development, and interactions with industrial and professional practitioners, as well as employers of students. The program faculty must have appropriate qualifications and must have and demonstrate sufficient authority to ensure the proper guidance of the program and to develop and implement processes for the evaluation, assessment, and continuing improvement of the program. The overall competence of the faculty may be judged by such factors as education, diversity of backgrounds, engineering experience, teaching effectiveness and experience, ability to communicate, enthusiasm for developing more effective programs, level of scholarship, participation in professional societies, and licensure as Professional Engineers.				
Criterion 7. Facilities	Classrooms, offices, laboratories, and associated equipment must be adequate to support attainment of the student outcomes and to provide an atmosphere conducive to learning. Modern tools, equipment, computing resources, and laboratories appropriate to the program must be available, accessible, and systematically maintained and upgraded to enable students to attain the student outcomes and				

	to support program needs. Students must be provided appropriate guidance regarding the use of the tools, equipment, computing resources, and laboratories available to the program. The library services and the computing and information infrastructure must be adequate to support the scholarly and professional activities of the students and faculty.
Criterion 8. Institutional Support	Institutional support and leadership must be adequate to ensure the quality and continuity of the program. Resources including institutional services, financial support, and staff (both administrative and technical) provided to the program must be adequate to meet program needs. The resources available to the program must be sufficient to attract, retain, and provide for the continued professional development of a qualified faculty. The resources available to the program must be sufficient to acquire, maintain, and operate infrastructures, facilities, and equipment appropriate for the program, and to provide an environment in which student outcomes can be attained.

5.2 Institution of Engineering and Technology (IET) Accreditation

Programmes are accredited for a maximum of five years and an accreditation visit is normally required to each site where the programme is delivered. The accreditation process is necessarily rigorous and programmes are accredited against output standards set by the Engineering Council on behalf of the sector. Key reference points for academic accreditation are:

- ✤ Accreditation of Higher Education Programmes (AHEP) Third Edition
- The Frameworks for Higher Education Qualifications of UK Degree-Awarding Bodies
- Engineering Subject Benchmark Statement
- Foundation Degree Benchmark Statement
- ✤ IET Guidance on how to meet the Learning Outcome requirements for Accreditation

An accredited degree programme must meet all of the required Learning Outcomes set out in AHEP. Each type of accredited degree provides a solid foundation in the principles of engineering relevant to the discipline specialism. The six key areas of learning defined in AHEP Third Edition are:

- Science and mathematics
- Engineering analysis
- Economic, legal, social, ethical and environmental context
- Design
- Engineering practice
- ✤ Additional general skills

Criterion 1 -	Programme aims				
Programme	*	Programme level Learning Outcomes			
Aims, Learning	*	Coverage of AHEP Learning Outcomes in programme and			
Outcomes and module Learning Outcomes		module Learning Outcomes			
	L				

Content:	 Alignment of programme content, Learning Outcomes and aims with the programme title Programme Structure: technical & non-technical, balance, breadth and scope. Industrial involvement: evidence of industrial input and balance.
	 influence on programme design, including the maintenance of links with industry and other relevant external stakeholders. Impact of scholarship/research and consultation on programme design Public information - how programme accreditation is integrated into all published material and the process for ensuring accuracy of such information.
Criterion 2 - Achievement of AHEP Learning Outcomes:	The Learning Outcomes achieved by the graduates from the programme should fulfil the AHEP output standards. Areas to be reviewed within this criterion are each of the six AHEP Learning Outcome areas as defined by AHEP.
Criterion 3 - Assessment:	 Standard, appropriateness and challenge of examination papers and continuous assessment, including use of clear and transparent marking criteria. Distribution of assessment results including balance between examination papers and continuous assessment results Weighting of continuous assessed work towards the final award
Criterion 4 - Projects:	 Assessment regulations Project selection and allocation Staff supervision and management of student projects Project planning and management Standard and appropriateness Marking and moderation
Criterion 5 - Student Support and Staffing:	 Entry route and data Failure rates Student support Industrial involvement in the student learning experience including: lectures, visits, sponsorship and training, and support for industrial placements IET student awareness of professional registration and membership of PEIs, does the department have an IET Staff/Student Advisor? Support for development of employability of students Staff recruitment, development and training Use of teaching fellows, postgraduate tutors, demonstrators and visiting staff Department staff numbers including academic and technical Staff professional registration and membership of professional bodies

Criterion 6 –	The learning resources and laboratory facilities should adequate to		
Resources and	support the students' learning experience. Areas to be reviewed		
Facilities:	within this criterion are:		
	 Information and learning resources (including VLEs) 		
	Provision of general and specialist laboratory computing		
	facilities		
	 Planned expenditure (capital and revenue) 		
Criterion 7 -	The programme review and monitoring procedures should operate		
Quality	effectively to guarantee the quality of the assessment in		
Assurance and	maintaining output standards and are effective in maintaining and		
Enhancement	enhancing the students' learning experience. Areas to be reviewed		
	within this criterion are:		
	✤ Implementation of the action plan following the previous IET		
	accreditation visit (if applicable)		
	✤ Programme design, approval and periodic and annual review		
	processes		
	 Continuous quality improvement processes 		
	 External academic audit (for example External Examiners) 		

Check list for IET Course File Preparation

- 1. Six nos. of activity questions with CO mapping
- 2. Scheme of evaluation of all six activities
- 3. Sample copy with correction & signature of faculty
- 4. Mid question with CO mapping
- 5. Scheme of evaluation for mid semester question
- 6. End sem question with CO mapping
- 7. Scheme of evaluation for end sem question
- 8. Mark in provided format
- 9. AHEP4 mapping as per format (18 LO prescribed by IET with Course outcome)

