V.R.S. College of Engineering and Technology

Arasur, Dist.: Villupuram PIN- 607 107

Internal Quality Assurance Cell

Annual Quality Assurance Report
2014 -2015

March 2016   **Submitted to:**

National Assessment and Accreditation Council
Bangalore, India

V.R.S. College of Engineering And Technology,

(Accredited by NBA, NAAC & An ISO 9001 : 2008 Recertified Institution)

Arasur - 607 107, Villupuram Dist., Tamil Nadu.

Off: 04149- 209153,209163 Cell : 94432 40278

Web site : www.vrscet.in

email : vrscet@yahoo.com

Ref :

Date : 04.03.2016

Certificate

This is to certify that the **AQAR (Annual Quality Assurance Report) 2014-2015** forwarded to the National Assessment and Accreditation Council, Bangalore is compiled with the data collected from the official records and is true to the best of our knowledge and belief.

R. Balasubramaniyan

Coordinator – IQAC

Dr. N. Anbazhaghan

Principal
PRINCIPAL
V.R.S. College of Engg & Tech
Arasur - 607 107 Villupuram Dt.
Tamil Nadu.

Contents

S. No.	PARTICULARS	Page No.
1.	**PART – A**	
	Details of the Institution	**4**
	IQAC Composition and Activities	**7**
2.	**PART – B**	
	CRITERION I : Curricular Aspects	**10**
	CRITERION II : Teaching – Learning and Evaluation	**11**
	CRITERION III : Research, Consultancy and Extension	**14**
	CRITERION IV : Infrastructure and Learning Resources	**18**
	CRITERION V : Student Support and Progression	**20**
	CRITERION VI : Governance, Leadership and Management	**25**
	CRITERION VII : Innovations and Best Practices	**31**
3.	**ANNEXURES**	
	Annexure – I Abbreviations	**33**
	Annexure – II Feedback from Stakeholders - Analysis	**34**

The Annual Quality Assurance Report (AQAR) of the IQAC

Part – A

1. Details of the Institution

1.1 Name of the Institution

V. R. S. COLLEGE OF ENGINEERING AND TECHNOLOGY

1.2 Address Line 1

NH 45

Address Line 2

ARASUR

City/Town

VILLUPURAM

State

TAMIL NADU

Pin Code

607 107

Institution e-mail address

vrscet@yahoo.com

Contact Nos.

04149 – 209153, 209163

Name of the Head of the Institution:

DR. N. ANBAZHAGHAN

Tel. No. with STD Code:

04149 – 209153, 209163

Mobile:

9443289886

Name of the IQAC Co-ordinator:

R. BALASUBRAMANIYAN

Mobile:

9443444719

IQAC e-mail address:

iqac.vrscet@gmail.com

1.3 **NAAC Track ID** *(For ex. MHCOGN 18879)*

TNCOGN15361

1.4 **NAAC Executive Committee No. & Date:**
    (For Example EC/32/A&A/143 dated 3-5-2004.
    This EC no. is available in the right corner- bottom
    of your institution's Accreditation Certificate)

EC/66/A&A/002 dated 21-02-2014

1.5 Website address:

www.vrscet.in

Web-link of the AQAR:

http://www.vrscet.in/AQAR2014-15.pdf

For ex. http://www.ladykeanecollege.edu.in/AQAR2012-13.doc

1.6 Accreditation Details

Sl. No.	Cycle	Grade	CGPA	Year of Accreditation	Validity Period
1	1st Cycle	B	2.33	2014	5 Years

1.7 Date of Establishment of IQAC: DD/MM/YYYY

28/02/2014

1.8 AQAR for the year *(for example 2010-11)*

2014-15

AQAR for the Academic Year 2014-15   5

1.9 Details of the previous year's AQAR submitted to NAAC after the latest Assessment and Accreditation by NAAC ((*for example AQAR 2010-11submitted to NAAC on 12-10-2011)*

i.   AQAR <u>2013-14 submitted to NAAC on 20-03-2015</u>   (DD/MM/YYYY)
ii. AQAR_____   (DD/MM/YYYY)
iii. AQAR_____   (DD/MM/YYYY)
iv. AQAR_____   (DD/MM/YYYY)

1.10 Institutional Status

University   State ☐ Central ☐ Deemed ☐ Private ☐

Affiliated College   Yes √   No ☐

Constituent College   Yes ☐   No √

Autonomous college of UGC   Yes ☐   No √

Regulatory Agency approved Institution   Yes √   No ☐

(eg. AICTE, BCI, MCI, PCI, NCI)

Type of Institution   Co-education √   Men ☐   Women ☐

                        Urban ☐   Rural √   Tribal ☐

Financial Status   Grant-in-aid ☐   UGC 2(f) ☐   UGC 12B ☐

                     Grant-in-aid + Self Financing ☐   Totally Self-financing √

1.11 Type of Faculty/Programme

Arts ☐   Science ☐   Commerce ☐   Law ☐   PEI (Phys Edu) ☐

TEI (Edu) ☐   Engineering √   Health Science ☐   Management ☐

Others   (Specify)   [.]

1.12 Name of the Affiliating University *(for the Colleges)*

| ANNA UNIVERSITY, CHENNAI |

1.13 Special status conferred by Central/ State Government-- UGC/CSIR/DST/DBT/ICMR etc

Autonomy by State/Central Govt. / University

University with Potential for Excellence   UGC-CPE

DST Star Scheme   UGC-CE

UGC-Special Assistance Programme   DST-FIST

UGC-Innovative PG programmes   Any other (*Specify*)

UGC-COP Programmes

2. IQAC Composition and Activities

2.1 No. of Teachers   06

2.2 No. of Administrative/Technical staff   02

2.3 No. of students   02

2.4 No. of Management representatives   01

2.5 No. of Alumni   02

2.6 No. of any other stakeholder and

   community representatives   01

2.7 No. of Employers/ Industrialists   01

2.8 No. of other External Experts   01

2.9 Total No. of members   16

2.10 No. of IQAC meetings held   03

2.11 No. of meetings with various stakeholders: No.   07   Faculty   04

Non-Teaching Staff Students   01   Alumni   01   Others   01

2.12 Has IQAC received any funding from UGC during the year?   Yes ☐   No ☑

If yes, mention the amount

2.13 Seminars and Conferences (only quality related)

(i) No. of Seminars/Conferences/ Workshops/Symposia organized by the IQAC

Total Nos.   2   International   -   National   -   State   -   Institution Level   2

(ii) Themes   Entrepreneurship Development program

Employability Skills

2.14 Significant Activities and contributions made by IQAC

Interaction with Heads and faculties of each and every department for maintaining and sustaining quality education as directed by IQAC

2.15 Plan of Action by IQAC/Outcome

The plan of action chalked out by the IQAC in the beginning of the year towards quality enhancement and the outcome achieved by the end of the year.

Plan of Action	Achievements
1. Create awareness among students about Entrepreneurship through Entrepreneurship development Programmes.	1. An Entrepreneurship development programme was organized for the benefit of the students
2. Encouraging the staffs to go for higher studies.	2. 11 faculties are pursuing Ph.D. in their fields & 2 faculties have completed their Ph.D. during 2013-14.
3. Reducing the paper work.	3. College Data is now automated through the implementation of Inspro Plus Software.
4. Faculties are encouraged to publish papers in Anna University Annexure –I and Annexure – II journals.	4. Significant number of papers were published in Anna University Annexure –I and Annexure – II journals.

2.15 Whether the AQAR was placed in statutory body   Yes ☐   No ☑

Management ☐   Syndicate ☐   Any other body ☐

Provide the details of the action taken

☐

Part – B

Criterion – I
1. Curricular Aspects

1.1 Details about Academic Programmes

Level of the Programme	Number of existing Programmes	Number of programmes added during the year	Number of self-financing programmes	Number of value added / Career Oriented programmes
PhD	---	---	---	---
PG	2	---	2	---
UG	6	---	6	---
PG Diploma	---	---	---	---
Advanced Diploma	---	---	---	---
Diploma	---	---	---	---
Certificate	---	---	---	---
Others	---	---	---	---
Total	8	---	8	---

Interdisciplinary	---	---	---	---
Innovative	---	---	---	---

1.2 (i) Flexibility of the Curriculum: ~~CBCS~~/Core/Elective option / ~~Open options~~
     (ii) Pattern of programmes:

Pattern	Number of programmes
Semester	8
Trimester	---
Annual	---

1.3 Feedback from stakeholders*   Alumni ✓   Parents ✓   Employers ✓   Students ✓
    (On all aspects)

      Mode of feedback   :   Online ☐   Manual ✓   Co-operating schools (for PEI) ☐

* provided an analysis of the feedback in the Annexure- II

1.4 Whether there is any revision/update of regulation or syllabi, if yes, mention their salient aspects.

As per the requirements of the industries, the curriculum and the syllabi of the individual B.E. programmes have been revised by the Anna University for the students who have joined in 2013-2014

