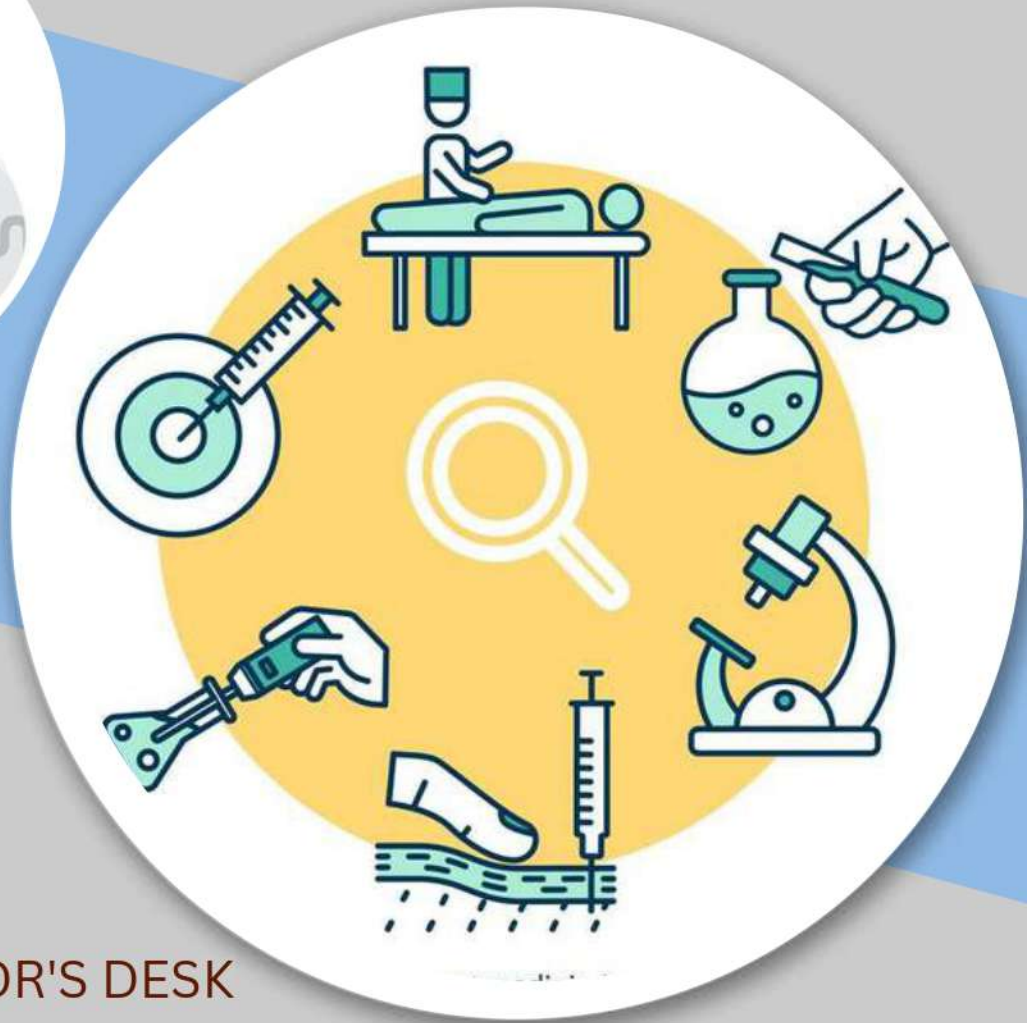




THE BIOTECH TIMES

DEPARTMENT OF BIOTECHNOLOGY
ADHIYAMAAN COLLEGE OF ENGINEERING
(AUTONOMOUS)

Vol -III, issue- 1, 2023
FOR INTERNAL CIRCULATION



MESSAGE FROM EDITOR'S DESK

Dear Readers,

Greetings to all, You have in your hand “The Biotech Times”, official newsletter from the Department of Biotechnology, Adhiyamaan College of Engineering. We capture the cherished moments of Our journey.

