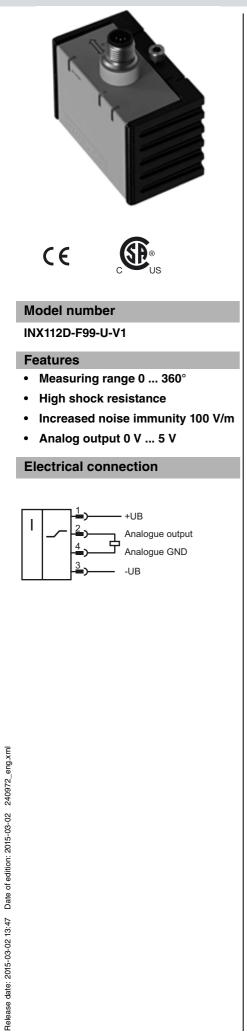
## **Inclination sensor**



$\begin{array}{c c c c c c c } MTF_d & 390 a \\ Mission Time (T_M) & 20 a \\ Diagnostic Coverage (DC) & 0 % \\ Indicators/operating means \\ Operatin indicator & LED, green \\ \hline \hline \\ Electrical specifications & \\ Operatin indicator & LED, green \\ \hline \\ Electrical specifications & \\ Oho-load supply current I_b & \leq 25 m A \\ Time delay before availability t_v & \leq 200 ms \\ Analog output & \\ Output type & 1 voltage output 0 5 V \\ Load resistor & \geq 1 kQ \\ Ambient conditions & \\ Ambient conditions & \\ Ambient apperature & -40 85 °C (-40 185 °F) \\ Mechanical specifications & \\ Connection type & 4-pin, M12 x 1 connector \\ Housing material & PA \\ Degree of protection & IP66 / IP69K \\ Mass & 240 g \\ Factory settings & \\ Analog output & 78.75 ° 191.25 ° \\ Compliance with standards and \\ directives & \\ Standard conformity & \\ Stock and impact resistance & 100 g according to DIN EN 60068-2-27 \\ Standards & EN 60947-5-2:2007 \\ IEC 60947-5-2:2007 \\ IEC 60947-5-2:2007 \\ IEC MCP opperties & \\ Emitted interference in accordance with ISO 7637-2: \\ Pulse & 1 & 2a & 2b & 3a & 3b & 4 \\ Severity level & II & III & III & III & III \\ Figure ot 2 & 2b & 3a & 3b & 4 \\ Severity level & II & 1II & III & III & III \\ Figure ot 2 & 2b & 3a & 3b & 4 \\ Severity level & II & 1II & III & III & III \\ Figure ot 2 & 2b & 3a & 3b & 4 \\ Severity level & IV & V & V & V \\ Severity level & IV & IV & V \\ Severity level & IV & IV & V \\ Severity level & IV & IV & V \\ Severity level & IV & IV & V \\ Severity level & IV & IV & V \\ Severity level & IV & IV & Severity level & III \\ EN 61000-4.8; & 10 V(0.0180 MHz) \\ Severity level & III \\ EN 6100-4.8; & 10 V(0.0180 MHz) \\ Severity level & III \\ Hi & EN 6100-4.8; & IV (0.0180 MHz) \\ Severity level & III \\ Hi & EN 6100-4.8; & IV (0.0180 MHz) \\ Severity level & II \\ Hi & Severity level & III \\ Hi & Severity level & $		Dat	a									
Measurement range         0 360 °           Absolute accuracy         ≤ ± 0.5 °           Response delay         ≤ 20 ms           Resolution         ≤ 0.1 °           Repost accuracy         ≤ ± 0.1 °           Temperature influence         ≤ 0.27 °/K           Functional safety related parameters         0 360 °           MTFg         390 a           Mission Time (Tw)         20 a           Diagnostic Coverage (DC)         0 %           Indicators/operating means         0 30 V DC           Operation foldiage Ug         10 30 V DC           No-load supply current lo         ≤ 25 mA           Time delay before availability to         200 ms           Analog output         2 1 voltage output 0 5 V           Coda supply current lo         ≤ 25 mA           Time delay before availability to         2 00 ms           Analog output         - 40 85 °C (-40 185 °F)           Output type         1 voltage output 0 5 V           Connection type         4-pin, M12 x 1 connector           Housing material         PA           Degree of protection         IP66 / IP69K           Mass         240 g           Standard conformity         CSA aug proval		cation	S				In aliz - ti		1 avi-			
Absolute accuracy $\leq \pm 0.5$ Response delay $\leq 0.01$ Resolution $\leq 0.1$ Repeat accuracy $\leq \pm 0.1$ Temperature influence $\leq 0.027$ Functional safety related parameters       MTTFg         Mission Time (T <sub>M</sub> )       20 a         Diagnostic Coverage (DC)       0%         Indicators/operating means       Operation indicator         LEctrical specifications       EUCy green         Electrical specifications       To 30 V DC         No-load supply current I <sub>b</sub> $\leq 25$ mA         Time delay before availability I <sub>v</sub> $\leq 200$ ms         Analog output       Towlade output 0 5 V         Load resistor $\geq 1$ kQ         Ambient conditions       Ambient conditions         Connection type       4-pin, M12 x 1 connector         Housing material       PA         Degree of protection       IP68 / IP69K         Mass       240 g         Factory settings       Connector Hype         Analog output       78.75 ° 191.25 °         Compliance with standards and directives       Standard conformity         Shandard Conformity       GCSA approval         CSA approval       CCSAus Lis												
