Industrial Internet of Things

ACI400 IIoT Edge Device

Cloud and ERP/MES Connectivity

Ensured Data Security

Data security is a top concern for most production facilities. The ACI400 implements encryption and certificate-based authentication to ensure secure connections.

Designed to Grow with You

Building on established communication protocols, the ACI400 connects to both newer and older weighing devices, extending their useful life and saving existing investments from premature phase out.

Engineered for Weighing Automation

The ACI400 has a comprehensive data library, the result of collaboration between experts in the weighing industry and in industrial automation. It is suitable for common weighing applications in most industries.

Effortless Configuration

The embedded webserver makes on-site or remote configuration fast and easy to complete. The webserver is also used for updating the ACI400 firmware as new IoT capabilities develop.

Get Ready for Industry 4.0

Enable your operation with the right tools to prepare for Industry 4.0. The ACI400 IIoT Edge device from METTLER TOLEDO is a gateway for the Industrial Internet of Things. It provides an OPC UA server and several MQTT clients for seamless exchange of non-time-critical data between our weighing solutions and your chosen Cloud and ERP/MES systems.

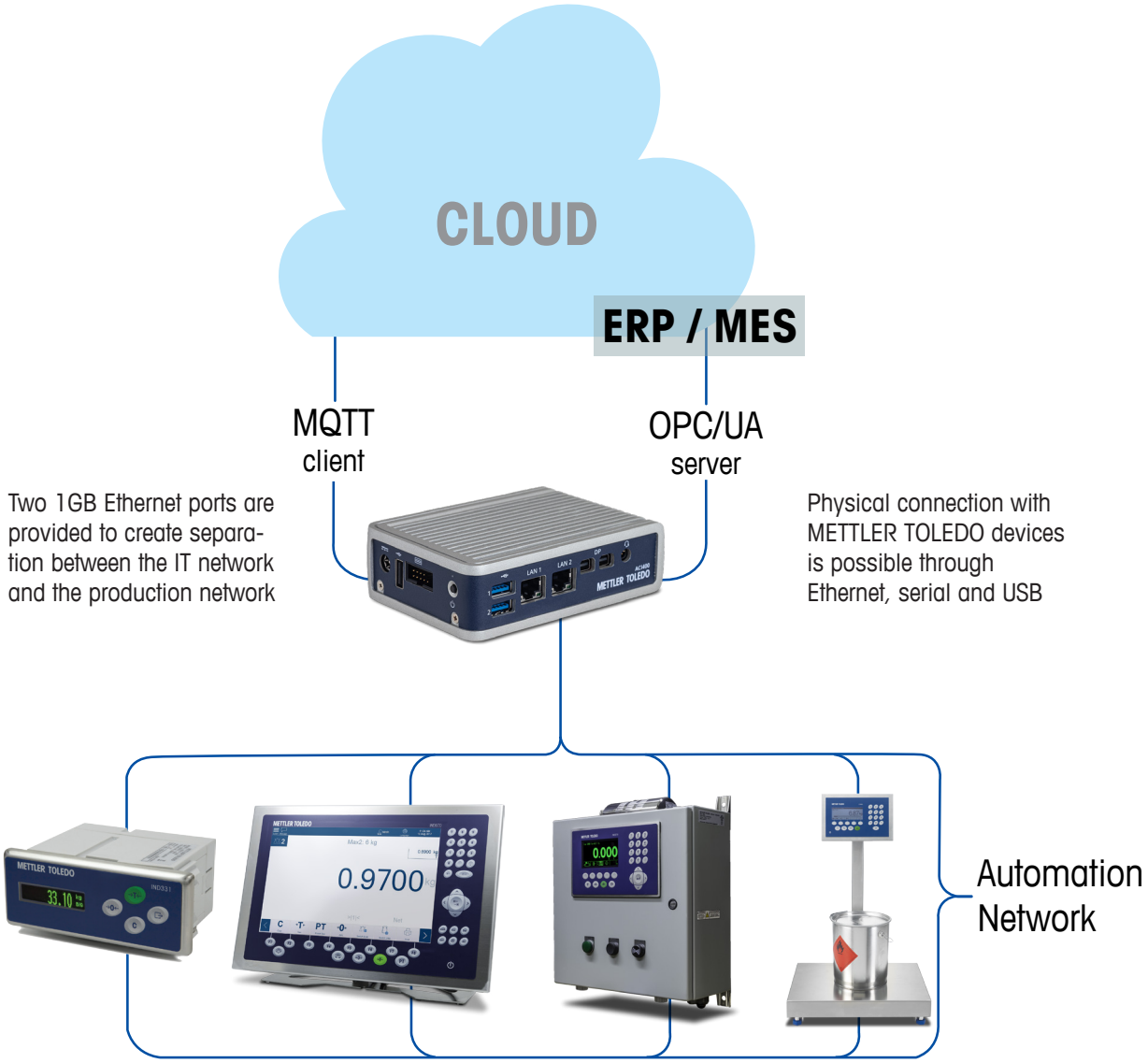
The ACI400 is ideal for customers in the Chemical, Food, Pharmaceutical, and Transportation & Logistics industries. It enables operations to securely and efficiently manage data and assets with well-established solutions such as Azure, AWS (Amazon Web Services), IBM and SAP.

