INDIAN INSTITUE OF TECHNOLOGY, ROORKEE

DEPARTMENTAL REVIEW TEMPLATE

1. **Name of Department/Center :** Center of Excellence in Transportation Systems

2. **Reviewers :**

   ① Dr. L. R. Kadiyali

   ② Dr. S. Gangopadhyay

3. **Date of Review:** 29-4-2014.

GRID FOR ASSESSMENT

NOTE:

i. Please grade in the box provided for the following parameters in the range of 1-10 with 10 being the highest.

ii. Leave 'blank' for 'No Comment'.

iii. Kindly give your opinion on the strength and weakness of the Department/ Center and your suggestions for future growth.

I.   ACADEMICS

I.1	Undergraduate	Score
1.	Curriculum i. Curricular Structure ii. Course Syllabi iii. Flexibility	
2.	Formal Academic Load on Students i. Teaching ii. Laboratory/Practical iii. Projects(minor/major)	
3.	Evaluation Process i. Continuing Evaluation ii. Mid-term Evaluation iii. End-term Evaluation	

4.	Academic Ambience	
5.	Opportunity for Peer-Based Learning	

6.	Opportunity for Further Learning(Breadth and Depth)
	  i. Elective Courses Specialization
	  ii. Minor with Major Discipline
	  iii. Honors Programme in Major Discipline	

7.	E-Assisted Learning
	  i. Availability of Library Resources and Major Search Engines (like Scopus, Web of Science)
	  ii. Multi-Media Assisted Teaching	

8.	In –Curriculum Research/Exploration Opportunity to Students	

9.	Technical Societies/ Colloquium for Students
	  i. Departmental Society
	  ii. Student Chapter(s) of Professional Societies	

10.	Faculty –Student Interaction	
11.	Faculty Mentoring of Students	
12.	Faculty Advisor System for Students/Class of Students	
13.	Self Study Courses for Student	
14.	Effective Teaching Mechanism for Enhanced Number of Students in Various Classes	
15.	Effectiveness of Assisted Learning: Tutorial System for B.Tech Students/ Seminars	

I.2	Graduate Programmes (Masters)	Score

1.	Curriculum
	  i. Curricular Structure
	  ii. Course Syllabi
	  iii. Flexibility
		9
		8
		9

2.	Formal Academic Load on Students
	  i. Teaching
	  ii. Laboratory/Practical
	  iii. Seminar/Dissertation
		9
		9
		9

3.	Evaluation Process
	  i. Continuing Evaluation
	  ii. Mid-Term Evaluation
	  iii. End-Term Evaluation
		9
		9
		9

4.	Academic Ambience	10
5.	Opportunity for Peer-Based Learning	9
6.	Opportunity for further Learning(Breadth and Depth) Elective Courses (Specialization Electives)	9
7.	E-Assisted Learning i. Availability of Library Resources and Major Search Engines (like Scopus, Web of Science)	9

			Score
	ii.	Multi-Media Assisted Teaching	9
8.	In –Curriculum Research/Exploration Opportunity to Students		9
9.	Technical Societies/ Colloquium for Students		
	i.	Departmental Society	8
	ii.	Student Chapter(s) of Professional Societies	8
10.	Faculty –Student Interaction		9
11.	Faculty Mentoring/Supervising of Students		9
12.	Faculty Advisor System for Students/Class of Students		9
13.	Effectiveness of Assisted Learning: Home Assignments/Seminars/Presentations		9

I.3	Doctoral (Ph.D) Programmes	Score
1.	Pre-Ph.D Courses and Evaluation Process	9
2.	Comprehensive Courses Examination	9
3.	Breadth and Depth of Knowledge of Students	9
4.	Seminar/ Presentations and Technical Communication	9
5.	Average No. of Research Students/Faculty	9
6.	Average No. of Research Papers of Ph.D Students	9
7.	Average Duration to Complete Ph.D (years)	9

II. RESEARCH

		Score
1.	Research Ambience in the Department	10
2.	Research Awareness among Doctoral Students	10
3.	Competence Level of Doctoral Students for Research	9
4.	Quality of Research	9
5.	Quality of Publications	9
6.	Impact of Publications	8
7.	Relevance of Research to Knowledge Generation	9
8.	Societal Relevance of Research	9
9.	Exposure of Researchers to the International State of Art	8
10.	Student Exposure to Attending Quality Conferences/Symposia	9
11.	Growth in Ph.D Programme	8
12.	Quality of Research Infrastructure	9
13.	Utilization of Existing Research Infrastructure	9
14.	Department Initiative on Faculty Hiring	8
15.	Breadth and Depth of Research in the Department	9
16.	Research Intensity of Faculty Members	9

FuturisticAreas For Hiring Faculty Members
- Inland Water Transport —   - Airport Planing & Design

Research Areas for Improvement

Road Safety, Driver Behavior & Psychology

Comments (not more than 100 words for each given below)
Strength:

Weakness:

Suggestions for improvement:

The activities being carried are appreciated, however it requires bit more forcessed in the next 1-2 years.

III. Departmental Infrastructure

		Score
1.	Adequacy of Class Rooms and Multi-Media Facility	10
2.	Availability of Laboratories	10
3.	Availability of Conference/Seminar Room, etc.	10
4.	Availability of Seating Space for Research Students	10
5.	Availability of Internet Services in Research Labs and Class Rooms	10
6.	Departmental Library and E-Resources	10
7.	Computing Facilities and Software	10
8.	Adequacy of Offices and Furnishing for Faculty	10
9.	Faculty- Student Ratio	10
10.	Support Staff (Technical/Administrative) Adequacy	7

Comments (not more than 100 words for each given below)
Strength:

Weakness:

Students - faculty ratio.

Suggestions for improvement:

Improved ratio on faculty to students
Reqd., Atleast 6 to 7 faculty (regular)
Shall be required in 1-2 years.

IV. Admissions of Ph.D Students

		Score
1.	Intake of Ph.D Students	9
2.	Admission Process	9
Suggestions:		
	—	

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V. Outcomes

		Score
1.	Placements	
	i. Placement of B.Tech/IDD Students	—
	ii. Placement of Masters Student	—
	iii. Placement of Ph.D Students	10
2.	Average No. of Ph.D.s Awarded per Year	10
3.	Publications per Faculty in ISI Indexed Journals/Year	9
4.	Average Citations per Faculty/Year (Last-Three Years) (Web of Science/Scopus)	9
5.	Recognitions; Awards(National/International) to Faculty/Students	9
6.	Consultancy and Projects	9
7.	No. of Ph.D. graduates who took Academics as Career(Based on Data of Last 5 Years)	9

Comments and Suggestions for improvement:

Date:

① _(signature)_

② _(signature)_

(Signature of the Reviewer)

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