5.3 National Assessment and Accreditation Council (NAAC) Accreditation

Criterion 1:	Curriculum is in the core of education. It is important to have a relevant,				
Curricular	well structured curriculum that answers all the questions about the				
Aspects	future and equips the student with all the necessary skills and				
(150	knowledge.				
marks)	The key aspects to consider while complying with this criteria are:				
	 Curriculum design and development, 				
	 Curriculum planning and implementation, 				
	✤ Academic flexibility,				
	 Curriculum enrichment, 				
	 Feedback system. 				
Criterion 2:	This criterion addresses the regular academic activities of the				
Teaching-	institution. The teaching-learning processes, students results, desired				
Learning	outcomes etc comes under this criterion. As the first criteria deals with a				
and	"WHAT" in learning, this one assess the "HOW" the learning happens.				
Evaluation	Various evaluation and assessment practices are also a point of interest				
(200	for this one. Here are some important areas to focus on to improve this				

 Student enrollment and profile, Catering student diversity, Teaching-Learning process, Teacher quality,
 Catering student diversity, Teaching-Learning process, Teacher quality,
 Teaching-Learning process, Teacher quality,
✤ Teacher quality,
 Evaluation process and reforms.
Student performance and learning outcomes.
Criterion 3: This criterion, as the name suggests, is about the academic researc
Research. extended consultancy services from the side of institution towards t
Consultance industry and the field of study, and extension which is the outreach
v and institution towards the society, addressing various real-life problem
Extension finding solutions, and other extra-curricular activities to improve t
(250 overall quality of the institution. The key aspects of this criterion are:
marks) Promotion of research.
Resource mobilization for research.
 Research facilities.
 Research publications and awards.
\diamond Consultancy
 Extension activities and institutional social responsibility.
Collaborations.
Criterion 4: This criterion is to assess the physical academic facilities and suppo
Infrastruct system. Having a good learning environment and necessary facilities a
ure and important while working towards the quality of education. Classroom
Learning labs, technology, facilities for physical fitness and medical purpose
Resources proper and sufficient reference materials are all vital for assuring high
(100 educational quality of the institution. Introducing ICT
marks) education comes under this criterion. The major factors to consid
while improving this criterion are:
Physical facilities including hostel, playgrounds, internet with the second
medical emergency addressal etc.
 Library as a learning resource.
✤ IT infrastructure.
 Maintenance of campus facilities.
Criterion 5: The major field of focus for this criterion is on ensuring prop
Student participation of students in academics, and students support for t
Support side of the institution. Mentoring and providing guidance for t
and students in various aspects of education and their field of study al
Progression matters. Helping and guiding students in their education contribut
(100 into the overall quality of education. How the institution facilitate t
marks) progression of students to higher level of education and/or toward
employment is also an important factor while working on this criterio
To comply with this criteria, the institution need to focus on t
following:
Student mentoring and support.
Student progression,
Student participation and activities.
Criterion 6: Governance and management are the backbone of the institutio

Governance	Having a well-structured governing body and a management helps to			
, leadership	find and address gaps in practices, and efficiently implement proper			
and	counter mechanisms on time. The quality and future of the institution			
manageme	depends on it. Internal quality assurance, faculty empowerment,			
nt (100	financial resource management, strategy development, all comes down			
marks)	to this criterion. The key aspects of this criterion are:			
	 Institutional vision and leadership, 			
	 Strategy development and deployment, 			
	 Faculty empowerment strategies, 			
	 Financial management and resource mobilization, 			
	 Internal quality assurance system. 			
Criterion 7:	This criterion is to assess factors like			
Innovations	The approach of institution towards a greener, eco-friendly campus,			
and best	 Energy conservation in the institution, 			
practices	 Innovative ideas implemented in the institution, and 			
(100	 Practices towards a common, better future. etc. 			
marks)	These all proclaims the nature perspectives of the institution towards			
	the outside world, and its moral values. The 'Best practises' includes			
	anything that have contributed towards the institutional objectives and			
	quality improvement.			

The NAACs grades institutes on an eight-grade ladder:[5] (Annex 1-2)

Range of institutional CGPA	Letter Grade	Performance Descriptor
3.51 - 4.00	A++	Accredited
3.26 - 3.50	A+	Accredited
3.01 - 3.25	А	Accredited
2.76 - 3.00	B++	Accredited
2.51 - 2.75	B+	Accredited
2.01 - 2.50	В	Accredited
1.51 - 2.00	С	Accredited
≤ 1.50	D	Not Accredited

Checklist of documents in Theory course file:

A. <u>Course Descriptor:</u>

- 1. Course Name
- 2. Course Code
- 3. L-T-P
- 4. Contact hours per week
- 5. Course Coordinator
- 6. Course Outcomes
- 7. Syllabus
- 8. Lesson Plan
- 9. Books
- 10. Links to e-resources (NPTEL, YouTube, Swayam etc)
- 11. Learning activities (Activity details & schedule)
- 12. Assessment scheme/ Evaluation scheme
13. CO-PO mapping (Mention the mapping levels (3-High mapping, 2-Medium mapping, 1-Low mapping, 0-No mapping))