METTLER TOLEDO

Solution Details

MQTT clients for Azure, Amazon Web Services, IBM, and a generic MQTT broker facilitate transmission of customer selectable payloads directly to cloud services. The OPC UA server structures important data from a weighing process so that data is accepted by ERP/MES systems without difficulty.

The ACI400 IIoT Edge supports multiple, simultaneous MQTT broker and OPC UA client connections. Two-way communication is possible, allowing external services to send commands to METTLER TOLEDO weighing devices.



Each ACI400 IIoT Edge can connect up to four unique weighing channels. This can mean four scale channels from a single terminal, four single-scale terminals, four intelligent weigh modules, or any combination of such devices.

ACI400 IIoT Edge – Data Library*

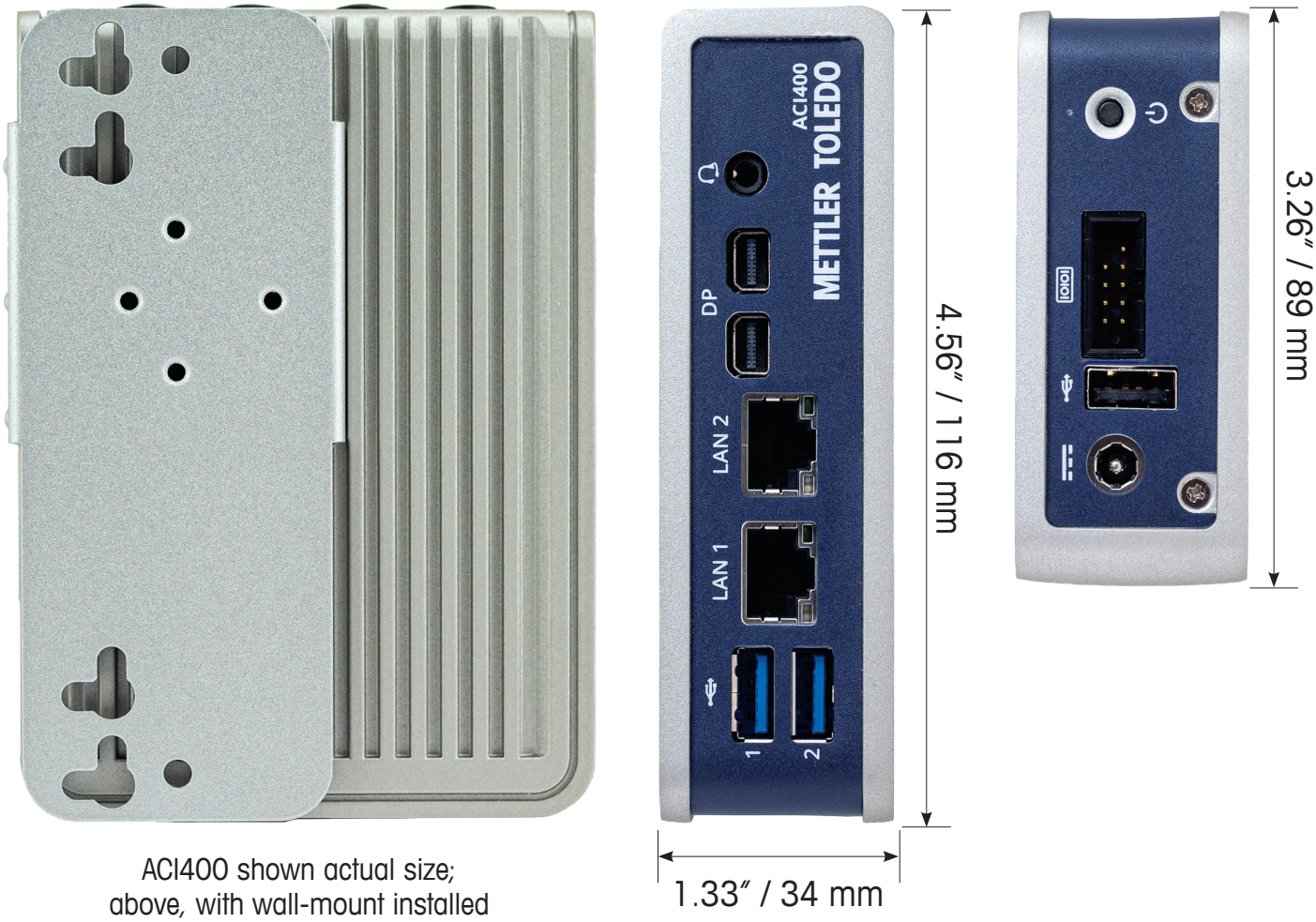
Two-way communication between the ACI400 IIoT Edge and a weighing device occurs through either METTLER TOLEDO SICS protocol or a Shared Data Server (SDS) connection. Data transmission from the ACI400 to an MQTT broker can also be achieved using a simple outbound print template from the connected weighing device. METTLER TOLEDO Industrial weighing devices which support the SICS protocol, or have a Shared Data Server, or can simply output print data, have the potential to connect the Industrial Internet of Things through the ACI400 IIoT Edge gateway.