Response delay         ≤ 20 ms           Resolution         ≤ 0.1 °           Repeat accuracy         ≤ ± 0.1 °           Temperature influence         ≤ 0.027 °/K           Functional safety related parameters         Operation indicator           MTFrg.         390 a           Mission Time (T <sub>M</sub> )         20 a           Diagnostic Coverage (DC)         0 %           Indicators/operating means         Operation indicator           Operation indicator         LED, green           Electrical specifications         0           Operation indicator         LED, green           Electrical specifications         0           Operation indicator         LED, green           Compation tope         1 voltage output 05 V           Load resistor         ≥ 1 kΩ           Analog output         -40 85 °C (-40 185 °F)           Storage temperature         -40 85 °C (-40 185 °F)           Mechanical specifications         Connection type           Connection type         4 pin, M12 x 1 connector           Housing material         PA           Analog output         78.7 ° 191.25 °           Compliance with standards and directives         Standard conformitly           Standard conformitly												
Presolution $\leq 0.1^{\circ}$ Repeat accuracy $\leq \pm 0.1^{\circ}$ Temperature influence $\leq 0.027^{\circ}$ %K         Functional safety related parameters       Minsion Time (T <sub>M</sub> )       20 a         Diagnostic Coverage (DC)       0 %         Indicators/operating means       ELD, green         Operation indicator       LED, green         Electrical specifications       Electrical specifications         Operating voltage U <sub>B</sub> 10 30 V DC         No-load supply current U <sub>b</sub> $\leq 25$ mA         Time delay before availability U <sub>v</sub> $\leq 200$ ms         Analog output       0 85 °C (-40 185 °F)         Obtain temperature       -40 85 °C (-40 185 °F)         Misein conditions       Ambient conditions         Ambient conditions       PA         Degree of protection       IP68 /IP69K         Mass       240 g         Factory settings       Connector         Analog output       78.75 ° 191.25 °C         Compliance with standards and directives       IStandard conformity         Standard conformity       CSA approval         CAS approval       CCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       CSA approval <t< td=""><td colspan="6">•</td><td colspan="5"></td></t<>	•											
Temperature influence         ≤ 0.027 °/k           Functional safety related parameters         390 a           Mission Time (T <sub>N</sub> )         20 a           Diagnostic Coverage (DC)         0 %           Indicators/operating means         Doperation indicator         LED, green           Electrical specifications         Electrical specifications         Operating voltage U <sub>B</sub> 10 30 V DC           No-load supply current I <sub>b</sub> ≤ 25 mA         Standard         Standard           Output type         1 voltage output 0 5 V         Load resistor         ≥ 1 kΩ           Ambient conditions         Ambient conditions         Ambient conditions         Ambient conditions           Connection type         4-0 85 °C (-40 185 °F)         Storage temperature         -40 85 °C (-40 185 °F)           Boardian and type         4-10 85 °C (-40 185 °F)         Storage temperature         -40 85 °C (-40 185 °F)           Connection type         4-pin, M12 x 1 connector         Housing material         PA           Degree of protection         IP68 / IP69K         Mass         240 g           Factory settings         Conditions         Compliance with standards and directives         Compliance with standards and U ga coording to DIN EN 60068-2-27           Standard conformity         Stock and i												
Functional safety related parameters         390 a           MTTF <sub>d</sub> 390 a           Mission Time (T <sub>ki</sub> )         20 a           Diagnostic Coverage (DC)         0 %           Indicators/Operating means         LED, green           Coperation indicator         LED, green           Electrical specifications         20 a           Operating voltage U <sub>B</sub> 10 30 V DC           No-load supply current I <sub>b</sub> ≤ 25 m A           Time delay before availability t <sub>v</sub> ≤ 20 m B           Analog output         1 voltage output 0 5 V           Output type         1 voltage output 0 5 V           Analog mutput type         40 85 °C (-40 185 °F)           Storage temperature         -40 85 °C (-40 185 °F)           Connection type         49A           Page of protector         PA           Degree of protector         PA           Page output 0         PA           Analog output         YA           Compliance with standards and drote output 0 5 ° 191.25 °           Compliance with standards and corresting         EN 60947-52:2007           Standard conformity         Standard conformity         Standard conformity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval)	Repeat accura	асу					$\leq$ ± 0.1 °					
$\begin{array}{c c c c c c c c c c c c c c c c c c c $							$\leq 0.027$ °	'/K				
