SINGLE PHASE SMART METER

JAM2000 Series

- Ability to add different communication modules like GPRS, G3 & PRIME PLC
- Includes different log files with various event types; Records 1,000 events
- Flexible event / Alarm management / Fraud detection
- Remote / Local manual Connection & Disconnection
- Ability to communicate with wired or wireless submeters
- Power quality process & Load profile management
- Message / Access authentication & Encryption
- Remote tariff programming
- Remote firmware update
- Support push mechanism

EAA
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SINGLE PHASE SMART METER

JAM2000 Series

Meter Type	Static, Single Phase, Active and Reactive Energy, Bidirectional
Approvals	IEC 62052-11, IEC 62053-21, IEC 62052-21 IEC 62054-21, IEC 62053-22, IEC 62053-23
Mechanical Compliance	BS standard (JAM2000) / ANSI standard (JAM2000 A)
Connection Type	Single phase 2 wire
Reference Voltage / Frequency	220 / 230 / 240V - 50 ~ 60Hz
Operating Voltage Range	100 ~ 320 V
Over Voltage Operation	The meter has been designed to withstand a voltage of 460 V
Class Index	Active class 1 / Reactive class 2
Basic Current	5 A
Maximum Current	100A (Permanent)
Class Accuracy Current Range	Extended from 100 mA up to 120 A
Starting Current	≤15 mA
Short Time Over Current	7 KA for 1 line cycle
Meter Constant	2000 imp/kWh/kvarh
Insulation Class	Double insulation
Optical Port	Application layer: COSEM-DLMS / Link Layer: HDLC
Battery	Internal long life lithium battery + supercap for supporting RTC and R.W.P with ability to add external battery easily
Display	Long life 8 digit LCD (from zero to nine) 9mm X 4.5mm LCD with OBIS code 5 digit 6mm X 3mm
None-Volatile Memory	Retention time more than 40 years
Read Without Power (RWP)	Shows meter data on LCD without power
Supported xDLMS Services	Block_Transfer_with_Get, Get, Block_Transfer_With_Set, Set, Selective Access, Multiple_References, Data Notification, Action, General Protection
Communication Module	Fully modular and future proof design communication module totally separated from metrology part
Up Link Communication	Could be GPRS, G3 and PRIME PLC
Sub Meters Communication	Could be wired or wireless MBUS
PLC Protocol Stack	Application model: IEC 62056-61/62 in conjunction with DLMS UA 1000-1 Ed.10.0 Application layer: IEC 62056-53 in conjunction with DLMS UA 1000-2 Ed.7.0 G3 Protocol Stack | PRIME Protocol Stack
Operating Temperature Range	-30°C to +65°C
Limit Temperature Range Of Operation	-40°C to +70°C
Storage Temperature	-40°C to +85°C
Relative Humidity	Up to 95% for 30 days per year
Mean Temperature Coefficient	≤ 0.02 % @ PF=1 or PF=0.5 ind over -40°C to +75°C
Degree of Protection	IP54
Sets of Associations	LLS, HLS (GMAC)
Latching Relay	For demand control and remote or manual connection / disconnection of load
Supported AMI use Cases	Meter registration · Clock synchronization Remote tariff programming · Remote firmware update On demand meter reading · Alarms and events management Scheduled (Billing) meter reading · Fruad detection Remote disconnection & reconnection · Load profile management Power control (e- meters) · Power outages, sags & swells process
Dimension	200 / 217 (Short / Long Cover) x 141 x 85 mm (H x L x W) / R=175 mm (JAM2000 A)