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**ACADEMIC DETAILS**

Examination	University	Institute	Year	CPI/%
Bachelor of Technology (Hons).	Electronics & Communication Engineering APJ Abdul Kalam Technological University (KTU)	Thangal Kunju Musaliar College of Engineering	2019	8.65
12 <sup>th</sup> AISSCE :	Science Central Board of Secondary Education	Kendriya Vidyalaya Pattom	2015	93.8%
10 <sup>th</sup> AISSE :	Science Central Board of Secondary Education	Kendriya Vidyalaya Pattom	2013	10.0

*\*Other relevant test scores include:***1st year:** Calculus (10/10), Differential Equations (10/10), Eng. Physics (10/10), Eng. Mechanics (10/10)**2nd year:** Complex Algebra (10/10), Probability, Random Processes and Numerical Analysis (10/10)**FIELDS OF INTEREST**

- Machine learning & Artificial Intelligence, Signal Processing, Robotics, Internet of Things.

**TECHNICAL SKILLS**

- Languages** (C, C++, Java, Python), **Database** (MySQL), **Tools** (L<sup>A</sup>T<sub>E</sub>X, Eclipse, MATLAB, PSPICE, AUTOCAD).
- Hardware** (Arduino, ESP8266, GSM module, INTEL 8085/86/51, Raspberry Pi)

**ACADEMIC PROJECTS**

- Recent trends in moving object detection** ( Summer Research Internship project)  
(Institution: National Institute of Technology, Calicut, May'18 - July'18, Guide: Dr. Sudhish N George)
  - Studied on different improvised PCA techniques for moving object detection in videos.
- Bluetooth Enabled Assistance for Differently-abled (BEAD)** (Research paper)  
(Guide: Dr. Gopakumar K, Jan'18 - present)
  - Accepted for IEEE TENSYPMP'18 conference at Sydney, Australia.
  - Objective: To develop a low-cost guidance and navigation system for differently-abled.
  - Possible interaction between external elements and the user via inbuilt information exchange system.
- Advanced Vertical-Farming Assistive Setup (AVAS)** (5th Semester Research Project)  
(Guide: Prof. Reshma S., Oct'17 - Nov'17)
  - Objective :Automation of Vertical Farming for better yield.
  - Fuzzy performance analysis and comparison of growth attributes of subject plants with the ideal set.
  - Implemented automation using arduino, humidity and temperature sensors and servo motors and studied the response.
- Autonomous Maze Solver** (4th Semester College Technical Fest Project)  
(Mar'17)
  - Objective :Made a self-path-finding bot (autonomous).
  - Uses Pledge algorithm (without using compass, but with a modified count technique).
  - The robot was designed to find the way out of a complex maze with 1 exit.
- Line follower robot** (1st Semester Inter-College Technical Fest Project)  
(Oct'15)
  - Objective: Made a simple line follower (both black and white track) using IR array.
  - Finalist in Tathva by NIT Calicut.

## EXPERIENCE

- **Airports Authority of India, International Airport, Trivandrum:** (July 2018) Got exposure to avionics studies and other important fundamentals relating to the airport operations.
- **Keltron Manufacturing Facility, Karakulam, Trivandrum:** (July 2016) Studied about security and surveillance systems, UPS manufacturing, related fabrication techniques and a bit of SMD soldering.
- Took class on Microcontroller basics taking example of Arduino (Uno), as part of IETE workshop at college.
- Attended workshop on PCB design and printing, conducted in college by IETE.
- Attended Big data workshop conducted by IEEE Trivandrum chapter (Kerala Section).
- Attended IOT challenge workshop by IIT Bombay. (Semifinalist team)

## KEY ACHIEVEMENTS

- Google Science Fair 2013 Asia Pacific Regional Finalist (Project: BCI and speech synthesis).
- Google Science Fair 2012 Asia Pacific Regional Finalist (Project: Triphala effect on colon).
- Participated in the Oracle Thinkquest Digital Media competition and got appreciation.
- Participated in many National Level Science congresses, and Science exhibitions.
- Secured top ranks in Science and Maths Olympiads, school college and state level quizzes.

## STRENGTHS

- Positive Attitude, Social Interaction, Hardworking.

## INTEREST AND HOBBIES

- Have undergone 7 years of formal training in Mridangam (2008-15).
- Successfully completed 56km trekking at Agasthyarkoodam within 2 days. (44km covered on day 2).
- Have been practicing Yoga from age 5.
- Loves swimming and have also done river rafting.
- Active quizzier and a debater and have brought many laurels to my alma mater.
- Sub-40 Rubik's cube solver.
- Have got gold medal in abacus and mental arithmetic.
- Fond of geek stuff and loves technology (was school magazine editor).
- Plays Chess, Carrom, Table Tennis, Cricket, Football and Badminton.
- Was School Captain and held various other positions in the school council.
- College student member in IEEE, IETE and IEDC.