

Attainment of Learning Outcomes Mechanism

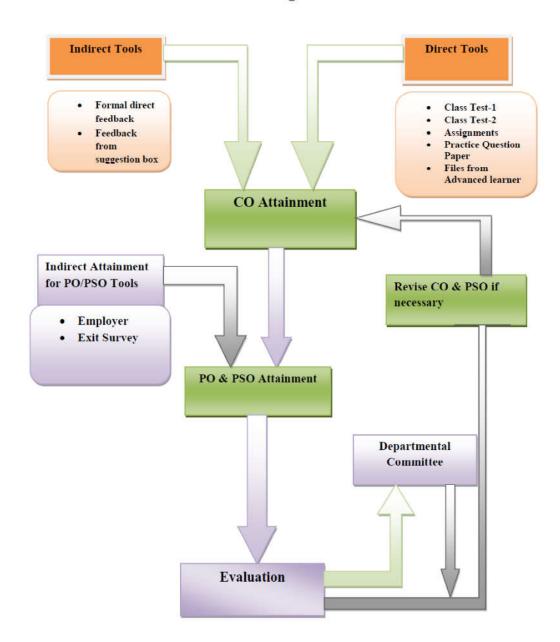


Fig-1: Attainment of Learning Outcome Mechanism

Table-1: Course Outcome attainment

Course outcomes	PO1	PO2	PO3	PO4	PO5	PO6	PO 7	PO8	PO9	PO10	P011	PO12	PSO1	PSO2	PSO3
CO1		1		2					2				1		
CO2		3			1							1			
CO3			1			1		1			3		2		
CO4					1		3								1
CO5									3	2				2	
CO6			3					1					1		
Average attainment															

Table 2: Programme Attainment Matrix (PAM)

Course codes	PO1	PO2	PO3	PO4	PO5	P06	PO7	PO8	PO9	PO10	PO11	PO12	PSO1	PSO2	PSO3
Course1			2	1			2			2			1		1
Course2		1		2	1			3	3		1	1		1	
Course3	1	2	2			2				1	3		2		2
Course4		1					2						3		1
Course5															
Average attainment															

MGM's College of engineering and Technology, Kamothe, Navi Mumbai Attainment of programs outcomes, program specific outcomes and course outcomes

Sr. No	Attainment of programs outcomes, program specific outcomes and course outcomes	Page No.
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Department of Electronics & Telecommunication Departmental Technical Committee Meeting Report

Department of Electronics & Telecommunication arranged Departmental Meeting for important discussion about the Department development. It was held on 7th July 2017. Main objectives of this meeting were to get valuable suggestions from the department which will help us to improve the quality of teaching and outcome of students. The meeting was held to encourage the students to become entrepreneur, appear competitive examination, join higher study, to improve the placement of the department. In addition, the main purpose, to review the Vision, Mission, Course outcomes and Programme Educational Outcomes of the department.

Introduction of Members

The members of Department Technical Committee were Dr. S. K. Narayankhedkar, Dr. Indra Vijay Singh and Prof. Pralhad P. Narwade. Dr.S.K. Narayankhedkar, Principal of MGM's College of Engineering and Technology Kamothe, Navi Mumbai who completed his Ph.D from IIT, Bombay, in Optical Communication. Dr. Indra Vijay Singh Head of Electronics & Telecommunication Department of MGMCET-Kamothe. He completed his Ph.D. from Aligarh Muslim University, having specialization in RF circuits and system Design. Prof. Pahralad Narwade, M.E from MGMCET, in Biomedical Engineering, having 25 years of teaching exp.

Suggestion from Comittee Members

Following were some suggestion received from the members which are helpful for us to improve the quality of the Department.

1. For better placement and hands on experience, improve the Industry Institute Interaction.

- 2. Suggestion for sending students to the industry and try to get the industry sponsored projects for maintaining the relation with the industry.
- 3. Faculty should get continuous feedback from the industry, accordingly try to include the suggestion in teaching learning methodology.
- 4. Advised that the project completion responsibility must be given to guide and periodic review of progress should be taken.
- 5. Committee suggested that paper publications and patent process should be increased, because by getting patents, students can start their own business.
- 6. To modify the Vision, Mission and Goals of the department.
- 7. To focus on the faculty teaching quality improvement by improving logical thinking about any problem.
- 8. To arrange various workshops in the department and inviting the experts from the industry to guide the faculty.
- 9. Also discussed about Course Outcomes, Programme Outcomes and Programme Specific Outcomes of the departments.
- 10. To focused on improvement of faculty qualification and teaching quality.
- 11. The student needs to learn basic concept of the subjects and get deep knowledge.
- 12. Faculty members need to attend faculty Development Programme, Conferences, and Seminars of related subjects.