B. Details of Learning Activities:

- 1. Description of learning activities with CO mapping
- 2. Activity question paper with CO mapping
- 3. Model solution (detailed solution of activity)
- 4. Assessment scheme (Scheme of evaluation)
- 5. Sample evaluated copy of students
- 6. Feedback given to students (about their performance & how to improve)
- 7. Repeat step- 2 to 6 for all the 6 activities

C. <u>Mid & End Semester Examination:</u>

- 1. Mid semester question paper with CO mapping
- 2. Model solution & scheme of evaluation
- 3. Repeat step-1 to 2 for End semester examination

D. Program wise course report: (to be filled in the format given)

- 1. Grade distribution
- 2. CO attainments

E. <u>Meeting Notice & Minutes of Meeting:</u>

- 1. 4-5 meetings before End semester examination (Notice & Minutes of meeting)
- 2. One meeting after publication of result (Notice & Minutes of meeting):

The minutes of this meeting must contain the analysis & discussion on the following points:

i) CO attainments

ii) Areas of low & high CO attainments

iii) Areas where students apparently lacked conceptual clarity

iv) Questions less attempted by the students

v) Challenges faced while teaching

vi) Feedback received from the students directly /indirectly by faculty members

vii) Plans to achieve better outcome in the upcoming session

viii) Plans to overcome the challenges

ix) Whether changes are required in lesson plan, learning activities, tutorials etc? if so, what?

x) Which contents beyond syllabus may be taught in the next session to bridge any knowledge gap and motivate students for projects in that area or life-long learning?

xi) What activities may be conducted based on the contents taught beyond syllabus? What will be the change in lesson plan in that case? Which course outcomes and program outcomes /program specific outcomes will be addressed to a greater depth by this new content beyond syllabus?

xii) Initiatives taken to identify and help slow learners and motivate fast learners, the observations and the outcomes.

5.4 National Board of Accreditation (NBA)

Outcome based education is targeted at achieving desirable outcomes (in terms of knowledge, skills, attitudes and behavior) at the end of a program. Teaching with this awareness and making the associated effort constitutes outcome based education. Accreditation Criteria Marks Distribution is follows.

Criterion		Mark / Weightage
Program Level Criteria		
1.	Vision, Mission and Program Educational Objectives	60
2.	Program Curriculum and Teaching – Learning Processes	120
3.	Course Outcomes and Program Outcomes	120
4.	Students' Performance	150
5.	Faculty Information and Contributions	200
6.	Facilities and Technical Support	80
7.	Continuous Improvement	50
Institution Level Criteria		
8.	First Year Academics	50
9.	Student Support Systems	50
10.	Governance, Institutional Support and Financial Resources	120
	Total	1000

Accreditation Criteria Details

Criteria	Highlights
Criterion 1- Vision,	While framing the PEOs, the following factors are to be
Mission and Program	considered:
Educational Objectives	✤ PEOs should generally reflect on the professional
(PEOs)	accomplishments, continuing education and attitudes in
	the first few years after their graduation.
	✤ The PEOs should be consistent with the mission of the
	institution.
	✤ All the stakeholders should participate in the process of
	framing PEOs
	 The number of PEOs should be manageable
	 It should be based on the needs of the stakeholders.
Criterion 2- Program	Program should describe the process that periodically
Curriculum and	documents and demonstrates how the program curriculum
Teaching-Learning	is evolved considering the Program Outcomes and Program-
Processes	Specific Outcomes. The structure of the curriculum shall
	comprise of course code, course title, total number of
	contact hours (lecture, tutorial and practical) and credits.
	Program curriculum grouping based on course components
	such as core, elective, basic science, engineering science,
	humanities and projects / internship shall also
	indicated.Program should include methods followed to
	improve quality of teaching and learning processes which
	may include adherence to academic calendar and improving
	instruction methods using pedagogical initiatives such as
	real world examples, collaborative learning, quality of
	laboratory experience with regard to conducting
	experiments, recording observations, analysis of data, etc.
	encouraging bright students, assisting weak students, etc. It