Available Data	ICS4 Series ICS6 Series	IND131/xx IND331/xx	IND560 IND560x		IND570/xx		IND690/xx	IND780/xx		IND930	SLP85x Module
Communication to ACI400	SICS	SICS	SICS	SDS	SICS	SDS	SICS	SICS	SDS	SICS	SICS
Asset Data											
Device Type	•	•	•	•	•	•	•	•	•	•	•
Manufacturer	•	•	•	•	•	•	•	•	•	•	•
Model	•	•	•	•	•	•	•	•	•	•	•
Firmware Version	•	•	•	•	•	•	•	•	•	•	•
Serial Number	•	•	•	•	•	•	•	•	•	•	•
Weight Data											
Selected Scale	x	n/a	n/a	n/a	n/a	n/a	x	x	•	x	n/a
Scale Type	x	x	x	•	x	•	x	x	•	x	x
Scale Capacity	•	•	•	•	•	•	•	•	•	•	•
Scale Increment	•	x	x	•	x	•	x	x	•	•	x
Scale Primary Unit	•	•	•	•	•	•	•	•	•	•	•
Displayed Weight	•	•	•	•	•	•	•	•	•	•	•
Currently Displayed Unit	•	•	•	•	•	•	•	•	•	•	•
Current Gross Weight	•	•	•	•	•	•	•	•	•	•	•
Current Net Weight	•	•	•	•	•	•	•	•	•	•	•
Current Tare Weight	•	•	•	•	•	•	•	•	•	•	•
Tare Mode	•	x	x	•	x	•	•	•	•	•	x
Registered Weight	•	•	•	•	•	•	•	•	•	•	•
Weight and Device Status											
Weight Stable Status	•	•	•	•	•	•	•	•	•	•	•
Weight Data OK Status	x	x	x	•	x	•	x	x	•	x	x
Legal for Trade Status	•	x	x	•	x	•	x	•	•	•	x
Under Capacity	•	•	•	•	•	•	•	•	•	•	•
Over Capacity	•	•	•	•	•	•	•	•	•	•	•
Supported Commands to Device											
Tare Scale	•	•	•	•	•	•	•	•	•	•	•
Set Preset Tare	•	•	•	•	•	•	•	•	•	•	•
Clear Tare	•	•	•	•	•	•	•	•	•	•	•
Zero Scale	•	•	•	•	•	•	•	•	•	•	•

• - Data available
x - Data not available
n/a - Device supports a single scale.

* This Data Library table is not intended to be a comprehensive list of compatible METTLER TOLEDO products and does not guarantee information availability through the ACI400. Please visit **www.mt.com/ACI400-iiot-edge** for the most up-to-date summary of compatible devices, available data and supported protocols, or contact your local METTLER TOLEDO representative for further details.

Dimensions



ACI400 shown actual size;
above, with wall-mount installed

Ordering Information

Material Number	Description
30551833	ACI400 IIoT Edge Gateway with Din Rail Mount
30551834	ACI400 IIoT Edge Gateway with Wall Mount
64088427	Accessory Cable, USB to RS232 Converter, 2m (6 ft)
30576643	Replacement Power Adapter ACI400, 12V with International Plugs
30539590	Replacement Serial Adapter Cable ACI400, IDC10 to DB9, 265mm (10.4″)

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www.mt.com/ACI400-iiot-edge
For more information

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