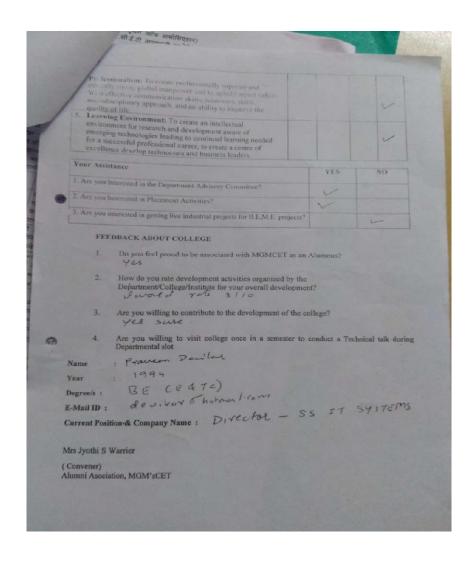
Co-ordinator, Prof. Prahlad Narwade HoD Indra Vijay Singh



Alumni Feedback

We are glad that you have spent valuable years job thankful if you can spare some of your valuat suggestions for further improvement of this coll the quality of our academic programs and enhance the statement of the statement o	Me mine to mi		DUCK SIDES	AGM'sCET and give of great use	We shall is valuable to improve
Please Tick	e the credibili	y or our cor			Poor Poor Poor Vitute? For (1-4) aptly
Attributes	Excellent	Very Good	Good	Average	Poor
Interaction with Departmental faculty Laboratory Setup		V	-		
Ahmini Association/Network of Old Friends What is the caliber of students passing out		7			
How do you rate the courses which are skills related suiting to the Industry	V				
included into the programs? How do you rate the learning experience in terms of their relevance to the real life application?	/	198			
How do you rate the courses that you have leant in relation to your current job.	V				
each of the Program Educational Objectives (1- describes your understanding, Please include any	given belov	v, which of	the four	statements	(1-4) aptl
	given belov	v, which of	the four	statements ne Quit	(1-4) apti
Your assessment Programme Educational Objectives	5) given belov comments.	v, which of	the four	statements ne Quit	(1-4) apti
Your assessment Programme Educational Objectives 1. Preparation: To educate students for gradu postgraduate programmes and to succeed in	5) given below comments.	v, which of	Sor exte	ne Quit	(1-4) apti
Your assessment Programme Educational Objectives Preparation: To educate students for gradupostgraduate programmes and to succeed in related fields. Core Competence: To provide students wiknowledge in their chosen area.	5) given below comments.	Very little	Sor exte	ne Quit	(1-4) apti
Your assessment Programme Educational Objectives 1. Preparation: To educate students for gradu postgraduate programmes and to succeed in related fields. 2. Core Competence: To provide students wi	5) given below comments.	v, which of Very little 1	Sor exte	ne Quit	(1-4) apti







Analysis of Alumni feedback:

- 1. Most of the alumni agreed that they gained fundamental knowledge during their graduation which indicates the one of the programme outcome (PO1) is satisfying.
- 2. Most of the alumni accepts that inputs given to them helped to improve their soft skills and personality development.
- **3.** Motivation to life long learning seems to very much satisfactory.
- **4.** Most of the alumni told that developed abilities and attitude during the graduation, is helpful to serve the societies.
- **5.** Some alumni said that more technical hands on knowledge is required so that it can copup with industry environment.



