



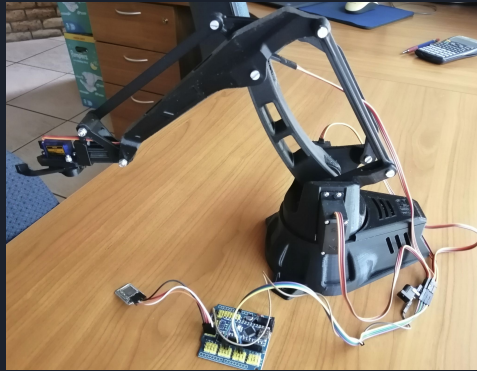
Kids Invoke Innovation

And Maybe Eskom Too

Rohan Schwartz
SARAO

About

- Mechatronics turned Software Engineer
- Enjoy building stuff



Engineering solutions start with a problem



Engineering solutions start with a problem



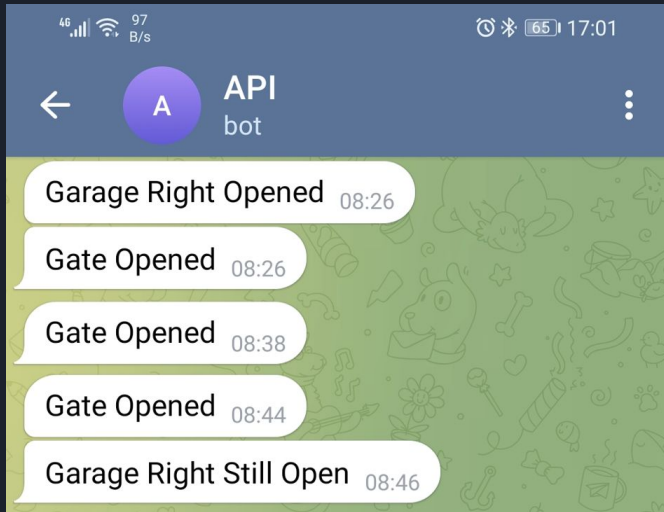


Solution

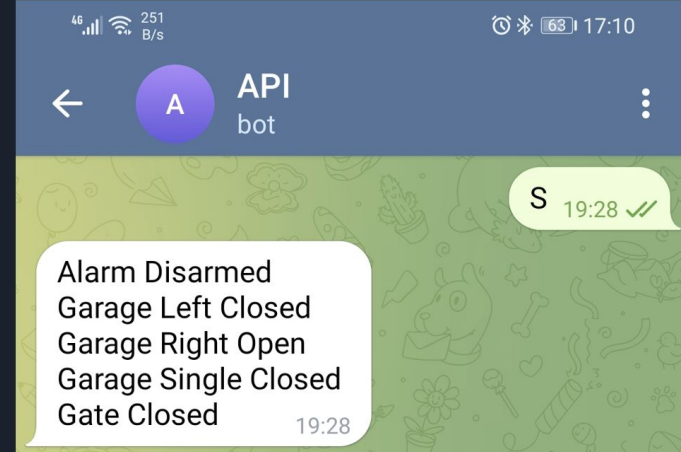
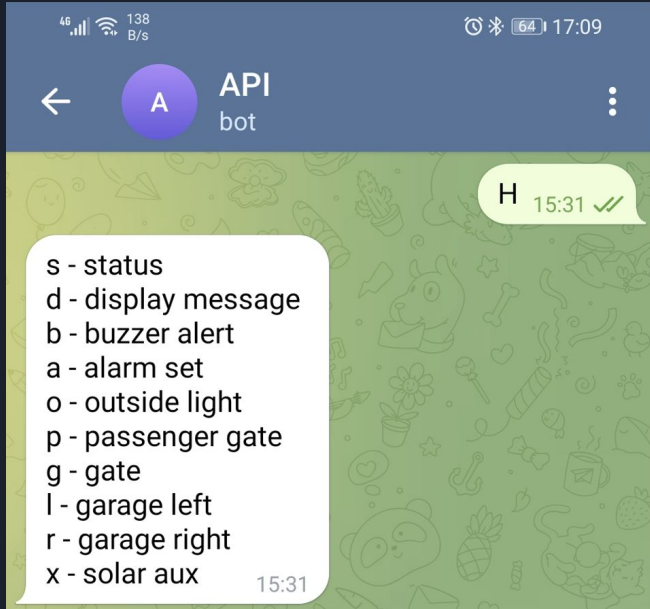
Problem + RaspberryPi + Python = homepy

- Monitor gate and garage doors
- Control driveway floodlight
- Report states via LCD interface and beeper

Alert messaging



Control and status



Solar





Python libraries

- RaspberryPi - pigpio
- Telegram - requests (python-telegram-bot, Telethon)
- MODBUS - minimalmodbus
- Blynk - BlynkLib



Future dev

- Download weather data and add intelligence for automatically control of non-essential loads (geyser element and pool pump) depending on how much PV there is for the day



Thank you



Rohan Schwartz
SARAO