1.5 Any new Department/Centre introduced during the year. If yes, give details.

No

Criterion – II

2. Teaching, Learning and Evaluation

2.1 Total No. of permanent faculty

Total	Asst. Professors	Associate Professors	Professors	Others
128	108	10	8	2

2.2 No. of permanent faculty with Ph.D.

6

2.3 No. of Faculty Positions Recruited (R) and Vacant (V) during the year

Asst. Professors		Associate Professors		Professors		Others		Total	
R	V	R	V	R	V	R	V	R	V
27	22	-	-	-	1	-	-	27	23

2.4 No. of Guest and Visiting faculty and Temporary faculty

-	-	-

2.5 Faculty participation in conferences and symposia:

No. of Faculty	International level	National level	State level
Attended	-	1	-
Presented papers	6	23	-
Resource Persons	-	1	10

2.6 Innovative processes adopted by the institution in Teaching and Learning:
- Mind Mapping Technique
- Mission 10X

2.7 Total No. of actual teaching days during this academic year

174

2.8 Examination/ Evaluation Reforms initiated by
     the Institution (for example: Open Book Examination, Bar Coding,
     Double Valuation, Photocopy, Online Multiple Choice Questions)

Remedial Test, Tutorial Class, Coaching Class

2.9 No. of faculty members involved in curriculum
     restructuring/revision/syllabus development
     as member of Board of Study/Faculty/Curriculum Development workshop

-	-	-

2.10 Average percentage of attendance of students

87.61%

2.11 Course/Programme wise distribution of pass percentage:

Title of the Programme	Total no. of students appeared	Division				
		Distinction %	I %	II %	III %	Pass %
B.E-Mechanical Engineering	67	-	52.23%	16.41%	-	68.65%
B.E-Electrical and Electronics Engineering	65	-	40.00%	18.46%	-	58.46%
B.E-Electronics and Communication Engineering	103	19.41%	57.28%	14.56%	-	73.78%
B.E-Computer Science and Engineering	112	-	56.25%	17.85%	-	74.10%
B.Tech-Information Technology	51	-	50.98%	23.52%	-	74.50%
B.E-Civil Engineering	68	-	48.52%	17.64%	-	66.17%
M.E-Product Design & Development	04	50%	25%	-	-	75%
M.E- Embedded System Technologies	16	12.5%	81.25%	-	-	93.75%

2.12 How does IQAC Contribute/Monitor/Evaluate the Teaching & Learning processes:
   - Ensuring effective conduction of tests, seminar, project review and special coaching classes etc.
   - Effective implementation of Mission -10X /Blooms Teaching methodologies such as Mind Mapping, Brain storming, Quiz, Summarization, Simulation, Storytelling, practical, Crossword Puzzle, Video etc.
   - Students Mentoring.
   - Encouraging students to apply for projects with TNSCST and other agencies.
   - Conducting ISTE Ramanujam maths exam for faculty & students.
   - Identifying niche areas for research.
   - Motivating faculty members for research.
   - Guidance for proposal preparation and submission.
   - Arranging training, seminar and workshop related to research.

2.13 Initiatives undertaken towards faculty development

Faculty / Staff Development Programmes	Number of faculty benefitted
Refresher courses	---
UGC – Faculty Improvement Programme	94
HRD programmes	128
Orientation programmes	---
Faculty exchange programme	---
Staff training conducted by the university	---
Staff training conducted by other institutions	---
Summer / Winter schools, Workshops, etc.	94

2.14 Details of Administrative and Technical staff

Category	Number of Permanent Employees	Number of Vacant Positions	Number of permanent positions filled during the Year	Number of positions filled temporarily
Administrative Staff	81	---	---	---
Technical Staff	10	---	---	---

Criterion – III

3. Research, Consultancy and Extension

3.1 Initiatives of the IQAC in Sensitizing/Promoting Research Climate in the institution

- Identifying niche areas for research.
- Motivating faculty members for research.
- Guidance for proposal preparation and submission.
- Arranging training, seminar and workshop related to research.

3.2   Details regarding major projects

	Completed	Ongoing	Sanctioned	Submitted
Number	---	1	---	---
Outlay in Rs. Lakhs	---	---	---	---

3.3   Details regarding minor projects

	Completed	Ongoing	Sanctioned	Submitted
Number	---	---	---	---
Outlay in Rs. Lakhs	---	---	---	---

3.4   Details on research publications

	International	National	Others
Peer Review Journals	64	---	---
Non-Peer Review Journals	---	---	---
e-Journals	---	---	---
Conference proceedings	34	---	---

3.5 Details on Impact factor of publications:

Range [10]   Average [48]   h-index [5]   Nos. in SCOPUS [11]

3.6 Research funds sanctioned and received from various funding agencies, industry and other organisations

Nature of the Project	Duration Year	Name of the funding Agency	Total grant sanctioned	Received
Major projects	-	-	-	-
Minor Projects	-	-	-	-
Interdisciplinary Projects	-	-	-	-
Industry sponsored	-	-	-	-
Projects sponsored by the University/ College	-	-	-	-
Students research projects *(other than compulsory by the University)*	-	-	-	-
Any other(Specify)	-	-	-	-
Total	-	-	-	-

3.7 No. of books published   i) With ISBN No.   02   Chapters in Edited Books   06

ii) Without ISBN No.   ---

3.8 No. of University Departments receiving funds from

UGC-SAP -   CAS -   DST-FIST -

DPE -   DBT Scheme/funds -

3.9 For colleges   Autonomy -   CPE -   DBT Star Scheme -

INSPIRE -   CE -   Any Other (specify) ISTE

3.10 Revenue generated through consultancy   ---

3.11 No. of conferences organized by the Institution

Level	International	National	State	University	College
Number	---	---	---	---	---
Sponsoring agencies	---	---	---	---	---

3.12 No. of faculty served as experts, chairpersons or resource persons   09

3.13 No. of collaborations   International -   National 02   Others -

3.14 No. of linkages created during this year: | --- |

3.15 Total budget for research for current year in lakhs:

From funding agency | Rs.5000.00 | From Management of University/College | Rs.7900.00 |

Total | Rs.12900.00 |

3.16 No. of patents received this year

Type of Patent		Number
National	Applied	01
	Granted	-
International	Applied	-
	Granted	-
Commercialised	Applied	-
	Granted	-

3.17 No. of research awards/ recognitions   received by faculty and research fellows
    of the institute in the year

Total	International	National	State	University	Dist	College
15	15	-	-	-	-	-

3.18 No. of faculty from the Institution
    who are Ph. D. Guides | --- |
    and students registered under them | --- |

3.19 No. of Ph.D. awarded by faculty from the Institution | --- |

3.20 No. of Research scholars receiving the Fellowships (Newly enrolled + existing ones)

JRF | - | SRF | --- | Project Fellows | - | Any other | - |

3.21 No. of students Participated in NSS events:

University level | 174 | State level | - |

National level | - | International level | - |

3.22 No. of students participated in NCC events:

| University level | - | State level | - |
| National level | - | International level | - |

3.23 No. of Awards won in NSS:

| University level | 2 | State level | 2 |
| National level | - | International level | - |

3.24 No. of Awards won in NCC:

| University level | - | State level | - |
| National level | - | International level | - |

3.25 No. of Extension activities organized

| University forum | - | College forum | - |
| NCC | - | NSS | 3 | Any other | - |

3.26 Major Activities during the year in the sphere of extension activities and Institutional Social Responsibility

Through NSS:

- "Water Conservation and Tobacco Awareness Rally".

- Voters Day Awareness Rally.

Through Departments:

i. Microsoft Office Package for Junior Assistants in various Schools of Villupuram District.

Through Clubs:

i. Blood donation camp
ii. Water conservation week

Criterion – IV
4. Infrastructure and Learning Resources

4.1 Details of increase in infrastructure facilities:

Facilities	Existing	Newly created	Source of Fund	Total
Campus area	35 Acrs.	-		35 Acrs.
Class rooms	40	4		44
Laboratories	38	1	Fund from the institution	39
Seminar Halls	6	-		6
No. of important equipments purchased (≥ 1-0 lakh) during the current year.	29	-		29
Value of the equipment purchased during the year (Rs. in Lakhs)	71,99,962.30	2,85,300.00		74,85,262.30
Others	-	-		-

4.2 Computerization of administration and library

- IVRS[Inspro Plus]
- Library[Palpap software]

4.3 Library services:

	Existing		Newly added		Total	
	No.	**Value**	**No.**	**Value**	**No.**	**Value**
Text Books	25439	18382826	1101	837298	26540	19220124
Reference Books	2467	2190741	3	1473	2470	2192214
e-Books	987	-	-	-	987	-
Journals	42	64454	42	67174	84	131628
e-Journals	DELNET	66500	493	66500	-	-
Digital Database	BCL	-	-	-	-	-
CD & Video	987	-	-	-	987	-

4.4 Technology up gradation (overall)

	Total Computers	Computer Labs	Internet	Browsing Centres	Computer Centres	Office	Departments	Others
Existing	498	18	9 MBPS	01	01	15	25	04
Added	-	-	1 MBPS	-	-	03	-	-
Total	498	18	10 MBPS	01	01	18	25	04

4.5 Computer, Internet access, training to teachers and students and any other programme for technology up gradation (Networking, e-Governance etc.)

