

ADDITION

(3) INERIS 05ATEX0025X/02

(4) ASYNCHRONOUS MOTORS Type RL...

(5) Made by RAEL MOTORI ELETTRICI

(15) PURPOSE OF THE ADDITION

- Application of new standards
EN 60079-0 : 2006 EN 61241-0 : 2006 EN 60079-7 : 2003
EN 60079-1 : 2004 EN 61241-1 : 2004
- Introduction of five new motors, type RL56, RL100, RL112, RL132 and RL160.
- The motors type RL 56 up to RL90 can be used with direct cable entry without terminal box.

PARAMETERS RELATING TO THE SAFETY

The parameters relating to the safety for the new types are :

Electrical characteristic :

Maximum supply voltage : 690 V
Frequencies : 50/60 Hz
Power of motors : from 0.06 kW to 18.5 kW
Isolation class : F

Frequency variation :

Range of variable frequencies : 1 to 200 Hz
The maximum power of motors varies according to the type of the motor and the electric characteristics.

The various powers are specified in the descriptive documents.

Characteristic of the thermal probes fitting on the motors, with frequency inverter, double speed quadratic or constant torque and single-phase :

Threshold of release :

- $70^{\circ}\text{C} \pm 5^{\circ}\text{C}$ for temperature class T6 or T85°C,
- $90^{\circ}\text{C} \pm 5^{\circ}\text{C}$ for temperature class T5 or T100°C,
- $120^{\circ}\text{C} \pm 5^{\circ}\text{C}$ for temperature class T4 or T135°C,

MARKING

The marking is modified as follow:

I - MOTOR CATÉGORY II 2 G :

I - A Communicating motor size RL56 up to RL90 and terminal box enclosures (Version Ex d), without fan

RAEL MOTORI ELETTRICI

I - 15077 Predosa (AL)

RL..... (*)

INERIS 05ATEX0025X

(Serial number)

(Year of construction)

Ex II 2 G

Ex d IIC (**)

T_{amb} : (***)

T.Cable : (****)

WARNINGS : DO NOT OPEN WHEN ENERGIZED
WAIT 30 MINUTES BEFORE OPENING (1)

Temperature class (**)	Range of ambient temperature (***)	Cable temperature (****)
T5	-20°C to 40°C	90°C
T4	-20°C to 50°C	100°C
T4	-20°C to 60°C	110°C

(*) Type is completed by numbers and/or letters corresponding to manufacturing variation.

(***) Indication of ambient temperature ranges only if it is different from -20°C to 40°C.

(1) Waiting only for motors without internal probe.

I - B Communicating motor size RL56 up to RL90 and terminal box enclosures or motor without terminal box (Version Ex d), with fan

RAEL MOTORI ELETTRICI

I - 15077 Predosa (AL)

RL..... (*)

INERIS 05ATEX0025X

(Serial number)

(Year of construction)

Ex II 2 G

Ex d IIC (**)

T_{amb} : (***)

T.Cable : (****)

WARNINGS : DO NOT OPEN WHEN ENERGIZED
WAIT 30 MINUTES BEFORE OPENING (1)

Temperature class (**)	Range of ambient temperature (***)	Cable temperature (****)
T6	-20°C to 40°C	NC
T5	-20°C to 50°C	85°C
T4	-20°C to 60°C	95°C

- (*) Type is completed by numbers and/or letters corresponding to manufacturing variation.
 (***) Indication of ambient temperature ranges only if it is different from -20°C to 40°C.
 (1) Waiting only for motors without internal probe and for motor without terminal box for the temperature class T6, T85°C, T5 and T100°C.

I - C Separate motor and terminal box enclosures (Version Ex d), with fan

RAEL MOTORI ELETTRICI

I - 15077 Predosa (AL)

RL..... (*)

INERIS 05ATEX0025X

(Serial number)

(Year of construction)

Ex II 2 G

Ex d IIC (**)

T_{amb} : (***)

WARNING : DO NOT OPEN WHEN ENERGIZED

	Range of ambient temperature (***)	Cable temperature (****)
T6	-20°C to 40°C	NC
T5	-20°C to 50°C	NC
T4	-20°C to 60°C	90°C

- (*) Type is completed by numbers and/or letters corresponding to manufacturing variation.
 (***) Indication of ambient temperature ranges only if it is different from -20°C to 40°C.

I - D Separate motor and terminal box enclosures (Version Ex de), with fan

RAEL MOTORI ELETTRICI

I - 15077 Predosa (AL)

RL..... (*)

INERIS 05ATEX0025X

(Serial number)

(Year of construction)

Ex II 2 G

Ex d e IIC (**)

T_{amb} : (***)

WARNING: DO NOT OPEN WHEN ENERGIZED

On the motor :

- The code "d"

On the terminal box :

- The code "e"
- (rated voltage and rated current and/or rated power)

Temperature class (**)	Range of ambient temperature (***)	Cable temperature (****)
T6	-20°C to 40°C	NC
T5	-20°C to 50°C	80°C
T4	-20°C to 60°C	90°C

- (*) Type is completed by numbers and/or letters corresponding to manufacturing variation.
 (***) Indication of ambient temperature ranges only if it is different from -20°C to 40°C.