Mission Time (T <sub>M</sub> )       20 a         Diagnostic Coverage (DC)       0 %         Diagnostic Coverage (DC)       0 %         Diagnostic Coverage (DC)       0 %         Deparation indicator       LED, green         Electrical specifications          Contrad supply current 1 <sub>0</sub> ≤ 25 m A         Time delay before availability t <sub>v</sub> ≤ 20 ms         Analog output       > 1 voitage output 0 5 V         Codr esistor       ≥ 1 kΩ         Ambient temperature       -40 85 °C (-40 185 °F)         Storage temperature       -40 85 °C (-40 185 °F)         Connection type       4-pin, M12 x 1 connector         Housing material       PA         Degree of protection       P68 / IP69K         Mass       240 g         Factory settings       78.75 ° 191.25 °         Compliance with standards and directives       Standard conformity         Standard conformity       cCSA us Listed, General Purpose, Class 2 Power Source         CApprovals and certificates       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSAus Listed, General Purpose, Class 2 Power Source         Emited interference in munity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval) interference in munity in accordance w		ty rela	ited pa	arame	ters							
Diagnostic Coverage (DC)         0 %           Indicators/operating means         Operation indicator         LED, green           Electrical specifications         0 30 V DC           No-load supply current l <sub>0</sub> ≤ 25 mA           Time delay before availability t <sub>v</sub> ≤ 200 ms           Analog output         0 30 V DC           Output type         1 voltage output 0 5 V           Load resistor         ≥ 1 kΩ           Ambient conditions	•	(T)										
Indicators/operating means       LED, green         Operation indicator       LED, green         Electrical specifications       0         Operating voltage Ug       1030 V DC         No-load supply current Ig       ≤ 25 mA         Time delay before availability t <sub>v</sub> ≤ 20 ms         Analog output       Output type         Output type       1 voltage output 0 5 V         Load resistor       ≥ 1 kΩ         Ambient temperature       -40 85 °C (-40 185 °F)         Storage temperature       -40 85 °C (-40 185 °F)         Mechanical specifications       Connection type         Connection type       4-pin, M12 x 1 connector         Housing material       PA         Degree of protection       IP68 / IP69K         Mass       240 g         Factory settings       -40 g according to DIN EN 60068-2-27         Standard conformity       78.75 ° 191.25 °         Standard conformity       cCSA us Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSA us Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSA us Listed, General Purpose, Class 2 Power Source         Emitted interference in accordance with ISO 7637-2:       Puise         Puise       1 2												
Operation indicato         LED, green           Electrical specifications         0 30 V DC           No-load supply current l <sub>0</sub> ≤ 25 mA           Time delay before availability t <sub>v</sub> ≤ 200 ms           Analog output         0 30 V DC           Output type         1 voltage output 0 5 V           Lad resistor         ≥ 1 kΩ           Ambient conditions	0	0	· · /				0 /8					
Electrical specifications       10 30 V DC         Operating voltage Up       10 30 V DC         No-load supply current I <sub>0</sub> $\leq$ 25 mA         Time delay before availability t <sub>v</sub> $\leq$ 200 ms         Analog output $\geq$ 1 voltage output 0 5 V         Load resistor $\geq$ 1 kΩ         Ambient conditions       -40 85 °C (-40 185 °F)         Storage temperature       -40 85 °C (-40 185 °F)         Connection type       4-pin, M12 x 1 connector         Housing material       PA         Degree of protection       IP68 / IP69K         Mass       240 g         Factory settings       -         Analog output       78.75 ° 191.25 °         Compliance with standards and directives       100 g according to DIN EN 60068-2-27         Standard conformity       Standards         Standards       EN 60947-5-2:2007         EMC Propertise       100 g according to DIN EN 60068-2-27         Standards       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Propertise       cCSAus Listed, General Purpose, Class 2 Power Source         EINE Of 1042:10 V/m       Frequency band 20 MHz up to 2 GHz         Mainsborne interference inmunity in accordance with NO 7637-2:         Pulse       1 2		-					LED, gree	ən				