“Educating the mind without educating the heart is no education at all”.

A review of the events and the academic activities that took place in the academic year 2022-23 will be included in the following issue. In this issue, you will perceive internship, workshop, Achievements and Department activities.

EVENTS ORGANIZED BY THE DEPARTMENT

- 55th Engineers Day Celebration in Occasion of 162 Birthday of Sir.M.Visvesvaraya organized by Department of Biotechnology in association with IEI Students Chapter on Sept 15, 2022.



- 34 National convention of Agricultural Engineering and National Seminar on Utilization of Modern Technologies in Agricultural Engineering for Sustainable Agricultural Production organized by the department in association with IEI Students Chapter (Hosur Local Centre) on Sept 16 & 17, 2022 .

- Annual alumni meet 2022: department have organized ALUMINI MEET on may 19th 2022. alumni 's were participated in the various events organized by the alumni association. Students of the department were interacted with them and alumni's shared their views and gave motivational talks that made alumni meet 2022 a grand success



- The pledge against drug abuse led by Hon'ble Chief Minister Of Tamil Nadu has taken by 2600 students of our College on 11th August 2022.

- On the occasion of **NATIONAL VACCINATION DAY** on 16th March 2022, Prof. Dr.K.Suresh, Department of Biotechnology, MGR College, Hosur, Krishnagiri (Dt), Tamil Nadu, started his presentation with the importance of vaccination and how it works. He elaborated the mechanism of vaccine in the human body based on its types. He also elaborated the topic of immunoglobulins and its types. He listed the types of vaccine based on their function, synthesis and working. He also explained the mode of action of vaccine and the commonly used routes for vaccine. Finally, he ended up with the covaxin production and how it works in the body.



- Our Department organized **"AWARENESS PROGRAM ON HEALTH BENEFITS OF MILLETS"** on 16th May 2022. Dr.G.Ranganath, Principal honoured the Chief guest Dr.Kadhar Vali, the legendary person Dr.Kadhar Vali. Explaining the importance of millets. The program was ended up with the National Anthem.

CONFERENCE ORGANIZE BY DEPARTMENT

Two days national conference on “ Futuristics Trends in Biotechnology And its Applications towards Biomedicine industries held was held at Adhiyamaan college of engineering, Hosur. Organized by the department of Biotechnology, Dr.V.Manivasagan Head of the Department welcomes the gathering and explained the progress made in Biotechnology. Principal Dr.G.Ranganath addressed importance of biotechnologist in the pandemic situation, He also appreciated the students for inovation and enterpreneuricial skills in the department. Chief guest Dr.Syed salman Lateef, Head laboratories, Wipro science lab ,Guest of honor, Mr.M.Jeyandran, Deputy Manager, Syngene International Ltd,Bengaluru , Invited speaker Dr.S.Jagannathan, Assiatant research Officer, Pasteur insistute of india ,Coonoor.

On second Day of National confrence Invitea Alumini Mrs. Divya Suriyaprakash, Manager, Antheme Bioscience Pvt Ltd., Bengaluru, Invited speaker,Dr .S.Renganathan, Professor, Center for Biotechnology, AnnaUniversity

More than 100 participants from various insistution presented their papers and Poster





BOOK CHAPTERS

Faculties of department of biotechnology Adhiyamaan college of Engineering, Hosur have published various research papers on 2023 “Futuristic Trends in Biotechnology And Its Applications Towards Biomedicine Industries” conference with ISBN/ISSN number published by department of Biotechnology ACE Hosur

