

NATIONAL BOARD OF ACCREDITATION

Data Capturing Points of the Program Applied for NBA Accreditation– Tier I/II UG (Engineering) Institute Programs

Program Name : Mechanical Engineering	Discipline : Engineering & Technology
Level : Under Graduate	Tier : 2
Application No : 11495	Date of Submission : 27-01-2026

PART A- Profile of the Institute

A1.Name of the Institute : SCMS School of Engineering & Technology	
Year of Establishment : 2001	Location of the Institute: Palissery
A2. Institute Address :SCMS School of Engineering and Technology Vidya Nagar, Palissery, Karukutty, Ernakulam - 683 576 Kerala.	
City:Ernakulam	State:Kerala
Pin Code:683576	Website:www.scmsgroup.org
Email:sset@scmsgroup.org	Phone No(with STD Code):0484-2882901
A3. Name and Address of the Affiliating University (if any) :	
Name of the University : A P J Abdul Kalam Technological University	City: Thiruvananthapuram
State : Kerala	Pin Code: 695016
A4. Type of the Institution : Any Other(Please Specify)	
A5. Ownership Status : Self financing	

A6. Details of all Programs being Offered by the Institution:

- No. of UG programs: **10**
- No. of PG programs: **7**

Table No. A6.1: List of all programs offered by the Institute.

Sr.No.	Discipline	Level of program	Name of the program	Year of Start	Year of Closed	Name of The Department
1	Computer Application	PG	Master in Computer Applications	2006	--	Computer Science and Engineering
2	Engineering & Technology	UG	Automobile Engineering	2004	--	Automobile Engineering
3	Engineering & Technology	UG	CIVIL AND ENVIRONMENTAL ENGINEERING	2021	2023	Civil Engineering
4	Engineering & Technology	UG	Civil Engineering	2001	--	Civil Engineering
5	Engineering & Technology	PG	Communication Engineering	2013	2023	Electronics and Communication Engineering
6	Engineering & Technology	PG	Computer Aided Structural Engineering	2009	--	Civil Engineering
7	Engineering & Technology	UG	Computer Science and Engineering	2001	--	Computer Science and Engineering
8	Engineering & Technology	UG	Computer Science and Engineering (Artificial Intelligence)	2022	--	Artificial Intelligence and Data Science

9	Engineering & Technology	UG	Computer Science and Engineering (Data Science)	2021	--	Artificial Intelligence and Data Science
10	Engineering & Technology	PG	Computer Science and Information System	2012	2025	Computer Science and Engineering
11	Engineering & Technology	UG	Electrical and Electronics Engineering	2002	--	Electrical and Electronics Engineering
12	Engineering & Technology	UG	Electronics & Communication Engineering	2001	--	Electronics and Communication Engineering
13	Engineering & Technology	UG	Electronics Engineering (VLSI Design and Technology)	2023	--	Electronics and Communication Engineering
14	Engineering & Technology	PG	Environmental Engineering	2013	--	Civil Engineering
15	Engineering & Technology	UG	Mechanical Engineering	2001	--	Mechanical Engineering
16	Engineering & Technology	PG	Production and Industrial Engineering	2011	2025	Mechanical Engineering
17	Engineering & Technology	PG	VLSI & Embedded Systems	2012	2025	Electronics and Communication Engineering

A7. Programs to be considered for Accreditation vide this Application:

Table No. A7.1: List of programs to be considered for accreditation.

Name of the Department	Having Allied Departments	Name of the Program	Program Level
Civil Engineering	No	Civil Engineering	UG
Mechanical Engineering	Yes	Mechanical Engineering	UG
Automobile Engineering	Yes	Automobile Engineering	UG
Computer Science and Engineering	Yes	Computer Science and Engineering	UG

Table No. A7.2: Allied Department(s) to the Department of the program considered for accreditation as above.
Cluster ID. Name of the Department (in table no. A7.1) Name of allied Departments/Cluster (for table no. A7.1)

Allied Department/Cluster Name	Program Name	Program Level
Automobile Engineering	Automobile Engineering	UG

PART-B: Program information**B1. Provide the Required Information for the Program Applied For:**

Table No. B1: Program details.

A. List of the Programs Offered by the Department:

SR.NO.	PROGRAM NAME	PROGRAM APPLIED LEVEL	YEAR OF START / YEAR OF CLOSED	SANCTIONED INTAKE	INCREASE/DECREASE INTAKE (if any)	YEAR OF INCREASE/DECREASE	CURRENT INTAKE	YEAR OF AICTE APPROVAL	AICTE/COMPETENT AUTHORITY ARROVAL DETAILS	ACCREDITATION STATUS	FROM	TO	NO. OF TIMES PROGRAM ACCREDITE
1	Mechanical Engineering	UG	2001 / --	40	Yes	2023	30	2023	F.No.South-West/1-36445304927/2023/EOA	Granted accreditation for 3 years for the period (specify period)	2020	2026	2

Sanctioned Intake for Last Five Years for the Mechanical Engineering

Academic Year	Sanctioned Intake
2025-26	30
2024-25	30
2023-24	30
2022-23	60
2021-22	120
2020-21	120

