



CERTIFICATE NUMBER  
EFFECTIVE DATE  
EXPIRY DATE  
ABS TECHNICAL OFFICE

25-0234750-PDA  
31-Mar-2025  
30-Mar-2030  
Hamburg Engineering Department

## CERTIFICATE OF Product Design Assessment

This is to certify that a representative of this Bureau did, at the request of

**SCHALLER AUTOMATION GMBH & CO. KG**

located at

**INDUSTRIERING 14, D-66440 BLIESKASTEL, Germany**

assess design plans and data for the below listed product. This assessment is a representation by the Bureau as to the degree of compliance the design exhibits with applicable sections of the Rules. This assessment does not waive unit certification or classification procedures required by ABS Rules for products to be installed in ABS classed vessels or facilities. This certificate, by itself, does not reflect that the product is Type Approved. The scope and limitations of this assessment are detailed on the pages attached to this certificate.

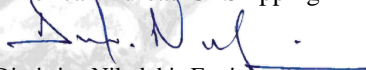
**Product:** Oil Mist Detector  
**Model:** VISATRON VN 115/87plus, VN 115/87plus Ex, VN 116/87plus, VN 215/87plus  
**Endorsements:**  
**Tier:** 3 - Type Approved, unit certification not required

This Product Design Assessment (PDA) Certificate remains valid until 30/Mar/2030 or until the Rules and/or Standards used in the assessment are revised or until there is a design modification warranting design reassessment (whichever occurs first).

Acceptance of product is limited to the "Intended Service" details prescribed in the certificate and as per applicable Rules and Standards.

This Certificate is valid for installation of the listed product on ABS units which exist or are under contract for construction on or previous to the effective date of the ABS Rules and standards applied at the time of PDA issuance. Use of the Product for non-ABS units is subject to agreement between the manufacturer and intended client.

American Bureau Of Shipping

  
Dimitrios Nikolakis, Engineer/Consultant

NOTE: This certificate evidences compliance with one or more of the Rules, Guides, standards or other criteria of ABS or a statutory, industrial or manufacturer's standards. It is issued solely for the use of ABS, its committees, its clients or other authorized entities. Any significant changes to the aforementioned product without approval from ABS will result in this certificate becoming null and void. This certificate is governed by ABS Rules 1-1-A3/5.9 Terms and Conditions of the Request for Product Type Approval and Agreement (2010)

**SCHALLER AUTOMATION GMBH & CO. KG**

INDUSTRIERING 14

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**Tier: 3 - Type Approved, unit certification not required**

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**Product:** Oil Mist Detector

**Model:** VISATRON VN 115/87plus, VN 115/87plus Ex, VN 116/87plus, VN 215/87plus

**Endorsements:**

**Intended Service:**

Monitoring of oil mist concentration in crankcases of internal combustion diesel engines, gas engines and alerting of high concentration.

**Description:**

The VISATRON® series VN87plus OMD-system uses the approved wear-free suction system to continuously extract the atmosphere of the crankcase compartments and other engine locations. A piping system is used to continuously draw the atmosphere to measure the oil mist level in the engine.

- VN115/87plus & VN116/87plus uses a header pipe sampling system to extract the engine crankcase atmosphere;
- VN115/87plusEX uses a header pipe sampling system to extract the engine crankcase atmosphere without air heating system;
- VN215/87plus uses individual compartment suction pipe to extract the individual compartment atmosphere;

Indication of high oil mist concentration: VN115 in entire crankcase, VN116 in either crankcase section, VN215 in each crankcase compartment.

Model VN115/87 plus Ex: Ex II (2G) [Ex op is IIB T4 Gb] +5 <= Ta <= +70° C

**Rating:**

Power Supply: 24 V DC +/- 25%, max. 3 A.

Degree of Protection: IP 54.

Max. Air Consumption: 1.0 m³/h at 0.5 bar.

**Service Restriction:**

1. Unit Certification is not required for this product. If the manufacturer or purchaser's request an ABS Certificate for compliance with a specification or standard, the specification or standard, including inspection standards and tolerances, must be clearly defined.

