

# YEARLY STATUS REPORT - 2023-2024

Part A					
Data of the Institution					
1.Name of the Institution	BIRLA INSTITUTE OF TECHNOLOGY				
• Name of the Head of the institution	INDRANIL MANNA				
• Designation	VICE CHANCELLOR				
• Does the institution function from its own campus?	Yes				
• Phone no./Alternate phone no.	06512275402				
• Mobile no	8127884422				
Registered e-mail	vc@bitmesra.ac.in				
Alternate e-mail address	registrar@bitmesra.ac.in				
• City/Town	Ranchi				
• State/UT	Jharkhand				
• Pin Code	835215				
2.Institutional status					
• University	Deemed				
• Type of Institution	Co-education				
• Location	Rural				
Name of the IQAC Co-ordinator/Director	Animesh Ghosh				

• Phone no.	/Alternate phon	e no		9470339587					
• Mobile	9007175618								
• IQAC e-n	dir.iq	ac@bi	tmesra	.ac.i	n				
• Alternate	Email address			daac@b	itmes	sra.ac.	in		
3.Website address (Web link of the AQAR (Previous Academic Year)				<u>https:</u> /conte				mesra.ac.in	
4.Whether Acad during the year?	Yes								
•	ether it is upload al website Web		ne	_				/Other-Depa /205/442	
5.Accreditation	Details								
Cycle	Grade	CGPA	Ą	Year of Accreditation		Validity from		Validity to	
Cycle 1	B+	78	8.25	2003	2003 16/09		2003	15/09/2008	
Cycle 2	A	3	.17	2022	2 22/11/202		2022	22 21/11/2027	
6.Date of Establ	ishment of IQA	C		22/09/2010					
7.Provide the lis UGC/CSIR/DST			-				ent-		
Institution/ Depa ment/Faculty	art Scheme		Funding	agency Year of award with duration		A	Amount		
Nil	Nil		Ni	il Nil				Nil	
8.Whether comp NAAC guideline		C as pe	r latest	Yes					
• Upload lat IQAC	<u>View File</u>								
9.No. of IQAC meetings held during the year				16					
• The minu compliand uploaded (Please up action tak	Yes								

• (Please upload, minutes of meetings and action taken report)	<u>View File</u>				
10.Whether IQAC received funding from any of the funding agency to support its activities during the year?	No				
• If yes, mention the amount	0				
11.Significant contributions made by IQAC du	ring the current year (maximum five bullets)				
Rankings and Accreditation, Achieved NIRF Engineering Rank within Top 50, Participated in International Rankings (QS and Times High Education)					
12.Plan of action chalked out by the IQAC in the Quality Enhancement and the outcome achieved					
Plan of Action	Achievements/Outcomes				
To Improve NIRF Engineering Ranking	Institute ranked among Top 50 in NIRF 2024				
International rankings	Participated in QS and achieved South Asia Rank 113. Rank in Times Higher Education was 45				
13.Whether the AQAR was placed before statutory body?	Yes				
• Name of the statutory body					
Name	Date of meeting(s)				
Nil	Nil				
14.Whether NAAC/or any other accredited body(s) visited IQAC or interacted with it to Assess the functioning?	Yes				
15.Whether institutional data submitted to AIS	HE				

Year	Date of Submission
Yes	19/03/2024

#### 16.Multidisciplinary / interdisciplinary

Programmes offered include Undergraduate, Graduate, Integrated MSc and PhD in various disciplines such as Engineering, Architecture and Planning, Pharmaceutical Sciences, Hotel Management and Catering, Management and Sciences. Establishment of the Centre for Quantitative Economics and Data Science in the year 2021 with the aim to provide fundamental knowledge and problem-solving skills in Quantitative Economics and Data Sciences, an essential tool for a multidisciplinary environment. Established a Department of Humanities and Social Sciences. Implemented Choice based credit system in 2018, which includes programme electives, open electives, NSS, NCC, Creative arts and Games to cater the holistic and multidisciplinary development. Based on the courses taken a student may be awarded with a Major, Minor, In-depth specialization. (e.g. A student can earn a major degree in Computer Science with a minor in Management, etc.) Set up of unique laboratory facilities multidisciplinary/interdisciplinary in nature (e.g. IDEA lab., Satellite, etc.) where the students of almost all disciplines work together to execute a single project of multidisciplinary nature. Focus on project-based learning.

#### 17.Academic bank of credits (ABC):

Uploading of mark sheet and degree certificate in NAD (A backbone of ABC) has been started, and degree certificates of 2019, 2020 and 2021 have already been uploaded. An exit plan is available in the existing integrated M.Sc. Curriculum. Students are encouraged to take up MOOC under the open elective category, and the credits earned are transferred. Provision of temporary withdrawal, which students can avail to pursue the Strat-up. Temporary withdrawal can also be utilized during any medical or financial exigencies.

#### **18.Skill development:**

Being addressed through summer internships, project works, and various MoUs signed with the industries. Immersive Summer Research Experience offered to give exposure to research in collaboration with foreign countries. UHV2: Understanding Harmony on Value education is included in all the UG curricula

**19.**Appropriate integration of Indian Knowledge system (teaching in Indian Language, culture, using online course)

Courses o	n Cı	reati	ve	Art	and	Art	$\operatorname{and}$	Cul	ture	are	off	ered	as	open
electives	to	the	в	Tech	stud	lents	s. MO	DOC	throu	igh i	the	Swaya	mr	portal.

20.Focus on Outcome based education (OBE):Focus on Outcome based education (OBE):

OBE is already in practice after the implementation of the CBCS curriculum since 2018. Analysis of outcomes is performed through the INPODS.

#### **21.Distance education/online education:**

Blending / Hybrid mode M. Tech (EVT) Programme for Tata Motors and M Tech (Computer Science with Specialization in ML) for Cognizant Technologies Employees. The institute (after getting accredited for NAAC with an A grade) has very recently become eligible for offering the vocational courses through ODL mode. Online MBA program has been initiated in 2024.

# **Extended Profile**

1.Programme		
1.1		59
Number of programmes offered during the year:		
File Description	Documents	
Data Template		<u>View File</u>
1.2		18
Number of departments offering academic program	imes	
2.Student		
2.1		7415
Number of students during the year		
File Description	Documents	
Data Template		<u>View File</u>
2.2	1810	
Number of outgoing / final year students during the	year:	

File Description	Documents
Data Template	<u>View File</u>
2.3	6853
Number of students appeared in the University example the year	mination during
File Description	Documents
Data Template	<u>View File</u>
2.4	0
Number of revaluation applications during the year	
3.Academic	
3.1	1633
Number of courses in all Programmes during the year	ear
File Description	Documents
Data Template	<u>View File</u>
3.2	410
Number of full time teachers during the year	
File Description	Documents
Data Template	<u>View File</u>
3.3	387
Number of sanctioned posts during the year	
File Description	Documents
Data Template	<u>View File</u>
4.Institution	
4.1	33680
Number of eligible applications received for admis Programmes during the year	sions to all the

File Description	Documents					
Data Template	<u>View File</u>					
4.2		930				
Number of seats earmarked for reserved category as per GOI/ State Govt. rule during the year						
File Description	Documents					
Data Template	<u>View File</u>					
4.3	104					
Total number of classrooms and seminar halls						
4.4	2317					
Total number of computers in the campus for acade						
4.5	8102.30					
Total expenditure excluding salary during the year (INR in lakhs)						
Part B						

### **CURRICULAR ASPECTS**

# 1.1 - Curriculum Design and Development

1.1.1 - Curricula developed and implemented have relevance to the local, national, regional and global developmental needs which is reflected in Programme outcomes (POs), Programme Specific Outcomes(PSOs) and Course Outcomes(COs) of the Programmes offered by the University

Birla Institute of Technology (BIT), Mesra, ensures its programs address local, national, regional, and global developmental needs through a robust Outcome-Based Education (OBE) framework. The framework aligns Program Outcomes (POs), Program-Specific Outcomes (PSOs), and Course Outcomes (COs) with contemporary challenges. POs focus on broad competencies matching global standards, PSOs target discipline-specific expertise, and COs emphasize the knowledge and skills gained through each course.

