

Tabelle1

Mutatio BOM

Part description	Part
NodeMCU (V1)	-
RTC Module, DS3231 (Optional, track time without internet)	-
NFET 2SK3018	Q1
Schmitt trigger SN74LVC1G14DBVR	IC2
100uF 1206 Capacitor	C6, C7
47uF 0805 Capacitor	C1, C2, C3, C4
WS2812B Color LED	LED
22uF 0603 Capacitor	C9, C13, C14
1uF 0603 Capacitor	C5
100nF 0603 Capacitor	C8, C12
1N4148 Diode	D1, D2, D3
MicroSD Socket	-
51k Resistor, 0603	R1, R2, R5
100k Resistor, 0603	R2
1k Resistor, 0603	R3
PCB	-

Additional Parts are untested (OpAmp circuit)
For datalogging, an SD card is needed (~3MB per day)

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Cost	
	6.16 €
	0.90 €
	0.05 €
	0.07 €
	0.10 €
	0.10 €
	0.12 €
	0.05 €
	0.01 €
	0.01 €
	0.02 €
	0.10 €
	0.01 €
	0.01 €
	0.01 €
	1.40 €
	7.72 €

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Source
Banggood
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Ebay/Aliexpress
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Ebay/Aliexpress
Ebay/Aliexpress
Ebay/Aliexpress
Ebay/Aliexpress
Digikey
Digikey
Digikey
Elecrow