

**TYPE APPROVAL CERTIFICATE****This is to certify:****That the Safety Control Unit for Rotating Machinery**

with type designation(s)

**Oil Mist Detector Visatron, VN 115/93, VN 116/93, VN 215/93**

Issued to

**Schaller Automation Industrielle Automationstechnik GmbH  
& Co. KG**

,

is found to comply with

**DNV GL rules for classification – Ships****Application :****Location classes:****Product(s) approved by this certificate is/are accepted for installation on all vessels classed by DNV GL.**

Type	Temperature	Humidity	Vibration	EMC	Enclosure
<b>Oil Mist Detector Visatron</b>					
<b>VN 115/93</b>	<b>B</b>	<b>B</b>	<b>B</b>	<b>A</b>	<b>IP54</b>
<b>VN 116/93</b>	<b>B</b>	<b>B</b>	<b>B</b>	<b>A</b>	<b>IP54</b>
<b>VN 215/93</b>	<b>B</b>	<b>B</b>	<b>B</b>	<b>A</b>	<b>IP54</b>

This Certificate is valid until **2021-07-25**.Issued at **Hamburg** on **2016-07-26**for **DNV GL**DNV GL local station: **Essen**Approval Engineer: **Marco Rinkel**

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**Duy Nam Le**  
**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.

Job Id: **262.1-023369-1**  
Certificate No: **TAA00000M9**  
Revision No: **1**

## Product description

Visatron Oil Mist Detector for diesel engine crankcase monitoring, types:  
VN115/93, VN116/93, VN215/93,

VN 115: Basic system  
without localisation of the point of damage  
VN 116: Medium sensitive system  
display of crankcase compartment half with the overheating damage  
VN 215: high sensitive system - with display of the compartment with the  
overheating damage

- Voltage: 24V DC +/-25%, Operating Current: max. 3A, Current at make: 4A
- Contact outputs (NO/NC): 1 prealarm, 1 NO/NC alarm, 1 detector failure
- RS 485 serial data link
- Built-in history storage device
- Connection of remote monitoring device

## Application/Limitation

Spare parts are to be supplied in accordance with recommendation in manual.

Product certificate

As long as the units are covered by the Type Approval, a product certificate will not be required. Correct configuration and set up for each delivery to be tested as part of switchboard functional testing and during commissioning after installation.

Suction pipes to be arranged according to Schaller instructions, with no low "pockets" where liquid oil may assemble and block the path between crankcase and oil mist detector unit.

## Type Approval documentation

Manual for Oil Mist Detector, Visatron System  
VN 115/93, VN 116/93, VN 215/93 No. 10980 Ed. 04W  
Manual VN93 180006 Version 2.4 11-2015

Drawings:

050072-015	13.08.99
070055-012	26.03.99
070022-011	26.03.99
DC094001 02-005	09.06.04
DC094002 02-005	08.01.01
DC094003 02 005	17.06.04

Oil Mist Detector Operating Instructions, Article No.: 2100 edition 06 99

Test reports: 330/97, 515/99, Cetecom 4-1055-1-1/03  
Test reports for VN XXX/87 type approval of 12.08.99  
EMC test report ESW 03509.023.95 dated 95-03-08

Documentation submitted for IACS UR M67 required tests:

For VISATRON VN115, 116, 215/93

- GSSO Test Report, February 2007-04-04
- CETECOM Test report 4-1055-01-01/03

Certification Retention Survey Report DNV Essen, dated 2013-03-06  
Periodical Assessment Report DNVGL Essen, dated 2016-08-31

## Tests carried out

Job Id: **262.1-023369-1**  
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IACS UR M67 Rev. 1, Oct. 2006

### **Marking of product**

Manufacturer: Schaller Automation Industrielle Automationstechnik GmbH & Co KG  
Model name: As listed under Product description  
Serial number: Unique for each delivered item

### **Periodical assessment**

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 type approved 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

Retention survey is to be performed at least every second year and at renewal of this certificate.

END OF CERTIFICATE