BIT's curricula cater to diverse developmental priorities. Programs in Infrastructure Development address local and regional challenges in Power & Energy, Water Resources, Roads, and Non-Conventional Energy, while courses in Smart Grids, 5G, IoT, and Urban Planning advance national priorities for modern cities. Programs in Aerospace and Architecture contribute to global challenges like space exploration and sustainable construction. Health and food security are addressed through Biotechnology, Pharmaceutical Sciences, and Bioengineering, focusing on drug development, agrochemicals, and bioprocessing to meet regional and global demands.

The institute effectively implements its curricula through online syllabi, Course Information Sheets (CIS), a Student Induction Program (SIP), and advanced laboratories. Regular stakeholder engagement ensures alignment with developmental needs.

By integrating academic excellence with societal priorities, BIT prepares students to address challenges across all levels, promoting sustainability and inclusive growth.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

# 1.1.2 - Number of Programmes where syllabus revision was carried out during the year

14

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

**1.1.3 - Total number of courses having focus on employability/ entrepreneurship/**skill development offered by the University during the year

**1.1.3.1** - Number of courses having focus on employability/ entrepreneurship/ skill development during the year

#### 1402

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### **1.2 - Academic Flexibility**

**1.2.1** - Number of new courses introduced of the total number of courses across all programs offered during the year

5	53						
	File Description	Documents					
	Upload the data template	<u>View File</u>					
	Upload relevant supporting document	<u>View File</u>					

# **1.2.2** - Number of Programmes in which Choice Based Credit System (CBCS)/elective course system has been implemented during the year

7

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# **1.3 - Curriculum Enrichment**

1.3.1 - Institution integrates crosscutting issues relevant to Professional Ethics, Gender, Human Values, Environment and Sustainability into the Curriculum

Our institute integrates societal priorities like gender equality, environmental sustainability, human values, and professional ethics into its curriculum to nurture socially responsible professionals.

Gender Equality is emphasized through mandatory undergraduate courses such as Professional Practice, Law, and Ethics and Constitution of India, focusing on gender sensitivity and constitutional rights. Electives in Management and Humanities further explore workplace diversity and the societal impact of gender-inclusive policies.

Environmental Sustainability is fostered through a core course on Environmental Science for all undergraduate programs, covering topics like climate change, biodiversity, pollution, and resource management. Postgraduate programs in Civil, Mechanical, Chemical, and Biotechnology departments focus on energy management, sustainability, and innovative environmental solutions. Interdisciplinary electives in Civil and Environmental Engineering, Remote Sensing, and Management address global challenges like climate change and natural resource conservation.

Human Values and Ethics are instilled through the National Service Scheme (NSS), where students participate in tree plantation drives, Swachh Bharat cleanliness campaigns, blood donation camps, and awareness programs in villages on health, hygiene, and social issues.

A strong focus on professional ethics ensures students develop moral integrity and ethical decision-making skills. These integrated efforts equip students to address societal challenges with empathy, sustainability, and a commitment to inclusive development.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

# **1.3.2** - Number of value-added courses for imparting transferable and life skills offered during the year

10

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### 1.3.3 - Total number of students enrolled in the courses under 1.3.2 above

**1.3.3.1** - Number of students enrolled in value-added courses imparting transferable and life skills offered during the year

75

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# **1.3.4** - Number of students undertaking field projects / research projects / internships during the year

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

1.4 - Feedback System		
1.4.1 - Structured feedback for design and review of syllabus – semester wise / is received from Students Teachers Employers Alumni		• All 4 of the above
File Description	Documents	
Upload relevant supporting document		<u>View File</u>
<b>1.4.2 - Feedback processes of the may be classified as follows</b>	e institution	• Feedback collected, analysed and action taken and feedback available on website
File Description	Documents	
Upload relevant supporting document		<u>View File</u>
TEACHING-LEARNING AND E	VALUATION	
2.1 - Student Enrollment and Pr	ofile	
2.1.1 - Demand Ratio		
2.1.1.1 - Number of seats availab	ole during the ye	ear
2147		
File Description	Documents	
Upload the data template		<u>View File</u>
Upload relevant supporting document		<u>View File</u>
2.1.2 - Total number of seats filled against reserved categories (SC, ST, OBC, Divyangjan, etc.) as per applicable reservation policy during the year (Excluding Supernumerary Seats)		
2.1.2.1 - Number of actual stude	nts admitted fro	om the reserved categories during the year
841		
File Description	Documents	
Upload the data template	<u>View File</u>	
Upload relevant supporting document		<u>View File</u>
2.2 - Catering to Student Diversi	ity	

2.2.1 - The institution assesses the learning levels of the students and organises special Programmes for advanced learners and slow learners

We adopt a structured and inclusive approach to address the diverse learning needs of its students, ensuring holistic development throughout their academic journey.

Orientation and Induction Programs mark the beginning of this process, helping new students transition smoothly into the institute. Spanning 2-3 weeks, these programs include interactive sessions with faculty, workshops, team-building activities, and personality development exercises. These initiatives familiarize students with institutional policies, academic goals, and available resources while allowing faculty to assess students' learning levels and aspirations.

Faculty Advisors are assigned to mentor students, monitor their academic progress and well-being, and offer personalized guidance. For slow learners, additional sessions, personalized mentoring, and focused support ensure they overcome academic challenges. Advanced learners are encouraged to participate in seminars, workshops, research projects, and skill development programs to further their growth.

BIT Mesra also emphasizes extracurricular activities through diverse student clubs and societies, nurturing creativity, leadership, and teamwork. Opportunities to participate in intercollegiate events and national forums enable students to gain valuable exposure and soft skills.

By balancing academic rigor with extracurricular engagement, BIT Mesra fosters intellectual growth, interpersonal skills, and cultural awareness, equipping students to excel both professionally and socially.

File Description	Documents	
Upload relevant supporting document	<u>View File</u>	
Link For Additional Information	https://www.bitmesra.ac.in/UploadedDocuments /deanugpg/files/SOP%20for%20Slow%20and%20Fas t%20Learners.pdf	

2.2.2 - Student - Full time teacher ratio during the year

Number of Students		Number of Teachers
7415		410
File Description	Documents	
Upload relevant supporting document		<u>View File</u>

### 2.3 - Teaching- Learning Process

2.3.1 - Student centric methods, such as experiential learning, participative learning and problemsolving methodologies are used for enhancing learning experiences

Birla Institute of Technology (BIT), Mesra, fosters innovative teaching methodologies to equip students with practical knowledge and critical problem-solving skills. Through experiential learning, participative learning, and problem-solving approaches, the institute ensures holistic education that enhances creativity and technical expertise.

Experiential Learning is emphasized through hands-on projects, internships, and field visits. Undergraduate and postgraduate students undertake mandatory final-year projects or theses, blending experimental and computational research to solve real-world problems. Exceptional projects are financially supported, often leading to publications or patents. Summer internships, facilitated by the Training and Placement Division, provide industry exposure. Discipline-specific internships, like architecture apprenticeships or urban planning fieldwork, ensure specialized training. Industrial and field visits further bridge classroom theory with practical application.

Participative Learning involves active student engagement in group discussions, collaborative projects, and technical clubs. Activities like hackathons, workshops, and team-based assignments foster communication, teamwork, and leadership skills, preparing students for professional challenges.

Problem-Solving Methodologies are integrated into pedagogy through case studies, interdisciplinary electives, and competitions. Students analyze real-world scenarios, develop solutions, and participate in hackathons at national and international levels, enhancing analytical and decision-making abilities.

This multifaceted approach ensures that BIT graduates excel in addressing contemporary challenges with innovation and

#### professionalism.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

2.3.2 - Teachers use ICT enabled tools including online resources for effective teaching and learning processes during the year

Birla Institute of Technology (BIT), Mesra, leverages Information and Communication Technology (ICT) to enhance the teaching and learning experience, fostering interactive and participatory education.

State-of-the-art ICT facilities in classrooms include smart boards, LCD projectors, and digital writing pads to support dynamic presentations. Virtual lab sessions enable students to perform remote experiments, complementing hands-on learning. The campus-wide Wi-Fi connectivity ensures seamless access to digital resources, while the e-library provides students and faculty with extensive research databases, eBooks, and journals.

Faculty adopt cloud-based platforms like Microsoft Teams and Google Classroom for virtual lectures and collaborative learning. BIT also promotes online platforms such as SWAYAM and MOOCs for flexible, self-paced education. E-content sharing, including recorded lectures and digital notes, ensures continuous access to learning materials.

