

# INSTITUTIONAL ASSESSMENT AND ACCREDITATION (Effective from July 2017)

**Accreditation - (Cycle - 1)** 

## PEER TEAM REPORT ON

## INSTITUTIONAL ACCREDITATION OF MEA ENGINEERING COLLEGE C-8079

Malappuram Kerala 679325

NATIONAL ASSESSMENT AND ACCREDITATION COUNCIL An Autonomous Institution of the University Grants Commission P.O. Box No. 1075, Nagarbhavi, Bengaluru - 560 072, INDIA

1.Name & Address of the			
1.1 value & Audiess of the	MEA ENGINEERING COLLEGE		
institution:	Malappuram		
	Kerala		
	679325		
2.Year of Establishment	2002		
3.Current Academic Activities at			
the Institution(Numbers):			
Faculties/Schools:	1		
Departments/Centres:	8		
Programmes/Course offered:	9		
Permanent Faculty Members:	152		
Permanent Support Staff:	98		
Students:	1447		
4.Three major features in the	Young and dedicated faculty technical staff		
institutional Context	2. Providing free quality tech	nnical education to rural	
(Asperceived by the Peer Team):	underprivileged section of society		
	3. Adequate infrastructure		
5.Dates of visit of the Peer Team	From: 21-01-2019		
(A detailed visit schedule may be	To: 22-01-2019		
included as Annexure):			
6.Composition of Peer Team			
which undertook the on site visit:			
	Name	Designation & Organisation Name	
Chairperson	DR. VENKATESH RAIKAR	Vice Chancellor,SANJAY	
		GHODAWAT UNIVERSITY	
		KOLHAPUR	
Member Co-ordinator:	DR. SUBASH ARYA	FormerRegistrar,VIKRAM	
		UNIVERSITY UJJAIN	
Member:	DR. SUREKHA BHANOT	Professor,BIRLA INSTITUTE OF	
		TECHNOLOGY & SCIENCE	
NAAC Co - ordinator:	Dr. A.v. Prasad		

#### Section II: CRITERION WISE ANALYSIS

Observations (Strengths and/or Weaknesses) on each qualitative metrices of the key Indicator under the respective criterion(This will be a qualitative analysis of descriptive nature aimed at critical analysis presenting strength and weakness of HEI under each criteria)

Criterion1 - Curricular Aspects (Key Indicator and Qualitative Metrices(QlM) in Criterion1)		
1.1	Curricular Planning and Implementation	
1.1.1	The institution ensures effective curriculum delivery through a well planned and documented	
QlM	process	
1.2	Academic Flexibility	
1.3	Curriculum Enrichment	
1.3.1	Institution integrates cross- cutting issues relevant to Gender, Environment and Sustainability,	
QlM	Human Values and Professional Ethics into the Curriculum	
1.4	Feedback System	

#### Qualitative analysis of Criterion 1

MEA Engineering College, established in the year 2002 is a self-financed engineering Institution in Malappuram district of Kerala state. Institute is committed to providing excellent and value-based higher technical education to socially and economically weak students. The Institution has been providing higher education to socially and economically weaker students. The institution is affiliated to APJ Abdul Kalam Technological University, and the University of Calicut with approval from AICTE, offering UG programmes in six discipline and PG programmes in three disciplines. The curriculum at UG and PG level are designed and developed by the above-mentioned universities. The curriculum planning and implementation of Institution are as per the guidelines of statutory bodies. Workshops/ Seminars/ Programs are organized by the Institution for supplementing the curriculum with cross-cutting issues relevant to gender, environment and sustainability, human values and professional ethics. The Curriculum also includes courses on Professional Ethics, Human rights, and Environmental Science. A structured mechanism is in place for receiving online feedback from students regarding the teaching-learning process. The Teaching-learning processes are periodically reviewed by the Principal.

Guest lectures, seminars, industrial visits and training programmes are conducted for imparting knowledge about latest technologies to students. Courses like life skill and language lab have also been introduced. Students have undergone internship in various reputed firms and industries and have undertaken projects. Refresher Courses, workshops, and FDPs are conducted for upgradation of faculty's knowledge and skills. Certificate courses like "Professional Diploma in SEO and Digital Marketing" have been introduced. Equal opportunities in terms of admissions, employment, training programmes, sports activities etc. are offered to boys & girls.

