

TYPE APPROVAL CERTIFICATE

This is to certify:**That the Instrument for Switchboard**with type designation(s)
PM5350 Power Meter

Issued to

Schneider Electric India Pvt Ltd
Bangalore Karnataka, India

is found to comply with

DNV GL rules for classification – Ships, offshore units, and high speed and light craft**Application :****Power meter for use onboard ships and offshore units.****Product(s) approved by this certificate is/are accepted for installation on all vessels classed by DNV GL.**Issued at **Hamburg** on **2018-01-08**This Certificate is valid until **2023-01-07**.DNV GL local station: **Mumbai**for **DNV GL**Approval Engineer: **Marco Rinkel**

Joannis Papanuskas
Head of Section

This Certificate is subject to terms and conditions overleaf. Any significant change in design or construction may render this Certificate invalid. The validity date relates to the Type Approval Certificate and not to the approval of equipment/systems installed.



Product description

Power Meter for measuring current and voltages and reporting in real time the rms values for all 3 phases and neutral. Calculates power factor, real power and reactive power.

Instantaneous rms values	
Current	Per phase, neutral or ground, average on 3 phases
Voltage	Average of 3 phases ,L-L, L-N Range: 480VacLL(CAT III), 690VacLL(CAT II) , 300VacLL UL
Frequency	45 – 70 Hz
Active power	Total and per phase (signed)
Reactive power	Total and per phase (signed)
Apparent power	Total and per phase
True Power Factor	Total and per phase 0.00 to 1 (signed, four quadrant)
Displacement Power Factor	Total and per phase 0.00 to 1 (signed, four quadrant)
Energy Values	
Active energy	0 – 9.2 x 10 ¹⁸ Wh
Reactive energy	0 – 9.2 x 10 ¹⁸ VARh
Apparent energy	0 – 9.2 x 10 ¹⁸ VAh
Demand values	
Current	Average
Active, reactive, apparent power	Total
Maximum Demand Values	
Maximum current	Average
Maximum active power	Total
Maximum reactive power	Total
Maximum apparent power	Total
Mechanical Characteristics	
Degree of Protection	IP51 on front, IP30 body
Dimensions	96 mm x 96 mm x 44 mm (max)

For additional info see manufacturer technical info.

Application/Limitation

Only to be installed in locations with no risk for condensation to occur.

Type Approval documentation

Tests carried out

Type tests in accordance with IEC 61010 & EN62052-11. EMC tests in accordance with EN 61326, Vibration test, Dry heat test and damp heat test (non condensation)

Job Id: **262.1-013259-2**
Certificate No: **TAE00002JE**

Marking of product

Schneider Electric , type designation.

Periodical assessment

The scope of the periodical assessment is to verify that the conditions stipulated for the type are complied with, and that no alterations are made to the product design or choice of systems, software versions, components and/or materials.

The main elements of the assessment are:

- Ensure that type approved documentation is available
- Inspection of factory samples, selected at random from the production line (where practicable)
- Review of production and inspection routines, including test records from product sample tests and control routines
- Ensuring that systems, software versions, components and/or materials used comply with typeapproved documents and/or referenced system, software, component and material specifications
- Review of possible changes in design of systems, software versions, components, materials and/or performance, and make sure that such changes do not affect the type approval given
- Ensuring traceability between manufacturer's product type marking and the type approval certificate

Periodical assessment is to be performed after 2 years and after 3.5 years. A renewal assessment will be performed at renewal of the certificate.

END OF CERTIFICATE