List of the Allied Departments/Cluster and Programs:

SR.NO.	ALLIED DEPARTMENT NAME	PROGRAM NAME	PROGRAM APPLIED LEVEL	YEAR OF START / YEAR OF CLOSED	SANCTIONED INTAKE	INCREASE/DECREASE INTAKE (if any)	YEAR OF INCREASE/DECREASE	CURRENT INTAKE	YEAR OF AICTE APPROVAL	AICTE/COMPETENT AUTHORITY ARROVAL DETAILS	ACCREDITATION STATUS	FROM	TC
1	Automobile Engineering	Automobile Engineering	UG	2004 / --	60	Yes	2023	30	2023	F.No.South-West/1-36445304927/2023/EOA	Applying first time	--	--

Sanctioned Intake for Last Five Years for the Automobile Engineering

Academic Year	Sanctioned Intake
2025-26	30
2024-25	30
2023-24	30
2022-23	60
2021-22	60
2020-21	60

B2. Detail of Head of the Department for the program under consideration:

A. Name of the HoD :	Dr. Vidya Chandran
B. Nature of appointment:	Regular
C. Qualification:	MS and PhD

B3. Program Details

Table No.B3.1: Admission details for the program excluding those admitted through multiple entry and exit points.

Item (Information to be provided cumulatively for all the shifts with explicit headings, wherever applicable)	2025-26 (CAY)	2024-25 (CAYm1)	2023-24 (CAYm2)	2022-23 (CAYm3)	2021-22 (CAYm4)	2020-21 (CAYm5)	2019-20 (CAYm6)
N=Sanctioned intake of the program (as per AICTE /Competent authority)	30	30	30	60	120	120	120
N1=Total no. of students admitted in the 1st year minus the no. of students, who migrated to other programs/ institutions plus no. of students, who migrated to this program	30	30	19	23	49	64	51
N2=Number of students admitted in 2nd year in the same batch via lateral entry including leftover seats	0	2	5	6	2	10	5
N3=Separate division if any	0	0	0	0	0	0	0
N4=Total no. of students admitted in the 1st year via all supernumerary quotas	0	2	0	0	0	0	0
Total number of students admitted in the program (N1 + N2 + N3 + N4) - excluding those admitted through multiple entry and exit points.	30	34	24	29	51	74	56

CAY= Current Academic Year. CAYm1= Current Academic Year Minus 1 CAYm2= Current Academic Year Minus 2. LYG= Last Year Graduate. LYGm1= Last Year Graduate Minus 1. LYGm2= Last Year Graduate Minus 2.

B4. Enrolment Ratio in the First Year

Table No. B4.1: Student enrolment ratio in the 1st year.

Year of entry	N (From Table 4.1)	N1 (From Table 4.1)	N4 (From Table 4.1)	Enrollment Ratio [(N1/N)*100]
2025-26 (CAY)	30	30	0	100.00
2024-25 (CAYm1)	30	30	2	106.67
2023-24 (CAYm2)	30	19	0	63.33

Average [(ER1 + ER2 + ER3) / 3] = 90.00≅ 20.00

B5. Success Rate of the Students in the Stipulated Period of the Program

Table No.B5.1: The success rate in the stipulated period of a program.

Item	(2021-22) LYG	(2020-21) LYGm1	(2019-20) LYGm2
A*= (No. of students admitted in the 1st year of that batch and those actually admitted in the 2nd year via lateral entry, plus the number of students admitted through multiple entry (if any) and separate division if applicable, minus the number of students who exited through multiple entry (if any).	122.00	130.00	125.00
B=No. of students who graduated from the program in the stipulated course duration	48.00	71.00	56.00
Success Rate (SR)= (B/A) * 100	39.34	54.62	44.80

Average SR of three batches ((SR_1+ SR_2+ SR_3)/3): 46.25

B6. Academic Performance of the First-Year Students of the Program

Table No.B6.1: Academic Performance of the First-Year Students of the Program.

Academic Performance	CAYm1 (2024-25)	CAYm2(2023-24)	CAYm3 (2022-23)
Mean of CGPA or mean percentage of all successful students(X)	5.25	3.96	6.29
Y=Total no. of successful students	32.00	19.00	23.00
Z=Total no. of students appeared in the examination	32.00	19.00	23.00

API [X*(Y/Z)]	5.25	3.96	6.29
---------------	------	------	------

Average API [(AP1+AP2+AP3)/3] : 5.17

B7: Academic Performance of the Second Year Students of the Program

Table No.B7.1: Academic Performance of the Second Year Students of the Program.