Criterion2	2 - Teaching-learning and Evaluation (Key Indicator and Qualitative Metrices(QlM) in Criterion2)
2.1	Student Enrollment and Profile
2.2	Catering to Student Diversity
2.2.1	The institution assesses the learning levels of the students, after admission and organises special
QlM	programs for advanced learners and slow learners
2.3	Teaching- Learning Process
2.3.1	Student centric methods, such as experiential learning, participative learning and problem solving
QlM	methodologies are used for enhancing learning experiences
2.3.4	Innovation and creativity in teaching-learning
QlM	
2.4	Teacher Profile and Quality
2.5	Evaluation Process and Reforms
2.5.1	Reforms in Continuous Internal Evaluation(CIE) system at the institutional level
QlM	
2.5.2	Mechanism of internal assessment is transparent and robust in terms of frequency and variety
QlM	
2.5.3	Mechanism to deal with examination related grievances is transparent, time-bound and efficient
QlM	
2.5.4	The institution adheres to the academic calendar for the conduct of CIE
QlM	
2.6	Student Performance and Learning Outcomes
2.6.1	Program outcomes, program specific outcomes and course outcomes for all programs offered by
QlM	the Institution are stated and displayed on website and communicated to teachers and students
2.6.2	Attainment of program outcomes, program specific outcomes and course outcomes are evaluated
QlM	by the institution
2.7	Student Satisfaction Survey

Student admission is done by adhering to the Govt. norms. The admission in most of the undergraduate programs except computer science and admission to all PG programs is much below the sanctioned strength. The Institution organizes orientation/induction programs for freshers. Institute has a mechanism to identify differential requirements of student population after admission. The Institution has been providing bridge Courses on Mathematics and Science for the newly admitted students. The academic calendar is published and strictly adhered to. An internal assessment, design, and evaluation of assignments is done in a transparent fashion with an aim to prepare students for external assessment. Grievance address mechanism is in place.

Course file is maintained by each faculty in which Programme Outcomes (PO), Programme Specific Outcomes (PSO), Course Outcomes (CO) are list, but a detailed and thorough analysis is required to improve the teaching-learning process. Quality of question paper is OK, steps may be taken to inculcate self-learning, critical and creative thinking by way of open book tests, assignments, group activities etc. Faculty-Advisor system is in place to counsel students regarding their academic and personal issues. Academic profile and personal information of the students are available in ERP software. Details of all courses like syllabus, course plan, evaluation scheme etc. are also accessible to students on ERP.

Criterion3 - Research, Innovations and Extension (Key Indicator and Qualitative Metrices(QlM) in			
Criterion3	Criterion3)		
3.1	Resource Mobilization for Research		
3.2	Innovation Ecosystem		
3.2.1	Institution has created an ecosystem for innovations including incubation centre and other		
QlM	initiatives for creation and transfer of knowledge		
3.3	Research Publications and Awards		
3.4	Extension Activities		
3.4.1	Extension activities in the neighbourhood community in terms of impact and sensitising students		
QlM	to social issues and holistic development during the last five years		
3.5	Collaboration		

Institution is trying to create an eco-system for research and innovations. Even though, the Institution management encourages faculty members to submit research proposals, write research papers in peer-reviewed journals and conferences having high impact factor, very few faculty members at present are actively involved in R&D work. Only four faculty members are eligible to act as research guides. Most of the faculty is non-Ph.D. Faculty members should be encouraged and facilitated to enroll for Ph.D. and pursue doctoral research. Faculty members with Ph.D. need to be motivated to take up Research Scholars and receive research grants from various government agencies and industries, use incubation centre and other initiatives for creation and transfer of knowledge through IEDC which provides all the basic facility for the project, research and startup activities. Quality and quantity of UG and PG students have to be increased to have a better culture of research & development. Management needs to be aggressive to promote research in the institute. Performance-based incentives to faculties for R&D work will certainly motivate them to make contributions to publications, patents and book writing. Few faculty members have published their research papers in reputed National and international journals with good impact factors.

The Institution is also actively involved in extension activities like mass weddings(MEHER), palliative care,107 houses in Nilamboor Taluk, Punarjjani Camp 2017-18, SWACHH BHARAT ABHIYAN (2016), Clean Melattur project, blood donation camps, helping in disaster management etc. Major extension activities are done through NSS and NCC. Institute has received awards and recognition for these activities.

The Institution has collaboration for research projects / teaching-learning through MIELES agreement. The peers in MIELES project in India are IISc, IIT-Madras, Mysore University, AMRITA University, KAHM Unity College, AIGA and there are 8 Universities from Europe.

