Industrial IP68 Modbus RS485 1-to-4 Splitter- Seeed Studio

Industrial IP68 Modbus RS485 1-to-4 Splitter/Hub (to be used w/ SenseCAP Sensor Hub)

SKU
206001060

This RS485 1-to-4 Splitter is an industrial-grade hub that can extend the connection of SenseCAP Sensor Hub to multiple sensors. It features IP68 rating, comes with waterproof aviation connector, easy to use, suitable for many application scenarios.

PRODUCT DETAILS

Features

- IP68 rating
- Anti-ultraviolet and anti- rain
- Suitable for long-term outdoor use

Description

RS485 1-to-4 Splitter can be used to increase the number of sensors that can be simultaneously connected to the SenseCAP Sensor Hub.

The Sensor Hub has 4 aviation connector interfaces through which sensors can be connected. Each of these interfaces can theoretically support up to 8 sensors. For connecting more than 4 sensors, the RS485 1-to-4 splitter is required. One interface (male) of the RS485 splitter can connect to the Sensor Hub, and the other 4 interfaces (female) can connect to the sensors.

This RS485 Splitter can be used with Sensor Hub 4G Data Logger and MODBUS RS 485 Sensors with aviation connectors, as shown in the image below.
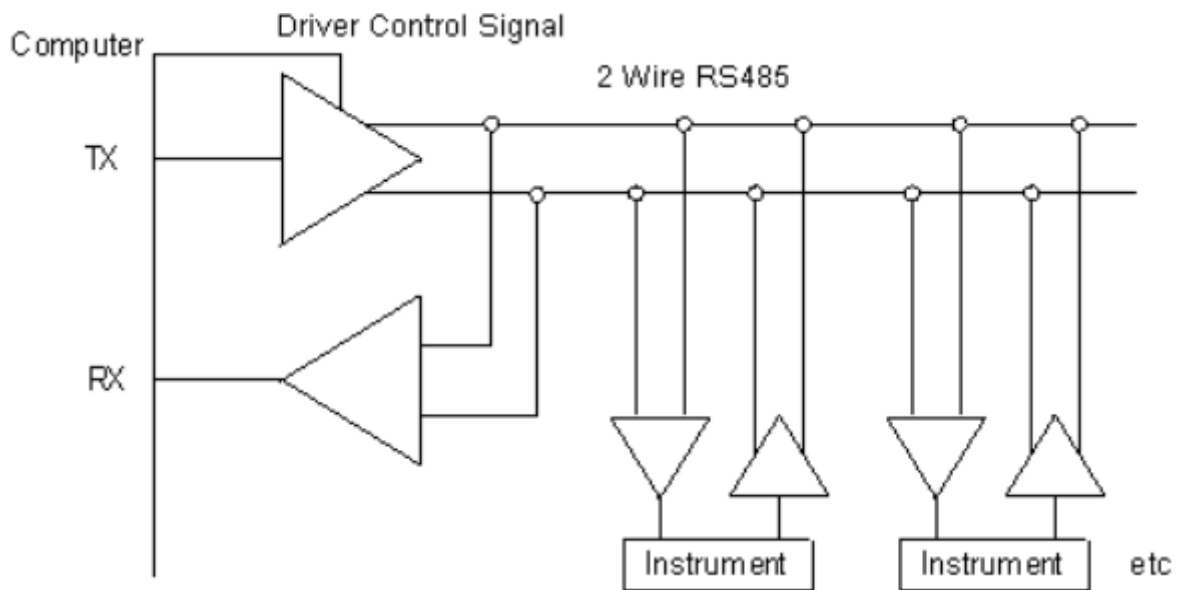

Application

The RS485 Splitter can be used in any scenario that requires the deployment of a large number of sensors with the SenseCAP SensorHub

Seeed SenseCAP is focusing on industrial sensing applications: smart agriculture, precision farming, and smart city. At Seeed, you can find a wide range of RS485 protocol sensors to help you deploy in industrial applications. You can monitor the following environmental data:

- Atmospheric Temperature/Humidity/Atmospheric Pressure/Light with waterproof [SenseCAP ORCH S4 4-in-1 Weather Sensor (A1B)](#)

- CO2 Concentration with [SenseCAP SOLO CO2 5000 (A2)](#)

- Water Conductivity, Salinity, and Total Dissolved Solids (TDS) with [Industrial EC & TDS Sensor (B)](#)

- Soil Moisture and Temperature with [S-Soil MT-02B Industrial Soil Moisture & Temperature Sensor](#)

- Leaf Wetness & Temperature with [S-YM-01B Industrial Leaf Wetness and Temperature Sensor](#)

- Real-time plant photosynthetic light levels with [Industrial PAR Sensor](#)

- hydrogen-ion activity, PH level, in water-based solutions with [Industrial pH Meter/ Sensor](#)

What is RS485?

Ref: [Windmill](#)

In short, RS485 is a standard defining the electrical characteristics of serial lines for use in serial communications systems. It is essentially a form of serial communication.

Compared to serial communication, USB and ethernet are significantly more complex and expensive. Serial communication also has a deterministic behaviour to avoid collisions of data packets, making it more reliable for a linkage system with many devices.

There are many standards in serial communication and RS485, also known as TIA-485 (-A) or EIA-485, is just one of them. It is known for being able to be used effectively over long distances and in electrically noisy environments. Due to this and it being able to transmit