Academic Performance	CAYm1 (2024-25)	CAYm2 (2023-24)	CAYm3 (2022-23)
X=(Mean of 2nd year grade point average of all successful students on a 10-point scale) or (Mean of the percentage of marks of all successful students in 2rd year/10)	3.44	5.22	5.28
Y=Total no. of successful students	24.00	30.00	48.00
Z=Total no. of students appeared in the examination	24.00	29.00	51.00
API [X * (Y/Z)]	3.44	5.40	4.97

Average API [(AP1 + AP2 + AP3)/3] : 4.60

B8. Academic Performance of the Third Year Students of the Program

Table No.B8.1: Academic Performance of the Third Year Students of the Program

Academic Performance	CAYm1 (2024-25)	CAYm2 (2023-24)	CAYm3 (2022-23)
X=(Mean of 3rd year grade point average of all successful students on a 10-point scale) or (Mean of the percentage of marks of all successful students in 3rd year/10)	6.33	5.65	6.48
Y=Total no. of successful students	30.00	48.00	72.00
Z=Total no. of students appeared in the examination	30.00	48.00	74.00
API [X*(Y/Z)]:	6.33	5.65	6.30

Average API [(AP1 + AP2 + AP3)/3] : 6.09

B9. Placement, Higher Studies, and Entrepreneurship

Table No.B9.1: Placement, higher studies, and entrepreneurship details.

Item	LYG (2021-22)	LYGm1(2020-21)	LYGm2(2019-20)
FS*=Total no. of final year students	122.00	130.00	125.00
X=No. of students placed	27.00	41.00	43.00
Y=No. of students admitted to higher studies	8.00	8.00	6.00
Z= No. of students taking up entrepreneurship	0.00	1.00	1.00
Placement Index(P) = $((X + Y + Z)/FS) * 100$:	28.69	38.46	40.00

Average Placement Index = (P_1 + P_2 + P_3)/3: 35.72 Placement Index Points:

PART C: Faculty Details in Department and Allied Departments**(Data to be filled in for the Department and Allied Departments)****C1. Faculty details of Department and Allied Departments**

Table No.C1: Faculty details in the Department for the past 3 years including CAY

Sr.No	Name of the Faculty	PAN No.	Highest degree	University	Area of Specialization	Date of Joining in this Institution	Experience in years in current institute	Designation at Time Joining in this Institution	Present Designation	The date on which Designated as Professor/ Associate Professor if any	Nature of Association (Regular/ Contract/ Ad hoc)	Currently Associated (Y/N)	In case of NO, Date of Leaving	IS HOD?
1	Dr. Mahesa Rengaraj R	XXXXXXXX06A	M.E. and Ph.D.	Cochin University of Science and Technology	Safety Engineering	08/01/2008	18	Assistant Professor	Professor	01/08/2017	Regular	Yes		No
2	Mr. Francis Thomas	XXXXXXXX46N	M.Tech	Cochin University of Science and Technology	Production Engineering	01/08/2007	18.5	Lecturer	Assistant Professor		Contractual Fulltime	Yes		No
3	Mr. Deepak Xavier	XXXXXXXX51H	M.Tech	University of Calicut	Energy Systems Analysis and Design	06/01/2025	1	Assistant Professor	Assistant Professor		Regular	Yes		No
4	Dr. Gibin George	XXXXXXXX02G	M.Tech and Ph.D.	National Institute of Technology Karnataka	Metallurgical and Materials Engineering	01/02/2021	4.11	Assistant Professor	Associate Professor	01/08/2023	Regular	Yes		No
5	Dr. Raghav G R	XXXXXXXX88J	M.E. and Ph.D.	Anna University, Chennai	Metallurgy and Materials Engineering	01/02/2021	4.11	Associate Professor	Associate Professor	01/02/2021	Regular	Yes		No
6	Mr. Ajith Kumar R	XXXXXXXX17M	M.Tech	University of Kerala	Thermal Science	18/07/2016	9.6	Assistant Professor	Assistant Professor		Regular	Yes		No
7	Dr. Jose Sheril Dcotha	XXXXXXXX34E	M.Tech and Ph.D.	APJ Abdul Kalam Technological University Kerala	Renewable Energy	13/10/2008	17.3	Lecturer	Assistant Professor		Regular	Yes		No
8	Dr. Vidya Chandran	XXXXXXXX23F	MS and PhD	Karunya Institute of Technology and Sciences	Computational Fluid Dynamics	09/11/2011	14.2	Assistant Professor	Associate Professor	01/10/2020	Regular	Yes		Yes
9	Mr Dinil Babu C	XXXXXXXX31P	M.Tech	Mahatma Gandhi University, Kerala	Machine Design	01/02/2024	1.11	Assistant Professor	Assistant Professor		Regular	Yes		No
10	Mr. Suraj R	XXXXXXXX78B	M.E.	Anna University, Chennai	Manufacturing Engineering	01/08/2019	6.5	Assistant Professor	Assistant Professor		Regular	Yes		No

