

# Electrical Engineer

Prajapati Jay Sanjaybhai  
9104927170  
jaysp215@gmail.com



## OBJECTIVE

To work with best of my abilities and skills in order to benefit my organization also to be better other in this competitive Time an influential position in the organization.

## SKILLS

Basic computer knowledge

MS Word, Excel, PowerPoint

Teamwork and coordination

Problem solving

Basic PLC concepts

Basic electrical concepts

Circuit analysis fundamentals

Reading electrical drawings

## PROJECTS

### Obstacle Avoiding Robot Using Arduino

#### Leadership

Duration:3 Month, Team Size:4

Arduino is the main processing unit of the robot. Out of the 14 available digital I/O pins, 7 pins are used in this project design. The ultrasonic sensor has 4 pins: Vcc, Trig, Echo and Gnd. Vcc and Gnd are connected to the +5v and GND pins of the Arduino. Trig (Trigger) is connected to the 9th pin and Echo is connected to 8th pin of the Arduino UNO respectively. A Servo Motor is used to rotate the Ultrasonic Sensor to scan for obstacles. It has three pins namely Control, VCC and GND. The Servo Control Pin is connected to pin 11 of Arduino while the VCC and GND are connected to +5V and GND. L293D is a 16 pin IC. Pins 1 and 9 are the enable pins. These pins are connected to +5V. Pins 2 and 7 are control inputs from microcontroller for first motor. They are connected to pins 6 and 7 of Arduino respectively. Similarly, pins 10 and 15 are control inputs from microcontroller for second motor. They are connected to pins 5 and 4 of Arduino. Pins 4, 5, 12 and 13 of L293D are ground pins and are connected to Gnd.

### Wireless Charging Station for Electric Vehicle

#### Leadership

Duration:1 month , Team Size:4

Wireless charging station for electric vehicle As electric vehicles (EVs) become more popular, there is a need for better ways to charge them. This project focuses on creating a wireless charging station for EVs, which means no need for physical plugs or cables. The system will use a technology called inductive power transfer (IPT), which transfers energy through electromagnetic fields between a charging pad on the ground and a receiver in the vehicle. The main goal of this project is to design a safe, efficient, and easy-to-use wireless charging station. The system will include a charging pad, power converter, receiver, and communication unit. The charging pad will create an electromagnetic

field that transfers energy to the vehicles receiver. The design will ensure that the system works efficiently, is safe for users, and is simple to operate.

### **Rooftop of solar system**

Duration:1 month , Team Size:3

### **Leadership**

Designed a residential rooftop solar system including load calculation, panel and inverter selection, and basic system layout. Gained practical understanding of solar PV components, wiring, and energy efficiency benefits.

## **EDUCATION**

| <b>Degree / Course</b>             | <b>University / Board</b>                         | <b>Percentage / CGPA</b> | <b>Year of passing</b> |
|------------------------------------|---|--------------------------|------------------------|
| Diploma in Electrical Engineering  | Government polytechnic gandhinagar                | 70                       | 2023                   |
| Bachelor of Electrical Engineering | Kalol institute of technology and research centre |                          | Pursuing               |

## **ADDITIONAL PERSONAL INFO**

Address Behind Highschool prajapati vas pansar  
Languages Gujarati Hindi English  
Date of Birth 01/05/2005  
Gender male

## **AWARDS**

Dewang Mehta IT Award 2025 (Top Ranker) Awarded by the Dewang Mehta Foundation Trust for securing the top academic rank in Electrical Engineering during the third year at Kalol Institute of Technology & Research Centre, Kalol.

## **INTERNSHIPS**

- Internship – Electrical Engineering Pramukh Enterprise | July 2025 Hands-on experience in electrical components fitment and basic industrial electrical work. Assisted in installation and testing of electrical components while following safety practices.
- Electrical Maintenance Intern – IFFCO Kalol Hands-on industrial training in motors, transformers, power distribution systems, earthing, and preventive maintenance.

## **DECLARATION & SIGN**

I hereby declare that all the above information is true to best of my knowledge

JSP