- NPTEL

4.6 Amount spent on maintenance in lakhs:

i) ICT

25, 29,692.48

ii) Campus Infrastructure and facilities

6, 35, 42, 935.49

iii) Equipments

74, 85,262.30

iv) Others

2, 60, 35, 544.39

Total:

9, 95, 93, 434.66

Criterion – V
5. Student Support and Progression

5.1 Contribution of IQAC in enhancing awareness about Student Support Services

> ➢ Training & placement aid through alumni
> ➢ Placement brochure at Training & Placement cell
> ➢ 24*7 Wi-Fi facility available
> ➢ Common computer centre (Net lab) for surfing
> ➢ Provision of Hi-tech Gym
> ➢ Health centre facility
> ➢ Grievance redressal committee
> ➢ Arrangement of Industrial Visit to enhance practical knowledge
> ➢ Canteen and store facility for both boys and girls

5.2 Efforts made by the institution for tracking the progression

> ➢ Conducted career development programs for students
> ➢ Followed transparent admission procedure
> ➢ Highlighting achievements of students in College news letter
> ➢ Making college Bus facility available on field visits.
> ➢ Making parents meet and informing them on the progress of their children also encourage them to improve his/her skills
> ➢ A mentor/special counselor is allocated for a batch of 20 students in each programme to monitor and counsel the students' progress in academic as well as extra-curricular activities
> ➢ Conducted Add on course for the students for their placement and career
> ➢ In Plant training was conducted for students through alumni

5.3 (a) Total Number of students

UG	PG	Ph. D.	Others
1604	32	-	-

(b) No. of students outside the state

04

(c) No. of international students

-

Men

No	%
1009	61.67

Women

No	%
627	38.33

Last Year						This Year					
General	SC	ST	OBC	Physically Challenged	Total	General	SC	ST	OBC	Physically Challenged	Total
	235	3	102	-			272	2	124	-	

5.4 Details of student support mechanism for coaching for competitive examinations (If any)

> i. Online aptitude Test
> ii. Technical aptitude test
> iii. Technical Seminar
> iv. Aptitude classes for placement

No. of students beneficiaries

1636

5.5 No. of students qualified in these examinations

NET | - | SET/SLET | - | GATE | - | CAT | -

IAS/IPS etc | - | State PSC | - | UPSC | - | TANCET | 9

5.6 Details of student counseling and career guidance

Student counseling

Responsibilities

- Track record

    The track records of minimum 15 students are scrutinized by staff members and students are benefited through the corresponding staff member's guidance. All the staff members has been trained to give better counseling by M/S. HELIKX.

- Special counselor

    The counselor gives guidance and encourages the students for their improvement in academic as well as in co-curricular activities.

Career Guidance

Responsibilities

1. To enable each student to understand the definition of what is meant by career – the scope for performing various jobs, each requiring a set of knowledge, skills and aptitude during a productive time span.

2. To enable students to consider various career opportunities available and make appropriate career choices, sufficiently early during their academic life.

3. To provide adequate information to the students to realize the above objectives through publishing information, expert talks and seminars.

4. To offer individual counseling to the students as and when necessary.

5. To arrange interactive sessions between alumni and students

6. To arrange Seminars / Workshops on Career opportunities.

No. of students benefitted   1636

5.7 Details of campus placement

On campus			Off Campus
Number of Organizations Visited	Number of Students Participated	Number of Students Placed	Number of Students Placed
11	283	128	18

5.8 Details of gender sensitization programmes

> Women empowerment cell is formed to prevent sexual harassment and to promote the general well-being of female students, teaching and non-teaching women staff of the college.
> To provide guidelines for the redressal of grievances related to sexual harassment of female students, teaching and non-teaching women staff of the College.
> Suggestion / Complaint box is placed at various places on the campus which are accessible to students.
> Students have the freedom to approach the Principal during working hours without prior appointment.

5.9 Students Activities

    5.9.1   No. of students participated in Sports, Games and other events

State/ University level   7   National level   -   International level   -

    No. of students participated in cultural events

State/ University level   -   National level   -   International level   -

    5.9.2   No. of medals /awards won by students in Sports, Games and other events

Sports: State/ University level   75   National level   -   International level   -

Cultural: State/ University level   -   National level   -   International level   -

5.10 Scholarships and Financial Support

	Number of students	Amount in Rs.
Financial support from institution – Economically weaker Section Scholarship	42	1,26,000.00
Financial support from government	1084	56,75,200.00
Financial support from other sources	5	90,000.00
Number of students who received International/ National recognitions	-	-

5.11   Student organized / initiatives

Fairs   : State/ University level   - Number   National level   -   International level   -

Exhibition: State/ University level   1   National level   -   International level   -

5.12   No. of social initiatives undertaken by the students   5

5.13   Major grievances of students (if any) redressed: Nil

Criterion – VI

6. Governance, Leadership and Management

6.1 State the Vision and Mission of the institution

Vision
To improve the socio-economic status of the rural poor peasants by providing opportunities to them to acquire engineering and technical skills.
Mission
To establish and run a technical institution with a high quality teaching and research in a rural area of poor socio-economic status and hence to make the technical education available to the underprivileged at affordable cost.

6.2 Does the Institution has a management Information System

Yes. The institution has a management information system.

6.3 Quality improvement strategies adopted by the institution for each of the following:

6.3.1 Curriculum Development

As per Anna University

6.3.2 Teaching and Learning

i. Implementation of outcome based education.
a. Defining course outcomes to meet out program outcomes.
b. Identifying content delivery method.
c. Assessing the students using various evaluation techniques for the attainment of course outcomes.
ii. Effective implementation of Mission -10X /Blooms Teaching methodologies such as Mind Mapping, Brain storming, Quiz, Summarization, Simulation, Storytelling, practical, Crossword Puzzle, Video etc.
iii. Live-demos of working models using you tube.
iv. Preparation of course files
v. Academic research
vi. Guest lecturers
vii. Case studies seminars
viii. Intensive courses
ix. Discussion with groups
x. Field trips and lab lectures
xi. Mentoring
xii. Tutorial teaching

6.3.3 Examination and Evaluation

i. Evaluation of marks comprises of internal marks from continuous assessment test and external marks scored in End Semester Examination.
ii. Continuous Assessment Tests are carried out by respective departments and End Semester Examinations are conducted by the office of the Controller of Examinations, Anna University, Chennai.
iii. Both the marks in the continuous assessment and End Semester Examinations are considered while declaring the results.

6.3.4   Research and Development

i.   Identifying niche areas for research.
ii.   Motivating faculty members for research.
iii.   Guidance for proposal preparation and submission.
iv.   Arranging training, seminar and workshop related to research.

6.3.5   Library, ICT and physical infrastructure/ instrumentation

1. Collection of requirements of books, journals, magazines etc. for the ensuing academic year/semester from all the departments and recommend it to the Top Management for procurement.
2. Upgradation of infrastructure like providing/increasing the internet connectivity, digital library facilities, online preparation for placement activities etc. will be carried out.
3. Recommending for updating the available / required books with new editions.
4. Monitoring the availability of reprographic facilities to all the students without stagnation.
5. Establishing a clean and calm environment inside the library to motivate the user for spending more hours.

6.3.6 Human Resource Management

i. In the institution, the process of assessing adequate human power requirements, staff recruiting, monitoring and planning professional development programmes for personnel development and seeking appropriate feedback responses are very good.

ii. Recruitment of faculty and staff are based on the guidelines provided by Anna University and AICTE, New Delhi.

iii. There are many staff welfare schemes namely EPF, Group insurance and Accidental policy

iv. ERP Biometric system is introduced for all the administrative modules of the institution.

v. Sponsorship of Higher Studies for Faculties

vi. Organizing Developmental training programme and workshops/seminars for enhancing the multi-skills of faculties.

vii. Incentives are given to the Faculties for their contribution in research.

viii. Effective appraisal system has been followed to assess the performance of faculties.

ix. Faculty members who have published papers in reputed National and International journals shall be awarded with cash prize of Rs.2500/- and Rs.5000/- respectively.

x. Highest pass percentage producing faculty member in each section shall be appreciated with gold ring worth Rs.7000/-.

xi. Highest percentage between current and previous semester results giving head of the department shall be appreciated with gold ring worth Rs.7000/- and progressive result producing head of the department shall be appreciated with gifts worth Rs.1000/-.

6.3.7 Faculty and Staff recruitment

i. Releasing the advertisement in the Leading daily newspapers.
ii. Scrutinizing of Application as per the college norms.
iii. Selection of Candidates as per the norms of staff selection committee.

