



# (1) EU-Type Examination Certificate

(2) Equipment or protective system intended for use in potentially explosive atmospheres - Directive 2014/34/EU

(3) Certificate number: SEV 21 ATEX 0544 X

(4) Product: Flameproof three-phase asynchronous motor

H6DX series, H3DX series

(5) Manufacturer: Hoffmann Technics AG

(6) Address: Sittertalstrassse 34, 9014 St. Gallen, Switzerland

- (7) The equipment and any acceptable variation thereto is specified in the schedule to this certificate and the documents therein referred to.
- (8) Eurofins, notified body No. 1258, in accordance with article 17 of Directive 2014/34/EU of the European parliament and of the council, dated 26 February 2014, 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 the Directive.

The examination and test results are recorded in confidential report no 21CH-00534.X01

(9) Compliance with the essential health and safety requirements has been assured by compliance with:

EN IEC 60079-0:2018 EN 60079-1:2014 EN 60079-31:2014

Except in respect of those requirements listed at item 18 of the schedule.

- (10) If the sign «X» is placed after the certificate number, it indicates that the product is subjected to special conditions for safe use specified in the schedule to this certificate. The sign "U" is placed after the certificate number. It indicates that this certificate must not be mistaken for a certificate intended for an equipment or protective system. This partial certification may be used as a basis for certification of an equipment or protective system.
- (11) This EU type examination certificate relates only to design and construction of the specified product. Further requirements of this directive apply to the manufacturing process and supply of this product. These are not covered by this certificate.

Issue: 0

(12) The marking of the product shall include the following:

EX II 2G Ex db IIA/IIB T4 Gb
II 2D Ex tb IIIA/IIIB/IIIC T120 °C Db

**Eurofins Electric & Electronic Product Testing AG Notified Body ATEX** 

Patrick Gutensohn Product Certification





(13)

## **Appendix**

(14) EU-Type Examination Certificate no. SEV 21 ATEX 0544 X

#### (15) Description of product

#### General product information:

H6DX series motors are variable frequency speed-regulating explosion-proof three-phase asynchronous type while H3DX series motors are high efficiency explosion proof three-phase asynchronous type. H6DX series motors must be connected to external variable frequency power supply.

H6DX series motor is based on H3DX series motor structure. It has two types: structure with built-in fan cooling which is same as H3DX series and structure with auxiliary motor cooling fans (BG series) with independent power supply. Model 80 to 132 comprise of motor base and front/rear end cover while model 160 to model 355 are composed of motor base, front/end cover, front/end internal and external bearings covers. The core rotating part consisting stator, rotor, shaft and rolling-element bearings are equipped on the motor. Terminal boxes incorporated with above two series motors are mainly composed of base and lid. They are equipped with terminal stud, terminal sleeve (or terminal board). Two or one thread entries on terminal boxes are drilled for external wiring connection purpose on-site, and only Ex certified (Ex db) cable glands shall be used. Unused entries shall be closed by Ex certified (Ex db) blanking element. Connection bolts are installed inside for wiring.

Motors supplied by a frequency converter may be equipped with thermal protection devices embedded in the stator winding (one per phase) to ensure the insulation class and temperature class.

The degree of protection of the enclosure is IP65, according to IEC 60079-0 and IEC 60529

Ratings:

Maximum voltage: 1140 V AC, 50/60 Hz;

Maximum power: 315 kW

Classification of installation and use	Stationary
Ingress protection:	IP65
Rated ambient temperature range (°C)	-55 °C +60 °C
Rated ambient temperature range (°C) for Ex Components:	N/A

### Warning labels:

WARNING - FREQUENCY CONVERSION POWER SUPPLY CANNOT BE USED FOR FAN MOTOR WARNING - POTENTIAL ELECTROSTATIC CHARGING HAZARD - SEE INSTRUCTIONS WARNING - FREQUENCY CONVERSION POWER SUPPLY CANNOT BE USED FOR FAN MOTOR CAUTION - USE FASTENERS WITH YIELD STRESS ≥ 640 Mpa

Type designation:

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H6DX series		
H6DX 80		
H6DX 90		
H6DX 100		
H6DX 112		
H6DX 132		
H6DX 160		
H6DX 180		
H6DX 200		



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Issue: 0



H3DX series	H6DX series		
H3DX 225	H6DX 225		
H3DX 250	H6DX 250		
H3DX 280	H6DX 280		
H3DX 315	H6DX 315		
H3DX 355	H6DX 355		
H3DX 400	H6DX 400		
H3DX 450	H6DX 450		

(16) Report number 21CH-00534.X01

#### (17) Specific conditions of use

- The flameproof joints are not intended to be repaired
- Potential electrostatic charging hazard See instruction
- Frequency conversion power supply cannot be used for fan motor
- Warning Only Use Cables Suitable For 135 °C

#### (18) Essential health and safety requirements

In addition to the essential health and safety requirements (EHSRs) covered by the standards listed at item 9, the following are considered relevant to this product, and conformity is demonstrated in the report:

Issue: 0

Clause Subject None

## (19) Drawings and Documents

See test report "Manufacturer's Documents"