11	Mr. Vishnu.H.	XXXXXXXX74E	M.Tech	Mahatma Gandhi University, Kerala	Machine Design	03/12/2012	13.1	Assistant Professor	Assistant Professor		Regular	Yes		No
12	Mr. Noel Joseph Gomez	XXXXXXXX86L	M.Tech	University of Kerala	Propulsion Engineering	13/08/2012	13.5	Assistant Professor	Assistant Professor		Regular	Yes		No
13	Dr. Anjana Viswanath	XXXXXXXX84M	M.Tech and Ph.D.	National Institute of Technology Calicut	Industrial Engineering	01/08/2019	6.5	Assistant Professor	Associate Professor	01/09/2023	Regular	Yes		No
14	Mr. Nikhil Asok N	XXXXXXXX88M	M.Tech	University of Kerala	Machine Design	27/12/2010	15.1	Assistant Professor	Assistant Professor		Regular	Yes		No
15	Mr. Rakesh A	XXXXXXXX91Q	M.E.	Anna University, Coimbatore	Mechatronics	13/06/2011	14.7	Assistant Professor	Assistant Professor		Regular	Yes		No
16	Mr. Sujith R	XXXXXXXX23J	M.Tech	National Institute of Technology Calicut	Manufacturing Technology	10/06/2013	11.6	Assistant Professor	Assistant Professor		Regular	No	18/12/2024	No
17	Mr. Dhanesh S	XXXXXXXX33L	M.E.	Anna University, Chennai	Engineering Design	08/10/2018	6.2	Assistant Professor	Assistant Professor		Regular	No	18/12/2024	No
18	Mr. Sanju A C	XXXXXXXX90M	M.E.	Karunya University	Automobile Engineering	02/06/2014	11	Assistant Professor	Assistant Professor		Regular	No	04/06/2025	No
19	Mr. Anup Kumar T M	XXXXXXXX56Q	M.Tech	University of Calicut	Production Engineering	09/08/2018	6.9	Assistant Professor	Assistant Professor		Regular	No	23/05/2025	No
20	Dr. Rag R.L	XXXXXXXX13M	M.Tech and Ph.D.	National Institute of Technology Calicut	Computational heat transfer	15/03/2021	3.4	Professor	Professor		Regular	No	18/07/2024	No
21	Dr. Sam Joshy	XXXXXXXX47L	M.Tech and Ph.D.	APJ Abdul Kalam Technological University Kerala	Mechanical Engineering	01/08/2011	12.9	Assistant Professor	Associate Professor	22/01/2021	Regular	No	27/05/2024	No
22	Mr. Anoob Jose	XXXXXXXX24G	M.Tech	University of Calicut	Machine Design	06/01/2025	1	Assistant Professor	Assistant Professor		Regular	Yes		No

Table No.C2: Faculty details of Allied Departments for the past 3 years including CAY.

Sr.No	Name of the Faculty	PAN No.	APAAR faculty ID*(if any)	Highest degree	University	Area of Specialization	Date of Joining in this Institution	Experience in years in current institute	Designation at Time Joining in this Institution	Present Designation	The date on which Designated as Professor/ Associate Professor if any	Nature of Association (Regular/ Contract/ Ad hoc)	Currently Associated (Y/N)	In case of NO, Date of Leaving	IS HOD?
1	Dr. Jenson Joseph E	XXXXXXXX96R	XXXXXXXXXX352	M.E. and Ph.D.	National Institute of Technology Tiruchirappalli	Mechanical Engineering	01/08/2011	14.5	Assistant Professor	Professor	20/01/2022	Regular	Yes		No
2	Dr. Manoj Kumar B.	XXXXXXXX28P	XXXXXXXXXX635	M.E. and Ph.D.	Karpagam University, Coimbatore	Industrial Engineering	12/04/2007	18.9	Assistant Professor	Associate Professor	01/10/2018	Regular	Yes		No
3	Dr. Jayadevan P C	XXXXXXXX86Q	XXXXXXXXXX696	M.Tech and Ph.D.	APJ Abdul Kalam Technological University	Mechanical Engineering	26/04/2021	4.8	Assistant Professor	Associate Professor	01/08/2023	Regular	Yes		No
4	Mr. Vipin Raj P.G.	XXXXXXXX56M	XXXXXXXXXX630	M.E.	Anna University, Chennai	Industrial Engineering	16/06/2008	17.7	Assistant Professor	Assistant Professor		Regular	Yes		Yes
5	Mr. Sujay K	XXXXXXXX82F	XXXXXXXXXX355	M.E.	Anna University, Chennai	Industrial Engineering	23/07/2012	13.5	Assistant Professor	Assistant Professor		Regular	Yes		No
6	Mr. Koshy P Joseph	XXXXXXXX92A	XXXXXXXXXX114	MS	Lawrence Technological University, USA	Automotive Engineering	10/06/2013	12.7	Assistant Professor	Assistant Professor		Regular	Yes		No
7	Mr. Anoop M S	XXXXXXXX58R	XXXXXXXXXX294	M.Tech	Amity University Noida	Automobile Engineering	01/08/2019	6.5	Assistant Professor	Assistant Professor		Regular	Yes		No
8	Mr. Aravind P V	XXXXXXXX50J	XXXXXXXXXX152	M.Tech	Mahatma Gandhi University, Kerala	Industrial Engineering	11/01/2010	16	Assistant Professor	Assistant Professor		Regular	Yes		No
9	Mr. Amal P Dev	XXXXXXXX74K	XXXXXXXXXX128	M.Tech	Mahatma Gandhi University, Kerala	Computer Integrated Manufacturing	01/04/2019	6.9	Assistant Professor	Assistant Professor		Regular	Yes		No
10	Dr. Gulsavin Guruprasad Engoor	XXXXXXXX89A	XXXXXXXXXX794	M.Tech and Ph.D.	National Institute of Technology Tiruchirappalli	Solar Energy	01/07/2025	0.6	Assistant Professor	Assistant Professor		Regular	Yes		No
11	Dr. S R Akhil Krishnan	XXXXXXXX90E	XXXXXXXXXX981	M.Tech and Ph.D.	National Institute of Technology Tiruchirappalli	Mechanical Engineering	06/01/2025	1	Assistant Professor	Assistant Professor		Regular	Yes		No