6.3.8 Industry Interaction / Collaboration

i. MoU's have been signed with the leading concerns to enhance the campus recruitment and project training for the student community.

6.3.9 Admission of Students

The students are admitted according to the Anna University/ Tamil Nadu Government/ AICTE Norms.

6.4 Welfare schemes for

Teaching	Transport facilities Medical and Maternity Leave EPF Group Insurance
Non teaching	Transport facilities Medical and Maternity Leave EPF Group Insurance
Students	NSS, ISTE chapter, IEE, YRC, RRC. Group Insurance

6.5 Total corpus fund generated

6.6 Whether annual financial audit has been done   Yes ✔ No

6.7 Whether Academic and Administrative Audit (AAA) has been done?

Audit Type	External		Internal	
	Yes/No	Agency	Yes/No	Authority
Academic	NO	--	Yes	Academic auditing committee headed by principal
Administrative	NO	--	NO	--

6.8 Does the University/ Autonomous College declare results within 30 days?

For UG Programmes   Yes [✓] No [   ]

For PG Programmes   Yes [✓] No [   ]

6.9 What efforts are made by the University/ Autonomous College for Examination Reforms?

> As per Anna University Examination Reforms

6.10 What efforts are made by the University to promote autonomy in the affiliated/constituent colleges?

> As per Anna University promotional schemes

6.11 Activities and support from the Alumni Association

> 1. Conduct of Alumni meets consistently to proceed with a fondness with the Alumni of the College.
>
> 2. Appreciating the Alumni, in the Alumni meet who have advanced estimable commitments in his/ her calling.
>
> 3. Enrolment of new Alumni in Alumni Association through the online/site outlined particularly for the reason.
>
> 4. We upgrade the contact among the Alumni for the improvement in their calling.
>
> 5. We make an opportunity for connection with the students, who are as of now doing their course in the College with Alumni to know the current status of industry.
>
> 6. We make a bond with commercial ventures in which our Alumni are exceeding expectations in their calling.
>
> 7. We make an opportunity for our Pre-final year students through the Alumni with profession mindfulness program.

6.12 Activities and support from the Parent – Teacher Association

1. The class in-charge ought to meet the students' guardians and will give the proposal about the students' advancement.

2. The students CA test marks are sent to parents by post.

3. The truants are informed to their guardians promptly through telephone.

4. The Special counseling students' guardians are spurred during the University exams through telephone by relating counselor.

6.13 Development programmes for support staff

Preparing Programmes are directed to the supporting staff for their improvements with respect to the computer essential.

6.14 Initiatives taken by the institution to make the campus eco-friendly

1. There is no formal behavior of Green Audit in the organization yet the foundation is eco- amicable. Part of consumption is caused to make the grounds eco-accommodating.
2. The administration, the Head of the organization and all the staff are submitted and as a result of their dedication and inclusion, part of trees is planted.
3. The college grounds is moderate temperature zone. The college classrooms are exceptionally decently ventilated, that they barely require any counterfeit lighting.
4. The college is east-bound sufficient regular lighting is accessible both in the Fore Noon and After Noon.
5. Students are swayed to going to courses, gatherings and doing activities identified with renewable Energy.
6. Rain water collecting is carried out in the college ground with a simulated lake.
7. The college has made game plans for the stopping of understudies the college ground. This aides in keeping the grounds as clean as could reasonably be expected.
8. The leaves are covered in the dirt itself and the papers are arranged off.
9. The College inn wreckage utilizes a gas and steam for cooking.
10. The Trees are planted and the college composes programs consistently to instill this custom among its understudies.
11. Every year e-waste is given to an expert scrap merchant. The utilized lead batteries are securely arranged by giving under purchase back plans to new battery chargers.
12. Cleanly keep up the classrooms and toilet with preplanned schedule.
13. Consistently new saplings are added to greenish the grounds.
14. Concrete roads are laid in the college campus.
15. A newly two – wheelers parking area has been constructed in the entrance of college campus.
16. Bus facilities have been extended for nearby interior villages.

Criterion – VII

7. <u>Innovations and Best Practices</u>

7.1 Innovations introduced during this academic year, which have created a positive impact on the functioning of the institution. Give details.

- **Students monitoring:**
  - **Attendance monitoring**
    - Review of students' attendance every day. If any student is absent, we make a phone call to her/his parents to inform them and collect reasons.
    - Review of students' attendance once in 15 days and displaying of the attendance details in the notice boards.
    - Review of students' attendance, once in a month and sending the attendance details to the parents by post.
  - **Education monitoring**
    - Conduct of four Pre continues Assessment, three continues Assessment (CA) Tests, and one Model examination at regular intervals, in such a way to cover the entire syllabus of the Anna University.
    - Conduct of remedial classes after the working hours from 5.00 P.M. to 6.00 P.M the students who have failed in the CA Tests are given special coaching during those hours.
    - Mentoring and motivating the student groups by the teaching faculties of each Department.
    - The teaching staff members called advisors interact with the students to identify their strength, attitude, characters, ambitions etc.
- **Training and Placement cell:**
  - **Soft skill training:**
    - ✓ Soft skill training classes conducted for all the students starting from the first year to third year by LSE Groups, Pondicherry.
  - **Technical Skill Training:**
    - ✓ Training in Php and DotNet Platform for final year CSE & IT is given by eAPPZ Softwares, Chennai.
    - ✓ Training in J2EE programming for final year CSE & IT is done by ICT Academy of Tamil Nadu.
    - ✓ Training in C Programming for final year CSE & IT is done by Suresoft Systems Pvt. Ltd., Pondicherry.
    - ✓ Training in Cisco Certified Network Associate (CCNA) training program for final year ECE students is done by RJP Infotek Private Limited, Chennai.
    - ✓ Training in PLC /SCADA for final year ECE&EEE students is given by Axis Global Automation, Chennai.
    - ✓ Training in Microcontroller and its application for ECE final year students is done by SoftXper Private Limited, Chennai.

- **Sports and Cultural**
  - ✓ The management encourages the students to participate in sports and games, as it provides not only good health, but also qualifies for personal development such as team spirit, leadership qualities, organizing abilities, social interaction etc.
  - ✓ The college has well- established sports ground and other sports facilities. The students are encouraged to participate in various zonal and inter-zonal tournaments and intercollegiate and inter-university matches.
  - ✓ Sports Day celebrations are conducted every year to motivate and honor the winners of various sports events.

7.2 Provide the Action Taken Report (ATR) based on the plan of action decided upon at the beginning of the year

Task	Action	Status
Encouraging the staffs to go for higher studies.	• Advising faculties to register for Ph.D. • 11 faculties are already pursing Ph.D. in their fields.	2 faculties have completed their Ph.D. during 2013-14
Reduce the paper work	Ask the Management to Purchase ERP System	• Purchased Insproplus S/W • Reduced the paper work • College Data is now Automated
Applying for funds to organize workshops, seminars etc.	• Proposal sent to professional bodies like CSIR,ISTE,DRDO etc. with the guidance of Dr. S. Poorna Chandra, Funding Consultant.	Waiting for results
Applying for funds to do students projects, research projects etc.	Proposal sent to TNSCST	Waiting for results
Conduct of more Entrepreneur cell programs.	Proposal sent to DST, NSIC etc…	**Achieved:** Program was organized by Entrepreneurship Development Cell, Sponsored by DST on the title "Entrepreneurship Awareness Camp" from 27 January 2014 to 29 January 2014 for final year EEE students.
LCD projector & Multimedia Speakers for all class	Exact Count was given to the Principal	Purchased LCD Projector and Multimedia Speakers for all Classes.
Provide two system with 8 mbps internet connections along with printer	Requirement was forwarded to Principal	Purchased network Switch and provided the two system along with printer

7.3 Give two Best Practices of the institution *(please see the format in the NAAC Self-study Manuals)*

Program Outcomes Assessment/ Procedures

  To improve students' skills and their ability is assessed on various factors such as to function in multi-disciplinary teams, to understand professional and ethical responsibilities, the need to, engage in lifelong learning activities and to communicate effectively. The assessment is carried out by getting feedback from Alumni, Stakeholders and professional body members through a survey, based on expected outcomes.

Mission 10X – Learners Centric Approach

  It is indisputable that education is indispensable to all. Hence the best is to be provided, to all the consumers of knowledge. The goal is to lay foundation for pedagogic techniques. The learners are motivated with various interactive learning methodologies, by creating a friendly learning environment and opportunities.

Institution Productivity plus ERP system

  Implementation of Institution Productivity Plus ERP system (Insproplus) for all academic assurance pertaining to academics such as students management, library management, hostel management, transport management, HR management and finance management provide systematic and streamlined access for providing precise and accurate information.