The institute regularly upgrades its IT infrastructure, investing in software, hardware, and ICT-enabled spaces like classrooms, labs, and seminar halls. Students benefit from interactive learning, selfpaced access to resources, and participation in global webinars and conferences. ICT-enabled laboratories and seminar halls further support research dissemination and collaborative learning.

Through a systematic approach to ICT development, including regular audits and faculty training, BIT ensures a connected academic environment that prepares students for a technology-driven world.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

### 2.3.3 - Ratio of students to mentor for academic and other related issues during the year

**2.3.3.1 - Number of mentors** 

408		
File Description     Documents		
Upload relevant supporting document	<u>View File</u>	
2.4 - Teacher Profile and Quality		
2.4.1 - Total Number of full time teachers against sanctioned posts during the year		
410		
File Description	Documents	
Unload the data template	View File	

Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>
document	

# 2.4.2 - Total Number of full time teachers withPh.D./D.M/M.Ch./D.N.B Superspeciality/D.Sc./D'Lit. during the year

#### 353

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 2.4.3 - Total teaching experience of full time teachers in the same institution during the year

# 2.4.3.1 - Total experience of full-time teachers

### 5416

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 2.4.4 - Total number of full time teachers who received awards, recognition, fellowships at State, National, International level from Government/Govt. recognised bodies during the year

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### 2.5 - Evaluation Process and Reforms

2.5.1 - Number of days from the date of last semester-end/ year- end examination till the declaration of results during the year

12

2.5.1.1 - Number of days from the date of last semester-end/ year- end examination till the declaration of results year wise during the year

12

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 2.5.2 - Total number of student complaints/grievances about evaluation against total number appeared in the examinations during the year

0

File Description	Documents
Upload relevant supporting document	<u>View File</u>

2.5.3 - IT integration and reforms in the examination procedures and processes (continuous internal assessment and end-semester assessment) have brought in considerable improvement in examination management system of the institution

The Examination Department has integrated its activities with IT at various levels using the ERP. It includes: Hall Ticket generation, Tabulation, Result processing & publication, Grade card generation, Transcript generation etc.

File Description	Documents
Upload relevant supporting document	<u>View File</u>
2.5.4 - Status of automation of Examination A. 100% automation of entire	

# division along with approved Examination Manual

division & implementation of Examination Management System (EMS)

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### 2.6 - Student Performance and Learning Outcomes

2.6.1 - The institution has stated learning outcomes (generic and programme specific)/graduate attributes which are integrated into the assessment process and widely publicized through the website and other documents

BIT, Mesra, follows the Outcome-Based Education (OBE) framework, as mandated by the National Board of Accreditation (NBA), to ensure measurable learning outcomes that align with global education standards. The framework focuses on Course Outcomes (COs), which define specific knowledge and skills, Program Outcomes (POs), outlining broad competencies, and Program-Specific Outcomes (PSOs), targeting discipline-specific expertise.

These learning outcomes are widely publicized through the institute's website, where detailed program structures, syllabi, and Course Information Sheets (CIS) are accessible. CIS documents provide comprehensive details on course objectives, outcomes, and assessment methods, ensuring transparency for all stakeholders. The Student Induction Program (SIP) introduces new students to these learning outcomes, while departmental notice boards, lab manuals, and well-equipped facilities enhance both theoretical and practical learning.

The assessment process evaluates COs through exams, projects, and assignments, with aggregated data used to measure POs and PSOs at the program level. Regular stakeholder engagement, including workshops with parents, alumni, and the Board of Studies (BoS), ensures continuous curriculum improvement. This structured and transparent OBE framework ensures accountability, educational quality, and the development of globally competent graduates prepared to excel professionally.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

2.6.2 - Attainment of Programme outcomes, Programme specific outcomes and course outcomes are evaluated by the institution during the year

Birla Institute of Technology (BIT), Mesra, has adopted the Outcome-Based Education (OBE) framework as mandated by the National Board of Accreditation (NBA), focusing on delivering measurable educational outcomes. This approach ensures that academic planning, teaching, learning, and assessment are aligned with achieving specific Program Outcomes (POs) and Program-Specific Outcomes (PSOs), preparing students for professional success.

In the planning stage, courses are designed with clearly defined learning objectives mapped to broader program outcomes. Faculty employ curriculum mapping techniques to align content and teaching strategies with these objectives. The teaching-learning system integrates modern tools like ICT-enabled classrooms, virtual labs, and project-based learning. Innovative methods, including case studies, and problem-solving exercises, foster engagement. Regular feedback mechanisms enable continuous refinement of teaching strategies.

The assessment process evaluates outcomes at both course and program levels. Course Outcomes (COs) are measured through exams, assignments, projects, and presentations, with CO attainment calculated each semester. Aggregated data from courses informs program-level assessments of POs and PSOs. These results guide improvements in curriculum and teaching methods, driving continuous enhancement.

Key features of BIT's OBE implementation include data-driven decision-making, periodic reviews, faculty involvement, and stakeholder engagement through workshops and seminars.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

### 2.6.3 - Number of students passed during the year

**2.6.3.1** - Total number of final year students who passed the university examination during the year

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

## 2.7 - Student Satisfaction Survey

**2.7.1** - Student Satisfaction Survey (SSS) on overall institutional performance (Institution may design its own questionnaire) (results and details need to be provided as a web link)

https://conference.bitmesra.ac.in/ContentUploaded/igac/files/Feedbac k%202024%20signed(1).pdf

# **RESEARCH, INNOVATIONS AND EXTENSION**

### **3.1 - Promotion of Research and Facilities**

3.1.1 - The institution Research facilities are frequently updated and there is well defined policy for promotion of research which is uploaded on the institutional website and implemented

BIT has a research preample that Higher Education inculcating Ethics, Research, Innovation Entrepreneurship will empower Nation with Technology, Economy and Sustainability.Our Research Views are Think Critically, Rationally and Act Efficiently and & Think Global and Act Local.For the Internal Aspects we focus on:(a) Inculcate mindset towards Quality Research and Ethics amongst Faculty and students, (b) State of the art Scientific Infrastructure and Funding Support for carrying out Impactful Research, (c) Quality academicians, researchers, technocrats to accelerate research outcome and outreach. For the External aspects we focus on:

(a) Academia-Industry Collaboration for addressing industry related problems, carry out consultancy, and provide sustainable solutions

(b) National and International Collaboration for interdisciplinary research

(c) Ecosystem for nurturing innovative idea and entrepreneurship, to attract funding from external sources and

(d) Solutions to real-life challenges and societal issues through technological interventions. In order to address these internal and external aspects of research promotion we have various schemes as mentioned below:

- Central Instrumentation Facility
- Dedicated Department Fund

- Research Promotion Grant
- Fellowships at Masters and PhD level
- Seed Money Scheme
- AICTE IDEA Lab
- Funding Support to Faculty and Students
- IPR cell
- International Summer Research Experience

File Description	Documents
Upload relevant supporting document	<u>View File</u>

#### 3.1.2 - The institution provides seed money to its teachers for research (amount INR in Lakhs)

35.7

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# **3.1.3** - Number of teachers receiving national/ international fellowship/financial support by various agencies for advanced studies/ research during the year

8

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# **3.1.4** - Number of JRFs, SRFs, Post-Doctoral Fellows, Research Associates and other research fellows enrolled in the institution during the year

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>
315 - Institution has the following facilities to A. Any 4 or more of the above	

support research Central Instrumentation Centre Animal House/Green House Museum Media laboratory/Studios Business Lab Research/Statistical Databases Moot court Theatre Art Gallery		
File Description	Documents	
Upload relevant supporting document		<u>View File</u>

# 3.1.6 - Number of departments with UGC-SAP, CAS, DST-FIST, DBT, ICSSR and other recognitions by national and international agencies during the year

14

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 3.2 - Resource Mobilization for Research

**3.2.1** - Extramural funding for Research (Grants sponsored by the non-government sources such as industry, corporate houses, international bodies for research projects) endowments, Chairs in the University during the year (INR in Lakhs)

#### 0

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# **3.2.2** - Grants for research projects sponsored by the government agencies during the year (INR in Lakhs)

### 1114.31

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 3.2.3 - Number of research projects per teacher funded by government and non-government

### agencies during the year

#### 0.27

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### **3.3 - Innovation Ecosystem**

3.3.1 - Institution has created an eco-system for innovations including Incubation centre and other initiatives for creation and transfer of knowledge