is also required to mention the initiatives, implete details and analysis of learning levels related semester tests, assignments and evaluation, st ascertain the quality of the projects in terms related to project identification, allotment, monitoring, evaluation including demonstration prototypes and enhancing the relevance Implementation details including details of PC addressed through the projects with justificat required to be provided. Program should descri initiatives related to industry interaction i industry-attached laboratories, partial appropriate courses by industry experts, initiative industry internship/summer training, etc.	plementation to quality of teps taken to of processes continuous n of working of projects. Os and PSOs tion are also ibe about the in terms of delivery of ves related to
Critarian 2 Cauroo Dragia illustrations of program articulation	motrin and
Criterion 3- Course Precise inustrations of program articulation	matrix and
Outcomes and Program course articulation matrix, modes of delivery of	the courses,
Outcomes how assessment tools are used to assess the	ne impact of
course delivery / course content, and how lab	boratory and
project work are contributing towards the attain	nment of the
COs and POs, shall be clearly outlined in the pro-	ogram.
Criterion 4 - Students' The educational institution should monitor the	he academic
Performance performance of its students carefully. The inst	titution shall
provide the required information for three	ee complete
academic years about sanctioned intoly and or	orresponding
academic years about sanctioned intake and co	
admission in the program, success rate with	and without
backlogs in the stipulated period, academic pe	erformance of
second and third year, placement and higher	studies and
professional activities as per the format given in	the SAR.
Criterion 5 - Faculty The faculty members should possess adequate	·
Information and expertise to deliver all the curricular cont	knowledge /
Contributions program. The number of faculty members must	knowledge / tents of the
so as to enable them to engage in activities of	knowledge / tents of the t be adequate
teaching duties, especially for the purposes of	knowledge / tents of the be adequate outside their
development, curriculum development,	knowledge / tents of the t be adequate outside their f professional
mentoring/counseling, administrative work, t	knowledge / tents of the t be adequate outside their f professional , student
placement of students, interaction with inc	knowledge / tents of the t be adequate outside their f professional , student training, and
professional practitioners	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and
	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and
Criterion 6 - Facilities The institution must provide adequate in	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and
Criterion 6 - Facilities The institution must provide adequate in and Technical Support facilities to support the achievement of t	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and frastructural the Program
Criterion 6 - Facilities The institution must provide adequate in and Technical Support facilities to support the achievement of t Outcomes. Classrooms tutorial rooms mee	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and hfrastructural the Program eting rooms
Criterion 6 - Facilities The institution must provide adequate in and Technical Support facilities to support the achievement of t Outcomes. Classrooms, tutorial rooms, mee	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and hfrastructural the Program eting rooms, rooms and
Criterion 6 - Facilities The institution must provide adequate in and Technical Support facilities to support the achievement of t Outcomes. Classrooms, tutorial rooms, mee seminar halls, conference hall, faculty to laboratories must be adequately furnished to	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and infrastructural the Program eting rooms, and
Criterion 6 - Facilities The institution must provide adequate in and Technical Support facilities to support the achievement of t Outcomes. Classrooms, tutorial rooms, meet seminar halls, conference hall, faculty to laboratories must be adequately furnished to	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and frastructural the Program eting rooms, rooms, and o provide an
Criterion 6 - Facilities The institution must provide adequate in and Technical Support facilities to support the achievement of t Outcomes. Classrooms, tutorial rooms, mee seminar halls, conference hall, faculty to laboratories must be adequately furnished to environment conducive to learning.	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and frastructural the Program eting rooms, rooms, and o provide an
Criterion 6 - Facilities and Technical SupportThe institution must provide adequate in facilities to support the achievement of t Outcomes. Classrooms, tutorial rooms, mee seminar halls, conference hall, faculty to laboratories must be adequately furnished to environment conducive to learning.Criterion7-Closing the loop at course level, program	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and frastructural the Program eting rooms, rooms, and provide an
Criterion 6 - Facilities and Technical SupportThe institution must provide adequate in facilities to support the achievement of t Outcomes. Classrooms, tutorial rooms, mee seminar halls, conference hall, faculty to laboratories must be adequately furnished to environment conducive to learning.Criterion7- Closing the loop at course level, program institution level ensures quality assurance of to	knowledge / tents of the t be adequate outside their f professional , student training, and dustrial and offrastructural the Program eting rooms, and provide an n level and the program.

	provide continuous improvement through course delivery,
	assessment and curriculum.
Criterion 8 –First Year	First year of graduation study consists of science,
Academics	mathematics, humanities and general engineering courses
	from different departments of the institution. Institution has
	to provide information about First Year Faculty Ratio
	(FYSFR), Qualification of Faculty Teaching First Year
	Common Courses, First Year Academic Performance,
	Attainment of Course Outcomes and Program Outcomes of
	all first year courses and the action taken based on the
	results of evaluation of relevant POs and PSOs for
	continuous improvement.
Criterion 9 –Student	Academic student support systems play an important role in
Support Systems	the teaching-learning process. Institutions are expected to
	provide information on the various such systems namely,
	mentoring/proctor system at individual level, feedback
	analysis and reward and corrective measures, self-learning
	facilities/materials and scope for learning beyond syllabus,
	career guidance, training and placement, details of activities
	of entrepreneurship cell, and provision for co-curricular and
	extra-curricular activities as per the format given in SAR.
Criterion 10 -	The governance structure of the program must clearly assign
Governance,	authority and responsibility for the formulation and
Institutional Support	implementation of policies that enable the institution to fulfil
and Financial	its Mission and in turn Vision of the institution. The
Resources	institution must possess the financial resources necessary
	to fulfill its Mission and PEOs.

5.5 ATAL Ranking of Institutions on Innovation Achievements (ARIIA)

Atal Ranking of Institutions on Innovation Achievements (ARIIA) is an initiative of Ministry of Education (MoE), Govt. of India to systematically rank all major higher educational institutions and universities in India on indicators related to "Innovation and Entrepreneurship Development" amongst students and faculties. Assessment of innovation and startup ecosystem in HEIs will be based on seven parameters with certain weightages allocated as below.

Parameters		
Budget, Expenses to Support & Revenue Generated	20	
Infrastructures & Facilities to Support Innovations and Start-ups		
Awareness Activities for Promoting Idea Generation and Innovation		
Promotion and Supporting Entrepreneurship Development		
Intellectual Property (IP) Generation, Technology Transfer and	14	
Commercialization		
Innovative Learning Methods & Courses		
Innovations in Governance of the Institution		

5.6 National Institutional Ranking Framework (NIRF)

The MHRD is vested with the responsibility to prepare the National Institutional Ranking Framework (NIRF) Ranking. NIRF Ranking Parameters The NIRF Ranking is prepared based on five parameters