7.4 Contribution to environmental awareness / protection

> ➤ The institution has adopted a rainwater harvesting system to increase the recharge of ground water by collecting the rain water from the catchment areas and storing in the reservoir (pond).
> ➤ The institution being a green campus, is improving energy efficiency, conserving resources and enhancing environmental quality by educating for sustainability, natural resources management, climate change and creating healthy living and learning environment. We made our institution as a smoke free, plastic free and accident free zone by educating the students.
> ➤ All the students shall enroll in any one of the personality and character development programs (NSS/YRC) and undergo training for about 80 hours and attend a camp of about ten days. The training shall include classes on hygiene and health awareness and also training in first aid.
> ➤ The primary objective of this unit is to involve the technical students and turn them into responsible Indian citizens by protecting the environment and servicing people through Special Camp activities for an adopted village nearby Arasur for its all-round development during the vacation.
> ➤ The NSS Unit is also involved in the activities like Environment Enrichment (Tree Plantation, Campus Cleaning), Women Empowerment (Women Awareness Program), Health Awareness (HIV/AIDS Awareness Program, Road Safety Awareness Program, Dengue Awareness Program, Blood Donation Camps).
> ➤ The college has a constructive relationship with the following institutions for meaningful outreach activities: Government Hospital-Mundiyampakkam, Primary Health Centre-Iruvelpattu, Lions Club of Villupuram, JIPMER Hospital Pondicherry for Blood Donation Camps and Health Awareness Programs, Kovai Sankara Eye Hospital, GMR/NHAI for Road Safety and local NGOs.

7.5 Whether environmental audit was conducted?   Yes [ ]   No [√]

7.6 Any other relevant information the institution wishes to add. (For example SWOT Analysis)

STRENGTHS:
- Clear academic schedule/methodology and co-curricular programs prior to commencement of each semester.
- Staffs well planned course files, maintenance of assessment records, lab manuals etc.
- Frequent class committee meetings to redress the grievances of students.
- Special counseling during study holidays through phone to both students and parents.
- The student project contest is being conducted to exhibit their hidden talents and appreciated with rewards in Annual day celebrations.
- In plant training & industrial visits has become mandatory to students.
- On-campus and off-campus facilities for placement
- Career guidance and entrepreneurship activities.
- Well developed and sophisticated library facilities
- Management's scholarship through economically weaker section cell along with regular Government scholarships.
- 250 litres/hour R. O. Plant is functioning to provide pure water on all drinking water taps.
- Periodic monitoring of students through counseling.
- Students Attendance, CA Test and University results are intimated to parents by post.
- High capacity Gen set facilities to maintain zero power cut environment.
- Life Insurance to all Students and staff.

WEAKNESS:
- Rural based students with average knowledge present.
- Lack of placement from core companies.
- Less number of funded projects.

OPPORTUNITIES:
- Scope for strengthening the industry institution interaction for better placements of students.
- Enter into collaborative projects with industries and other institutions for better exposure to students.
- Conducting training programs for students to match the industry requirements.

CHALLENGES:
- To forge strong alliances with National organizations for academic and R&D activities in thrust areas of Engineering &Technology.
- Training the rural-based Tamil medium students in English language and communication skills so as to be selected in the campus interview.

8. **Plans of institution for next year**

- Applying for 2(f) status from U. G. C.
- Working meticulously towards improving the student admission.
- To conduct soft skill and Technical Skill development with well-trained organization to improve placement opportunities from tier – 1 companies.
- To Sign more number of MOU with CII & other Industries.
- Apply for funds to do research projects, workshop and seminar, FTDP.STTP, students projects etc.
- Vigorous improvement in Anna University results.
- Involving in more Professional Societies activities such as ISTE, SAE, IETE, ISHRAE, CSI, ICTACT, etc.
- Conduct at least two programmes on Entrepreneur cell programs and Career Guidance Bureau for the students and staffs.

<div align="right">**ANNEXURE - I**</div>

Abbreviations:

CAS	-	Career Advanced Scheme
CAT	-	Common Admission Test
CBCS	-	Choice Based Credit System
CE	-	Centre for Excellence
COP	-	Career Oriented Programme
CPE	-	College with Potential for Excellence
DPE	-	Department with Potential for Excellence
GATE	-	Graduate Aptitude Test
NET	-	National Eligibility Test
PEI	-	Physical Education Institution
SAP	-	Special Assistance Programme
SF	-	Self Financing
SLET	-	State Level Eligibility Test
TEI	-	Teacher Education Institution
UPE	-	University with Potential Excellence
UPSC	-	Union Public Service Commission

<div align="center">***************</div>

FEEDBACK FROM STAKEHOLDERS-ANALYSIS

*Question for students

Regarding theory

- Whether teacher comes to class on time with good planning and clear objectives?
- Whether teacher organizes subject matter in logical sequence or not?
- Is the voice of the teacher is audible?
- Does the teacher draw diagram legibly?
- Real time examples are given by teacher or not?
- Does the teacher offer assistance and counseling?
- Relevant question for interaction is encouraged or not?
- Whether teacher encourages raising doubts?
- Whether encouragement is given on originality and creativity?
- Is there any partiality shown by the teacher?
- Coverage of the syllabus is at appropriate pace or not?
- Whether teacher conduct activities regarding subject like quizzes, seminar?
- Is there any partiality shown in the correction of answer scripts?

Regarding Lab

- Are you satisfied with your batch size?
- Whether experiments of Lab Classes are conducted as per schedule provided?
- Whether equipment's provided are sufficient manner and in good condition?
- Consumables provided in the lab are of Good Quality or not?
- Are number of experiments conducted as per University Norms?
- Are there any experiments conducted beyond the syllabus?
- Was the Lab Manual provided complete in covering the syllabus and informative?
- Are the Class in-charges (faculties) helpful in completing the experiments?
- Is there any opportunity provided to complete partially done experiments and for days of which students were absent?