Criterion4 - Infrastructure and Learning Resources (Key Indicator and Qualitative Metrices(QlM) in		
Criterion4)		
4.1	Physical Facilities	
4.1.1	The institution has adequate facilities for teaching- learning. viz., classrooms, laboratories,	
QlM	computing equipment, etc.	
4.1.2	The institution has adequate facilities for sports, games (indoor, outdoor),gymnasium, yoga centre	
QlM	etc., and cultural activities	
4.2	Library as a Learning Resource	
4.2.1	Library is automated using Integrated Library Management System (ILMS)	
QlM		
4.2.2	Collection of rare books, manuscripts, special reports or any other knowledge resources for library	
QlM	enrichment	
4.3	IT Infrastructure	
4.3.1	Institution frequently updates its IT facilities including Wi-Fi	
QlM		
4.4	Maintenance of Campus Infrastructure	
4.4.2	There are established systems and procedures for maintaining and utilizing physical, academic	
QlM	and support facilities - laboratory, library, sports complex, computers, classrooms etc.	

The Institution has adequate facilities for teaching and learning in terms of classrooms laboratories, seminar halls, department library etc. Seminar halls are equipped with a projection system, but very few classrooms are equipped with LCD projectors. Telepresence facility should be made available in at least one hall so that students and faculty have access to experts from academia and industry. The Institution also has a canteen and Campus-store, ATM facility, transportation facility, separate hostels for boys and girls etc. The Institution Auditorium can accommodate up to 1500 audience.

The Institution has a digital automated central library equipped with adequate text and reference books, e-books, technical magazine, journals, e-journals, NPTEL video lectures, books for competitive exams like GATE, CAT, GRE, TOEFL etc. Increased use of Library facilities among students and faculty members is recommended. A number of reference books and general reading books [classics, biographies, history, science fiction, political philosophy] are less. It is advised to provide book bank facility for SC/ST students as per Govt. norms. A cloud-based Library Management system and RFID system will further enhance Library automation.

The Institution provides internet facility with a speed of 40 Mbps, in collaboration with BSNL networks. Wi-Fi facility is available for the entire campus including the hostels. A well-established campus networking center is maintaining the network connections and network security for the whole campus. However, it is observed that computers in a few laboratories need augmentation and up-gradation. Budget allocation is made for the maintenance and upkeep of gardens, horticulture, electrical and civil works. Facilities provided for sports and games include football cum cricket ground, volleyball court, badminton court, table tennis, gymnasium (separate for boys and girls) etc.

Criterion5 - Student Support and Progression (Key Indicator and Qualitative Metrices(QlM) in Criterion5)		
5.1	Student Support	
5.2	Student Progression	
5.3	Student Participation and Activities	
5.3.2	Presence of an active Student Council & representation of students on academic & administrative	
QlM	bodies/committees of the institution	
5.4	Alumni Engagement	
5.4.1	The Alumni Association/Chapters (registered and functional) contributes significantly to the	
QlM	development of the institution through financial and non financial means during the last five years	

The Institution facilitates financial support to students through various schemes like Merit cum Means Scholarships, CH Muhammedkoya Scholarship (for Girls), e-Grantz Educational assistance, Central Sector Scheme of Scholarship for College and University Students for pursuing an engineering education. In addition to that, the Institute supports various students through scholarships and free-ships, bridge courses, remedial classes, mentor program. The institution conducts programs like MEA TECHNO BUD AWARDS for identifying students among School / Diploma level with good potential and offers the scholarship to pursue Engineering Programme for their studies.

The career guidance and placement unit have student representatives and the Placement Unit (PU) which assist students in their career planning. The placement unit tries to offer employment opportunities to students in their area of interest through continuous mentoring and by successfully coordinating recruitment activities. The Institute is putting forth its best efforts to maximize the employment opportunities by establishing an interface with various companies, collaboration with foreign universities etc.

For the benefit of the student community, the student council is formed comprising one student representative from each department, from which one is elected as the college union chairman. The council initiates effective dialogues and discussions between the staff/college authorities and students to resolve various student-related issues. A convocation ceremony MEGRAD for the graduates is conducted from the academic year 2015-16 onwards and toppers are awarded cash prizes Cultural festivals, sports festivals, magazine publication and celebration of festivals and National importance days are conducted with much enthusiasm. Organizations like IEEE, IEDC, UBA, and FOSS have chapters in the Institution and several seminars and technical sessions by the student community are conducted.

The Institution has an excellent Alumni spread all over the globe and contributes towards improvement in academics, infrastructure, industry interactions, placements, social welfare activities etc. The MEAAA (MEA Alumni Association) has also taken up activities geared to improve society at large, which includes the donation of an ambulance to the Pain and Palliative Clinic, financial help in community marriages (MEHAR) etc. Alumni association need to register itself.