<u> </u>		1
Teaching,	*	Student Strength including Doctoral Students (SS).
Learning &	**	Faculty-student ratio with emphasis on permanent faculty (FSR)
Resources	*	Combined metric for Faculty with PhD (or equivalent) and
(TLR)		Experience (FQE)
	*	Financial Resources and their Utilization (FRU)
Research and	*	Combined metric for Publications (PU)
Professional	*	Combined metric for Quality of Publications (QP)
Practice (RP)	*	IPR and Patents: Published and Granted (IPR)
	*	Footprint of Projects and Professional Practice (FPPP)
Graduation	*	Metric for University Examinations (GUE)
Outcomes (GO)	*	Metric for Number of Ph.D. Students Graduated (GPHD)
Outreach and	*	Percentage of Students from Other States/Countries (Region
Inclusivity (OI)		Diversity RD)
	**	Percentage of Women (Women Diversity WD).
	**	Economically and Socially Challenged Students (ESCS).
	*	Facilities for Physically Challenged Students (PCS).
	*	Perception (PR) Ranking
Peer	*	Academic Peers and Employers (PR)
Perception		

5.7 Quacquarelli Symonds (QS) World University Rankings Six metrics are used to rank universities in the QS World University Rankings:

Academic	The highest weighting of any metric is allotted to an
Reputation	institution's Academic Reputation score.
(40%)	
Employer	Students will continue to perceive a university education as a
Reputation	means by which they can receive valuable preparation for the
(10%)	employment market. It follows that assessing how successful
	institutions are at providing that preparation is essential for a
	ranking whose primary audience is the global student community.
Faculty/	Teaching quality is typically cited by students as the metric of
Student Ratio	highest importance to them when comparing institutions using a
(20%)	ranking. It is notoriously difficult to measure, but we have
	determined that measuring teacher/student ratios is the most
	effective proxy metric for teaching quality.
Citations per	Teaching is one key pillar of an institution's mission. Another is
Faculty (20%)	research output. We measure institutional research quality using
	our Citations per Faculty metric. To calculate it, we take the total
	number of citations received by all papers produced by an
	institution across a five-year period by the number of faculty
	members at that institution.
International	A highly international university acquires and confers a number of
Faculty	advantages. It demonstrates an ability to attract faculty and

Ratio/Internatio	students from across the world, which in turn suggests that it
nal Student	possesses a strong international brand. It implies a highly global
Ratio (5% each)	outlook: essentially for institutions operating in an
	internationalized higher education sector. It also provides both
	students and staff alike with a multinational environment,
	facilitating exchange of best practices and beliefs.

5.8 Quacquarelli Symonds (QS) Asia University Rankings The indicators used to compile the QS Asia University Rankings are as follows:

Academic Reputation (30%)	This is assessed using data from the large global survey of academics conducted by QS each year. The results of this survey, which asks academics to identify the leading universities in their own subject area, also feed into other rankings and reports produced by QS, including the QS World University Rankings and the QS World University Rankings by Subject. The aim is to give an indication of which universities hold the strongest reputation within the international academic community.
Employer Reputation (20%)	This is again assessed using the results of a major international survey, this time of graduate employers, who are asked to identify the universities they perceive as producing the highest-quality graduates. The results of this survey are used to inform a number of other QS research projects, reflecting the importance of employability and employment prospects for today's university applicants and graduates.
Faculty/Studen	This indicator assesses the ratio of full-time academic staff
t Ratio (10%)	members employed per student enrolled. The aim is to give an idea of how much contact time and academic support students at the institution may expect to receive.
International	Using data provided by Scopus, this indicator assesses the degree
Research	of international openness in terms of research collaboration for
Network (10%)	each evaluated institution. To calculate this indicator the Margalef Index, widely used in the environmental sciences, has been adapted to produce a score that gives an indication of the diversity of an institution's research collaborations with other institutions in different locations of the world.
Citations per	These two indicators are both assessed using data from
paper (10%)	the Scopus database of research publications and citations. The
and papers per $(50/)$	first assesses the number of citations per research paper published;
faculty (5%)	aiming to give an idea of the impact each institution's research is
	number of research papers published per faculty member. This
	provides an indication of the overall research productivity of the university.
Staff with a	A new indicator introduced to the OS University Rankings: Asia for
PhD (5%)	2016, this assesses the proportion of academic staff members

	qualified to PhD level. This complements the faculty/student ratio
	indicator, both aiming to provide proxy measures of an institution's
	commitment to high-quality teaching.
Proportion of	The final four indicators all aim to assess how 'international' each
international	university is, reflecting the fact that internationalization is a major
faculty (2.5%)	priority both for universities in Asia and in every world region.
and proportion	These two indicators, also used in the QS World University
of international	Rankings, assess the proportion of staff and students at the
students (2.5%)	university who are classed as 'international'.
Proportion of	These last two indicators, not used in the global ranking, offer
Inbound	additional insights into the internationalization activity at
exchange	universities in Asia, assessing the relative size of each institution's
students (2.5%)	inbound and outbound student exchange programs.
and proportion	
of Outbound	
exchange	
students (2.5%)	

5.9 The Times Higher Education Ranking (THE)

The Times Higher Education World University Rankings are the only global performance tables that judge research-intensive universities across all their core missions: teaching, research, knowledge transfer and international outlook.



5.10 Times Impact Ranking

The Times Higher Education Impact Rankings are the only global performance tables that assess universities against the United Nations' Sustainable Development Goals (SDGs). We use carefully calibrated indicators to provide comprehensive and balanced *comparisons across* four broad areas: Universities can submit data on as many of these SDGs as they are able. Each SDG has a series of metrics that are used to evaluate the performance of the university on that SDG. Any university that provides data on SDG 17 and at least three other SDGs is included in the overall ranking. As well as the overall ranking, we also publish the results of each individual SDG in 17 separate tables.