12	Mr. Mobin C M	XXXXXXXX36A	XXXXXXXX160	M.E.	Vinayaka Missions University, Salem	Automobile Engineering	01/02/2024	1.11	Assistant Professor	Assistant Professor		Regular	Yes		No
13	Dr. Albin Joseph	XXXXXXXX01A	NA	M.Tech and Ph.D.	National Institute of Technology Calicut	Mechanical Engineering	01/11/2021	2.10	Assistant Professor	Assistant Professor		Regular	No	25/09/2024	No
14	Mr. Manu Antony	XXXXXXXX38A	NA	M.Tech	VIT University, Vellore	Manufacturing Engineering	16/11/2020	3.7	Assistant Professor	Assistant Professor		Regular	No	12/07/2024	No

C2. Student-Faculty Ratio (SFR)

No. of UG(Engineering) programs in Department including allied departments/ clusters (UGn):

UG1=1st UG program

UGn=nth UG program

B= No. of Students in UG 2nd year (ST)

C= No. of Students in UG 3rd year (ST)

D= No. of Students in UG 4th year (ST)

No. of PG (Engineering) programs in Department including allied departments/ clusters (PGm):

PG1=1st PG program.

PGm=mth PG program

A= No. of Students in PG 1st year

B= No. of Students in PG 2nd year

Student Faculty Ratio (**SFR**) = S/F

S= No. of students of all programs in the Department including all students of allied departments/clusters.

No. of students (ST)=Sanctioned Intake (SA)+ Actual admitted students via lateral entry including leftover seats (L) if any (limited to 10 % of SA)

Students who admitted under supernumerary quotas (SNQ, EWS, etc) will not be considered in calculating SFR value. Those students are exempted.

F=Total no. of regular or contractual faculty members (Full Time) in the Department, including allied departments/clusters (excluding first year faculty (The faculty members who have a 100% teaching load in the first-year courses)).

No. of UG Programs in the Department1 No. of PG Programs in the Department1

Table No.C2.1: Student-faculty ratio.

Description	CAY(2025-26)	CAYm1 (2024-25)	CAYm2 (2023-24)
UG1.B	32	33	66
UG1.C	33	66	123
UG1.D	66	123	128
UG1: Mechanical Engineering	131	222	317
UG2.B	32	33	63
UG2.C	33	63	61
UG2.D	63	61	62
UG2: Automobile Engineering	128	157	186
PG1.A	0	12	12
PG1.B	12	12	18
PG1: Production and Industrial Engineering	12	24	30
DS=Total no. of students in all UG and PG programs in the Department	143	246	347

Description	CAY(2025-26)	CAYm1 (2024-25)	CAYm2 (2023-24)
AS=Total no. of students of all UG and PG programs in allied departments	128	157	186
S=Total no. of students in the Department (DS) and allied departments (AS)	S1= 271	S2= 403	S3= 533
DF=Total no. of faculty members in the Department	16	16	19
AF= Total no. of faculty members in the allied Departments	12	10	11
F=Total no. of faculty members in the Department (DF) and allied Departments (AF)	F1= 28	F2= 26	F3= 30
FF=The faculty members in F who have a 100% teaching load in the first-year courses	0	0	0
Student Faculty Ratio (SFR)=S/(F-FF)	SFR1= 9.68	SFR2= 15.50	SFR3= 17.77
Average SFR for 3 years	SFR= 14.32		

C3. Faculty Qualification

- Faculty qualification index (FQI) = $2.5 * [(10X + 4Y)/RF]$ where
- X=No. of faculty members with Ph.D. degree or equivalent as per AICTE/UGC norms.
- Y=No. of faculty members with M. Tech. or ME degree or equivalent as per AICTE/ UGC norms.
- RF=No. of required faculty in the Department including allied Departments to adhere to the 20:1 Student-Faculty ratio, with calculations based on both student numbers and faculty requirements as per section C2 of this documents: (RF=S/20).

Table No.C3.1: Faculty qualification.

Year	X	Y	RF	FQ = 2.5 x [(10X + 4Y) / RF]
2025-26(CAY)	10	18	13.00	33.08
2024-25(CAYm1)	8	18	20.00	19.00
2023-24(CAYm2)	11	19	26.00	17.88

C4. Faculty Cadre Proportion

- Faculty Cadre Proportion is 1(RF1): 2(RF2): 6(RF3)
- RF1= No. of Professors required = $1/9 * \text{No. of Faculty required to comply with 20:1 Student-Faculty ratio based on no. of students (S) as per C2 of this documents.}$
- RF2= No. of Associate Professors required = $2/9 * \text{No. of Faculty required to comply with 20:1 Student-Faculty ratio based on no. of students (S) as per section C2 of this documents.}$
- RF3= No. of Assistant Professors required = $6/9 * \text{No. of Faculty required to comply with 20:1 Student-Faculty ratio based on no. of students (S) as per section C2 of this documents.}$
- Faculty cadre and qualification and experience should be as per AICTE/UGC norms.

