



Certificate no. TAI-FS-C-20-0033

WE HEREBY CERTIFY THAT

Product description HYDRAULIC COMPACT HELICAL SLOT SPRING RETURN ACTUATOR
Models SERIES UCROM
Manufacturer SERVOVALVE S.p.A.
Via Giotto 29
I-20145 Milano (MI)

IS IN COMPLIANCE WITH THE REQUIREMENTS OF THE STANDARDS

IEC 61508 Parts 1–7:2010

AS RESULT OF THE ASSESSMENT ACCORDING TO THE PROVISION SET OUT IN THE ABOVE-MENTIONED STANDARDS

Summary Report no. TAI-FS-R-20-0063

Expiry date 11.10.2023

Issue date 12.10.2020

12.10.2020, Monte Roberto (AN)

Ing. Crescenzo Di Fratta

Annex to certificate no. TAI-FS-C-20-0033

Type	A
HFT	0
Safety functions	1. Delivery of a full stroke (90° ± tolerance) driven by the spring, with power fluid exhausted from the cylinder through the control system
Mode of operation	Low Demand Mode


Random failure rates				
Configuration	Safety function	λ_{DU} [1/h]	λ_{DD} [1/h]	λ_S [1/h]
UCROM - No PST	1	5,94E-08	0,00E+00	0,00E+00
UCROM - With PST	1	5,35E-09	5,41E-08	0,00E+00

Systematic capability	3 (Route 1s applied)			
Architectural constraints	Route 1_H:	Applied	Route 2_H:	Applied
	The product can be used in: <ul style="list-style-type: none"> • single channel configuration: <ul style="list-style-type: none"> ○ up to SIL 2 without external diagnostic tests ○ up to SIL 3 considering external diagnostic tests • double channel configuration: up to SIL 3 			

Remarks:

- For further details, including environmental conditions, limitations of use, lifetime, failure rates traceability, mean repair times, common cause factors and systematic capability constraints, make reference to Safety Manual SM-05.

END OF CERTIFICATE



Ing. Crescenzo Di Fratta