Important Points-

Areas	Research, Stewardship, Outreach and Teaching.
17 UN SDGs	SDG 1 – No Poverty; SDG 2 – Zero Hunger; SDG 3 – Good Health And Well-Being; SDG 4 – Quality Education; SDG 5 – Gender Equality; SDG 6 – Clean Water And Sanitation, SDG 7 – Affordable And Clean Energy; SDG 8 – Decent Work And Economic Growth; SDG 9 – Industry, Innovation And Infrastructure; SDG 10 –Reduced Inequalities; SDG 11 – Sustainable Cities And Communities; SDG 12 – Responsible Consumption And Production, SDG 13 – Climate Action; SDG 14 – Life Below Water; SDG 15 – Life On Land; SDG 16 – Peace, Justice And Strong Institutions: SDG 17 – Partnerships For The Goals
Calculation for Scoring	A university's final score in the overall table is calculated by combining its score in SDG 17 with its top three scores out of the remaining 16 SDGs. SDG 17 accounts for 22 per cent of the overall score, while the other SDGs each carry a weight of 26 per cent. The score from each SDG is scaled so that the highest score in each SDG in the overall calculation is 100 and the lowest score is 0. This is to adjust for minor differences in the scoring range in each SDG and to ensure that universities are treated equitably, whichever SDGs they have provided data for. It is these scaled scores that we use to determine which SDGs a university has performed most strongly in; they may not be the SDGs in which the university is ranked highest or has scored highest based on un scaled scores
Categories of metrics within each SDG	Research metrics are derived from data supplied by Elsevier. For each SDG, a specific query has been created that narrows the scope of the metric to publications relevant to that SDG. This is supplemented by additional publications identified by artificial intelligence. As with the World University Rankings, we are using a five-year window between 2015 and 2019. The only exception is the metric on patents that cite research under SDG 9, which relates to the time frame in which the patents were published rather than the time frame of the research itself. The metrics chosen for the bibliometrics differ by SDG and there are always at least two bibliometric measures used. <i>Continuous metrics</i> measure contributions to impact that vary continually across a range – for example, the number of graduates with a health-related degree. These are usually normalised to the size of the institution. When we ask about policies and initiatives – for example, the existence of mentoring programmes – our metrics require universities to provide the <i>evidence to support</i> their claims. In these cases, we give credit for the evidence and for the evidence being public.

	These metrics are not usually size-normalised. Evidence is evaluated against a set of criteria and decisions are cross-validated where there is uncertainty. Evidence is not required to be exhaustive – we are looking for examples that demonstrate best practice at the institutions concerned.
Time frame	Unless otherwise stated, the data used refer to the closest academic year to January to December.
Exclusions	The ranking is open to any university that teaches at either undergraduate or postgraduate level. Although research activities form part of the methodology, there is no minimum research requirement for participation. THE reserves the right to exclude universities that they believe have falsified data, or are no longer in good standing.
Data collection	Institutions provide and sign off their institutional data for use in the rankings. On the rare occasions when a particular data point is not provided, we enter a value of zero.

5.11 Shanghai Ranking

Candidate Universities - ARWU considers every university that has any Nobel Laureates, Fields Medalists, Highly Cited Researchers, or papers published in Nature or Science. In addition, universities with a significant amount of papers indexed by Science Citation Index-Expanded (SCIE) and Social Science Citation Index (SSCI) are also included.

• Ranking Criteria and Weights

Universities are ranked by several academic or research performance indicators, including alumni and staff winning Nobel Prizes and Fields Medals, highly cited researchers, papers published in Nature and Science, papers indexed in major citation indices, and the per capita academic performance of an institution. For each indicator, the highest scoring institution is assigned a score of 100, and other institutions are calculated as a percentage of the top score. The data distribution for each indicator is examined for any significant distorting effect; standard statistical techniques are used to adjust the indicator if necessary. Scores for each indicator are weighted as shown below to arrive at a final overall score for an institution. The highest scoring institution is assigned a score of 100, and other institution score, Indicator are weighted as a percentage of the top score. The highest scoring institution is assigned a score of 100, and other institution.

top seore. Indicators and weights for mewo are as follows:				
Criteria	Indicator	Code	Weight	
Quality of Education	Alumni of an institution winning Nobel	Alumni	10%	
	Prizes and Fields Medals			
Quality of Faculty	Staff of an institution winning Nobel Prizes	Award	20%	
	and Fields Medals			
	Highly Cited Researchers	HiCi	20%	
Research Output	Papers published in Nature and Science*	N&S	20%	
	Papers indexed in Science Citation Index-	PUB	20%	
	Expanded and Social Science Citation Index			
Per Capita	Per capita academic performance of an	PCP	10%	
Performance	institution			
*For institutions specialized in humanities and social sciences such as London School				
of Economics, N&S is not considered, and the weight of N&S is relocated to other				

indicators.

5.12 US News Rankings

Thirteen (13) nos. of indicators and weights that U.S. News chose to measure global research performance. Each of the school's profile pages on usnews.com lists the overall global score as well as numerical ranks for the 13 indicators, allowing students to compare each school's standing in each indicator. The indicators and their weights in the ranking formula are listed in the table below, with related indicators grouped together; an explanation of each follows.

