IECEx Certificate of Conformity

INTERNATIONAL ELECTROTECHNICAL COMMISSION
IEC Certification Scheme for Explosive Atmospheres

for rules and details of the IECEx Scheme visit www.iecex.com

Certificate No.:	IECEx DEK 12.0065X	Issue No: 2	Certificate history:
Status:	**Current**	Page 1 of 5	Issue No. 2 (2014-07-25) Issue No. 1 (2014-04-18) Issue No. 0 (2013-01-23)
Date of Issue:	**2014-07-25**		

Applicant: **Magnetrol International N.V.**
Heikensstraat 6
9240 Zele
Belgium

Electrical Apparatus: **Guided Wave Radar Level Transmitter Eclipse Model 706-5...-1.., Model 706-5...-A.. , Model 706-5...-C.. and Eclipse Level Probe Model 7A.-....-...**

Optional accessory: *Eclipse Level Probe Model 7A.-....-... and Model 7C.-....-...*

Type of Protection: **Ex ia; Ex nA [ia]**

Marking: Ex ia IIC T4 Ga or
Ex nA [ia Ga] IIC T4 Ga/Gc or
Ex ic [ia Ga] IIC T4 Ga/Gc

Approved for issue on behalf of the IECEx Certification Body: R. Schuller

Position: Certification Manager

Signature:
(for printed version)

Date: 2014-07-25

1. This certificate and schedule may only be reproduced in full.
2. This certificate is not transferable and remains the property of the issuing body.
3. The Status and authenticity of this certificate may be verified by visiting the Official IECEx Website.

Certificate issued by:

DEKRA Certification B.V.
Meander 1051,
6825 MJ Arnhem
The Netherlands

DEKRA

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Manufacturer: **Magnetrol International N.V.**
Heikensstraat 6
9240 Zele
Belgium

Additional Manufacturing location(s):

Magnetrol International Inc.
705 Enterprise Street
Aurora IL 60504
United States of America

This certificate is issued as verification that a sample(s), representative of production, was assessed and tested and found to comply with the IEC Standard list below and that the manufacturer's quality system, relating to the Ex products covered by this certificate, was assessed and found to comply with the IECEx Quality system requirements. This certificate is granted subject to the conditions as set out in IECEx Scheme Rules, IECEx 02 and Operational Documents as amended.

STANDARDS:

The electrical apparatus and any acceptable variations to it specified in the schedule of this certificate and the identified documents, was found to comply with the following standards:

IEC 60079-0 : 2011 Edition:6.0	Explosive atmospheres - Part 0: General requirements
IEC 60079-11 : 2011 Edition:6.0	Explosive atmospheres - Part 11: Equipment protection by intrinsic safety "i"
IEC 60079-15 : 2010 Edition:4	Explosive atmospheres - Part 15: Equipment protection by type of protection "n"
IEC 60079-26 : 2006 Edition:2	Explosive atmospheres - Part 26: Equipment with equipment protection level (EPL) Ga

*This Certificate **does not** indicate compliance with electrical safety and performance requirements other than those expressly included in the Standards listed above.*

TEST & ASSESSMENT REPORTS:

A sample(s) of the equipment listed has successfully met the examination and test requirements as recorded in

Test Report:

NL/DEK/ExTR12.0063/01

Quality Assessment Report:

CA/CSA/QAR06.0004/08 NL/DEK/QAR11.0031/02

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Schedule

EQUIPMENT:

Equipment and systems covered by this certificate are as follows:

Guided Wave Radar Level Transmitter Eclipse Model 706-5...-... and Eclipse Level Probes Model 7A..-....-... and Model 7C.-....-... are used for level detection, using the TDR (Time Domain Reflectrometry) principle. Model 7..-....-1.. and Model 7..-....-A.. are intrinsically safe versions and Model 7..-....-C.. is a non sparking version with an intrinsically safe Probe connection.
Model 706-51..-.... has an output/supply circuit for connection to a 4 - 20 mA current loop with digital communication (HART) and Model 706-52..-... has an output/supply circuit for connection to a Fieldbus communication.

The transmitter is provided with a display for local read-out and configuration. The maximum probe length is 25 m.

Ambient temperature range -40 °C to +70 °C for type of protection Ex ia and Ex ic.
Ambient temperature range -15 °C to +70 °C for type of protection Ex nA [ia].
Process temparature range -196 °C to +450 °C, depending on the Probe Model.

The transmitter enclosure provides a degree of protection IP66 as per IEC 60529.

Installation instructions

The instructions provided with the equipment shall be followed in detail to assure safe operation.

CONDITIONS OF CERTIFICATION: YES as shown below:

Because the enclosure of the Guided Wave Radar Level Transmitter Eclipse Model 706-5...-.1. and/or Probe Model 7..-....-... is made of aluminium, if it is mounted in an area requiring equipment of EPL Ga, it must be installed such, that, even in the event of rare incidents, ignition sources due to impact and friction sparks are excluded.

EQUIPMENT (continued):

Electrical data

Eclipse Model 706-51..-1.. and Model 706-51..-A.. with Probe Model 7..-....-... .:
Output/supply circuit (terminals + and -):
in type of protection intrinsic safety Ex ia IIC, only for connection to a certified intrinsically safe circuit, with the following maximum values:
U_i = 28.4 V; I_i = 120 mA; P_i = 0.84 W; C_i = 4.4 nF; L_i = 2.7 µH.

Eclipse Model 706-51..-C.. with Probe Model 7..-....-... .:
Output/supply circuit (terminals + and -):
U_n = 36 V; U_m = 250 V.

Eclipse Model 706-52..-1.. and Model 706-52..-A.. with Probe Model 7..-....-... .:
Output/supply circuit (terminals + and -):

in type of protection intrinsic safety Ex ia IIC, only for connection to a certified intrinsically safe circuit, with the following maximum values:
U_i = 28.4 V; I_i = 120 mA; P_i = 0.84 W; C_i = 0.5 nF; L_i = 2.7 µH;
or in type of protection intrinsic safety Ex ia IIC, only for connection to a certified intrinsically safe circuit in accordance with FISCO, with the following maximum values:
U_i = 17.5 V; I_i = 380 mA; P_i = 5.32 W; C_i = 0.5 nF; L_i = 2.7 µH;
or in type of protection intrinsic safety Ex ic IIC, only for connection to a certified intrinsically safe circuit in accordance with FISCO, with the following maximum values:
U_i = 17.5 V; I_i = 570 mA; C_i = 0.5 nF; L_i = 2.7 µH.

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DETAILS OF CERTIFICATE CHANGES (for issues 1 and above):

-Changed Manufacturing address.