Table No.C4.1: Faculty cadre proportion details.

Year	Professors		Associate Professors		Assistant Professors	
	Required RF1	Available AF1	Required RF2	Available AF1	Required RF3	Available AF3
2025-26	1.00	2.00	3.00	6.00	9.00	19.00
2024-25	2.00	2.00	4.00	6.00	13.00	17.00
2023-24	2.00	3.00	5.00	6.00	17.00	20.00
Average	RF1=1.67	AF1=2.33	RF2=4.00	AF2=6.00	RF2=13.00	AF2=18.67

C5. Visiting/Adjunct Faculty/Professor of Practice

Table No. C5.1: List of visiting/adjunct faculty/professor of practice and their teaching and practical loads.

(CAYm1)

S.No	Name of the Person	Designation	Organization	Name of the Course	No. of hours handled
1	Mr. Dinish Kumar M	adjunct faculty	SSET	Mechatronics	45.00

(CAYm2)

S.No	Name of the Person	Designation	Organization	Name of the Course	No. of hours handled
1	Mr. Dinish Kumar M	adjunct faculty	SSET	Mechatronics	45.00

(CAYm3)

S.No	Name of the Person	Designation	Organization	Name of the Course	No. of hours handled
1	Mr. Dinish Kumar M	adjunct faculty	SSET	Mechatronics	45.00

C6. Academic Research

Table No. C6.1: Faculty publication details.

S.No.	Item	2024-25 (CAYm1)	2023-24 (CAYm2)	2022-23 (CAYm3)
1	No. of peer reviewed journal papers published	5	8	5
2	No. of peer reviewed conference papers published	1	1	2
3	No. of books/book chapters published	2	2	5

C7. Sponsored Research Project

Table No. C7.1: List of sponsored research projects received from external agencies.

(CAYm1)

PI Name	Co-PI names if any	Name of the Dept., where project is sanctioned	Project Title*	Name of the Funding agency	Duration of the project	Amount(Lacs) i.e. 15,25,000=15.25
Dr. Vidya Chandran	Mr. Nikhil Ashok N	Mechanical Engineering	Integration of Micro Wind Turbines on electric vehicles as range extenders	APJ Abdul Kalam Technological University	one year	0.36
						Amount received (Rs.):0.36

(CAYm2)

PI Name	Co-PI names if any	Name of the Dept., where project is sanctioned	Project Title*	Name of the Funding agency	Duration of the project	Amount(Lacs) i.e. 15,25,000=15.25
Dr. Gibin George	Nil	Mechanical Engineering	Fabrication of Electrolysis chamber for water splitting using surface modified stainless steel mesh	The Agency for New and Renewable Energy Research and Technology (ANERT)	9 months	0.55
						Amount received (Rs.):0.55

(CAYm3)

PI Name	Co-PI names if any	Name of the Dept., where project is sanctioned	Project Title*	Name of the Funding agency	Duration of the project	Amount(Lacs) i.e. 15,25,000=15.25
Dr. Gibin George	Mr Vishnu H	Mechanical Engineering	Biodegradable packing peanuts based on banana leaf ribs	APJ Abdul Kalam Technological University	one year	0.18
Dr. Gibin George	Nil	Mechanical Engineering	Development of eco friendly packaging materials from agricultural wastes	CERD, APJ Abdul Kalam Technolog	one year	0.70
						Amount received (Rs.):0.88

Total Amount (Lacs) Received for the Past 3 Years: 1.79

Note*:

- Only sponsored research projects will be considered. Infrastructure-based projects will not be considered here.

C8. Consultancy Work

Table No. C8.1: List of consultancy projects received from external agencies.

(CAYm1)

PI Name	Co-PI names if any	Name of the Dept., where project is sanctioned	Project Title*	Name of the Funding agency	Duration of the project	Amount(Lacs) i.e. 15,25,000=15.25
Mr. Adarsakumar G Nair	Mr. Mobin C M	Mechanical Engineering	Surakshit Marg	Internationale Zusammenarbeit (GIZ) GmbH	1.5years	11.90
Mr. Adarsakumar G Nair	Mr. Nikhil Ashok N	Mechanical Engineering	Surakshit Marg	K P Paul Foundation	1 year	43.26
						Amount received (Rs.):55.16

(CAYm2)

(CAYm3)

Total amount (Lacs) received for the past 3 years: 55.16

Note*:

- Only consultancy projects will be considered. Infrastructure-based projects will not be considered here.

C9. Institution Seed Money or Internal Research Grant to its Faculty for Research Work

Table No. C9.1: List of faculty members received seed money or internal research grant from the Institution.