TILe Institution's Innovation Council (IJC), Entrepreneurship Development Cell (EDC), and Intellectual Property Right cell (IPR-Cell) at BIT Mesra Ranchi have been supporting and promoting a variety of innovation-related activities for faculty and students under the mentorship of Honorable Vice Chancellor, Prof. Indranil Manna and supervision of Dean of Research, Innovation, and Entrepreneurship, Prof. Raju Poddar. The various schemes, policy, competitions were formulated and conducted for providing strong ecosystem for pre-incubation support and innovation activities. 1. Seed Money Scheme 2. Institution's Innovation Council, BIT Mesra 3. Innovation, Incubation and Entrepreneurship Policy 4. Startup Policy 5. Pre-incubation Supportfor Start-Ups 6. Business Plan Competition 7. BJT Nishan -Innovation Contest 8. Enigma - A National Level Technical Case Study Competition

File Description	Documents
Upload relevant supporting document	<u>View File</u>

**3.3.2** - Number of workshops/seminars conducted on Research Methodology, Intellectual Property Rights (IPR), Entrepreneurship and Skill Development during the year

#### 49

**3.3.2.1** - Total number of workshops/seminars conducted on Research methodology, Intellectual Property Rights (IPR), entrepreneurship, skill development year wise during the year

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

**3.3.3** - Number of awards / recognitions received for research/innovations by the institution/teachers/research scholars/students during the year

# **3.3.3.1** - Total number of awards / recognitions received for research/innovations won by institution/teachers/research scholars/students year wise during the year

-	-
2	<b>^</b>
Z	4
_	_

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 3.4 - Research Publications and Awards

<b>3.4.1.1 -</b> The institution has a stated Code of Ethics for research and the implementation of which is ensured through the following	Α.	All	of	the	above	
1. Inclusion of research ethics in the research methodology course work						
2. Presence of institutional Ethics committees (Animal, chemical, bio- ethics etc)						
3. Plagiarism check 4. Research Advisory Committee						

File Description	Documents	
Upload relevant supporting document		<u>View File</u>
3.4.2 - The institution provides incentives to teachers who receive state, national and international recognitions/awards Commendation and monetary incentive at a University function Commendation and medal at a University function Certificate of honor Announcement in the Newsletter / website		C. Any 2 of the above

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 3.4.3 - Number of Patents published/awarded during the year

# 3.4.3.1 - Total number of Patents published/awarded year wise during the year

71

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 3.4.4 - Number of Ph.D's awarded per teacher during the year

# 3.4.4.1 - How many Ph.D's are awarded during the year

103

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# **3.4.5** - Number of research papers per teacher in the Journals notified on UGC website during the year

3

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 3.4.6 - Number of books and chapters in edited volumes published per teacher during the year

# **3.4.6.1** - Total number of books and chapters in edited volumes / books published, and papers in national/international conference-proceedings during the year

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 3.4.7 - E-content is developed by teachers For e-PG-Pathshala For CEC (Under Graduate) For SWAYAM For other MOOCs platform For NPTEL/NMEICT/any other Government Initiatives For Institutional LMS

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# **3.4.8** - Bibliometrics of the publications during the year based on average Citation Index in Scopus/ Web of Science/PubMed

Scopus		Web of Science
130729	)	72752
File Description	Documents	

Ĩ	
Any additional information	<u>View File</u>
Bibliometrics of the publications during the year	<u>View File</u>

# 3.4.9 - Bibliometrics of the publications during the year based on Scopus/ Web of Science – h-Index of the University

Scopus	Web of Science
114	92

File Description	Documents
Bibliometrics of publications based on Scopus/ Web of Science - h-index of the Institution	<u>View File</u>
Any additional information	<u>View File</u>

**3.5 - Consultancy** 

3.5.1 - Institution has a policy on consultancy including revenue sharing between the institution and the individual and encourages its faculty to undertake consultancy

The faculty members of the Institute are encouraged to undertake, individually or in group, consultancy services to any Government and private organizations using the available infrastructure of the institute partially or fully. Institute has taken up several nationally important consulting projects in various areas of science and engineering. The consultancy services are mainly related to following activities: Providing technical advice Scientific analysis of specific nature Design, vetting and Detailed Project Report (DPR) Demand driven user specific corporate training programmes The institute has well laid down norms for consultancy revenue sharing. The consultancy share between Institute and faculty is 50:50 ratio.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

**3.5.2** - Revenue generated from consultancy and corporate training during the year (INR in Lakhs)

**3.5.2.1** - Total amount generated from consultancy and corporate training during the year (INR in lakhs)

### 68.57

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 3.6 - Extension Activities

3.6.1 - Extension activities in the neighbourhood community in terms of impact and sensitising students to social issues and holistic development during the year

The Institute undertakes a plethora of extension activities, especially in its neighbourhood for creating awareness about social issues, national campaigns and policies along with comprehensive development of the selected rural areas and community groups. For all these campaigns the Institute has created a number of platforms. As per the provisions of academic programs, the Institute offers first and second-year students the option to select NCC, or NSS depending upon their interests. Among the student clubs/societies few clubs like Rotaract Club, Leo Club, EPAC etc. function on these aspects. NSS wing of BIT has adopted 10 nearby villages for the socio-economic upliftment of the families and provides free education to the underprivileged children of diferent age groups. Besides this NSS, NCC, and other socio cultural clubs/societies have also carried out a number of campaigns for the promotion of the following: Swachh Bharat Abhiyan Blood Donation Camps Plantation Drives International Yoga Day World Tobacco Prohibition Day Traffic Safety Week, etc.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

**3.6.2** - Number of awards received by the Institution, its teachers and students from Government /Government recognised bodies in recognition of the extension activities carried out during the year

**3.6.2.1** - Total number of awards and recognition received for extension activities from Government / Government recognised bodies during the year

0

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

3.6.3 - Number of extension and outreach programs conducted by the institution including those through NSS/NCC/Red cross/YRC during the year(including Government initiated programs such as Swachh Bharat, Aids Awareness, Gender Issue, etc. and those organised in collaboration with industry, community and NGOs)

10

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# **3.6.4** - Total number of students participating in extension activities listed at **3.6.3** above during the year

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### 3.7 - Collaboration

**3.7.1** - Number of collaborative activities with other institutions/ research establishment/industry for research and academic development of faculty and students during the year

# **3.7.1.1** - Total number of Collaborative activities with other institutions/ research establishment/industry for research and academic development of faculty and students during the year

#### 74

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 3.7.2 - Number of functional MoUs with institutions/ industries in India and abroad for internship, on-the-job training, project work, student / faculty exchange and collaborative research during the year

### 16

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### INFRASTRUCTURE AND LEARNING RESOURCES

### **4.1 - Physical Facilities**

4.1.1 - The institution has adequate facilities for teaching - learning. viz., classrooms, laboratories, computing equipment, etc.

The institute provides world-class infrastructure and state-of-theart facilities to foster an advanced teaching, learning, and research environment. The institute exceeds statutory requirements by offering modern classrooms, specialized laboratories, and cuttingedge resources. Classrooms and Learning Spaces include 10 smart classrooms and 50 ICT-enabled classrooms equipped with interactive whiteboards, projectors, and high-speed internet for enhanced learning experiences. Video conferencing facilities connect students and faculty with global academic and professional networks.

Specialized Laboratories cater to various disciplines, including the Plasma Laboratory (Physics), Smart Grid Laboratory (EEE), VLSI Laboratory (ECE), Wind Tunnel Facility (SER), Microplastic Analysis Facility (Civil Engineering), and Robotics Laboratory (ME). Facilities like the Rocket Propulsion Lab and Renewable Energy Lab promote innovation in space exploration and sustainable energy. Program-specific labs, such as the Food Production Lab (HMCT) and CADD labs in all departments, further enhance practical skills.

Software Resources include licensed tools like MATLAB, ANSYS, AutoCAD, and SolidWorks, ensuring students and faculty access the latest technologies.

BIT also boasts a Central Instrumentation Facility (CIF) with advanced analytical equipment for cutting-edge research in biotechnology, environmental studies, and materials science. With well-stocked libraries, seminar halls, sports facilities, and comfortable hostels, BIT creates a holistic academic environment supporting both intellectual and personal growth.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

4.1.2 - The institution has adequate facilities for cultural activities, yoga, games (indoor, outdoor) and sports. (gymnasium, yoga centre, auditorium, etc.)