No-load supply current l₀         ≤ 25 mA           Time delay before availability t₀         ≤ 200 ms           Analog cutput            Output type         1 voltage output 0 5 V           Load resistor         ≥ 1 k2           Ambient conditions            Rechanical specifications         -40 85 °C (-40 185 °F)           Mechanical specifications         -4pin, M12 x 1 connector           Housing material         PA           Degree of protection         IP68 / IP69K           Mass         240 g           Factory settings         -4nalog output           Analog output         78.75 ° 191.25 °           Compliance with standards and directives         100 g according to DIN EN 60068-2-27           Standard conformity         EIC 60947-5-2:2007           Shock and impact resistance         100 g according to DIN EN 60068-2-27           Standards         cCSAus Listed, General Purpose, Class 2 Power Source           EMC Properties         cCSAus Listed, General Purpose, Class 2 Power Source           EINS 11452 ·	Electrical spec	ificatio	ns				, 0					
Time delay before availability t₀       ≤ 200 ms         Analog output       Utput type       1 voltage output 0 5 V         Output type       ≥ 1 kΩ         Ambient conditions       >         Ambient temperature       -40 85 °C (-40 185 °F)         Storage temperature       -40 85 °C (-40 185 °F)         Mechanical specifications       -         Connection type       -40 85 °C (-40 185 °F)         Mechanical specifications       -         Connection type       -40 85 °C (-40 185 °F)         Mechanical specifications       -         Connection type       -40 85 °C (-40 185 °F)         Mechanical specifications       -         Connection type       -40 85 °C (-40 185 °F)         Mechanical specifications       -         Connection type       -40 85 °C (-40 185 °F)         Mass       -         Connection type       -40 85 °C (-40 185 °F)         Mass       -         Standard conformity       78.75 ° 191.25 °         Shandard conformity       100 g according to DIN EN 60068-2-27         Standards       CSA approval       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       -	Operating volt	age U <sub>B</sub>	3				10 30 \	/ DC				
Analog output <ul> <li></li></ul>												
Output type       1 voltage output 0 5 V         Load resistor $\geq 1$ KQ         Ambient conditions       -40 85 °C (-40 185 °F)         Storage temperature       -40 85 °C (-40 185 °F)         Mechanical specifications       -40 85 °C (-40 185 °F)         Connection type       4-pin, M12 x 1 connector         Housing material       PA         Degree of protection       IP68 / IP69K         Mass       240 g         Factory settings		fore av	ailabili	ty t <sub>v</sub>			≤ 200 ms					
Load resistor       ≥ 1 kΩ         Ambient conditions       -4085 °C (-40185 °F)         Storage temperature       -4085 °C (-40185 °F)         Storage temperature       -4085 °C (-40185 °F)         Mechanical specifications       -4085 °C (-40185 °F)         Connection type       4-pin, M12 x 1 connector         Housing material       PA         Degree of protection       IP68 / IP69K         Mass       240 g         Factory settings	• •								<b>5</b> \ (			
Ambient conditions       -40 85 °C (-40 185 °F)         Storage temperature       -40 85 °C (-40 185 °F)         Mechanical specifications       -40 85 °C (-40 185 °F)         Mechanical specifications       -40 85 °C (-40 185 °F)         Connection type       4-pin, M12 x 1 connector         Housing material       PA         Degree of protection       IP68 / IP69K         Mass       240 g         Factory settings       78.75 ° 191.25 °         Analog output       78.75 ° 191.25 °         Compliance with standards and directives       100 g according to DIN EN 60068-2-27         Standard conformity       Standards         Standards       EN 60947-5-2:2007         IEC 60947-5-2:2007       IEC 60947-5-2:2007         Standards       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSAus Listed, General Purpose, Class 2 Power Source         Frequency band 20 MHz up to 2 GHz       requency band 20 MHz up to 2 GHz         Mains-borne interference in accordance with ISO 7637-2:       Pulse         1       2a       2b       3a       3b         Severity level       III       III       III							-	oulput 0.	5 V			
Ambient temperature       -40       85 °C (-40       185 °F)         Storage temperature       -40       85 °C (-40       185 °F)         Mechanical specifications       Connection type       40       85 °C (-40       185 °F)         Connection type       -40       85 °C (-40       185 °F)       191		tions					- 1 1122					
Storage temperature       -40 85 °C (-40 185 °F)         Mechanical specifications       4-pin, M12 x 1 connector         Connection type       4-pin, M12 x 1 connector         Housing material       PA         Degree of protection       IP68 / IP69K         Mass       240 g         Factory settings							-40 85	°C (-40	. 185 °F)			