(CAYm1)

(CAYm2)

Faculty name	Project title/ Support for Activity	Duration of the project	Amount(Lacs) i.e. 15,25,000=15.25	Amount Utilized(Lacs) i.e. 15,25,000=15.25	Outcomes of the project
Dr. Raghav G R	Rain Water Storage Cum Interlocking Brick	6 months	0.10	0.10	Patent granted
			Amount received (Rs.): 0.10		

(CAYm3)

Total amount (Lacs) received for the past 3 years : 0.10

PART D: Laboratory Infrastructure in the Department

(Data to be filled in for the Department)

D1. Adequate and Well-Equipped Laboratories, and Technical Manpower

Table No.D1.1: List of laboratories and technical manpower.

Sr. No	Name of the Laboratory	Number of students per set up(Batch Size)	Name of the Important Equipment	Weekly utilization status(all the courses for which the lab is utilized)	Technical Manpower Support		
					Name of the Technical staff	Designation	Qualification
1	Basic Workshop - Mechanical	30	Carpentry: Standard wood working tools (Jack plane, Various chisels and saws) Circular saw and	15 Hours	Mr. Arun M. N./ Mr. V. T.	Lab Instructor / Senior	Diploma in Mechanical E
2	Hydraulics Machines Laboratory	30	Pelton, Francis turbines and all types of pumps, Mono block centrifugal pump set (1HP), Centrifugal pump set (4HP) (Open), Micro loco (ging line)	15 hours	Mr. P. T. Joy	Assistant Work Shop Su	B.Tech in Mechanical E
3	Thermal Engineering Lab	30	Four-cylinder Petrol Engine, Twin Cylinder Diesel Engine, Constant and Variable Speed Diesel Engine, Variable Compression Ratio Petrol Engine	15 Hours	Mr. Rajesh K. B.	Deputy Work Shop Super	B.Tech in Mechanical E
4	Computer Aided Design and Analysis Lab	30	Intel Core i7 processor (Server), 18.5" LCD Monitor, Windows 7, INTEL Core i3 processor (35 client machines) 15" LCD Monitor, Windows 7, 4 GB	20 hours	Mr. R. Premanand	CAD/CAM Instructor	Diploma in Mechanical E
5	Manufacturing Technology Lab	30	CNC-turning machine, Vertical Machining Centre, Lathe, Shaper, Slotting machine, Radial drilling machine, Milling machine, Tool and Cutter grinder	18 hours	Mr. C. K. Jayachandran	Work Shop Foreman	Diploma In Mechanical E
6	Mechanical Engineering Lab	30	Refrigeration Test Rig, Air Conditioning Test Rig, Heat Exchanger, Natural Convection Apparatus, Fluid Computer Apparatus, Liquid Pipe	12 hours	Mr. K. K. Gopalakrishna	Work Shop Superintend	B. Tech in Mechanical E
7	Automobile Workshop	30	Wheel Alignment Machine Horizontal Line Boring Machine Vertical Line Boring Machine KTS 590 –	20 hours	Mr. Joyal John / Mr. Pra	Lab Instructor/ Lab Instr	Diploma in Automobile E
8	Tool maker's microscope	15	Metzer optical instruments	15 Hours	Mr. K. K. Gopalakrishna	Work Shop Superintend	B. Tech in Mechanical E

D2. Safety Measures in Laboratories

Table No. D2.1: List of various safety measures in laboratories.

Sr. No	Laboratory Name	Safety Measures
1	Basic Workshop - Mechanical	1. Dry Powder (CO2) Fire Extinguisher. 2. Safety shields and gloves for the operators of any hazardous equipment like Arc Welding equipment. 3. Safety instructions display board. 4. Separate uniform for workshop. 5. First Aid Kit. 6. Students are given proper instructions to avoid any critical mistakes. 7. Fire drills are conducted every academic year. 8. Proper instructions on using safety equipment, like fire extinguishers, are given to students. 9. Awareness on proper usage of first aid kits is made among the students. 10. Periodic inspection and maintenance of all equipment is done by technical staff and lab instructors as a precautionary measure.
2	Fluid Mechanics and Machines Lab	1. Dry Powder (CO2) Fire Extinguisher. 2. Safety instructions display board. 3. Separate uniform code for workshop. 4. Separate electrical control for each apparatus. 5. Students are given proper instructions to avoid any critical mistakes. 6. Fire drills are conducted every academic year. 7. Proper instructions on using safety equipment, like fire extinguishers, are given to students. 8. Awareness on proper usage of first aid kits is made among the students. 9. Periodic inspection and maintenance of all equipment is done by technical staff and lab instructors. 10. First Aid Kit.