Department of Electronics and Telecommunication Engineering

Analysis of Employer Feedback

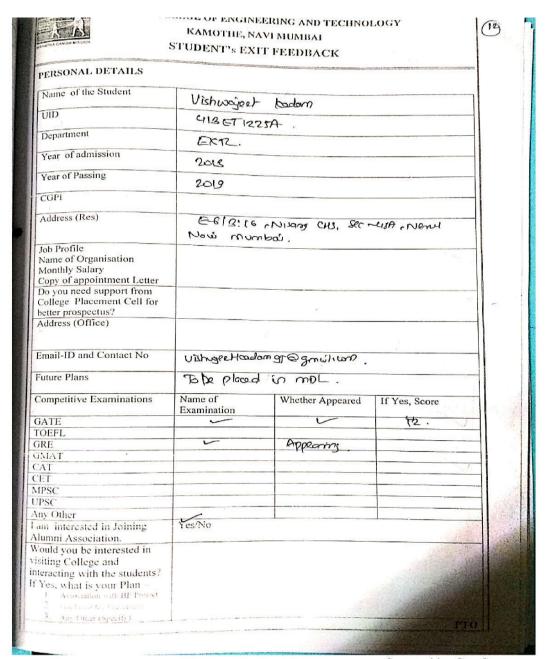
Name of Employee	:
Designation & Development	:
Date of Joining	:
Name of Employer	:
Address	:
Name of Authority	:
Designation & Development	:
Signature	:

Analysis of Employer feedback

- Most of the employers are satisfied with technical Competency of MGMCET students.
- 2. MGM,s students have shown good involvement, sincerity and self motivation,
- 3. Good in innovative ideas generation, leadership and professional ethics.
- 4. They are satisfied with ability to work with team and shoulder responsibility



Student Exit feedback



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Stress on funda	Nery Good		High Mr.	during your stay. e) Unsatisfactory	Ь.
Stress on funda		c) Good	d) Satisfactory	e) (Jisatista)	<u> </u>
	mentals and ba	sics	,	- Contain	
a) Excellent	b) Very Good		Satisfactory	e) Unsatisfactory	d
In general new	taredoese of the	faculty me	mbers for engaging	the lectures	
a) Excellent	Very Good	c) Good	d) Satisfactory	e) Unsatisfactory	Ь
Vour impression	ens en internal	a servement	1		
a) Excellent		c) Good	d) Satisfactory	e) Unsatisfactory	b
e Venetinanni	6 . 5 1		initiatives and inte	ractions on your performa-	ang .
	on on the Facili b) Very Good	c) Good	d) Satisfactory	e) Unsatisfactory	9
	- barrier		from Industry and	Adjunct Faculty	
	on on the Resor b) Very Good	c) Good	d) Satisfactory	e) Unsatisfactory	a
7. Your impress	ion about Place b) Very Good	c) Good	d) Satisfactory	e) Unsatisfactory	a
		-,		economic Placement Community	1
Support from ay Excellent	Office b) Very Good	c) Good	14/Satisfactory	e) Unsatisfactory	7 64
	0 8	57.0004	- say sams actory	c) Offsatisfactory	d
9 College Libra					
a) Excellent	b) Very Good	c) Good	Satisfactory	e) Unsatisfactory	d
10. Annual Soci	af and Technica	Function			
Excellent	b) Very Good	e) Good	d) Satisfactory	e) Unsatisfactory	a
11. Overall Satis	faction Level	-17			1
Excellent	b) Very Good	c) Good	d) Satisfactory	e) Unsatisfactory	a
	for improvemen			Johnansiactory	



Analysis from student exit feedback:

- 1. Most of the students were satisfied with overall facilities provided by institute.
- 2. Satisfied with technical, cultural and social events conducted by the college
- **3.** They were satisfied with support provided by the office and exam cell.
- 4. They were satisfied with teaching and learning methodology of college
- **5.** They were satisfied with teaching quality of faculty members.



Analysis from parent's feedback

- 1. Maximum parents were satisfied with the facilities provided by the college.
- **2.** Frequently meeting with parents is being arranged but involvement of parents is less. This was discussed in departmental meeting.

Following actions were taken against the students:

- 1. Continuously students progress (attendance, results analysis, participations) is displayed on the notice board an same is send to parents through SMS.
- **2.** Most of the parents are not reading SMS, therefore, class in charges and mentors are communicating them frequently.
- **3.** Faculty members also ask to parents about the curriculum and programme outcomes.



