

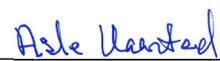
# TYPE EXAMINATION CERTIFICATE

- [2] EQUIPMENT OR PROTECTIVE SYSTEM INTENDED FOR USE IN POTENTIALLY EXPLOSIVE ATMOSPHERES DIRECTIVE 2014/34/EU
- [3] Type Examination Certificate Number: **Presafe 19 ATEX 14080** **Issue 1**
- [4] Product: EX-shaft alignment system
- [5] Manufacturer: Acoem AB
- [6] Address: Östergårdsgatan 9  
431 53. Mölndal  
Sweden
- [7] This product and any acceptable variation thereto is specified in the schedule to this certificate and the documents therein referred to.
- [8] DNV GL Presafe AS certifies that this product has been found to comply with the Essential Health and Safety Requirements relating to the design and construction of products intended for use in potentially explosive atmospheres given in Annex II to Directive 2014/34/EU of the European Parliament and of the Council, dated 26 February 2014.
- The examination and test results are recorded in confidential reports listed in section 16.
- [9] Compliance with the Essential Health and Safety Requirements has been assured by compliance with:  
EN 60079-0: 2018, EN 60079-11: 2012, EN 60079-28: 2015
- [10] If the sign "X" is placed after the certificate number, it indicates that the product is subject to the Specific Conditions of Use specified in the schedule to this certificate.
- [11] This TYPE EXAMINATION CERTIFICATE relates only to the design of the specified equipment and not to specific items of equipment subsequently manufactured.
- [12] The marking of the product shall include the following:

 **II 3 G Ex ic op is IIC T4 Gc , 0°C ≤ Ta ≤ 50 °C**

Date of issue:  
2020-11-16



  
Asle Kaastad  
For DNV GL Presafe AS  
The Certificate has been digitally signed.  
See [www.dnvgl.com/digitalsignatures](http://www.dnvgl.com/digitalsignatures) for info



[13] **Schedule**

[14] **Type Examination Certificate No:** Presafe 19 ATEX 14080 Issue 1

[15] **Description of Product**

The **EX-shaft alignment system** is a portable system, used to align the shafts between two rotating machines. A system consists of a display unit (DU), separately certified (not covered by this certificate), two TD-units, types M4, Model M4 Ex and type S4, Model M4 Ex and mechanical fixtures used to mount the TD-units on the shafts.

The TD-units, covered by this certificate, is powered by rechargeable Li-Ion batteries and includes 650 nm class II diode laser, laser power < 1 mW and Class I Bluetooth transmitter.

The certified EX-shaft alignment tool is complete in the portable transport case, fixtures and charger. The battery charging is to be done, with the designated USB charger, outside the hazardous area. The instrument is not to be active during charging.

**Type designation**

M4, Model M4 Ex  
S4, Model S4 Ex

**Electrical Data**

Battery charging, USB 5.0 V, 0.5 A

**Ambient temperature:**

0°C to +50°C

[16] **Report No.:** 201818

[17] **Specific Conditions of Use**

None

[18] **Essential Health and Safety Requirements**

Essential Health and Safety Requirements (EHSRs) are covered by the standards listed at item 9

[19] **Drawings and documents**

Number	Title	Rev.	Date
EX-0001	Descriptive Document FL EXO	H	2020-07-07

[20] **Certificate History**

Issue	Description	Issue date	Report no.
0	Primary Certificate	2019-04-30	D0001145
1	Minor electronic modification and doc. updates	2020-11-16	201858

END OF CERTIFICATE