PUBLICATIONS IN NATIONAL AND INTERNATIONAL JOURNALS

- Saranya K., Dhanachezhiyan, M., Gopinath, G., Mathan kumar, A. and Ramesh babu, N.G. (2019). "Study Of UV Mutated Protease Enzyme From Various Sources", International Research Journal Of Pharmacy, 5(5), 80-84.
- Ashok Kumar, S., Santhosh, J., Venkatesh, C., . Ramesh Babu, N. G., Saravanan N. and Parvathy, S. (2019). "Microbial conversion of cellulose into bioethanol", World journal of pharmaceutical research, 8(6), 733-753.
- Saranya, K., Manivasagan, V., kanakadurga, R., Mohan Babu, V.P. and Ramesh Babu, N.G. (2019). "A survey on anticancer properties of Indian medicinal palnts- A broad spectrum analysis", International journal of pharmaceutical sciences and research, 10(8), 3635-3640.
- Saranya, K., Manju, M., Ramya, S., Snehamercy, S., Vinodhini, A., Manivasagan, V. and Ramesh Babu, N.G. (2019). "Comparison of ex vivo and in vitro experimental analysis of succulent plants on the antioxidant and antimicrobial activity", International journal of agricultural sciences and veterinary medicine, 7(3), 22-30.
- Mahalakshmi, S., Sruthi, V.S., Ramesh babu, N.G., Sivaraj, C. and Arumugam, P. (2019). "Isolation and pharmacological activities of Curcumin from Curcuma longa L.", International Journal for Research in Applied Sciences and Biotechnology, 6(5), 7-17, <https://doi.org/10.31033/ijrasb.6.5.2>
- Preethi Krishna, M. T., Suriya Devi, A. U., Manivasagan, V., Saranya, K., Ramesh Babu, N. G. and Krishnaraj, M. (2019). "Studies On Antioxidant, Antimicrobial Properties And Factors Affecting The Extraction Of Nanoparticles From Withania somnifera" Indian Journal of Research in Pharmacy and Biotechnology (IJRPB), 7(5), 1-5. <https://doi.org/10.31426/ijrpb.2019.7.5.7511>
- Saranya, K., Bharath, V M K. Akshai kumar, PP., Logeshwaran, C., Manivasagan, V. and Ramesh Babu, N.G. (2019). "Evaluation of Radiation Absorbption Capacity of azadirachta indica", International Journal For Research in Applied Science & Technology (IJRASET), 7 (9) , 31-33
- Hari priya, MS., Tamill selvi, R., Priyadharshini, V., Manivasagan, V., Saranya, K. and Ramesh Babu, N.G. (2019). "Comparision of Nutritional Content of Commercial and Organic Food Product (Cereals and species) With Special Emphasis on UV Spectroscopic Method of Analysis", International Journal of Chemical Studies, 7(6), 1-5.
- Manivasagan, V., Bhavani, K., Indhumathi, V., Perundevi, S., Vinoja, B.N. and Ramesh Babu, N.G. (2019). "Investigation of Anti-Quorum Sensing and biofilm inhibition activities of medicinal plants against antibiotic resistant microbial biofilms", Global Journal of Bio-science and Biotechnology, 8(4), 318-326.
- Manivasagan, V., Divakar, J., Kamesh, R., Lal Krishna, U. and Ramesh Babu, N.G. (2019). "Identification, Production and Characterization of Nattokinase, Bacteriocin from bacterial species", Bacterial Empire, 2(4), 91-95.
- Saranya, K., Nikitha, R., Surya Priya, S., Kavya, R., Ramesh Babu, N.G. and Evanjelene V.K. (2019). "Green Synthesis Of Silver Nanoparticles From Solanum Muricatum Leaf Extracts And Its Antibacterial Activity", International Journal of Science and Nature, 10(4), 178-1183.

GEN-BANK SUBMISSION

- Ezhilkumar P, SivakumarV.M, Saranya K, Manivasagan V and Kavitha S, NCBI GenBank Accession number MN658860- Bacillus cereus CITO3 16S ribosomal RNA gene, partial sequence. Published on 17 Nov 2019.