Criterio	n6 - Governance, Leadership and Management (Key Indicator and Qualitative Metrices(QlM) in		
Criterio			
6.1	Institutional Vision and Leadership		
6.1.1	The governance of the institution is reflective of an effective leadership in tune with the vision		
QlM	and mission of the institution		
6.1.2	The institution practices decentralization and participative management		
QlM			
6.2	Strategy Development and Deployment		
6.2.1	Perspective/Strategic plan and Deployment documents are available in the institution		
QlM			
6.2.2	Organizational structure of the institution including governing body, administrative setup, and		
QlM	functions of various bodies, service rules, procedures, recruitment, promotional policies as well as		
	grievance redressal mechanism		
6.2.4	Effectiveness of various bodies/cells/committees is evident through minutes of meetings and		
QlM	implementation of their resolutions		
6.3	Faculty Empowerment Strategies		
6.3.1	The institution has effective welfare measures for teaching and non-teaching staff		
QlM			
6.3.5	Institution has Performance Appraisal System for teaching and non-teaching staff		
QlM			
6.4	Financial Management and Resource Mobilization		
6.4.1	Institution conducts internal and external financial audits regularly		
QlM			
6.4.3	Institutional strategies for mobilisation of funds and the optimal utilisation of resources		
QlM			
6.5	Internal Quality Assurance System		
6.5.1	Internal Quality Assurance Cell (IQAC) has contributed significantly for institutionalizing the		
QlM	quality assurance strategies and processes		
6.5.2	The institution reviews its teaching learning process, structures & methodologies of operations		
QlM	and learning outcomes at periodic intervals through IQAC set up as per norms		
6.5.5	Incremental improvements made during the preceding five years (in case of first cycle)		
QlM			
	Post accreditation quality initiatives (second and subsequent cycles)		

The vision and missions of the institution though being located in a rural area focuses on becoming centre of excellence in Technical education by using cutting edge technology that produces competent engineers of today and tomorrow to serve the society.

The Governing Council of the institute has members from Management Committee, Academicians, Industrialist, representatives from DTE and AICTE, who are responsible for approving the policies and strategic plans of the institution. The College Council consisting of Principal, Director, Administration Manager, Vice-Principal, Dean (Academics), HoDs and faculty members of various levels of administration holds the responsibility of implementing the strategic plans for the benefit of the Institution and monitors the academic and non-academic activities of students. Every year among the teaching faculties, the best faculty member is awarded a "Tablet PC" based on the performance. The Institution has to strengthen its mechanism of faculty review. The institution provides facilities of transportation, child-care centre for both teaching and

non-teaching staffs. The Institution has a structured scale of pay for faculty members and the salary is based on their respective cadre. The annual financial audit is being regularly done. IQAC is in place but needs serious overhauling to act as an agent for proactive action to set targets for enhancing quality at all levels.

Criterion?	7 - Institutional Values and Best Practices (Key Indicator and Qualitative Metrices(QIM) in		
Criterion?	· · · · · · · · · · · · · · · · · · ·		
7.1	Institutional Values and Social Responsibilities		
7.1.2			
QlM			
	1. Institution shows gender sensitivity in providing facilities such as:		
	1. Safety and Security		
	2. Counselling		
	3. Common Room		
7.1.5			
7.1.5	Waste Management steps including:		
QlM	Solid waste management		
	Liquid waste management		
	E-waste management		
7.1.6	Rain water harvesting structures and utilization in the campus		
QlM	Rain water harvesting structures and utilization in the campus		
7.1.7	Green Practices		
QlM	• Students, staff using		
QIM	a) Bicycles		
	b) Public Transport		
	c) Pedestrian friendly roads		
	Plastic-free campus		
	Paperless office		
	Green landscaping with trees and plants		
7.1.18	Institution organizes national festivals and birth / death anniversaries of the great Indian		
QlM	personalities		
7.1.19	The institution maintains complete transparency in its financial, academic, administrative and		
QlM	auxiliary functions		
7.2	Best Practices		
7.2.1	Describe at least two institutional best practices (as per NAAC Format)		
QlM			
7.3	Institutional Distinctiveness		
7.3.1	Describe/Explain the performance of the institution in one area distinctive to its vision, priority		
QlM	and thrust		

The Institute is very serious and conscious of the safety and security of its students, especially for girls. The Institution promotes welfare-programmes with the help of Women's Development Committee and National Service Scheme associated with various Government bodies like Directorate of Social Justice, NSS Technical cell Kerala, various Panchayaths and municipalities. The NSS unit won the first prize in the state for street play which promoted gender equality and conducted state level workshop titled GENSIS which provides a platform for promoting women's rights and child rights, short film exhibition etc. Girls common room is

made available in every block with basic amenities. Incinerators have been installed in the campus and girls hostel. Sanitary napkins are made easily available. Liquid wastes from canteen, toilets, laundry etc are disinfected and disposed into a drainage facility. The Institution has a water treatment plant and a rain-water harvesting system. Minimum use of plastics in campus is promoted.