The institute believes in the philosophy of delivering holistic education, hence, the institute has included PT and Games (Course code: MC103, MC203), Creative Arts (MC104, MC108, MC204, MC208), NSS and NCC as an elective subject of total 4 credits in the curriculum of undergraduate programs. Every year the institute organizes national/zonal inter institute sports events: annual athletic meet, an annual technical fest "PANTHEON' a cricket tournament in the memory of an ex-student Chetan Devraj and a cultural fest 'BITOTSAV' Sports facilities The institute has a centrally created sports complex facility in 25 acres of land existing since 1955, and upgraded on a regular basis for all the games (indoor and outdoor) of national standards. Music and Cultural facilities: To develop social values in students, the institute has formed various clubs and societies. There are 12 clubs and societies actively involved in promoting social and cultural atmosphere within and outside the campus. These clubs organize events such as Deepotsav, Dance and Music Fests etc. The institute has two well equipped air conditioned music rooms of 800 square feet area housing the latest Indian and Western musical instruments.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

#### 4.1.3 - Availability of general campus facilities and overall ambience

The institute believes in the philosophy of delivering holistic education, hence, the institute has included PT and Games (Course code: MC103, MC203), Creative Arts (MC104, MC108, MC204, MC208), NSS and NCC as an elective subject of total 4 credits in the curriculum of undergraduate programs. Every year the institute organizes national/zonal inter institute sports events: annual athletic meet, an annual tech fest the "PANTHEON' a cricket tournament in the memory of an ex-student Chetan Devraj and a cultural fest 'BITOTSAV' Sports facilities The institute has a centrally created sports complex facility in 25 acres of land existing since 1955, and upgraded on a regular basis for all the games (indoor and outdoor) of national standards.

Music and Cultural facilities: To develop social values in students, the institute has formed various clubs and societies. There are 12 clubs and societies actively involved in promoting social and cultural atmosphere within and outside the campus. These clubs organize events such as Deepotsav, Dance and Music Fests etc. The institute has two well equipped air conditioned music rooms of 800 square feet area housing the latest Indian and Western musical instruments.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

**4.1.4 - Total expenditure excluding salary for infrastructure augmentation during the year (INR in Lakhs)** 

3873.26

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### 4.2 - Library as a Learning Resource

4.2.1 - Library is automated using Integrated Library Management System (ILMS) and has digitisation facility

The Central Library of Birla Institute of Technology, Mesra, is more like an Integrated Knowledge Resource Center that is stocked with over 1,52,712 books for the Mesra campus and 14411 books for the Lalpur campus, 683 Institute Theses, Print Journal 108, more than 18 thousand bound volumes (periodicals), national and international journals covering all aspects of academic studies and research materials. BIT library has over 48,683+ online journals and more than 10,005+ online books. All the e-resources are accessible locally within the campus as well as remotely. Plagiarism-checking (iThenticate 2.0) and academic writing and grammar-checking tools (Grammarly) are also available to BIT Mesra library users.

File Description	Documents
Upload relevant supporting document	<u>View File</u>
4.2.2 - Institution has subscription Library resources Library has re- subscription for the following: e books e-ShodhSindhu Shodhgan	egular – journals e-

File Description	Documents
Upload relevant supporting document	<u>View File</u>

# **4.2.3** - Annual expenditure for purchase of books/ e-books and subscription to journals/ejournals during the year (INR in Lakhs)

#### 238.45

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# **4.2.4** - Number of usage of library by teachers and students per day (foot falls and login data for online access)

#### 1472

File Description	Documents
Upload relevant supporting document	<u>View File</u>

### **4.3 - IT Infrastructure**

# **4.3.1** - Number of classrooms and seminar halls with ICT - enabled facilities such as LCD, smart board, Wi-Fi/LAN, audio video recording facilities during the year

#### 104

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

4.3.2 - Institution has an IT policy, makes appropriate budgetary provision and updates its IT facilities including Wi-Fi facility

The Institute is currently updating its IT Policy in collaboration with C3iHub at IIT Kanpur. The Institute also sets aside a dedicated budget for the ICTC Cell which looks after the entire IT infrastructure. The budget consists of allotments for recurring and nonrecurring items which is utilized in upgrading the IT infrastructure of the Institute. This budget makes substantial appropriations for Wi-Fi devices and in the last two years, more than 1600 access points have been provided in the Hostels. The ICT Cell has also significantly augmented the IT infrastructure of the Institute over the last few years with the setting up of new AV facilities, an increase in bandwidth, more Wi-Fi coverage, and many more such initiatives.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

## **4.3.3 - Student - Computer ratio during the year**

Number of students		Number of Computers available to students for academic purposes
7415		2317
4.3.4 - Available bandwidth of ir connection in the Institution (Le		• ?1 GBPS
File Description	Documents	
Upload relevant supporting document		<u>View File</u>
4.3.5 - Institution has the followi for e-content development Medi visual centre Lecture Capturing Mixing equipment's and softwar	a centre Audio System(LCS)	A. All of the above
File Description	Documents	
Upload relevant supporting document		<u>View File</u>
Upload the data template		<u>View File</u>
4.4 - Maintenance of Campus In	frastructure	
4.4.1 - Total expenditure incurre facilities excluding salary compo		ce of physical facilities and academic support year
4229.05		
File Description	Documents	
Upload the data template		<u>View File</u>
Upload relevant supporting document		<u>View File</u>
	—	es for maintaining and utilizing physical, academic omplex, computers, classrooms etc.
efficient systems and p	procedures t	), Mesra, has established o maintain and utilize its cilities, ensuring a holistic
Academic Infrastructure	: Laborator	ies and classrooms across 18

Academic Infrastructure: Laboratories and classrooms across 18 departments are maintained by the Academic Office and respective departments, which oversee repairs and upgrades with a team of experienced engineers. The Central Instrumentation Facility (CIF), supervised by a professor, is supported by research officers and technical staff to ensure seamless operations.

Library Services: The Central Library, managed by the Librarian and support staff, ensures access to up-to-date academic resources through efficient procurement, subscriptions, and archiving systems.

Computers and Networking: The Communication Team, guided by the Professor In-Charge, manages campus-wide IT infrastructure, ensuring uninterrupted connectivity.

Campus Maintenance: The Estate Office oversees campus upkeep, managing repairs through skilled staff such as mechanics, plumbers, and electricians. It also maintains the guest house and auditoriums.

Sports Complex: The 25-acre sports complex is managed by the Department of Physical Education, promoting physical fitness through events like the Annual Athletic Meet and inter-institute competitions.

Other Facilities: Hygienic food services are ensured by canteens monitored by a dedicated committee, while campus healthcare is provided by a dispensary staffed with doctors. The Transport Office efficiently handles campus transportation.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

#### STUDENT SUPPORT AND PROGRESSION

### 5.1 - Student Support

5.1.1 - Total number of students benefited by scholarships and free ships provided by the institution, Government and non-government agencies (NGOs) during the year (other than the students receiving scholarships under the government schemes for reserved categories)

#### 942

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 5.1.2 - Total number of students benefited by career counselling and guidance for competitive

## examinations offered by the Institution during the year

450	
File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>
5.1.3 - Following Capacity develops skills enhancement initiatives are institution Soft skills Language a communication skills Life skills physical fitness, health and hygic Awareness of trends in technolog	e taken by the and (Yoga, ene)
File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>
<ul> <li>5.1.4 - The Institution adopts the following for redressal of student grievances including sexual harassment and ragging cases</li> <li>Implementation of guidelines of statutory/regulatory bodies Organisation wide awareness and undertakings on policies with zero tolerance Mechanisms for submission of online/offline students' grievances Timely redressal of the grievances through appropriate committees</li> <li>All of the above</li> </ul>	
File Description	Documents
Upload relevant supporting	<u>View File</u>

### 5.2 - Student Progression

document

**5.2.1** - Number of students qualifying in state/ national/ international level examinations during the year (eg:NET/SLET/GATE/GMAT/CAT/ GRE/TOEFL/Civil Services/State government examinations)

5.2.1.1 - Number of students who qualified in state/ national/ international examinations (e.g.: IIT-JAM/NET/SET/JRF/ GATE /GMAT /CAT/ GRE/ TOEFL/Civil Services/State government examinations) during the year

40	
File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 5.2.2 - Total number of placement of outgoing students during the year

740

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# **5.2.3** - Number of recently graduated students who have progressed to higher education (previous graduating batch) during the year

58

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 5.3 - Student Participation and Activities

**5.3.1** - Number of awards/medals won by students for outstanding performance in sports/cultural activities at inter -university/state/national/international events (award for a team event should be counted as one) during the year

41

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

5.3.2 - Presence of Student Council and its activities for institutional development and student welfare

Student representation in various committees: Hostel Mess Committee: In each hostel, there is a Hostel mess committee which in addition to the functioning of the mess also ensures the proper maintenance of the hostels. Position No. of members Mess Secretary I Maintenance Secretary 1 Network Secretary I Sports Secretary 1 Reading Room Secretary 1 Mess Members

4-5 Institute Clubs and Societies: The Institute has around 33 clubs/societies for the development of students in the area of social, cultural and technical activities. All the clubs/societies have their own student-executive body and are mentored by a Faculty. BIT Welfare Society: The governing body of this society has 13 student members and the Dean Student Welfare/Dean of Student Affairs as patron. Among the 13 members, 5 are office bearers (president, vice-president, general secretary, joint secretary, treasurer) and the remaining are general members. Anti Ragging Committee: The Anti Ragging Committee has student representation (1 UG, 1 PG, 1 Ph.D. scholar).

