

Date: 09.05.2022

To Hansford Sensors

Artisan, Hillbottom Road, Sands Industrial Estate,

High Wycombe HP12 4HJ 8824

UK

OFFICIAL STATEMENT ABOUT RELIABILITY METRICS FOR ISO 13849-1

To Whom it May Concern:

HON Consulting S.r.l. dba BYHON, ANSI Accreditation ID #8914, carried out a reliability study for the following products:

MANUFACTURER	HANSFORD SENSORS
MODEL	HS-150 & HS-170 & HS-173 & HS-070 Premium Series Accelerometer
ELECTRICAL SCHEMATIC REFERENCE	P03.055.C
SAFETY FUNCTIONS	Provide an output signal proportional to the measured acceleration

After performing the FMEDA on the products, the following parameters can be defined:

λ _s (FIT)	42,8
λ _{DU} (FIT)	29,1
λ _{DD} (FIT)	27,3
DC	48%
MTTFd (h)	3,43E+07
MTTF (h)	1,00E+07

Notes:

- The diagnostic part of failure rates is present in case of out-of-range diagnosed by Logic Solver, otherwise all failure rates shall be considered as λ_{DU} and MTTF.
- All failure fates are in FIT (Failure In Time 1 FIT = 1 failure / 10⁹ hours).
- This declaration is not intended to demonstrate compliance with Standards relating to functional safety.

Sincerely,
Francesco Rosati,
Certification Director