The Institution organizes a number of programmes for promoting universal values, national integration, and communal harmony. All days of national importance are celebrated with vigor. The Institute promotes the development of faculty members by sending them to FDPs, Workshops Seminars, and National / International Conferences. A counselor is appointed on a full-time basis to address any psychological issues, stresses of the students. The Academic related matters are maintained, monitored and administered through an ERP software. The Institution's financial matters are maintained by software and measures are being taken to promote Digital payments. The Institution is beautifully landscaped with green grass and trees. Tree plantation and environmental awareness programmes are also conducted regularly. A very good initiative in use of renewable energy is covering of car parking roofs with PV cells with a total capacity of 40KW and expansion to 120 KW capacity is in process.

# **Section III:OVERALL ANALYSIS**based on Institutional strengths. Weaknesses, Opportunities & Challenges (SWOC) (up to 500 words)

#### Overall Analysis

#### **Strength:**

#### **STRENGTHS**

- 1. Young and dedicated faculty members
- 2. Pro-active, philanthropist and enthusiastic management
- 3. Providing quality technical education to under-privileged section of community
- 4. Adequate infrastructure in all respects
- 5. Student-Staff ratio is maintained as per AICTE norms
- 6. Good mechanism to take care of slow and advance Learners
- 7. Good Library facility
- 8. Excellent rapport with stake-holders
- 9. Societal concerned activities
- 10. Employee satisfaction is high
- 11. Effectiveness in teaching-learning process
- 12. Usage of renewal energy and green initiatives in the campus

#### **WEAKNESS**

- 1. Less research and Development activities
- 2. Industry-Institute interaction is less
- 3. Less skill development activities
- 4. Submission of proposals for funding agencies are less
- 5. Quality publications are less in number
- 6. Outcome based education is to be implemented effectively
- 7. Cadre-ratio is not up to the mark
- 8. Less number of PhD holders / Industry experienced faculty members
- 9. Poor consultancy / testing / IPR activities

#### **OPPORTUNITIES**

- 1. Tap Government funding that can support R & D activities
- 2. Consultancy / Testing can be given to local industries
- 3. Institute has opportunities for introduction of more Industry oriented Technical courses
- 4. College can start more advanced PG courses as per Industry 4.0 requirement
- 5. More skill development programmes can be organized to local people
- 6. Continuous enhancement of Industry Institute partnership

#### **CHALLENGES**

- 1. Entry of foreign Universities and private Universities
- 2. Institute is unable to attract quality students
- 3. Institute is unable to attract Industry-experienced and senior faculty members
- 4. Uncertainty in getting scholarships from State welfare department
- 5. Fewer funds from Government leads to poor R & D activities

6. Getting placement s in core sectors

#### Section IV:Recommendations for Quality Enhancement of the Institution

(Please limit to **ten major ones** and use telegraphic language) (It is not necessary to indicate all the ten bullets)

- Cadre-ratio is to be maintained
- R&D activities are to be strengthened and Quality research publications in peer reviewed journals / refer journals are to be increased
- Industry-Institute interaction and Placement activities are to be strengthened
- Proposals are to be submitted for external funding
- Self-Appraisal of faculty members should be effectively implemented
- Laboratories should be upgraded beyond curriculum requirement in phased manner
- OBE / Active learning to be implemented more
- IQAC and Alumni relation are to be strengthened
- More skill-development programmes are to be conducted
- Tie-ups with premier Institutes of National repute and scientific organizations has to be enhanced

I have gone through the observations of the Peer Team as mentioned in this report

Signature of the Head of the Institution

**Seal of the Institution** 

Sl.No	Name		Signature with date
1	DR. VENKATESH RAIKAR	Chairperson	
2	DR. SUBASH ARYA	Member Co-ordinator	
3	DR. SUREKHA BHANOT	Member	
4	Dr. A.v. Prasad	NAAC Co - ordinator	

Place

Date