3	Thermal Engineering Lab	1. Dry Powder (CO2) Fire Extinguisher 2. Safety instructions display board. 3. Separate uniform code for workshop. 4. Students are given proper instructions to avoid any critical mistakes. 5. Fire drills are conducted every academic year. 6. Proper instructions on using safety equipment, like fire extinguishers, are given to students. 7. Periodic inspection and maintenance of all equipment is done by technical staff and lab instructors. 8. Awareness on proper usage of first aid kits is made among the students 9. First Aid Kit.
4	Computer Aided Design and Analysis Lab	1. Periodic inspection and maintenance of all systems is done. 2. Convenient placement of Switchboards, MCBs, Plug points to avoid any injuries from electric shock
5	Manufacturing Technology Lab	1. Dry Powder (CO2) Fire Extinguisher 2. Safety instructions display board. 3. Separate uniform code for workshop. 4. Students are given proper instructions to avoid any critical mistakes. 5. Fire drills are conducted every academic year. 6. Proper instructions on using safety equipment, like fire extinguishers, are given to students. 7. Awareness on proper usage of first aid kits is made among the students. 8. Periodic inspection and maintenance of all equipment is done by technical staff and lab instructors. 9. First Aid Kit.
6	Mechanical Engineering Lab	1. Dry Powder (CO2) Fire Extinguisher 2. Safety instructions display board. 3. Separate uniform code for workshop. 4. Students are given proper instructions to avoid any critical mistakes. 5. Fire drills are conducted every academic year. 6. Proper instructions on using safety equipment, like fire extinguishers, are given to students. 7. Periodic inspection and maintenance of all equipment is done by technical staff and lab instructors. 8. Awareness on proper usage of first aid kits is made among the students. 9. First Aid Kit.
7	Automobile Workshop	1. Dry Powder (CO2) Fire Extinguisher 2. Safety instructions display board. 3. Separate uniform code for workshop. 4. Students are given proper instructions to avoid any critical mistakes. 5. Proper instructions on using safety equipment, like fire extinguishers, are given to students. 6. Periodic inspection and maintenance of all equipment is done by technical staff and lab instructors. 7. Awareness on proper usage of first aid kits is made among the students. 8. First Aid Kit.

D3. Project Laboratory/Research Laboratory

PART E: First Year faculty and financial Resources
(Data to be filled in for the first year course faculty and budget allocation and utilization)

E1. First Year Student-Faculty Ratio (FYSFR)

Table No. E1.1: FYSFR details.

Year	Sanctioned intake of all UG programs (S4)	No. of required faculty (RF4= S4/20)	No. of faculty members in Basic Science Courses & Humanities and Social Sciences including Management courses (NS1)	No. of faculty members in Engineering Science Courses (NS2)	Percentage= No. of faculty members $\frac{((NS1*0.8) + (NS2*0.2))}{(\text{No. of required faculty (RF4)})}$; Percentage= $\frac{((NS1*0.8) + (NS2*0.2))}{RF}$
2023-24(CAYm2)	570	28	14	52	77
2024-25(CAYm1)	570	28	14	58	81
2025-26(CAY)	600	30	15	59	79

E2. Budget Allocation, Utilization, and Public Accounting at Institute Level

Table No. E2.1: Budget and actual expenditure incurred at Institute level.

Items	Budgeted in 2025-26	Actual Expenses in 2025-26 till	Budgeted in 2024-25	Actual Expenses in 2024-25 till	Budgeted in 2023-24	Actual Expenses in 2023-24 till	Budgeted in 2022-23	Actual Expenses in 2022-23 till

Infrastructure Built-Up	43531343	16602475	11875000	11615668	10393000	10639088	4360000	5801990
Library	2710000	147946	3210000	2336254	2725000	2624541	935000	1131131
Laboratory equipment	950000	365959	1100000	1129983	1090000	1227505	645000	621098
Teaching and non-teaching staff salary	111000000	55537479	104335000	108037032	101235000	105766932	103300000	102334817
Outreach Programs	2835000	1508343	2330000	2214708	2325000	2344399	0	0
R&D	2500000	0	1200000	1102538	1500000	1186462	2500000	3551945
Training, Placement and Industry linkage	3000000	1129768	3870000	4131963	2750000	2639251	750000	1406579
SDGs	0	0	0	0	0	0	0	0
Entrepreneurship	3500000	2956793	3000000	3377622	1500000	1384584	1000000	1008780
Others, specify	122280000	45169816	110960000	116945808	101607000	103135834	101635000	91747357
Total	292306343	123418579	241880000	250891576	225125000	230948596	215125000	207603697

E3. Budget Allocation, Utilization, and Public Accounting at Program Specific Level

Table No. E3.1: Budget and actual expenditure incurred at program level.

Items	Budgeted in 2025-26	Actual Expenses in 2025-26 till	Budgeted in 2024-25	Actual Expenses in 2024-25 till	Budgeted in 2023-24	Actual Expenses in 2023-24 till	Budgeted in 2022-23	Actual Expenses in 2022-23 till
Laboratory equipment	200000	0	1500000	57500	550000	575528	255000	276887
Software	0	0	0	0	0	0	0	0
SDGs	60000	42723	60000	71577	60000	46196	60000	14000
Support for faculty development	210000	199742	60000	166271	120000	283005	165000	0
R & D	400000	340000	20000	12000	0	140000	0	65000
Industrial Training, Industry expert, Internship	30000	3430	15000	0	50000	0	25000	0
Miscellaneous Expenses*	200000	66156	150000	186248	100000	90654	100000	145115
Total	1100000	652051	1805000	493596	880000	1135383	605000	501002