

SenseCAP Indicator + D1S (Alpha) , 4-Inch Touch Screen IoT development platform powered by ESP32S3 & RP2040



Features

- **Dual MCUs and Rich GPIOs:** Equipped with powerful ESP32S3 and RP2040 dual MCUs and over 400 Grove-compatible GPIOs for flexible expansion options.
- **Real-time Air Quality Monitoring:** Built-in tVOC and CO2 sensors, and an external Grove AHT20 temperature and humidity sensor for more precise
- **Local LoRa® Hub for IoT Connectivity:** Integrated Semtech SX1262 LoRa® chip (optional) for connecting LoRa® devices to popular IoT platforms such as Matter via Wi-Fi, without the need for additional compatible devices.
- **Fully Open Source Platform:** Leverage the extensive ESP32 and Raspberry Pi open-source ecosystem for infinite application possibilities.
- **Fusion ODM Service Available:** Seeed Studio also provides one-stop ODM service for quick customization and scale-up to meet various needs.



Public Area Air Monitor



Weather Station Display



Asset Monitor



Grove Sensor Hub



ChatGPT Indicator



SOP Reminder



On-site Alarm



Digital Album

Specification

Screen	3.95 Inch, Capacitive RGB Touch Screen	
Screen Resolution	480 x 480 pixels	
Power Supply	5V DC, 1A	
Battery	N/A	
Processor	ESP32-S3: Xtensa® dual-core 32-bit LX7 microprocessor, up to 240MHz RP2040: Dual ARM Cortex-M0+ up to 133MHz	
Flash	ESP32S3: 8MB RP2040: 2MB	
External Storage	Support up to 32GB Micro SD Card (not included)	
Wi-Fi	802.11b/g/n, 2.4GHz	
Bluetooth	Bluetooth 5.0 LE	
LoRa®(SX1262)	LoRa®WAN/(G)FSK, 21dBm Max Transmitted Power Sensitivity/-136dBm@SF12 BW=125KHz RX Sensitivity, Up to 5km (depending on gateway antenna and environments)	
Sensors(Optional)	Built-in CO2 (SCD41)	Range: 0-40000ppm Accuracy: 400ppm - 5000ppm ±(50ppm+5% of reading)
	Built-in TVOC (SGP40)	Range: 1-500 VOC Index Points

External Temperature and Humidity Sensor	Range: -40 ~ + 85 °C/± 0.3 °C; 0 ~ 100% RH/± 2% RH (25 °C)
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Buzzer	MLT-8530, Resonant Frequency : 2700Hz
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Part List

SenseCAP Indicator	x1
USB Type-C Cable (1m)	x1
Grove AHT20 TH Sensor (For D1S and D1Pro version)	x1

ECCN/HTS

HSCODE	9027100090
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USHSCODE	9027102000
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UPC	
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EUHSCODE	9027109000
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COO	CHINA
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CE	1
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EU DoC	1
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FCC	1
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RoHS	1
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TELEC	1
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UK DoC	1
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