



Certificate of Compliance

Certificate: 1980091

Master Contract: 168668

Project: 70017722

Date Issued: November 4, 2015

Issued to: Metso Flow Control

Vanha Porvoontie 229

Vantaa, 01380

Finland

Attention: Juho Pörhönen

The products listed below are eligible to bear the CSA Mark shown with adjacent indicators 'C' and 'US' for Canada and US or with adjacent indicator 'US' for US only or without either indicator for Canada only.



Jelena Dzeletovic

Issued by: Jelena Dzeletovic

PRODUCTS

CLASS 2258 82 - PROCESS CONTROL EQUIPMENT - For Hazardous Locations -
Certified to US Standards

CLASS 2258 02 - PROCESS CONTROL EQUIPMENT - For Hazardous Locations

Class I, Div 1, Groups B, C, D; Class II, Div 1, Groups E, F, G; Class III; T4...T6, Enclosure Type 4X

Ex d IIC T4...T6

AEx d IIC T4...T6

Ex tb IIIC T100°C IP66

AEx tb IIIC T100°C IP66

- Valve Controller Series ND9ccdeE2ghhh Input Rated 32 Vdc, 4...20 mA HART, Profibus PA or Foundation Fieldbus, 1.74 W max; Limit Switch rated max. [32Vdc/5A], [125 Vdc/0.4A], [250 Vac/3A]; Temp. Code T6 at Ambient -40°C to +60 °C; Temp. Code T5 at Ambient -40°C to +75 °C; Temp. Code T4 at Ambient -40°C to +85 °C. Temperature Codes T6/T5/T4 for low temperature option C (ND Series) -53°C to +60°C/+75°C/+85°C, respectively.



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Nomenclature:

ND9ccdeffghhh

cc = Enclosure; 20, 30

d = Spool Valve; 2, 3, 6

e = Communications/input signal range; H, F, P

ff = Approvals; E2

g = Options for Valve Controller; T, J, M, G, C

hhh = I02, I03, I04 I09, I54, I11, I21, I45, I32, I34, I41, I56, I57, I58, I59, I60, D14, D33, D44, K05, K06, B06, R01, R02, R03, R35

- Valve Controller Series SG9cddHE2ghhh and VG9cddeE2ghhh; Input Rated 32 Vdc, 4...20 mA HART or Foundation Fieldbus, 1.05 W max; Limit Switch rated max. [32Vdc/5A], [125 Vdc/0.4A], [250 Vac/3A]; Temp. Code T6 at Ambient -40°C to +60 °C; Temp. Code T5 at Ambient -40°C to +75 °C; Temp. Code T4 at Ambient -40°C to +85 °C.

Nomenclature:

SG9cddHffghhh and VG9cddeffghhh

c = Enclosure; 2, 3

dd = Spool Valve and Connections; 12, 15, 35, 37

e = Communications/input signal range; H, F

ff = Approvals; E2



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g = Options for Valve Controller; S, T, C, J, M, L1, L2

hhh = I02, I03, I04, I09, I54, I11, I21, I45, I32, I34, I41, I56, I57, I58, I59, I60, D14, D33, D44, K25, K26, K45, K46, B06, R01, R02, R03, R35

APPLICABLE REQUIREMENTS

CSA Std C22.2 No.25-1966	Enclosures for Use in Class II, Groups , F and G Hazardous Locations
CSA Std C22.2 No.30-10	Explosion-Proof Enclosures for Use in Class I Hazardous Locations
CAN/CSA-C22.2 No.94-M91	Special Purpose Enclosures
C22.2 No. 142-M1987	Process Control Equipment
CAN/CSA C22.2 61010-1-04	Safety Requirements for Electrical Equipment for Measurement, Control, and Laboratory Use, Part 1: General Requirements.
CAN/CSA-C22.2 No 60079-0-07	Electrical apparatus for explosive gas atmospheres - General Requirements
CAN/CSA-C22.2 No 60079-1-11	Electrical apparatus for explosive gas atmospheres - Construction and Verification test of flameproof enclosures of electrical apparatus
CAN/ CSA C22.2 No 60079-31-12	Explosive atmospheres – part 31: Equipment dust ignition protection by enclosure “t”
CAN/CSA-C22.2 No. 60529-05	Degrees of protection provided by enclosures (IP code)
FM 3600 (1998)	Electrical Equipment for use in Hazardous (Classified) Locations - General Requirements
FM 3615 (2006)	Explosionproof Electrical Equipment General Requirements
FM 3810 (2005)	Electrical and Electronic Test, Measuring and Process Control Equipment
ANSI/ NEMA 250-1991	Enclosures for Electrical Equipment (1000 Volts Maximum)
ISA 60079-0-07	Electrical apparatus for explosive gas atmospheres - General Requirements
ISA 60079-1-07	Electrical apparatus for explosive gas atmospheres - Construction and Verification test of flameproof enclosures of electrical apparatus
ISA 60079-31-2009	Explosive atmospheres – part 31: Equipment dust ignition protection by enclosure “t”
ANSI/IEC 60529:2004	Degrees of protection provided by enclosures (IP code)