2. Ex-certification is not covered by this certificate. Application in hazardous area to be approved in each case according to the Rules and Ex-Certification/ Special Condition for Safe Use listed in valid Ex certificate issued by a notified/recognized Certification Body. Certificates in this regard are to be presented to ABS Surveyor for verification.

3. ATEX certified equipment is not to be installed in hazardous areas on U.S. vessels unless it can be proven to have been tested to the applicable IEC 60079 series standards by an independent laboratory accepted by the U.S. Coast Guard. USCG notice 01-12 (February 7, 2012).

4. The vacuum in the engine crankcase, caused by the extraction of gases, is not to exceed 2.5 mbar.

5. VN115/87plus EX is approved for one to one replacement in existing installations.

**Comments:**

1. Each particular application is to be specifically approved in conjunction with the relevant engine type and installation.

2. The Manufacturer has provided a declaration about the control of, or the lack of Asbestos in this product.

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### Notes/Drawing/Documentation:

Drawing No. 1-8082\_14-01-03, IP Test Report, Cetecom ICT Services Gmbh, 28-07-2014

Drawing No. 1-8082\_14-01-04, ENV Test Report, Cetecom ICT Services Gmbh, 06-10-2014

Drawing No. 1-8082\_14-01-05-A, EMC Test Report, Cetecom ICT Services Gmbh, 24-09-2014

Drawing No. 1-8082\_14-01-06, Vibration Test Report, Cetecom ICT Services Gmbh, 10-09-2014

Drawing No. DNV-GL\_Zert\_ISO9001\_2017\_e, DNV\_ISO9001\_certificate

Drawing No. Stueckliste1000123\_02a-Sendeplatine VN87plus EX, Parts List

Drawing No. 180081 Manual VN87plusEX\_Ver 1 1 Jan 2015, Manual

Drawing No. Release\_Notes\_VN87plusEx Version, Release\_Notes\_VN87plusEx

Drawing No. VA\_7\_3\_04e\_V03, procedural instruction

Drawing No. Manual\_VISATRON\_VN115-87plus\_EX\_V1-0\_12-2014, Manual 12-2014

Drawing No. 1000122\_02-Sendeplatine-Leiterbahnverlauf, Elektronik of transmitter

Drawing No. Back.jpg, Elektronik of transmitter,

Drawing No. Front.jpg, Elektronik of transmitter

Drawing No. 1000123\_02-Sendeplatine-Schalt-Bestueckungsplan, Elektronik of transmitter

Drawing No. EX-Schutzbeschreibung\_VN115-87plus Ex, Ex-protection description

Drawing No. ATEX141153, ATEX certificate

Drawing No. VN115-87plus EX IBExU14 ATEX 1153 EN, ATEX Certificate, EN

------(Revalidation 2020)-----

Drawing No. 1-8082/14-01-05-B, EMC Test Report, Cetecom ICT Services Gmbh, 08-12-2014

Drawing No. 1000MHz-6000MHz\_VN87plus, EMC Test Report, SGS TUV Saarland Forster Gmbh, 06-12-2019

Drawing No. Manual V2-5\_2017\_08, Manual

Drawing No. VN87 LR Function M67, IACS M67 Functional Test, 09-Sep-2015

Drawing No. VN87plus BV M67, IACS M67 Functional Test, 22-Mar-2017

### Terms of Validity:

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## STANDARDS

### ABS Rules:

2025 Marine Vessel Rules: 1-1-4/7.7, 1-1-A3, 1-1-A4, 4-2-1/7.2.2, 4-2-1-A3, 4-6-5/13.1, 4-8-3/1.7, 4-8-3/1.11, 4-8-3/1.13, 4-8-3/1.17.1, 4-9-6/Tables 1A, 1B, 4-9-9/13.1, 4-9-9/15.7 (Table 1), 5C-8-16/11.1

### National:

NA

### International:

IACS UR E10 (Rev. 9, 2023) except the flame retardant test,

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IACS UR M67 (Rev. 2, 2015)

**Government:**

NA

**EUMED:**

NA

**OTHERS:**

NA