Mechanical specifications       4-pin, M12 x 1 connector         Housing material       PA         Degree of protection       IP68 / IP69K         Mass       240 g         Factory settings								· ·	,			
Housing material       PÅ         Degree of protection       IP68 / IP69K         Mass       240 g         Factory settings       78.75 ° 191.25 °         Analog output       78.75 ° 191.25 °         Compliance with standards and directives       100 g according to DIN EN 60068-2-27         Standard conformity       50 g according to DIN EN 60068-2-27         Standards       EN 60947-5-2:2007 IEC 60947-5-2:2007         Approvals and certificates       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       Entited interference immunity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval)         Interference inmunity in accordance with ISO 7637-2:       Pulse         Pulse       1       2a       2b       3a       3b         Severity level       II       III       III       III       III         Failure criterion       C       A       C       C         Severity level       IV       IV       IV       IV         Severity level       IV       IV       IV       IV         Severity level       IV       IV       IV       IV         Severity level	• •		tions						/			
Degree of protection         IP68 / IP69K           Mass         240 g           Factory settings         78.75 ° 191.25 °           Analog output         78.75 ° 191.25 °           Compliance with standards and directives         78.75 ° 191.25 °           Standard conformity         78.75 ° 191.25 °           Standard conformity         100 g according to DIN EN 60068-2-27           Standards         EN 60947-5-2:2007 IEC 60947-5-2:2007           Approvals and certificates         cCSAus Listed, General Purpose, Class 2 Power Source           EMC Propertis         cCSAus Listed, General Purpose, Class 2 Power Source           Emitted interference immunity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval)           Inference immunity in accordance with ISO 7637-2:           Pulse         1         2         2         3         3         4           Severity level         III         III         III         III         III           Faiture criterion         C         A         C         EN 6100-4-2:         CD: 8 kV         A         C           EN 61000-4-2:         CD: 8 kV         A         C         EN 6100-4-3:         30 V/m (802500 MHz)         EN 6100-4-4:         2 kV         Severity level         IV         IV								2 x 1 con	nector			
Mass       240 g         Factory settings       78.75 ° 191.25 °         Compliance with standards and directives       78.75 ° 191.25 °         Standard conformity       100 g according to DIN EN 60068-2-27         Standards       EN 60947-5-2:2007 IEC 60947-5-2:2007         Standards       CCSA us Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSAus Listed, General Purpose, Class 2 Power Source         Emitted interference and interference immunity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval)         Interference immunity in accordance with ISO 7637-2:         Pulse       1       2a       2b       3a       3b       4         Severity level       III       III       III       III       III       III         Faiure criterion       C       A       C       A       C       EN 61000-4-2:       CD: 8 kV       / AD: 15 kV       Severity level       IV       IV       IV         Severity level       IV       IV       IV       EN 61000-4-3:       30 V/m (802500 MHz)       Severity level       IV       IV       IV       IV       IV       IV       IV       IV       IV       IV <td< td=""><td>•</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></td<>	•											
Factory settings       78.75 ° 191.25 °         Compliance with standards and directives       78.75 ° 191.25 °         Standard conformity       100 g according to DIN EN 60068-2-27         Standards       EN 60947-5-2:2007         Standards       EN 60947-5-2:2007         Approvals and certificates       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSAus Listed, General Purpose, Class 2 Power Source         Emitted interference and interference immunity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval)         Interference immunity in accordance with ISO 7637-2:         Pulse       1       2a       2b       3a       3b       4         Severity level       III       III       III       III       III       III         Failure criterion       C       A       C       A       C         EN 61000-4-2:       CD: 8 kV       /       AD: 15 kV       Severity level       IV       IV         EN 61000-4-3:       30 V/m (802500 MHz)       Severity level       IV       IV       Severity level       III       EN 61000-4-6:       10 V (0.0180 MHz)       Severity level       III       EN 61000-4-6:       10 V (0.0180 MHz)       Severity level       III       Severity level       III <td>• •</td> <td>ection</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td>59K</td> <td></td> <td></td> <td></td> <td></td>	• •	ection						59K				