Ranking indicator	Weight
Global research reputation	12.5%
Regional research reputation	12.5%
Publications	10%
Books	2.5%
Conferences	2.5%
Normalized citation impact	10%
Total citations	7.5%
Number of publications that are among the 10% most cited	12.5%
Percentage of total publications that are among the 10% most cited	10%
International collaboration – relative to country	5%
International collaboration	5%
Number of highly cited papers that are among the top 1% most cited in their	5%
respective field	
Percentage of total publications that are among the top 1% most highly cited	
papers	

GLOSSARY

Accreditation: Accreditation is the establishment of the status, legitimacy and appropriateness of an institution or program of study. Recognition status granted to a programme for a stipulated period of time after a quality assurance agency evaluation indicates that it meets minimum standards of quality.

Assessment: A general term that embraces all methods used to judge the performance of an individual, group or organization.

Assurance: Assurance of quality in higher education is a process of establishing stakeholders' confidence that provision (input, process and outcomes) fulfils expectations or measures up to threshold minimum requirements.

Audit: Audit, in the context of quality in higher education, is a process for checking that procedures are in place to assure quality, integrity or standards of provision and outcomes.

All India Council for Technical Education (AICTE)

AICTE (All India Council for Technical Education) is one of the important accreditation bodies for regulating technical and management colleges in India. AICTE decides the policies and guidelines for the approval of new colleges, extend the approval for existing colleges, cancel the approval for existing colleges etc.

Association of Indian Universities (AIU)

Association of Indian Universities (AIU) is not only an organisation but also an association of major universities in India. The major responsibility of the AIU is to evaluate syllabi, standards, courses and credits of international universities and equates the same with the various courses offered by the universities in India.

Academic audit: Academic audit is a review process that focuses on the procedures a university or a college uses to assure its academic standards and quality. It evaluates how the university or college satisfies itself that its chosen standards are being achieved and makes a judgment about threshold standards.

Academic quality: Academic quality describes how well the learning opportunities available to students help them to achieve their award. It is about making sure that appropriate and effective teaching, support, assessment and learning opportunities are provided.

Bar Council of India (BCI)

Bar Council of India's major responsibility is to regulate legal education and legal practice in India. The degrees awarded by BCI-approved universities or colleges will serve as a qualification for students to enroll themselves as advocates/lawyers upon graduation.

Bloom's Taxonomy: It is a classification of educational objectives and outcomes by using action verbs. Bloom's Taxonomy can be used for everything from lesson planning and Rubric making to curriculum mapping and more. Bloom's Taxonomy begins with lower-order thinking skills (LOTS) with Remembering, and ends with higher-order thinking skills (HOTS) with Creating.

Benchmarking: A process by which a higher education institution, programme, faculty, school or any other relevant unit evaluates and compares itself in chosen areas against internal and external, national and international reference points considered as best practices, for the purpose of monitoring and improvement.

Course Objective: (CO) It describes what a faculty member will cover in a course. They are generally less broader than desirable goals and more broader than student learning outcomes.

Course Outcome: Each course is designed to meet (about 6) Course Outcomes(COs). The Course Outcomes are stated in such a way that they can be actually measured. COs are set by the institution, by consulting with the department heads, faculties, students and other stakeholders. It is a detailed description of what a student must be able to do at the conclusion of a course.

Centre for Innovation and Research (CIR): Means a centre consisting of faculty members / scientific staff of KIIT to look after the innovation and research activities of the centre.

Dental Council of India (DCI)

DCI (Dental Council of India) regulates dental education and the dental profession in India. Maintaining uniform standards of dental education in India is the main aim. One of the major objectives of DCI is to regulate the curriculum associated with the training of dentists, dental mechanics, and dental hygienists.

Graduate Attributes (GAs): Engineering Graduates will be able to demonstrate knowledge of engineering, perform problem diagnostic analysis, design/develop solutions, conduct investigations of complex problems, use modern tools and techniques, Ethics and be able to contribute to Society, Environment and Sustainability

IET accreditation

The Institution of Engineering and Technology (IET) is a multidisciplinary professional engineering institution.

KIIT DU

Kalinga Institute of Industrial Technology (KIIT) Deemed to be University.

Medical Council of India (MCI)

The major function of MCI (Medical Council of India) is to set uniform standards that determine higher qualifications in medicine and recognise medical qualification in India and abroad. MCI maintains uniform standards for medical education in India (in both UG and PG medical courses).

National Assessment and Accreditation Council (NAAC)

NAAC (National Assessment and Accreditation Council) is an important higher education accreditation body, which determines the performance of higher learning institutes based on their performance in various parameters. Based on the report submitted by the committee, NAAC will grant a grade to the institute. All the institutes are assessed on different parameters and a cumulative score will be awarded to institutes. Institutes with a cumulative score of 3 or above out of 4 will get top grades from NAAC.NAAC grade is mandatory for the higher learning institutes to be eligible for various grants of central or state government.

National Education Policy (NEP)

The National Education Policy 2020 has identified some innovative approaches for teachers to follow, for promoting curiosity, enthusiasm, creativity, innovation, critical thinking skill with a problem-solving attitude, teamwork, mastery over communication skills, compassionate leadership etc.

National Board of Accreditation (NBA)

National Board of Accreditation (NBA) is completely different from various

accreditation bodies in India, as it accredits courses and not institutes. There is a big difference between the NBA and NAAC. NBA accredits technical/ professional courses in engineering and management streams, while NAAC accredits general universities and colleges. Technical institutes must have NBA accreditation for some of its courses. NBA has the authority to determine the policies, rules and regulations for granting accreditation to courses offered by higher learning institutes.

