11/30/2023

General BOM (other than some generic components)

Controller

Enclosure	LeMotech Project Box ABS Plastic IP65 Waterproof Dustproof Electrical Junction Box Outdoor Enclosure for Electronics Black 7.87 x 4.72 x 2.95 inch (200 x 120 x 75 mm)		Amazon
Power Supply	MEAN WELL LRS-150F-15 150W 15V 10 Amp Single Output Switching Power Supply		Amazon
Relay	Gebildet JD1912 Car Relay Harness 12V 40A 4 Pin SPST Harness Sockets with Color-labeled Wires for Automotive Truck Van Motorcycle Boat (Pack of 2)		Amazon
Switch	DaierTek 12V Latching Push Button Switch 19mm ON Off Black Metal Pre-Wired 12 Volt Blue Led Light Illuminated Waterproof Button for Marine RV -8 Pack		Amazon
	or	WerFamily Angel Eye Blue LED 19mm Waterproof Black Shell Aluminum Alloy Self-locking Latching Push Button Switch 1NO 1NC	Amazon
AC power connector without fuse			Aliexpress
Fuse	10PC Home Protection Inline Glass Tube Fuse Holder 5*20 /6*30MM 250V AC Screw Type Quick Blow Fuses with Wire CableWhite 5X20mm		Aliexpress
Fan	WINSINN 50mm Fan 12V, 3D Printer Micro 12 Volt Fans 5010 Dual Ball Bearing, Brushless Cooling 50mmx10mm 2PIN (Pack of 5Pcs		Amazon
Arduino MKR1010 Blynk iPhone application			Arduino blynk.io
Motion sensor	DAOKI 5Pcs IR Human Sensor AM312 Mini Detector Module HC-SR312 Pyroelectric Infrared PIR Motion Automatic Detector DC 2.7 to 12V for Arduino 2 A1U2 wi		Amazon
Flat Cable	Antrader IDC 1.27mm Grey Color Flat Ribbon Cable for 2.54mm Connectors, 20P-16Ft/5M		Amazon
USB extension cable	30cm 90 Degree Angle Elbow Micro USB 2.0 5Pin Male to Female Tape Panel Mounting Screw Hole Adapter Computer Extension Cable		Aliexpress
Panel mount 2x10 20 pin headers	5pcs 2.54MM IDC Type Box Header Male Headers 10/14/16/18/20/30/34/40/50 PIN Connector for 1.27mm Pitch Flat Cable		Aliexpress
2x10 20 pin female cable connector	10PCS FC-6/8/10/12/14/16/18/20/30/40/50/64 PIN FEMALE HEADER IDC SOCKET CONNECTOR 2.54MM pitch FOR 1.27MM wire 6p 10p 20p 40P		Aliexpress
2x10 20 pin pcb male header	10pcs dip 6/10/20/26/34/40 PIN 2.54MM pitch MALE SOCKET straight idc box headers PCB CONNECTOR DOUBLE ROW 10P/20P/40P DC3 HEADER		Aliexpress
Thermistor	10K NTC Thermistor		Aliexpress
Motion sensor connector	Nine to Nine 3.5mm Female Stereo Jack Panel Mount Connector Pack of 10		Amazon
Motion sensor connector	3.5MM Male Stereo Cable Plug		
KF2510 connectors	GeeBat 300pcs 2.54mm KF2510 Connector Kit with KF2510 2.54mm Female Pin Headers Terminals, 2.54mm 2/3 / 4/5 /6 Pin Housing Connector Adapter Plug		Amazon
JST SM connectors	OCR 2.5mm Pitch JST SM Connector 2 3 4 5 Pin Male/ Female Housing Plug Connector Assortment Kit 560Pcs		Amazon

	Level shifter	HiLetgo 5pcs TXS0108E High Speed Full Duplex 8 Way 8 Channel Level Conversion Module 8-Bit 8 CH Logic Level Bi-Directional Converter Module	Amazon
	74LS125N		Aliexpress or Ebay
	TIP120		Aliexpress
	7805CV		Aliexpress
	7805 heat sink		
	LEDs, dip sockets, resistors, ceramic capacitors, etc.	As noted on schematic	
	Board	EasyEDA and JLCPCB	see Github repository files
Remote board			
	Atmega328P-PU		Aliexpress or Ebay
	16MHz crystal		Aliexpress
	22pf capacitors		Aliexpress
	L293D		Aliexpress
	MAX487		Aliexpress
	L7805CV		Aliexpress
	6 pin Split Flap DIN Connector	5PCS/Lot Big S Terminal DIN6 Female Socket Connector 6P PCB Panel Mount	Aliexpress
	2x10 20 pin female cable connector	10PCS FC-6/8/10/12/14/16/18/20/30/40/50/64 PIN FEMALE HEADER IDC SOCKET CONNECTOR 2.54MM pitch FOR 1.27MM wire 6p 10p 20p 40P	Aliexpress
	2x10 20 pin pcb male header	10pcs dip 6/10/20/26/34/40 PIN 2.54MM pitch MALE SOCKET straight idc box headers PCB CONNECTOR DOUBLE ROW 10P/20P/40P DC3 HEADER	Aliexpress
	Rubber feet	40pcs Square Rubber Feet Self-Adhesive Bumper Door Buffer Stop Furniture Pads	Aliexpress
	1x6 6 pin PCB male header	For in system programming	
	LEDs, dip sockets, resistors, ceramic capacitors, etc.	As noted on schematic	
	Board	EasyEDA and JLCPCB	see Github repository files
	Programmer	USB Tiny ISP 6 pin programmer	Amazon