Analog output       78.75 ° 191.25 °         Compliance with standards and directives       100 g according to DIN EN 60068-2-27         Standard conformity       100 g according to DIN EN 60068-2-27         Standards       EN 60947-5-2:2007         IEC 60947-5-2:2007       IEC 60947-5-2:2007         Reprovals and certificates       cCSA us Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       cCSAus Listed, General Purpose, Class 2 Power Source         Emitted interference and interference immunity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval)         Interference immunity in accordance with ISO 7637-2:         Pulse       1       2a       2b       3a       3b       4         Severity level       III       III       III       III       III       III         Failure criterion       C       A       C       EN 61000-4-2:       CD: 8 kV       /       AD: 15 kV         Severity level       IV       IV       IV       IV       EN 61000-4-3:       30 V/m (802500 MHz)         Severity level       IV       IV       IV       EN 61000-4-4:       2 kV       EV         Severity level       III       III       <							240 g					
Compliance with standards and directives         Standard conformity         Standard conformity         Standards         CSA approval         CSA approval         Standards cortificates         CSA approval         Standards cortificates         CSA approval         CSA approval         Standards cortificates         CSA approval metrificates         CSA approval Null trefference immunity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval)         Interference immunity in accordance with ISO 7637-2:         Pulse       1       2	• •						78 75 °	101 25	0			
directives         Standard conformity         Shock and impact resistance       100 g according to DIN EN 60068-2-27         Standards       EN 60947-5-2:2007         IEC 60947-5-2:2007         IEC 60947-5-2:2007         Response       EN 60947-5-2:2007         Approvals and certificates       CSA approval         CSA approval       CSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       Entitied interference and interference immunity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval)         Interference immunity in accordance with ISO 7637-2:       Pulse         Pulse       1       2a       2b       3a       3b       4         Severity level       II       III       III       III       III       III         Failure criterion       C       A       C       A       C         Severity level       IV       IV       IV       IV       IV         Severity level       IV       IV       IV       IV       IV         Severity level       III       III       III       III       III       III         Frequency band 20 MHz up to 2 GHz       IV       IV       IV       IV       IV       IV	<b>U</b> 1		dards	and			.0.10	. 131.23				
Shock and impart resistance       100 g according to DIN EN 60068-2-27         Standards       EN 60947-5-2:2007 IEC 60947-5-2:2007         Approvals and certificates         CSA approval         Emitted interference and interference immunity in accordance with         DIN ISO 11452-2: 100 V/m         Frequency band 20 MHz up to 2 GHz         Mains-borne interference in accordance with ISO 7637-2:         Pulse       1       2a       2b       3a       3b       4          Severity level       III       III       III       III       III         Failure criterion       C       A       C         <												
Shock and impart resistance         100 g according to DIN EN 60068-2-27           Standards         EN 60947-5-2:2007 IEC 60947-5-2:2007           Approvals and certificates         cCSA approval           CSA approval         cCSAus Listed, General Purpose, Class 2 Power Source           EMC Properties         cCSA us Listed, General Purpose, Class 2 Power Source           EMIted interference and interference immunity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval) Interference immunity in accordance with ISO 7637-2:           Pulse         1         2a         2b         3a         3b         4           Severity level         III         III         III         III         III         III           Failure criterion         C         A         C         C         EN 6100-4-2:         CD: 8 kV         /         AD: 15 kV           Severity level         IV         IV         IV         EN 6100-4-4:         2 kV         Severity level         IV         EN 6100-4-4:         2 kV         Severity level         III         EN 6100-6-4:         EN	Standard conf	ormity										