Student's Grievance Redressal Committee:

This committee consists of one male student and one female student as representatives. The Committee has the responsibility to look after the grievances of students and to furnish suggestions on important issues pertaining to student welfare.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

## **5.3.3** - Number of sports and cultural events / competitions organised by the institution during the year

4	4

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### 5.4 - Alumni Engagement

5.4.1 - The Alumni Association/Chapters (registered and functional)contributes significantly to the development of the institution through financial and other support services during the year

BITMAA(Birla Institute of Technology Mesra Alumni Association) is an Official Institute Alumni body (Link: https://alumni.bitmesra.ac.in/ ) and an umbrella organization that is formed to coordinate the activities of the various alumni chapters / associations spread across the globe. We have 40000+registered alumni and8 chapters in the country and 2 overseas chapters. Apart from above BITOSA Global is an Alumni Association run by the various chapters in India and abroad. To achieve its objectives, some of the events conducted by the association are-

BITOSA Innovation Conclave- It was an event to celebrate the people who have travelled down the un-treaded path. The event provided an opportunity to "Inspire and get Inspired". Workshops on "Transformation to a Secure and connected world - An IOT Perspective" along with panel discussions with various eminent personalities were organised.

RISE SYMPOSIUM - It aims at the launch of and promotion of BITAlumni promoted Pebbles - styled to be an Innovations Labs and an entrepreneur ecosystem - where BIT Students, Faculty and Alumni, with entrepreneurial spirits, can showcase their Business Plans and have them judged by eminent Panellists.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

## 5.4.2 - Alumni contribution during the year (INR in Lakhs)

A. ? 5Lakhs

File Description	Documents
Upload relevant supporting document	<u>View File</u>

### GOVERNANCE, LEADERSHIP AND MANAGEMENT

### 6.1 - Institutional Vision and Leadership

6.1.1 - The institution has a clearly stated vision and mission which are reflected in its academic and administrative governance

Institute Vision Institute has clearly stated vision and each Department has its own vision statement which is aligned with the Institute's vision. To achieve these objectives, required action points are planned which percolate to the different academic and administrative sections.

"Institution Governance" describes all those structures, processes and activities which are considered in the planning and subsequent policies of the Institute. The governance process of BIT could be listed as below -

BIT has a robust governance process which includes the General Council (GC), Board of Governors (BoG), Finance Committee (FC), Academic Council (AC) and Building and Works Committee aligned to the UGC regulations as applicable from time to time. The different roles and responsibilities of these governing bodies are clearly stated in the Rules and Regulations of the Institute. Department Academic Committee (DAC), Department Policy Committee (DPC), and Board of Studies (BoS) of every Department proposes to the Academic Council for any revision of curriculum, syllabus and Department level activities through respective Deans.

Success of these activities can be validated through illustrious list of alumni, engagement of faculty at the national and international level, student achievements at academic and extracurricular spheres

File Description	Documents
Upload relevant supporting document	<u>View File</u>

6.1.2 - The effective leadership is reflected in various institutional practices such as decentralization and participative management

Registrar who looks after the overall administrative and academicactivities of the Institute. The Institute has given equal representation in various committees at all levels from Professors, Associate Professor and Assistant Professors in all Departments. The major academic activities are delegated through respective Deans, HoDs, Associate Deans, and faculty members grouped as a committee. The administrative responsibilities are delegated through the Registrar, Deputy Registrar(s), Assistant registrar(s), Administrative Officer, Section In-charges and staff members. Major academic and administrative decisions are taken through various committees. Each Head of the Department delegates academic responsibilities related to teaching-learning to UG, PG and Ph.D faculty coordinators. Individual faculty also have freedom to achieve course outcome in innovative ways at their own discretion. The HOD also constitutes faculty coordinator/ committees such as BOS, DAC, DPC, Budget committee, Purchase committee, ERP, etc. for smooth functioning of the Department with flexibility. All the hostel operations (maintenance, mess, recreational activities, etc.) are managed by student bodies through BIT Welfare society having Dean of Student Affairs as patron.

File Description	Doguments	
File Description Upload relevant supporting document	Documents           View File	
6.2 - Strategy Development and	Deployment	
6.2.1 - The institutional Strategic		
Short term plan (3 years) The Institute shall strive to excel in: 1. State of the art research in all its academic departments		
2.Developing high quali	ty human resources	
3. Enhancing a culture of innovation to meet the industrial and societal demands		
4. Creating and adoptin	ng new age curricula and delivery techniques	
5. Highest lab certifications and accreditations (e.g. NABL, ISO etc.)		
Long term plan (10 year	s)	
1. Ranking Targets:		
• To reach top 15 in Engineering category and top 25 in Overall and University level NIRF Rankings 44		
• To be in Atal Ranking in Innovation Achievement (ARIIA) in private category		
• To be ranked in QS/THE Asia level rankings.		
2. Accreditation Targets:		
• To aim for NBA accreditation for all the programs of the Institute		
• Achieve and maintain NAAC A++ grade in all future cycles		
• Engineering and technology programs to be accredited by ABET		
3. Outreach Targets:		
<ul> <li>National and international recognition in research and development in Engineering, Technology and allied sciences.</li> </ul>		

### • The Institute shall strive to be recognised as a premier Innovation and IPR hub. •Enable its graduates to lead National and Global level start-ups. **File Description** Documents Upload relevant supporting View File document 6.2.2 - The functioning of the institutional bodies is effective and efficient as visible from policies, administrative setup, appointment and service rules, procedures, etc. The vision and mission of the Institute are driven by the aligned policies which drive the academic and administrative processes. The organisational setup of BIT Mesra is shown below: 1. Chancellor 2. General Council 3. Board of Governors 4. Finance Committee 5. Academic Council 6. Building and Works Committee Other necessary committees as per the requirements are notified by the authorities. The above authorities are responsible for the functioning and governance of the Institute. Appointment o The appointment of Vice Chancellor and Registrar is as per the UGC norms o Faculty and staff recruitment is through open advertisements in prominent platforms Service rules: The Institute has well-defined rules and regulations and also has the Conduct, Disciplinary and Appeal Rule (CDA) Promotion policies: o Promotion of faculty is through Institute Career Advancement Scheme (CAS) Rules. o The Institute has the Modified Assured Career Progression (MACP)

Scheme, through its Recruitment and Promotion Norms (BITRPN) for nonacademic staff. The procedures followed for. promotion. facility utilization. grievance redressal and other subjects are on the Institute webpage.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

### 6.2.3 - Institution Implements e-governance in its areas of operations

6.2.3.1 - e-governance is implemented covering following areas of operation	A. All of the above
1. Administration 2. Finance and Accounts 3. Student Admission and Support 4. Examination	

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### **6.3 - Faculty Empowerment Strategies**

6.3.1 - The institution has a performance appraisal system, promotional avenues and effective welfare measures for teaching and non-teaching staff

The institute assesses the faculty's progressbased on the self appraisal forms submitted by each faculty member. This is a yearly activity and is based on the academic year (July to June). Furthermore, the appraisal is also conducted based on in-depth details provided by faculty member regarding their publication, research and consultancy projects, Patents, and Outreach activities.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

## **6.3.2** - Total number of teachers provided with financial support to attend conferences / workshops and towards membership fee of professional bodies during the year