MO	GM,s Col	lege of er	<mark>igineerin</mark>	g and T	echnology	, Kamo	the , Nav	<mark>i Mumb</mark> a	ai	
	Depa	rtment of	Electron	nics & Te	elecommu	nication	Engineer	ing		
	-			Div-	SE					
Course	Sign	al&	Course	Code	ECC 404	C	ourse	Prof D.I	3 Jadhav	
	Syste	em				T	eacher			
			Cou	rse Outo	comes (CC	O)				
ECC -404.1	Understa	nd about va	arious type	es of signa	als, classify	them, an	alyze them	, and perfo	orm various	
	operation	s on them.						Ť		
ECC-404.2		Understand about various types of systems, classify them, analyze them, and perform various operations on them								
ECC-404.3	Understa	nd use of tra	ansforms ir	n analysis	of signals in	continuo	is and discr	ete time do	main	
ECC-404.4	Understa	nd use of tra	ansforms ir	n analysis (of systems in	n continuc	ous and disc	rete time d	omain.	
ECC-404.5					nd operation					
ECC-404.6					se of Contin			~	s which are	
	useful to	understand	the behavi	our of elec	tronic circui	its and cor	nmunicatio	n systems.		
			A	Assessme	ent Tools					
Course					Tools					
Outcomes					College					
(C O)				For n	napping w	rite yes				
	Test-1	Test-2	Assn1	Assn2	Assn3	Assn4	Assn5	PQP	Others	
ECC -404.1	yes		yes							
ECC-404.2	yes			yes						
ECC-404.3		yes			yes					
ECC-404.4		yes				yes				
ECC-404.5							yes			
ECC-404.6								yes		

CO	Attainm	Overall (CO				
		attainment					
		Distribution					
CO1	60	CO4	60	Direct	Indirect		
CO2	65						
CO3	60	90	10				



Overall A	Attainment Level -CO	Attainme	Attainment Level –PO as				
Level-1 35		High	3	60			
Level-2	50	Medium	2	50			
Level-3	60	Low	1	35			

	Programme Specific Outcome (PSO)
PSO1	The E&TC graduates will be able to Analyze specific engineering problems and
	design analog & digital systems for a given specification and function
PSO2	Implement functional blocks of hardware-software co-designs for signal
	processing and communication applications by applying modern tools for public domain applications
PSO3	Associate the learning from the courses to arrive at solutions to real world
	problem

		C	O-PO a	and PSC	O Co	rrelatio	on Ma	atrix							
					F	O]	PSO	
(CO)	A	b	c	d	e	f	g	h	i	j	k	l	m	n	0
ECC -404.1	2	3	1	1		1							1		1
ECC-404.2	2	2	3		1	2							2		1
ECC-404.3	2	2	1	2		3									
ECC-404.4	1	3	3	3	1	1							1		
ECC-404.5	1	3	1	1		2									
ECC-404.6	2	3	1	1	1								3		
													1.7	0	1
Contribution to PO	1.6	2.6	1.6	1.6	1	1.8									

Now PO can be calculated with the help of following equation

WPi =
$$\sum_{i=0}^{j} \frac{(cO_j)}{6}$$
 (i = 1 to 12 and j = 1 to 6)

(where WP_i is the Weight factor for Programming Outcome PO_i)



AY 2017-18(Even Sem)

Prof. D. Jadhav

<u>Course Code</u> <u>Signal & Systems</u> <u>Course Code</u> <u>ECC404</u> <u>CourseTeacher</u>