**Students Feedback about the performance of faculties- (Branch wise)**

Department of EEE

Department of Mechanical

Department of Civil

Department of ECE
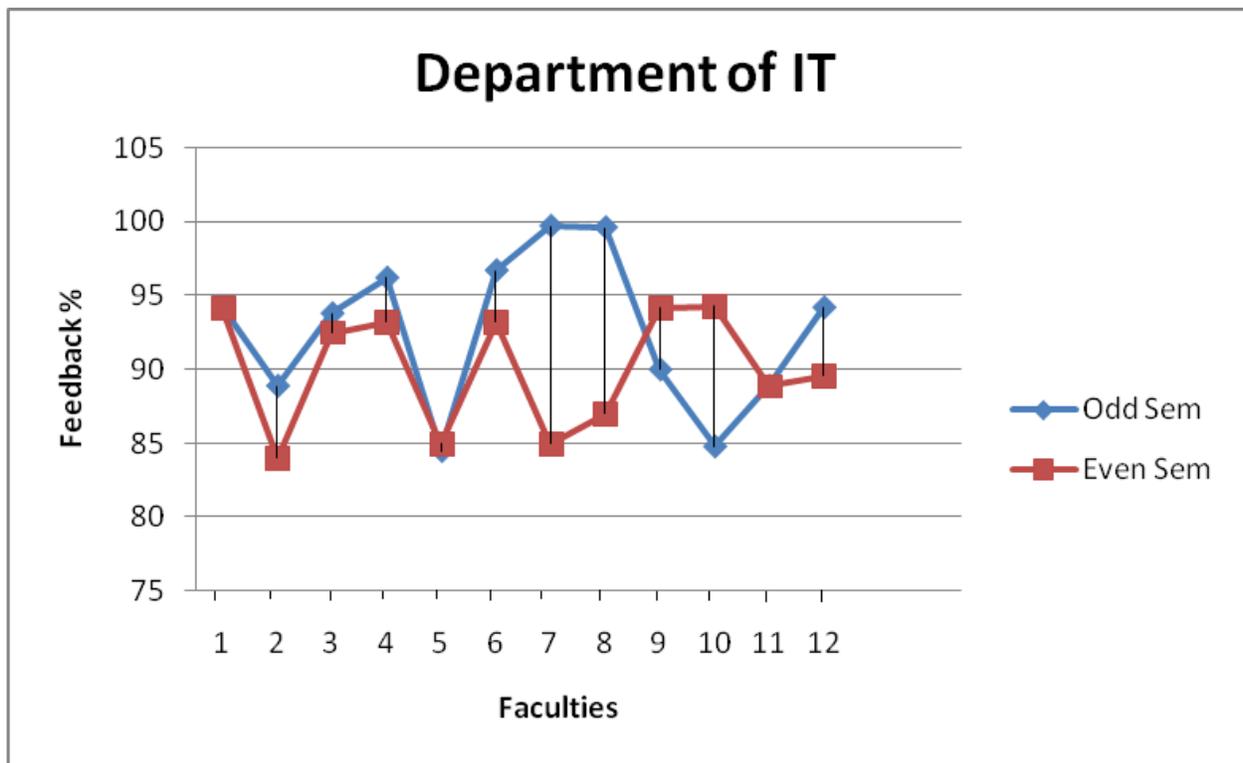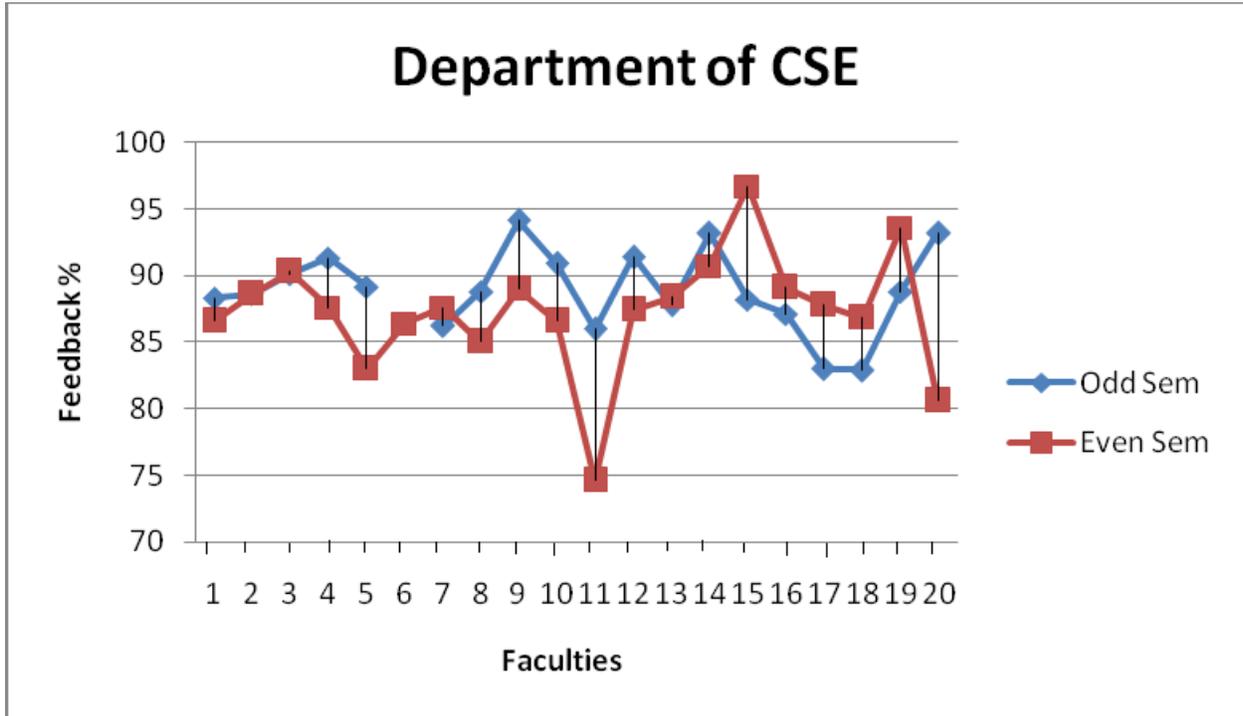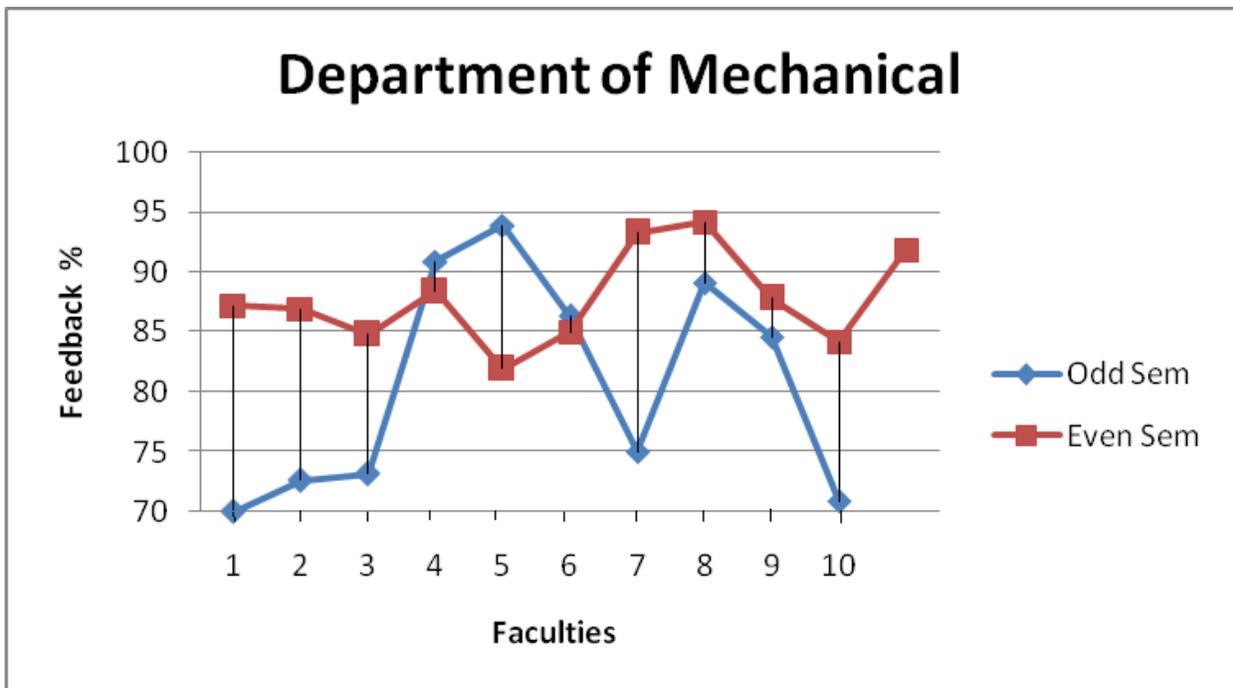