32

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

## **6.3.3** - Number of professional development / administrative training Programmes organized by the institution for teaching and non-teaching staff during the year

29

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### 6.3.4 - Total number of teachers undergoing online/ face-to-face Faculty Development Programmes (FDP)during the year(Professional Development Programmes, Orientation / Induction Programmes Refresher Course, Short Term Course)

35

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

### 6.4 - Financial Management and Resource Mobilization

6.4.1 - Institutional strategies for mobilisation of funds and the optimal utilisation of resources

The institute is self-sustained and has strong financial practices and internal controls in place to ensure optimum utilization of financial resources. The institute has various sources of funds the main being student fees which are collected semester-wise. The same is augmented by other sources of revenue like earnings from consultancy projects, grants, and investmentincomes. The budget preparation process takes into consideration the short-term and longterm goals set by the Institute. All Institute centres, departments, and sections propose their annual financial plans based on academic policy and planning to the Finance Committee of the Institute to achieve educational objectives. The Budget preparation of the Institute is made following a detailed process carried out by the individual departments/sections based on their targets. The budget of the Institute is finalized at the Institute level and thereafter placed before the Board of Governors for approval. Utilization of the approved budget and its regular monitoring occurs at multiple levels (HoDs, Deans, and officers). The Finance committee is responsible for observance of regulations relating to the maintenance of accounts of Income & Expenditures. Investment income also forms a source of revenue for the Institute and is monitored closely with the help of a MIS.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

6.4.2 - Funds / Grants received from government bodies during the year for development and maintenance of infrastructure (not covered under Criteria III and V) (INR in Lakhs)

2	$\mathbf{a}$
- <	
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File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

# 6.4.3 - Funds / Grants received from non-government bodies, individuals, philanthropists during the year for development and maintenance of infrastructure (not covered under Criteria III and V)(INR in Lakhs)

0

File Description	Documents
Upload the data template	<u>View File</u>
Upload relevant supporting document	<u>View File</u>

6.4.4 - Institution conducts internal and external financial audits regularly

The Institute is subjected to three types of Auditing system — audit by the Comptroller and Auditor General of India (CAG), Internal audit, and Statutory audit.Last five years the Institute engaged three different agencies for internal audit namely M/s. A.K. Bagri & Associates, M/s. Price Water House Coopers, and M/s. S.S. Kothari & Mehta. The statutory audit is conducted by M/s. K.N. Gutgutia & Co. Duties of Internal Auditors: To check all Journals Cash & Bank vouchers Bank reconciliation of all operative Banks, Store Ledger Physical verification of Cash. They prepare reports /observations on: I.Finance 2.0ffice of Registrar3.Purchase, and Store 4.Estate Administration 5.Planning &Development 6.Transport Department, Consumption of Petrol & Diesel etc. There is a mechanism for review of audit observations every quarter by the management before which the concerned department/section is already made aware of the observations of the auditors and they are given sufficient time to reply to the same. Every quarterly review is followed by the action taken report (ATR) of previous period audit observations. The auditobjections that are met with requisite action on the part of the Institute are reviewed by the auditors and if found satisfactory and sufficient are considered as settled.

File Description	Documents	
Upload relevant supporting document	<u>View File</u>	

### 6.5 - Internal Quality Assurance System

6.5.1 - Internal Quality Assurance Cell (IQAC) has contributed significantly for institutionalizing the quality assurance strategies and processes by constantly reviewing the teaching learning process, structures & methodologies of operations and learning outcomes at periodic intervals

Institute established a well-structured Internal Quality Assurance Cell (IQAC) to:

- Maintain the standards in Higher Education, the cell continuously monitors and provides inputs on Academic and Research activities.
- IQAC holds meetings of the members from time to time to ensure the high-quality teaching and research environment in the Institute.
- Quality improvement in teaching is ensured through the course feedback mechanism integrated into our Student Module of ERP System. Systematic feedback from all the stakeholders is also obtained from time to time
- After collection of the feedback periodic meetings of HoDs with faculty members at department level and organizing the need-based programs to improve the feedback suggestions are undertaken.
- Pedagogy and training programs on outcome-based education are some of the need and analyses-based programs which are conducted by IQAC for the faculty members.
- Constant efforts are being made by IQAC for NBA accreditation of all the courses offered by the Institute wherein IQAC reviews the documents, procedure and implementation for each of the courses in various programs.
- IQAC members meet and discuss the NBA accreditation

## requirements and visit the departments for a preaccreditation verification and its subsequent support.

File Description	Documents					
Upload relevant supporting document		<u>View File</u>				
6.5.2 - Institution has adopted the Quality assurance Academic Act Audit (AAA) and follow up actin Confernces, Seminars, Worksho quality conducted Collaborative initiatives with other institution programme on quality issues for studens Participation in NIRF A quality audit recognized by stat international agencies (ISO Cer NBA)	Iministrative on taken ops on e quality (s) Orientation r teachers and Any other e, national or	A. Any	5 or	all	of the	above
File Description	Documents					
Upload the data template			View 1	File		
Upload relevant supporting			View 1	File		

6.5.3 - Incremental improvements made for the preceding during the year with regard to quality (in case of first cycle) Post accreditation quality initiatives(second and subsequent cycles)

documnent

- UG/PG Course curriculum revision UG/PG course curricula are revised at regular intervals to keep it catering to the need of global demand - industry, higher education and research. In the last five years, several programmes have been revised in accordance with the vision and mission statements.
- Examination Reforms Adopted Bloom's Taxonomy-based assessment tools, Course outcome-based question paper preparation, ICT-based examination activities through ERP
- Seed Money Scheme Seed money grants in the range of Rs.
   80,000 to 2.0 Lakhs were provided to more than 60 faculty members during the last five years.
- Research Promotion Grant (RPG) Scheme In this scheme, 30% share of the overhead charges of research projects are credited to the account of investigators which can be used for academic and research activities.
- Immersive Summer Research Experience (ISRE-BIT) at U.S.
   Universities Institute has an Immersive Summer Research
   Programme for meritorious UG students with IllinoisInstitute

## of Technology (IIT), Chicago and Carnegie Mellon University (CMU), Pittsburgh.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

### INSTITUTIONAL VALUES AND BEST PRACTICES

### 7.1 - Institutional Values and Social Responsibilities

7.1.1 - Measures initiated by the Institution for the promotion of gender equity during the year

- Institution has adopted co-education in all the programs in true spirit for several decades. Presently, there are around 30% girl students in various programs which is more than the statutory mandate.
- There are more than 20% women faculty and staff.
- Institute has functional Internal Complaints Committee (ICC)
- Lady Doctors, and counsellors are available in the Institute dispensary to facilitate the female students, staff and faculty health.
- The student bodies, especially NSS, consistently strives to address women's concerns through various platforms.
- Institute has fully functional ladies club with modern multigym and outdoor sporting arena
- Girls' hostels also have a modern multigym in addition to indoor and outdoor sporting facilities
- Institute has female security guards
- Institute is covered by CCTV surveillance at strategic locations to ensure safety and security of women
- Induction program was held on 3/9/24 for the freshers
- A seminar on the topic of 'Women's safety and security' was held on 1/10/24.

File Description	Documents	
Upload relevant supporting document	<u>View File</u>	
Annual gender sensitization action plan(s)	https://drive.google.com/drive/folders/1STgl uWXzt0RvwiXjYXd_yxIhFIabsuEZ	
Specific facilities provided for women in terms of: a. Safety and security b. Counseling c. Common rooms d. Daycare Centre e. Any other relevant information	https://drive.google.com/drive/folders/1STgl uWXzt0RvwiXjYXd yxIhFIabsuEZ	
7.1.2 - The Institution has facilit alternate sources of energy and conservation Solar energy Wheeling to the Grid Sensor-b conservation Use of LED bulbs/ efficient equipment	energy Biogas plant based energy	
File Description	Documents	

Upload relevant supporting document	<u>View File</u>

7.1.3 - Describe the facilities in the Institution for the management of the following types of degradable and non-degradable waste (within 200 words) Solid waste management Liquid waste management Biomedical waste management E-waste management Waste recycling system Hazardous chemicals and radioactive waste management

Solid waste management :

• The waste from residential areas is being collected on a door to door basis in two bin system of green and blue colour:

i. Biodegradable waste is collected in green colour dustbin and the same is being composted in garden dept. ii. Non-Biodegradable waste is collected in blue colour dustbin and it is given to recycler.