National Council for Teacher Education (NCTE)

The National Council for Teacher Education (NCTE) takes a decision on all the matter pertaining to teacher education in India. The main objective of NCTE is to achieve coordinated and planned development of the teacher education system throughout India. NCTE maintains norms and standards in the teacher education system.

PBAS: Annual Self- Assessment for the Performance Based Appraisal. System (PBAS) is required for Promotion under CAS

Performance Indicators: Performance indicators are data, usually quantitative in form, that provide a measure of some aspects of an individual's or organization's performance against which changes in performance or the performance of others can be compared.

Program Outcomes (POs): POs are statements about the knowledge, skills and attitudes (attributes) the graduate of a formal engineering program should have. POs deal with the general aspect of graduation for a particular program, and the competencies and expertise a graduate will possess after completion of the program.

Program Educational Objectives (PEOs): Program Educational Objectives (PEO) are statements that describe the career and professional accomplishments that the program is preparing the graduates to achieve. PEO's are measured 4–5 years after graduation. They are set in order to measure the effectiveness of the program, and to check whether it has prepared the students to deal with the real world, where they could apply and use the skills and knowledge they've learned to good use.

Outcome Based Education (OBE): Deciding outcomes for academic achievements and it's attainment for assessment and formulation is based on a learning theory called Outcome Based Education (OBE).

Pharmacy Council of India (PCI)

Pharmacy Council of India (PCI) regulates the pharmacy education and pharma profession in India up to graduate level. PCI also determines the eligibility for practising pharmacy in India, pharmacy education regulation in India for the purpose of registration as a pharmacist (under Pharma Act), Regulation of Pharmacy profession and practice of pharma in India.

School Level Research Committee (SLRC) is a research committee of a School of KIIT to look after the overall research and development growth of the School.

University Grants Commission (UGC)

The University Grants Commission (UGC) is one of the premier higher education accreditation bodies in India. All the higher learning institutes in India must have UGC recognition to offer various courses, conduct exams, award degrees etc. All the universities in India must conduct the admission process, appoint faculty, pay salaries etc as per UGC norms. The UGC determines the guidelines for several aspects pertaining to higher education in Indian universities and colleges. Universities, which do not have UGC approval/ accreditation are regarded as 'Fake Universities' and students must refrain from getting admission in such universities.

ABBREVIATIONS

ATT	Association of Indian Universities
AIU	Association of motan Universities
RCI	Bar Council of India
COs	Course Outcomes
CAS	Career Advancement Scheme
DCI	Dental Council of India
EOA	External Quality Assurance
FIBAA	Foundation for International Business Administration Accreditation
GA	Graduate Attributes
HEI	Higher Educational Institutions
IOA	Internal Quality Assurance
IoE	Institutes of Eminence
IQAC	Internal Quality Assurance Cell
INC	Indian Nursing Council
IET	Institution of Engineering and Technology
ILOs	Intended Learning Outcomes
KPIs	Key Performance Indicators
KSAC	KIIT Students Activity Centre
KIIT	Kalinga Institute of Industrial Technology
MCI	Medical Council of India
NAAC	National Assessment and Accreditation Council
NBA	National Board of Accreditation
NIRF	National Institutional Ranking Framework
NCTE	National Council for Teacher Education
OBE	Outcome Based Education
PCI	Pharmacy Council of India
PBAS	Performance Based Appraisal system
PO	Program Outcomes
PEO	Program Educational Objectives
PBAS	Performance Based Appraisal System
QA	Quality Assurance
QAM	Quality Assurance Manual
QAS	Quality Assurance System
QMS	Quality Management System
UGC	University Grants Commission
ABET	Accreditation Board for Engineering and Technology, Inc.
AIU	Association of Indian Universities
AICTE	All India Council for Technical Education
AWMS	Accreditation Workflow Management System
AQAR	Annual Quality Assurance Report
ANSAC	Applied and Natural Science Accreditation Commission
API	Academic Performance Index

CAC	Computing Accreditation Commission
CAY	Current Academic Year
CAYm1	Current Academic Year minus1 (Current Assessment Year)
COs	Course Outcomes
CGPA	Cumulative Grade Point Average
CBCS	Choice Based Credit System
DVV	Data Validation and Verification
DELNET	Developing Library Network
EAC	Engineering Accreditation Commission
ETAC	Engineering Technology Programs
ETAC	Engineering Technology Accreditation Commission
FIST	Fund for the Improvement of Science and Technology Infrastructure
GATE	Graduate Aptitude Test in Engineering
GMAT	Graduate Management Admission Test
GRE	Graduate Record Examination
H-index	Hirsch Index
IF	Impact factor
HEI	Higher education institution
IIQA	Institutional Information for Quality Assessment
LYG	Last Year Graduate
LYGm1	Last Year Graduate minus 1
NAAC	National Assessment and Accreditation Council
NPTEL	National Programmed Teaching Enhanced Learning
NBA	National Board of Accreditation
OBE	Outcome Based Education
POs	Program Outcomes
PSOs	Program Specific Outcomes
PBL	Problem Based Learning
PEO	Program Educational Objectives
PTV	Peer Team Visit
RAF	Revised Accreditation Framework
SJR	SCI mago Journal Rank
SSS	Student Satisfaction Survey
SSR	Self Study Report
SWAYAM	Student Outcomes
SO	Strengths, Weaknesses, Opportunities and Challenges
SWOC	Strength, Weakness, Opportunity, Challenges
UGC	University Grants Commission
Wi-Fi	Wireless Fidelity