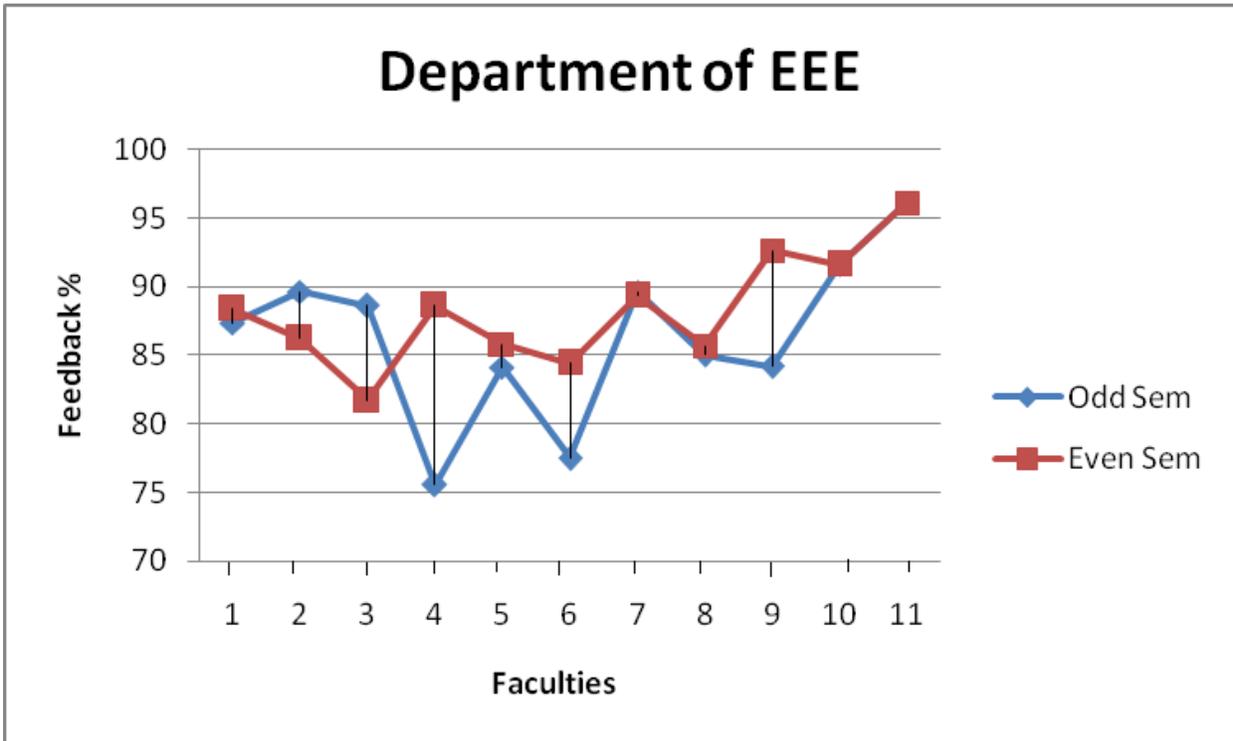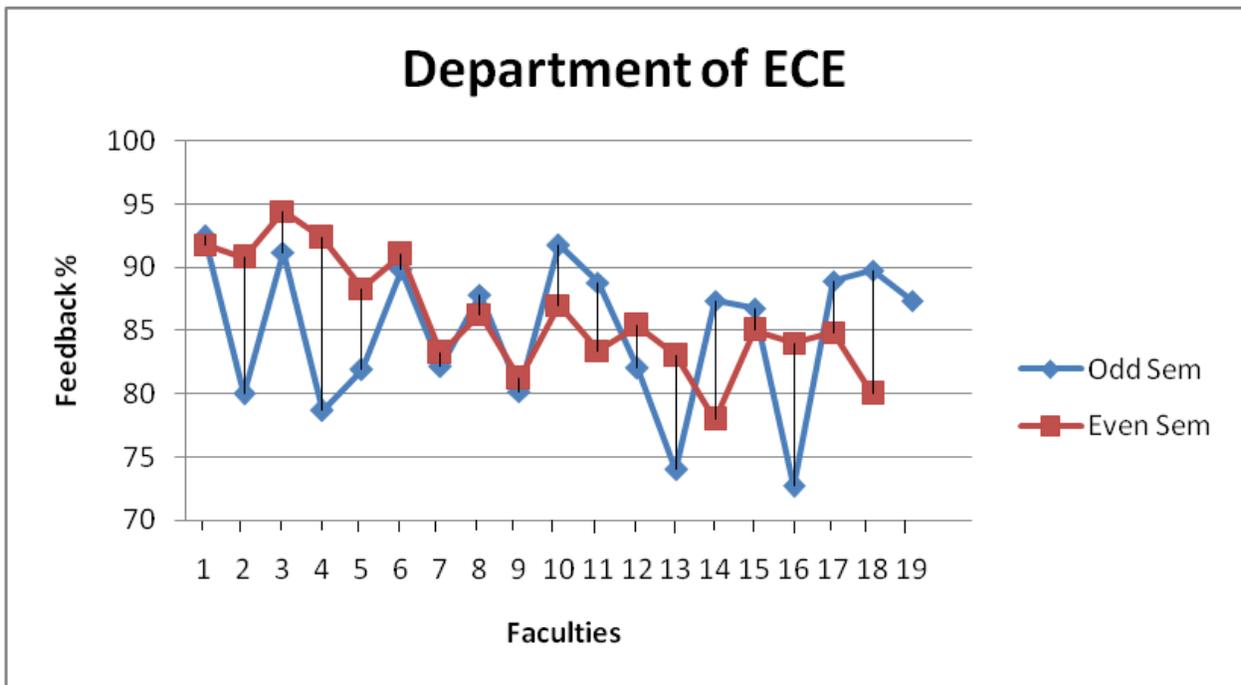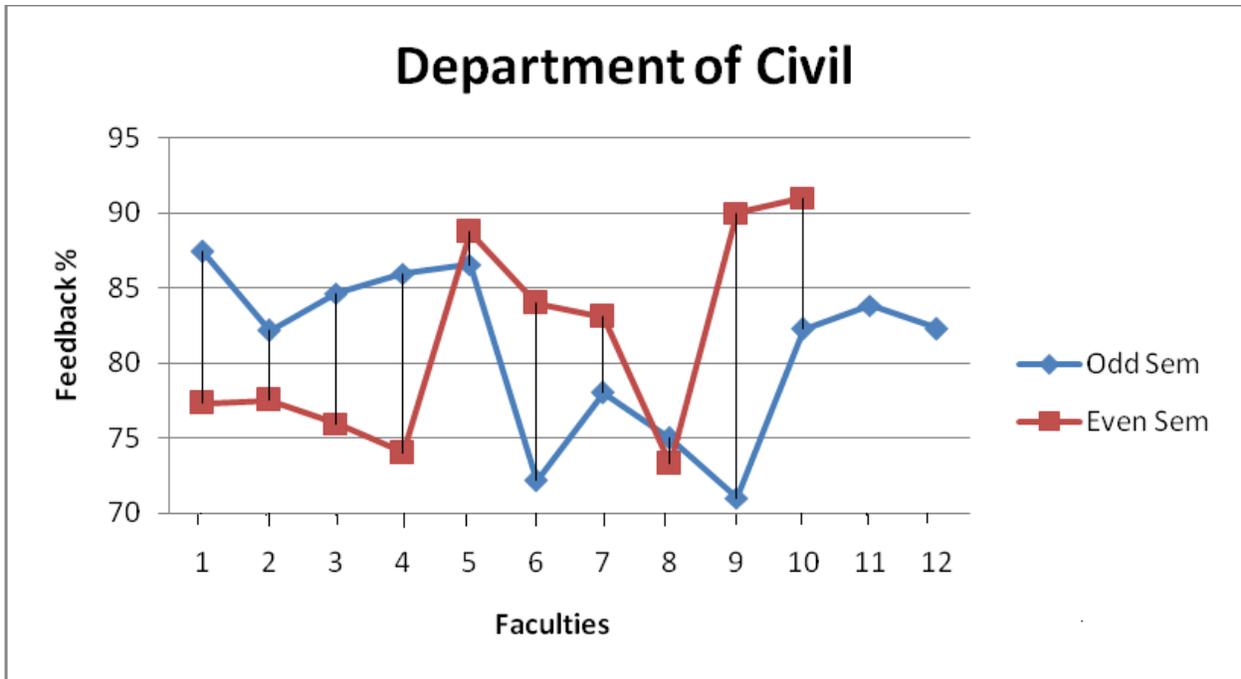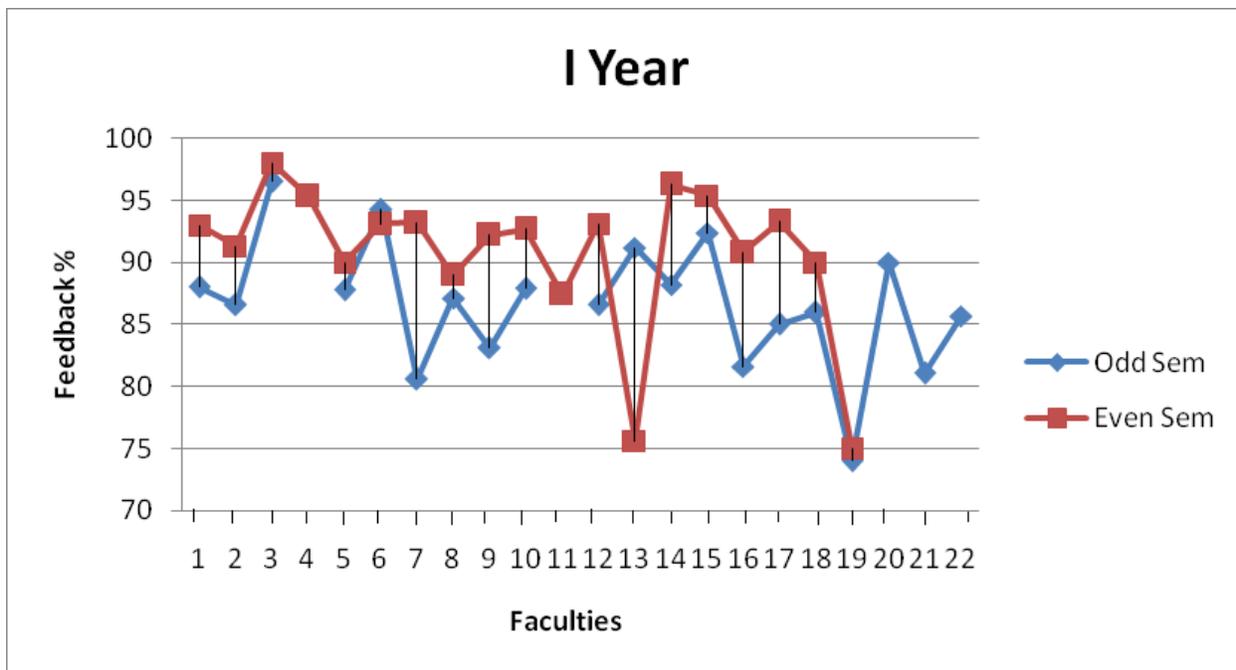
Analysis has been made on the faculties under 5 categories. They are
1-Poor
2-Satisfactory
3-Good
4-Very Good
5-Excellent