IEC 60947-5-2:2007         Approvals and c=rtificates         CSA approval         III approval approval         Pulse         1       2a       2b       3a       3b       4         Severity level       III       III       III       III       III         Failure criterion       C       A       A       C         Severity level       IV       IV       IV         Severity level       IV       IV         Severity level       III       <	Shock and ir	npact r	esista	nce			100 g acc	cording to	DIN EN	60068-2	-27	
Approvals and certificates       cCSA approval         CSA approval       cCSAus Listed, General Purpose, Class 2 Power Source         EMC Properties       Emitted interference and interference immunity in accordance with motor vehicle directive 2006/28/EG (e1 Type approval)         Interference immunity in accordance with       DIN ISO 11452-2: 100 V/m         Frequency band 20 MHz up to 2 GHz       Frequency band 20 MHz up to 2 GHz         Mains-borne interference in accordance with ISO 7637-2:       Pulse         1       2a       2b       3a       3b       4         Severity level       III       III       III       III       III         Failure criterion       C       A       C       C         Severity level       IV       IV       IV       IV         EN 61000-4-2:       CD: 8 kV       /       AD: 15 kV       Severity level       IV         Severity level       IV       IV       IV       IV       Severity level       IV         EN 61000-4-4:       2 kV       Severity level       III       EN 61000-4-4:       2 kV       Severity level       III       EN 61000-4-6:       10 V (0.0180 MHz)       Severity level       III       Severity level       III       Severity level       III       Severity level       III<	Standards						EN 60947	7-5-2:200	7			
DIN ISO 11452-2: 100 V/m         Frequency band 20 MHz up to 2 GHz         Mains-borne interference in accordance with ISO 7637-2:         Pulse       1       2a       2b       3a       3b       4         Severity level       III       III       III       III       III         Failure criterion       C       A       C       C         EN 61000-4-2:       CD: 8 kV       /       AD: 15 kV         Severity level       IV       IV       IV         EN 61000-4-3:       30 V/m (802500 MHz)       Severity level       IV         Severity level       IV       IV       Severity level         IV       IV       Severity level       IV         EN 61000-4-4:       2 kV       Severity level       III         EN 61000-4-6:       10 V (0.0180 MHz)       Severity level       III	CSA approva EMC Propertie Emitted interference	ul <b>es</b> e and inte	erferenc	ce immu	inity in	accol				-		
Severity level         III	DIN ISO 11452-2: 1 Frequency band 20	00 V/m MHz up	to 2 Gł	łz	th ISO	7637-	2:					
Failure criterion         C         A         C         A         C           EN 61000-4-2:         CD: 8 kV         /         AD: 15 kV         Severity level         IV         IV           EN 61000-4-3:         30 V/m (802500 MHz)         Severity level         IV         EN 61000-4-4:         2 kV           Severity level         IV         EN 61000-4-4:         2 kV         Severity level         III           EN 61000-4-6:         10 V (0.0180 MHz)         Severity level         III         Severity level         III												
EN 61000-4-2:       CD: 8 kV       / AD: 15 kV         Severity level       IV       IV         EN 61000-4-3:       30 V/m (802500 MHz)         Severity level       IV         EN 61000-4-4:       2 kV         Severity level       III         EN 61000-4-6:       10 V (0.0180 MHz)         Severity level       III	,											
Severity level         IV         IV           EN 61000-4-3:         30 V/m (802500 MHz)           Severity level         IV           EN 61000-4-4:         2 kV           Severity level         III           EN 61000-4-6:         10 V (0.0180 MHz)           Severity level         III	Failure criterion	С	А	С	Α	А	С					
Severity level         IV           EN 61000-4-4:         2 kV           Severity level         III           EN 61000-4-6:         10 V (0.0180 MHz)           Severity level         III	Severity level	IV			IV	15 kV						
EN 61000-4-4: 2 kV Severity level III EN 61000-4-6: 10 V (0.0180 MHz) Severity level III			III (OU	∠ວບ∪ IVI	172)							
Severity level         III           EN 61000-4-6:         10 V (0.0180 MHz)           Severity level         III												
EN 61000-4-6: 10 V (0.0180 MHz) Severity level III	EN 61000 4 4:											
Severity level III			(0.04 (	0 1 1 1-								
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	Severity level EN 61000-4-6: Severity level											
	Severity level EN 61000-4-6: Severity level											