• Food wastes from hostels are being taken by the villagers of surrounding rural areas to feed their cattle. • Metal waste is also used by the students to create some innovative ideas like sculptures, seating outlets, etc. The students are encouraged to develop "Best out of Junk" technology. • In campus at different places bins are being kept at regular intervals. The collected waste further disposed for composting and recycling.

Liquid waste management :

• Septic tank system for all existingbuildings is used for sewerage disposal in this large campus.

• A sewage treatment plant(STP) is there in the campus for treatment of liquid waste

E - waste is sent for recycling to authorised vendors.

File Description	Documents		
Upload relevant supporting document	<u>View File</u>		
7.1.4 - Water conservation facili in the Institution: Rain water ha well /Open well recharge Constr and bunds Waste water recyclin of water bodies and distribution campus	arvesting Bore ruction of tanks ng Maintenance		

File Description	Documents
Upload relevant supporting document	<u>View File</u>

### 7.1.5 - Green campus initiatives include

7.1.5.1 - The institutional initiatives for greening the campus are as follows:	Α.	Any	4	or	All	of	the	above
<ol> <li>Restricted entry of automobiles</li> <li>Use of bicycles/ Battery-powered vehicles</li> </ol>								
3. Pedestrian-friendly pathways								
4. Ban on use of plastic								
5. Landscaping								

File Description	Documents
Upload relevant supporting document	<u>View File</u>

7.1.6 - Quality audits on environment and energy are regularly undertaken by the institution								
<ul> <li>7.1.6.1 - The institution's initiatives to preserve and improve the environment and harness energy are confirmed through the following:</li> <li>1. Green audit</li> <li>2. Energy audit</li> <li>3. Environment audit</li> </ul>		D.	Any	1	of	the	above	
<ul> <li>4. Clean and green campus recognitions/awards</li> <li>5. Beyond the campus envis promotional activities</li> </ul>								
File Description	Documents							
Upload relevant supporting document			Δ	∕i∈	ew I	<u>File</u>		
7.1.7 - The Institution has a disabled-friendly and barrier-free environment Ramps/lifts for easy access to classrooms and centres. Disabled- friendly washrooms Signage including tactile path lights, display boards and signposts Assistive technology and facilities for persons with disabilities: accessible website, screen- reading software,mechanized equipment, etc. Provision for enquiry and information: Human assistance, reader, scribe, soft copies of reading materials, screen reading, etc.			Any	4	or	all	of the a	above
File Description	Documents							
Upload relevant supporting document			Σ	∕i∈	ew H	<u>File</u>		
7.1.8 - Describe the Institutional efforts/initiatives in providing an inclusive environment i.e. tolerance and harmony towards cultural, regional, linguistic, communal, socio-economic and other diversities								

(within a maximum of 200 words)

- The process of national level admission in the Institute attracts students from all over India and abroad (NRIs) with diversity in students' profile.
- Reservation of seats for OBC / SC / ST / EWS and PWD are strictly adhered to as per the statutory reservation policy of State of Jharkhand and Government of India.
- The interests of students, faculty members and staff are

safeguarded without any caste, creed, or gender discrimination.

- Institute officially declares holidays for various national festivals of different religious faiths. In addition to this there are official holidays to honour the local festivals.
- There is an active Internal complaint Committee (ICC) which ensures zero tolerance related to gender issues.
- To promote harmony amongst the different communities within the campus there are different platforms for sharing diversity such as staff club, ladies club, students clubs/societies etc. in the Institute level which are organised at regular intervals.
- Institute has number of hostels and each one of them individually organizes hostel night and similar activities
- Students with such wide diversities participate in various committees and student bodies such as sports/hostel/purchase/cultural committees etc.
- The Institute, with great zeal, celebrates festivals, the birth and death anniversaries of great Indian personalities.

File Description	Documents
Upload relevant supporting document	<u>View File</u>

7.1.9 - Sensitization of students and employees of the institution to constitutional obligations: values, rights, duties and responsibilities of citizens:

Institute understands that being an academic hub of national significance, it has a massive responsibility. From inculcating a deep sense of patriotism and pre-eminence of civic and social duty amongst an individual, BIT takes steps prudently to sensitize the students with these topics. The Institute accomplishes this by organizing various sociocultural events that create sensitive individuals.

Throughout the year, numerous events are organized by the clubs of the Institute. Some of the example events are mentioned below:

- International Youth Day
- National Blood Donation Day
- National Unity Day
- Constitution Day

The important days are celebrated with the motive of fostering the spirit of oneness and unity amongst the students who are still in the learning and developing phase. Institute encourages its employees to actively participate in various socio-cultural events of national importance such asAnti-terrorism Day pledge was taken by the employees of the Institute

- Employees pledged on Anti-Tobacco Day
- Institute has established the Rajbhasha Prakoshth
- Institute has established the Human Value Cell

7.1.10 - The Institution has a prescribed code of conduct for students, teachers, administrators and other staff and conducts periodic programmes in this regard. The Code of Conduct is displayed on the website There is a committee to monitor adherence to the Code of Conduct Institution organizes professional ethics programmes for students, teachers, administrators and other staff Annual awareness programmes on Code of Conduct are organized

File Description	Documents
Upload relevant supporting document	<u>View File</u>

7.1.11 - Institution celebrates / organizes national and international commemorative days, events and festivals

The Institute creates a sense of social responsibility by celebrating national and international important days, events and festivals. Important days are celebrated to foster the spirit of oneness and unity amongst the students, staff and faculty. The Institute encourages everyone to participate in various sociocultural events of national and international significance actively. Many events are celebrated in the Institute some of the following are mentioned below: National and international commemorative days

- Independence day
- Republic day
- Women's day
- World music day
- World environment day

### Events

• Teacher's Day

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Engineer's Day
Yoga Day Tribute to our National Heroes

Festivals

Makar Sankranti
Durga Puja
Saraswati Puja
Vishwakarma Puja
Karma Puja
Eid
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- Diwali
- Holi

File Description	Documents
Upload relevant supporting document	<u>View File</u>

### 7.2 - Best Practices

7.2.1 - Describe one best practice successfully implemented by the Institution as per NAAC format provided in the Manual

Immersive Summer Research Experience (ISRE) : The objective of the "Immersive Summer Research Experience" for the undergraduate students of engineering is to expose them to world class research in American institutes of repute. Apart from inculcating a research bent of mind in the students, this practice also aids in enhancing the employability of the students by making them aware of the contemporary practices in their subject domain on an international level. The cross cultural interactions with international students imbibe a mindset with a global outlook and are conducive to overall development of personality.

Presently the institutes to which the students are being sent are: 1. Illinois Institute of Technology, 2. Chicago Carnegie Mellon University, Pittsburgh 3. Georgia Institute of Technology, Atlanta 4. NorthEastern University -Boston 5. Virginia Tech University -Pittsburg

### 7.3 - Institutional Distinctiveness

7.3.1 - Highlight the performance of the institution in an area distinct to its priority and thrust (within a maximum of 200 words)

• BIT Mesra carries a distinction of being one of the foremostInstitutes of Technology in the country (ahead of all

but only one IIT).

- BIT Mesra initiated a programme on Space Engineering and Rocketry ahead of country's flagship organization called ISRO, way back in 1964 BIT Mesra has always upgraded its academic curriculum and teaching-learning exercise as per the prevailing norms, government directives and international standards. As a result, the graduates of this institution have always been the most sought-after engineers valued by the industries in the country.
- Besides advanced technological subject domains, BIT Mesra also imparted education for socioeconomic development of the rural and tribal population in the states of Bihar and Jharkhand.
- BIT Mesra is a rare university that houses a University Polytechnic besides various engineering departments and centres.
- BIT Mesra was a pioneer in establishing the first-ever Science and Technological Entrepreneurship Park (STEP) in the country as a part of the Small Industries Research and Development Organization (SIRDO) way back in 1974.
- In recognition of its overall contribution, BIT Mesra was the first institution in India to be granted autonomous status in 1970s.

### 7.3.2 - Plan of action for the next academic year

The following points describes the proposal of plan of action to be implemented for the next academic year in consonance with the Institute vision and mission. 1) Continued participation in NIRF and other rankings, especially International Rankings (QS, Times Higher Education, etc) 2) UG programs Accreditation to reach a target of 100 percent. 3) Increase in MoU's with Industry, research labs and academic institutions.