PAPERS PRESENTE

- V.Manivasagan, K.Saranya, Booja Ruthra and T.V.Janani, "Optimization of microcarrier material for the production of biofertilizer using Azospirillum", Internatioanl Conferene on Recent Trends in Clean Technologies for Suatainble Environment" organized by SSN college of engineering,Chennai during 26-27 september 2019.
- V.Manivasagan, K.Saranya, S. Kavitha, P.Jayamurugan, and S.Jeevitha, "Optimization of Cultural Conditions and Production of Ethanol from Manihot esculenta Crantz YTP 1 Stem by Consolidated Bioprocessing through Synthetic Consortium", 34th Indian Engineering Congress, The Institution of Engineers (India) Hyderabad, during 27.12.2019 to 29.12.2019, Technical volume. pp 48-51, ISBN NO.:978-81-938404-9-8.

s.no	Name	Title of the paper	ISBN/ISSN number of the proceeding
1	Manivasagan.V, Saranya.K	Futuristic Trends in Biotechnology And Its Applications Towards Biomedicine Industries	978-93-5811- 097-5
2	Saranya K, Nancy Sylviya S Christina, Sharmila G	Cervical Cancer Due to P53 Gene Mutation Identified by in House PCR Assay	978-93-5811- 097-6
3	Nancy sylviya S Christina, Saravanan R, Sharmila G	An Epigenetic Study On Cervical Cancer Patients Of Salam District – DNA Methylation Assay	978-93-5811- 097-7

INTER COLLEGE EVENT STUDENT'S PARTICIPATED

S.No	Name of the program/ Title of the presentation	Professional Activities	Resource person	Date	Number of students Participated
1	Women's Day Celebration	The Institutions of Engineers (India)	Dr. T.Menakadevi Chairman, IE(I), HLC, Hosur.	01.03.2023 & 02.03.2023	55
2	Seminar on sustainability and global health biotechnology	Entrepreneurship Development Cell (EDC)	Dr.R. Madhu sudhan, Senior Principal Scientist, Syngene International LTD.,Bengaluru.	20.01.2023	45
3	Webinar on intellectual property rights (IPR) and patent, designs filling	Indian Society for Technical Education (ISTE)	Dr. S. Jaganathan, Research Officer, Pasteur Institute of India, Coonoor.	21.12.2022	46

4	Webinar on GATE preparation	Entrepreneurship Development Cell (EDC)	Ms. S.Nalani, M.Tech, IIT Delhi	14.11.2022	46
5	Isolation and Characterization of Value added product From Morinda Spp.	Entrepreneurship Development Cell (EDC)	Dr.K.Kshitish Acharya, IBAB, Bangalore.	18.10.2022	45
6	Celebration “National Students Day”	The Institutions of Engineers (India)	Dr.G. Ranganath Chairman-CATE, The Institutions of Engineers (India)	14.10.22 & 15.10.2022	
7	Research Aptitude	Indian Society for Technical Education (ISTE)	Dr.C. Sivapathasekaran, Scientist, Cytiva Lifescience, Bangalore.	20.09.2022	46
8	34th National convention of Agricultural Engineering and National Seminar on Utilization of Modern Technologies in Agricultural Engineering for Sustainable Agricultural Production	The Institutions of Engineers (India)	Dr.G. Ranganath Chairman-CATE, The Institutions of Engineers (India)	16.09.2022 & 17.09.2022	
9	55th Engineering Day Celebration	The Institutions of Engineers (India)	Mr. V. Arun, Research Analyst, Biosciences, Trivandrum, Kerala	15.09.2022	
10	One day seminar on IPR	Entrepreneurship Development Cell (EDC)	Ms. Sneha mercy, Biocon Pvt., LTD.,	22.8.2022	44
11	Seminar on “One day seminar on Rules to maintain animal model for research	Indian Society for Technical Education (ISTE)	Ms. Sneha mercy, Biocon Pvt., LTD.,	27.7.2022	43
12	Technology Beyond 2025	Entrepreneurship Development Cell (EDC)	Dr. S. Jaganathan, Research Officer, Pasteur Institute of India, Coonoor.	10.06.2022	45
13	One day seminar on entrepreneurship development	Indian Society for Technical Education (ISTE)	C. Saravana Kumar, EGES Enviro Solutions Pvt. Ltd, Kancheepuram	9.6.2022	43