INX112D-F99-U-V1

Refer to "General Notes Relating to Pepperl+Fuchs Product Information".

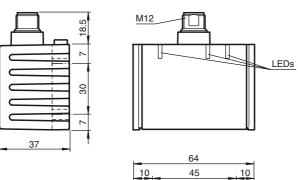
Pepperl+Fuchs Group www.pepperl-fuchs.com

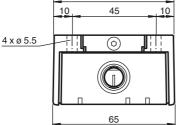
USA: +1 330 486 0001 fa-info@us.pepperl-fuchs.com Germany: +49 621 776 4411 fa-info@de.pepperl-fuchs.com Singapore: +65 6779 9091 fa-info@sg.pepperl-fuchs.com



# INX112D-F99-U-V1

## Dimensions

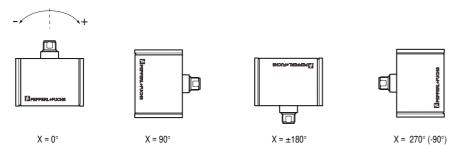




### **Sensor Orientation**

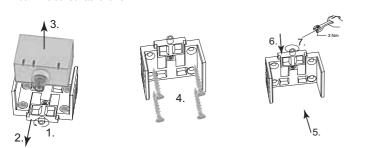
In the default setting the zero position of the sensor is reached, when the electrical connection faces straight upwards.

## **X** Orientation



#### Mounting of the sensor

Sensors from the -F99 series consist of a sensor module and accompanying cast aluminum housing. Select a vertical surface with minimum dimensions of 70 mm x 50 mm to mount the sensor. Mount the sensor as follows:



- 1. Loosen the central screw under the sensor connection.
- 2 Slide back the clamping element until you are able to remove the sensor module from the housing.
- 3. Remove the sensor module from the housing
- Position the housing at the required mounting location and secure using four countersunk screws. Make sure that the heads of the screws do not protrude. 4.
- Solide the clamping element flush into the housing.
   Slide the clamping element flush into the housing. Check that the sensor element is seated correctly.
   Finally tighten the central screw.

# **Pinout**



### Wire colors in accordance with EN 60947-5-2

1	BN	(brown)
2	WH	(white)
3	BU	(blue)
4	BK	(black)

## Accessories

### V1-G

Female connector, M12, 4-pin, field attachable

## **V1-W**

Female connector, M12, 4-pin, field attachable

Pepperl+Fuchs Group www.pepperl-fuchs.com

USA: +1 330 486 0001 fa-info@us.pepperl-fuchs.com Germany: +49 621 776 4411 fa-info@de.pepperl-fuchs.com

Singapore: +65 6779 9091 fa-info@sg.pepperl-fuchs.com



2