Department: Electronics& Telecomm. Engineering

Class: S. E. A

Name of Subject: Signals and Systems

AY	2017-18(E	iven Sem)										
	<u>Course</u>	Signal & Systems	Course	ECC404		CourseT		Prof				
			<u>Code</u>			<u>eacher</u>		Jadł	nav			
	•	Electronics& Telecomm. En	gineering									
	ss: S. E. A											
Na	me of Sub	ject: Signals and Systems										
S	UID	NAME OF STUDENT	Internal A	Internal Assessment								
N			Class	Class	As	Assn II	As	As	As	Р		
0			Test I	Test II	sn		sn	sn	sn	Q		
					1		III	IV	V	Р		
			Max	Max	10	10	10	10	10	10		
			Marks:2	Marks:2								
			0	0								
1	116ET1	Ardu Samiksha Kailash	11	18	7	8	7	8	8	4		
	173B	Hemlata										
2	117ET3	Auchar Rutuja Sanjay	2	15	7	7	7	8	7	3		
	193B	Ashwini										
3	116ET1	Bamane Shruti	14	18	8	8	8	8	8	4		
	117B	Shashikant Shweta										
4	116ET1	Bhange Monika	9	15	8	7	8	6	6	4		
	186B	Mallikarjun Usha				_	<u> </u>					
5	116ET1	Bhoir Sheetal	14	17	7	8	4	8	8	4		
_	211B	Harishchandra Harshali		10	<u> </u>	_						
6	116ET1	Borole Roshane Ramesh	5	10	7	7	6	6	7	4		
_	403B	Nisha	4.4	4.5	-	2	-	4	5			
7	116ET1 004A	Chaudhari Yatin Tukaram Sulabha	14	15	7	3	7	4	5	4		
8	117ET3	Chaudhary Rishikesh	8	17	7	3	7	6	7	4		
٥	330A	Vitthal Sulochana	0	17	'	3	'	O	/	4		
9	116ET1	Chavan Praful Subhash	12	17	7	6	7	4	8	6		
3	422A	Sujata	12	1/	'	J	′	4	0	U		
1	117ET3	Chokshi Harshala Dirgha	1	7	6	4	5	5	5	3		
0	284B	Geeta	*	'		7						
1	116ET1	Choudhari Swapnali	12	12	7	5	7	5	6	4		
1	270B	Sanjay Supriya			_		_					
1	117ET3	Dant Ajinkya Anil Anita	4	16	6	6	6	5	4	3		
2	328A	= = , , , , , , , , , , , , , , , , ,										
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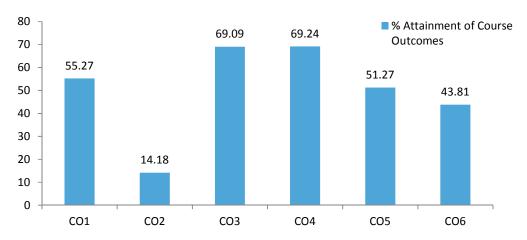
1	117ET3	Devkar Nikhil Vijay Rekha	3	12	6	6	7	4	7	4
3	309A									
1	116ET1	Dhatrak Prajakta Arun	2	17	8	8	6	4	5	4
4	183B	Sangeeta								
1	116ET1	Fernandes Ashley Alvin	18	18	8	8	7	4	5	3
5	179A	Racheal								
1	117ET3	Gavankar Nilakshi Sudhir	0	5	7	6	5	4	7	6
6	202B	Sandhya								
1	117ET3	Gholap Pratik Vitthal	7	16	6	7	7	4	7	6
7	277A	Sharmila								
1	117ET3	Ghuge Gajanan	5	15	7	7	7	4	6	4
8	069A	Dnyandeo Bhikabai								
1	116ET1	Gupta Nitesh Ramshabd	4	12	6	7	7	3	6	1
9	242A	Asha								
2	117ET3	Indorkar Raj Jawahar	1	16	4	5	6	6	5	4
0	027A									
2	117ET3	Jadhav Mrunali	0	16	6	7	7	7	7	4
1	021B	Balasaheb Sunita								
2	116ET1	Jadhav Isha Ashok Jyoti	9	18	7	7	6	8	7	4
2	048B									
2	116ET1	Jadhav Pranisha	6	17	7	6	7	4	4	3
3	241B	Mahendra Vaishali								
2	117ET3	Jeurgi Prerana	5	9	8	7	7	7	7	3
4	164B	Chandrashekhar								
2	116ET1	Joshi Siddhesh Sanjiv	7	18	7	8	6	4	7	3
5	036A	Sarika								
2	113ET1	Londhe Shrushti narayan	3	6	8	8	7	4	6	3
6	316B	Meena								
2	116ET1	Mahadik Rutuja	12	13	6	6	4	4	6	4
7	157B	Chandrakant Reshma								
2	115ET1	Mahadik Gaurav Girish	7	15	6	7	8	4	1	3
8	234A	Gandhali								
2	115ET1	Mahadik Sanket Laxman	2	16	7	8	7	4	6	4
9	257A	Lalita								
3	117ET3	Malshikare Navnath	5	9	6	6	6	4	7	4
0	117A	Baban Shantabai		_			_	_	_	_
3	114ET1	Mhetre Govind Saylu	1	0	4	4	3	3	6	3
1	091A	Shinabai	10				_		_	_
3	116ET1	Nair Anirudh Murali	12	15	8	8	7	4	5	3
2	433A	Reeja Pashilkar Vaishnavi	0	10	_	-	-			2
3	116ET1		8	18	8	7	6	4	6	3
3	367B	Jagannath Jayashree	2	10	-	6	-	4	r	4
3	116ET1	Pawar Anjali Dada Nanda	3	18	6	O	5	4	5	4
	051B 115ET1	Dayghan Anilyat	2	15	E	4	6	4	c	Λ
3 5	043A	Payghan Aniket Purushottam Maya	4	15	6	4	6	4	6	4
3	116ET1	Pote Vaishnavi Ramakant	5	16	6	6	7	4	5	4
6	279B	Reshma	٦	10	0	O	′	4)	4
3	117ET3	Rahul Vijay Prakash Vimla	10	11	6	4	6	1	1	1
7	258A	Mariur vijay Prakasii viiilla	10	**	0	4	٥	1	1	1
3	116ET1	Rangari Vishant Virendra	8	10	7	4	6	4	1	1
8	160A	Vidya	0	10	'	4	٥	4	1	1
3	116ET1	Rasal Siddhesh Ramesh	6	10	6	6	7	4	5	5
٦	TIOLIT	Masar Stauriesti Marriesti	L	10	J	U	_′_	_ +	ر	J