ENTREPRENEURSHIP DEVELOPMENT PROGRAM OF OUR STUDENTS

MUSHROOM CULTIVATION



Principal appreciated Mr. kiran kumar for his mushroom cultivation.

Mr.Kiran Kumar.S of II-year B. Tech Biotechnology has started the cultivation of *Pleurotus ostreatus* (oyster mushroom) on december 14, 2022 in the department They are rich sources of fibre and nutrients such as proteins, minerals, vitamins with lower amounts of fats and calories. Mushrooms are ready to harvest within 26-28 days. The first batch of harvest with a yield of 10kg mushrooms. The total harvest of mushrooms is around 30-40 kg in further batches.

INITIATION OF VERMICOMPOSTING

On jan 13,2023 Department of biotechnology have initiated vermicomposting to produce organic manure



INITIATION OF AZOLLA CULTIVATION



On January 13 2023. III year B.Tech Biotechnology department students have initiated azolla cultivation at department of Biotechnology, Adhiyamaan College of Engineering, Hosur

BIODISEL PRODUCTION

Three, B.Tech. Biotechnology students in their last year extracted biodiesel from several fungal microorganisms using diverse methods as their Major project at Bharthidasan University trichy

S Shiiva Aishwarayaa(AC21UBT034) of final year B.Tech Biotechnology Has extracted biofuel from *Turbinaria ornata* using Soxhlet Apparatus

Major Project

Extraction of Biofuel
from *Turbinaria
ornata* using soxhlet
Apparatus.

AT BHARATHIDASAN
UNIVERSITY,
TIRUCHIRAPPALII

By,
S Shiva Aishwaryaa
(AC19UBT034)
IV year
B.Tech Biotechnology



S.Stephen Das (AC21UBT037) of final year B.Tech Biotechnology Has extracted biofuel from Ulva fasciata,,Amphirea fragiliissima, Turbinaria Ornata using folch Method

Major Project

Extraction of Biofuel from Ulva fasciata, Amphirea fragiliissima, Turbinaria ornata using folch method.

AT BHARATHIDASAN UNIVERSITY, TIRUCHIRAPPALII

By, S.STEPHEN DAS (AC19UBT037) IV year B.Tech Biotechnology



Major Project

Extraction of Biofuel from Amphirea fragiliissima using sodium methoxide.

AT BHARATHIDASAN UNIVERSITY, TIRUCHIRAPPALII

By, Rakshitha R.G (AC19UBT032) IV year B.Tech Biotechnology



R G Rakshitha (AC21UBT032) of final year B.Tech Biotechnology Has extracted biofuel from Amphirea fragiliissima, using Sodium methoxide Method

SKILL DEVELOPMENT PROGRAM

Four student of our department third year Anuranjana S, Atchaya K, Katherine.P, Lokashree.P Has attended skill development training program which held on CSIR-Central Electrochemical Research Institute on 12 - 16 SEP 2022 Under Biosensor : Design and applications