II - MOTOR CATEGORY II 2 GD

II - A Communicating motor size RL56 up to RL90 and terminal box enclosures (Version Ex d), without fan

RAEL MOTORI ELETTRICI

I - 15077 Predosa (AL)

RL..... (*)

INERIS 05ATEX0025X

(Serial number)

(Year of construction)

 II 2 GD

Ex d IIC (**)

Ex tD A21 IP(****) T(**)

T_{amb} : (***)

T.Cable : (****)

WARNINGS : DO NOT OPEN WHEN ENERGIZED
 WAIT 30 MINUTES BEFORE OPENING (1)

Temperature class (**)		Range of ambient temperature (***)	Cable temperature (****)
Gas	Dust		
T5	T100°C	-20°C to 40°C	90°C
T4	T135°C	-20°C to 50°C	100°C
T4	T135°C	-20°C to 60°C	110°C

- (*) Type is completed by numbers and/or letters corresponding to manufacturing variation.
 (***) Indication of ambient temperature ranges only if it is different from -20°C to 40°C.
 (****) IP65 or IP66.
 (1) Waiting only for motors without internal probe.

II - B Communicating motor size RL56 up to RL 90 and terminal box enclosures or motor without terminal box (Version Ex d), with fan

RAEL MOTORI ELETTRICI

I - 15077 Predosa (AL)

RL..... (*)

INERIS 05ATEX0025X

(Serial number)

(Year of construction)

 II 2 GD

Ex d IIC (**)

Ex tD A21 IP(****) T(**)

T_{amb} : (***)

T.Cable : (****)

WARNINGS : DO NOT OPEN WHEN ENERGIZED
 WAIT 30 MINUTES BEFORE OPENING (1)

Temperature class (**)		Range of ambient temperature (***)	Cable temperature (****)
Gas	Dust		
T6	T85°C	-20°C to 40°C	NC
T5	T100°C	-20°C to 50°C	85°C
T4	T135°C	-20°C to 60°C	95°C

(*) Type is completed by numbers and/or letters corresponding to manufacturing variation.

(***) Indication of ambient temperature ranges only if it is different from -20°C to 40°C.

(****) IP65 or IP66.

(1) Waiting only for motors without internal probe and for motor without terminal box for the temperature class T6, T85°C, T5 and T100°C.

II - C Separate motor and terminal box enclosures (Version Ex d), with fan

RAEL MOTORI ELETTRICI

I - 15077 Predosa (AL)

RL..... (*)

INERIS 05ATEX0025X

(Serial number)

(Year of construction)

 II 2 GD

Ex d IIC (**)

Ex tD A21 IP(****) T(**)

T_{amb} : (***)

WARNING : DO NOT OPEN WHEN ENERGIZED

Temperature class (**)		Range of ambient temperature (***)	Cable temperature (****)
Gas	Dust		
T6	T85°C	-20°C to 40°C	NC
T5	T100°C	-20°C to 50°C	NC
T4	T135°C	-20°C to 60°C	90°C

(*) Type is completed by numbers and/or letters corresponding to manufacturing variation.

(***) IP65 or IP66.

(****) Indication of ambient temperature ranges only if it is different from -20°C to 40°C.

II - D Separate motor and terminal box enclosures (Version Ex de), with fan

RAEL MOTORI ELETTRICI

I - 15077 Predosa (AL)

RL..... (*)

INERIS 05ATEX0025X

(Serial number)

(Year of construction)

 II 2 GD

Ex d e IIC (**)

Ex tD A21 IP(****) T(**)

T_{amb} : (****)

WARNING: DO NOT OPEN WHEN ENERGIZED

On the motor :

- The code "d"

On the terminal box :

- The code "e"
- (rated voltage and rated current and/or rated power)

Temperature class (**)		Range of ambient temperature (***)	Cable temperature (****)
Gas	Dust		
T6	T85°C	-20°C to 40°C	NC
T5	T100°C	-20°C to 50°C	NC
T4	T135°C	-20°C to 60°C	90°C

(*) Type is completed by numbers and/or letters corresponding to manufacturing variation.

(***) IP65 or IP66.

(****) Indication of ambient temperature ranges only if it is different from -20°C to 40°C.

Marking may be carried out in the language of the country of use.

The protective system or equipment has also to carry the marking normally stipulated by its construction standards.

ROUTINE EXAMINATIONS AND TESTS

The routine examinations and tests are modified as follow:

In accordance with clause 16.2 of the EN 60079-1 standard, the equipment defined above is exempted of routine test in owing to the fact that it has undergone a static type test at 4 times the reference pressure.

In accordance with clause 7.2 of the EN 60079-7 standard, a test of dielectric strength for the version with terminal box protected by increased safety on each of the different circuits of the connection units, performed according to the relevant standards, the test voltage being applied during one minute.

(16) DESCRIPTIVE DOCUMENTS

The descriptive document quoted hereafter constitutes the technical documentation describing the modificationS of the equipment, subject of this present addition.

Certification file n° RAEL-004 of 2008.05.20 (25 rubrics)

signed on 2009.04.15

(17) SPECIAL CONDITIONS FOR SAFE USE

The special conditions for safe use are completed as follows :

The diametral clearance of the shaft, for motore RL 56, is less than the value indicated on the table 2 of the standard EN 60079-1 (0.20 mm).

(18) **ESSENTIAL SAFETY AND HEALTH REQUIREMENTS**

The respect of the Essential Health and Safety Requirements is completed as follows:

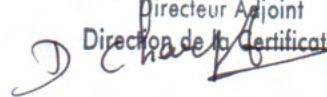
- Conformity to the standards quoted on page 1, clause (15).
- All provisions adopted by the manufacturer and defined in the descriptive documents.

Verneuil-en-Halatte, 2009 06 16

Dominique CHARPENTIER

Directeur Adjoint

Direction de la Certification



Director of the Certifying Body,
By delegation

T. HOUEIX

Certification Officer
Certification Division