Action taken against feedback from students

- Students will give their rating to the faculties based on the above questions in both theory and laboratory subjects.
- According to the deviations calculated, faculty will be advised to avoid those deviations in upcoming semester.
- Root cause of those deviations will be found out and the corrective measures will be given by the faculty to prevent those deviations in upcoming semesters.
- If a faculty scored less than 70 % from all the given criterions in feedback, the particular staff would be asked to face enquiry with head of department .Based on the explanation given by the faculty, the head of department will analyze the reason and may give memo or warning.
- If faculty scored 70-80 % from all the given criterions in feedback, the particular staff would be asked to face enquiry with the head of department. Based on the explanation given by the faculty, the head of department may give warning to the faculty such that they should avoid this situation in future.
- If a faculty scored more than 80% from all the given criterions in feedback, he/she may be appreciated and will be asked to continue and maintain the same in future.

<u>Students Feedback about the performance of faculties- (Semester wise)</u>
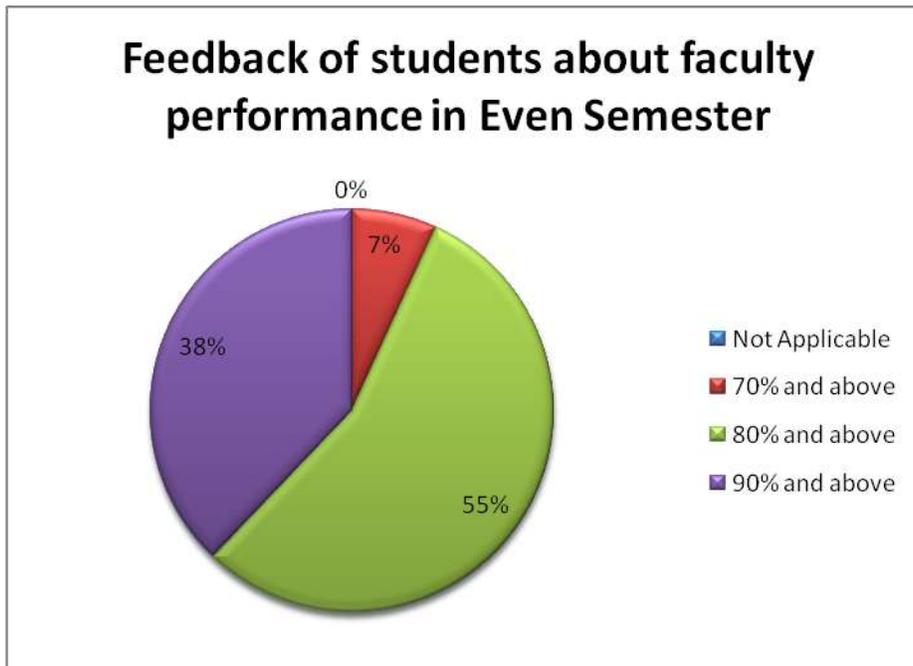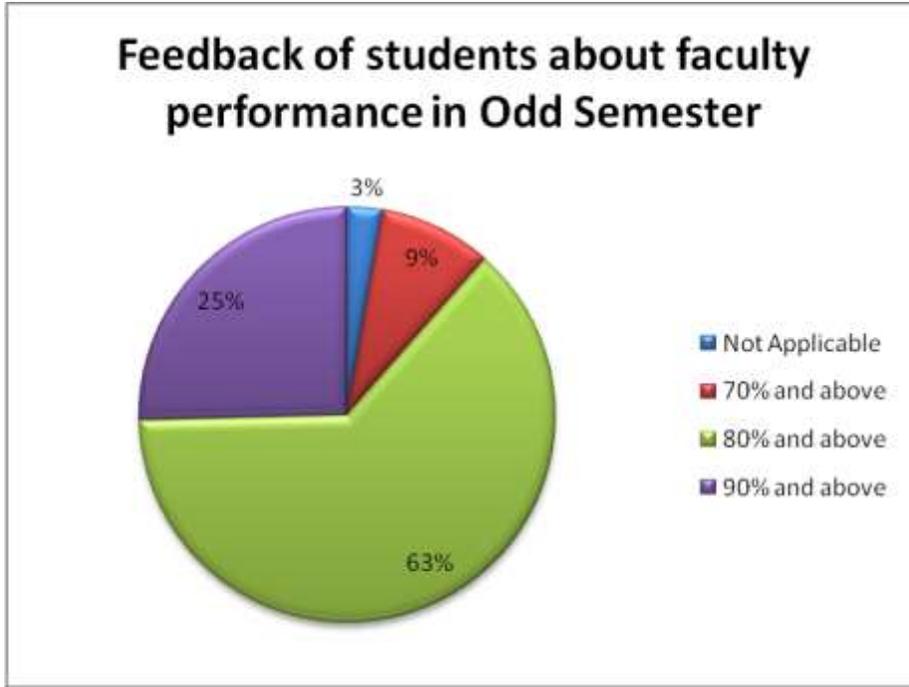
Feedback from students during Class Committee meetings

The class committee meeting will be conducted three times in a semester. During that meeting, the students will be asked for their subject related things and general related things like

- Portion completion of subject handling staff and their voice clarity.
- Whether they have distributed two marks and sixteen marks question bank with answers for the completed portion?
- Whether faculty solves problems in problematic subjects and experiment completion in laboratory subjects?
- Whether they have problem in using Wi-Fi facility?
- Whether the electrical appliances work properly in their class room?
- Do they face any inconvenience with canteen facility?
- Is there any water facility problem?
- Any other problem?

The feedback given by the students will be informed to the heads of departments regarding their subjects and System administrator regarding Wi-Fi facility and general related things to the administrative officer and overall report will be given to the principal and all necessary actions will be taken within two days of time.

Exit Feedback by Final year students

Exit feedback will be collected from final year students when they finish their course based on following criterions

- Facility on all aspects
- Teaching /Learning methodologies
- Laboratory facilities
- Supplementary activities
- Extra-curricular activities
- Quality of faculty
- Quality of students
- General things

Some of the suggestions and feedback were given by final year students. They are

- Practical oriented teaching methodology need to be improved
- Quality of food and working of canteen need to be improved.
- Library and laboratory facilities are satisfactory.
- Banking and Transport facility provided by college are satisfactory.
- Postal facility need to be improved.
- More industrial visits to be arranged for core subjects.
- Involvement of students in department related activities are excellent.
- Extra-curricular activities provided by college are excellent.
- Skills related to communication should be improved.

Based on feedback given by final year students improvements are met in upcoming years.

*Questions for Parents

- Are you satisfied with academic / overall performance of your son / daughter?
- After admitting in this institution, the academic improvement of your son / daughter is same / improved / deteriorated.
- Do you receive progress reports?
- Are you aware of methods adapted by Institute / Department for improving performance (Marks)?
- What are your suggestions to Institute / Department to improve performance (Marks)?
- Are you satisfied with marks obtained in the Anna University examinations?
- Are you satisfied with functioning and usage of library by your son / daughter?
- What are your comments on performance of your son / daughter in sports and social activity?
- Are you satisfied with the communication skill and personality development of your son / daughter?
- Are you aware of programmes conducted by the Institute to improve communication skill & Personality development?
- Do you prefer that Institute takes some additional steps to improve communication skill and personality development?
- Are you aware of Medical facility / Transport facility / Canteen service in institute?
- Whether parent is satisfied with facility extended in hostel or not? (If son / daughter is a Hosteller)

Feedback from Parents

The following points are observed from the feedback of the parents during parents teacher interaction based on the above questions.

- The quality of the education provided by the college is satisfactory.
- The overall performance of the student has been improved after admission in to this institution.
- Communication skill and technical knowledge of the student has been improved.
- Medical, Transport, Canteen facility provided by the college is agreeable.
- Discipline maintained by the college is venerable.
- Sports related activities conducted by the college are excellent.
- Laboratory facilities and books available in the library were really useful to the students.
- Hostel facility provided by the college is acceptable

Feedback from Employers

Many suggestions were given by employers for the improvement of students skills. They are

- Enhance the mathematical skills and logical thinking of the students.
- Problem solving capability of the students must be improved and should be related to the relevant applications.
- Students should be given practice in logical thinking for design based exercises.
- Make aware the students to visit industries to develop the student's ethical and social responsibilities.
- Student should organize Technical workshops & Symposiums, discusses the recent technical problems with the team and find the solution.
- Augment the communal related activities of students for Ethical responsibilities.
- Communication skill of the candidates can be improved by conducting seminars & Group Discussion Activities.
- Develop the knowledge of engineering solution in a global, environmental and social context.
- Improve the technical skill of the students and obtain membership from IEEE and various organizations.
- Kindle the talent of the students to implement funded projects from various industries.
- Establish the modern tools relevant to the expectation of industry.

*Questions for Alumni
- What is your present working status?
- What is your current academic status?
- What is the Domain of your working area?
- How college education helps you in career and in what aspects?
- Is the learned knowledge helps you in your professional and personal work?
- How can you help for your fellow alumni and in what ways?
- Mention any further suggestions for the development of the college.

Feedback from alumni
Many positive responses have been given by alumni
- They helped our final year students by conducting awareness programmes like seminars, workshops which in turn helped the students in their placement related activities.
- More practical oriented concepts need to be taught inside the class room.
- Communication oriented programmes need to be improved. So, Smart training program have been made further improvements and Soft skill programs are strengthened effectively.
- Way of teaching needs to be modified by conducting various activities and students should be made involved in those activities to learn the subject effectively.
- Apart from syllabus, additional courses to be learned on recent languages which will help them in their placements.
- They suggested that there may be interaction of final year students with them to know about their working status directly.