PROJECT EXHIBITION

NAME OF THE STUDENTS	TITLE	Award/Participation
V.Archana D.Dhanalakshmi S.Shruthi shankar S.Vaishnavi	Formulation Of Herbal Consortia To Evaluate The Anti-Obesity Analysis	Participated
L.Praveenperumal S. Ragu	Wound Healing Topical Ointment	Award
N.Archana G.Deepa Maseera	Evaluation, Identification, Purification And Biochemical Characterization Of An Microbe Phytase	Participated
Thilothamai jegani Praba	Bioreactor design	Participated
N.Chandana M.Sindhu R.Shashikala	Immobilization Of Ssdna On A G-C3N4	
S.Dineshkumar M.Gokulraj K.Iyyappan	Production, Optimization And Bioprospecting Of Ferulic Acid	Participated
S.Akshaya D.Malini A.Sujithaa	Production Of Industrial Enzyme Immobilized With Alginate Beads	Participated
Harshitha Maheshwari	Hydroponic farming	Participated



NPTEL COMPLETION

Our students from 3rd year and 2nd year have successfully completed their NPTEL course

COURSE COMPLETION CERTIFICATE AWARDED TO:

ELITE CERTIFICATION AWARDED TO:

- Nasreen Sara. S
- Savitha. N
- Sowbashne. M
- Shakthi Priya.S.K
- Dheetxith Krishna R
- Harshne M
- Mariya Bleesy M
- Rabisha Jeninppar P



- Karthikeyan. A
- Nellaiappan. M
- Santhiya. T
- Shakthi Priya. S K
- Sowbashne. M
- Suruthi. R
- Yagavi. S
- Arshath R
- ArshithaAsmi J
- HariHaran D V
- Karthikeyan M



INDUSTRIAL VISIT

S.NO	Date of visit	NO OF STUDENTS ATTENDED	Name of the Industry
1	22.02.2023	39	Aavin Dairy Plant, Krishnagiri.
	22.02.2023	42	
2	14.03.2023(FN)	47	FORT-SIPCOT powered innovation center, Hosur
	14.03.2023(AN)	42	
	15.03.2023	39	



TOPPERS IN COMPETITIVE EXAMINATION

Two Student of department of biotechnology have cleared competitive Exams like GATE, DBT BET

- Jayashree.B- GATE-AIR-309, DBT BET JRF-152, GAT B-133
- Nalini. S- GATE - AIR- 510

DBT- JUNIOR RESEARCH FELLOWSHIP (DBT-JRF) Biotechnology Eligibility Test (BET) - 2021 SCORE CARD

Application Number: J220414333 Roll Number: KK040300010

Candidate's Name: JAYASHREE B

Mother's Name: SANKAR B

Father's Name: BALAMURUGAN V

Category: OBC-NC Person with Disability (PwD): NO

Gender: FEMALE Date of Birth: 08-01-2000

Nationality: INDIAN



Subject	Maximum Marks	Marks obtained
Section A	150	60
Section B	150	92
Total Score	300	152

NTA Score in Words: One Hundred Fifty Two Only

Date: 28/08/2021

GATE 2021 Scorecard Graduate Aptitude Test in Engineering (GATE) 2021

Name: JAYASHREE B

Parent's / Guardian's Name: V BALAMURUGAN

Registration Number: BT21S57330048 Date of Birth: 08-Jan-2000

Examination Paper: Biotechnology (BT)

GATE Score: 286

Marks out of 100*: 25.67

Qualifying Marks**: 30.0 (General), 27.0 (EWS/OBC INCL), 20.0 (SC/ST/PwD)

Number of Candidates Appeared in this paper: 13186

All India Rank in this paper: 3163

Valid up to 31st March 2024

* Normalized marks for Civil Engineering (CE), Computer Science and Information Technology (CS) and Mechanical Engineering (ME) Papers.

** A candidate is considered qualified if the marks secured are greater than or equal to the qualifying marks mentioned for the category for which valid category certificate, if applicable, is produced along with this scorecard.