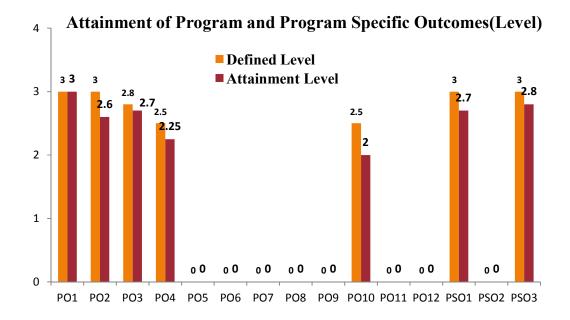
9	439A	Sandhya								
4	116ET1	Ravi Tulika Ravindra	8	11	6	6	7	4	6	6
0	390B	Kumar Sunita								
4	116ET1	Sharma Bhaskar	8	14	7	7	4	5	6	4
1	406A	Brijbhushan Hemlata								
4	116ET1	Shelke Suraj Navnath	5	12	6	6	6	4	5	3
2	128A	Sharda								
4	115ET1	Shetty Prajnay Arun	5	13	7	7	6	5	5	3
3	362A	Vidya								
4	116ET1	Singh Abhishek Jitendra	8	15	7	7	7	4	6	4
4	174A	Suman								
4	116ET1	Singh Shivam Pavan Saroj	9	9	6	8	3	5	7	3
5	338A									
4	116ET1	Swamy Meghraj Murgan	11	12	7	8	5	4	7	4
6	412A	Laxmi								
4	116ET1	Tambe Rasika Deepak	5	12	6	7	5	4	1	3
7	313B	Dipika								
4	116ET1	Tiwari Abhishek Surendra	11	14	6	6	7	4	4	4
8	387A	Manju								
4	116ET1	Ugale Pranil Shankar	5	·	7	6	7	7	7	3
9	371A	Chhaya		15						
5	116ET1	Varma Sanket	14	17	7	6	7	5	6	4
0	154A	Umashankar Munni								
5	116ET1	Waghmare Siddhi	9	14	7	7	6	4	1	4
1	368B	Bhimashankar Kavita								
5	116ET1	Yadav Prakash	13	19	8	7	8	5	5	4
2	299A	Krishnakant Sheeladevi								
5	116ET1	Yenage Suraj Sitaram	8	17	8	7	8	5	8	3
3	146A	Surekha								
5	116ET1	Diya Rajdeepsingh	5	17	4	4	7	1	3	4
4	284A	Chhailsingh Ratan.								
5	116ET1	Patil Rushikesh Rohidas	1	12	4	4	6	1	4	4
5	222A	Vrushali.								
	1	ı			1					



Overall Course Attainment = 2.33

% Attainment of Course Outcomes







Overall results =78%