Deepankar Choudhury Jtg Chairperson, GATE 2021

Name: NALINI SANKARAN

Registration Number: BT22567423156

Gender: Female

Parent's/Guardian's name: A. SANKARAN

Date of birth: 4-September-2000

Examination Paper: Biotechnology (BT)

Marks out of 100^a: 46.0 All India Rank in this paper

Qualifying Marks^{bb}: 35.5 (General), 31.5 (OBC INCL/EWS), 23.5 (SC/ST/PwD) GATE Score



TOPPERS IN ACADEMIC ACTIVITIES 2022-2023

Final Years	3rd Years	2nd years
Ms. Thaseen. R	Ms. Yagavi. S	Ms. Sruthi. R
Ms. Ishwarya. V	Mr. Pradeep Kumar. M	Ms. Ayesha shameema. M
Ms. Gurumeenakshi	Ms. Savitha.S	Ms. Varshini.S

ACHIEVEMENT BY STUDENTS

On the occasion of Dr.A.P.J.Abdul Kalam birthday celebration and National Students day celebration organized by IEI Students Chapter and IEI Hosur Local Centre on 15/10/2022 our department Students and Faculties bagged a number of awards .

- **Best Division Award** :Department Of Biotechnology, Adhiyamaan College of Engineering (Autonomous), Hosur.
- **Best Faculty Advisor Award** :Dr.K.Saranya, and Mrs.S.Kavitha
- **Best Student Award**

S. No	Name	Awarded By	Date
1	Ms. K. Abina	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
2	Ms. N. Amaravathi	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
3	Ms. P. Harshitha	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
4	Ms. N. Gurumeenakshi	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
5	Mr. R. Hariprasath	Tamil Nadu State Chess Association	29.09.2022 To 02.10.2022
6	Ms. N. Harshavarthini	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
7	Ms. S. Jaisudha	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
8	Ms. Aishwarya	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
9	Ms. A. Nandhini	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
10	Ms. K. Serena Karen	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
11	Ms. Supriya	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
12	Ms. Praba	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022
13	Ms Thilothamai	The Institutions Of Engineers (India), Hosur Local Center	15th October 2022

- **Best UG research Award**

NAME	AWARD	AWARDED BY	DATE
Harshitha P	Best UG Research Award	Society For Aerospace & Mechanical Professionals	10th June 2022
Arshan Selva Singh	Best UG Research Award	Society For Aerospace & Mechanical Professionals	10th June 2022
Maheshwari K	Best UG Research Award	Society For Aerospace & Mechanical Professionals	10th June 2022
Karthikeyan A	Best UG Research Award	Society For Aerospace & Mechanical Professionals	10th June 2022
Tharun Kumar S	Best UG Research Award	Society For Aerospace & Mechanical Professionals	10th June 2022

- **Best Paper Award**

NAME	AWARD	AWARDED BY	DATE
Arshath.R, Dheetxith Krishna.R Kiran Kumar.S	Best Paper	Department Of Science, M.G.R.College, Hosur, Tamil Nadu	10th And 11th November 2022

AWARD WON IN SPORTS ACTIVITIES

Name of the Student	Name of the Event	Inter-university/ State/National/ International	Name of the Award/ Medal	Team/ Individual
Mr. Hariprasath. R	National Level Chess Tournament	National Level	Runner	Individual
Ms. Eniya	Athletics - Relay	Zonal Level	Runner	Team
Mr. Arshath R Mr. Thanush S	Hand Ball	Zonal Level	Third Place	Team



EDITORIAL COMMITTEE



S.NO	NAME	YEAR
1.	Mr.Nellaiappan.M	Final Year
2.	Ms.Anuranjanaa.S	Final Year
3.	Ms.Nila.P	Final Year
4.	Mr.Vasanth.K	Final Year
5.	Mr.Arshath.R	Third Year
6.	Ms.Akshaya.A	Third Year
7.	Ms.Harshne.M	Third Year
8.	Mr.Karthikeyan.M	Third Year

We owe a heartfelt thanks to all the readers. We hope that the readers have find the updates more interesting.

If undelivered please return to:
The Head of Department
Department of Biotechnology
Adhiyamaan college of Engineering (Autonomous)
Hosur-635130

