

Data sheet

Temperature sensor and temperature transmitter Type MBT 5410



The MBT 5410 is a heavy-duty temperature sensor that can be used for controlling freezing installations and room temperature within general industry and marine applications.

This temperature sensor is based on a standardized Pt 100 or Pt 1000 element, which gives a reliable and accurate measurement. If needed a transmitter (MBT 9110) can be ordered as an integrated part of the sensor.

Features

- For measuring temperature in marine and industrial refrigeration, freezing installations
- Temperature range: From -50 70 °C
- High measuring accuracy

- Robust construction with resistance to shock and vibration
- Available with built-in transmitte

Approvals

Lloyds Register of Shipping, LR Germanischer Lloyd, GL Det Norske Veritas, DNV Registro Italiano Navale, RINA Nippon Kaiji Kyokai, NKK American Bureau of Shipping, ABS Korean Register of Shipping, KRS Bureau Veritas, BV China Classification Society, CCS





Technical data

Mechanical and environmental specifications

Ambient temperature	Approval from Lloyds Register of Shipping covers measuring range -30 – 70 °C. Because of this limitation the products are marked -30 – 70 °C.		
	Max. ambient temperatures for sensors with temperature transmitter are:		
	Standard:	-40 – 70 °C (Brief in max. 2 hours: 80 °C)	
	Without transmitter:	-50 – 70 °C (Brief in max. 2 hours: 80 °C)	
Sensor tolerance	EN 60751 class B: ± (0.3 + 0.005 × t)	t = temperature of medium, numerical value	
Vibration stability	Shock:	100 g / 6 ms	
	Vibrations:	4 g sine function, 2 – 100 Hz, measured acc. to IEC 60068-2-6	
Enclosure	IP67 according to IEC 60529		
Cable entry	Pg 13.5		
Material (sensor tube)	W.no. 1.4571 (AISI 316Ti)		

Further information about temperature transmitter type MBT 9110 available in separate data sheet

Response time

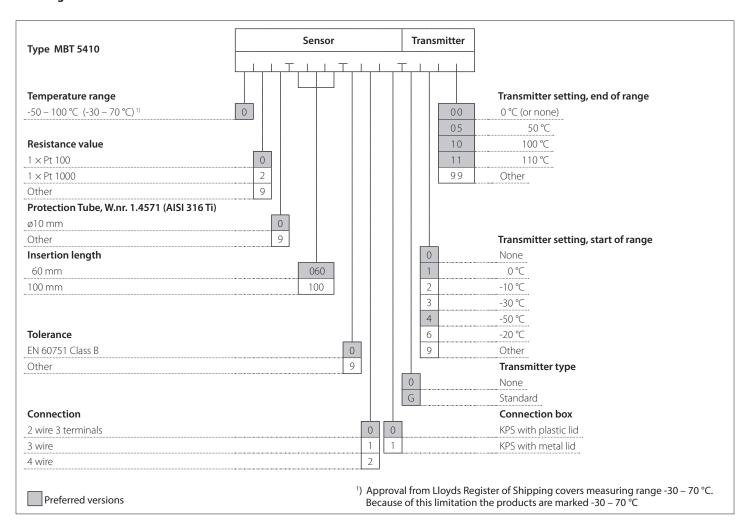
	Indicative response times	
Protection tube	Air 1 m/s	
	t _{0.5}	t _{0.9}
ø10 × 2	150 s	450 s

Net weight

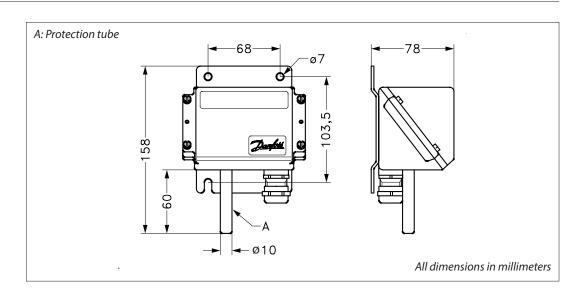
	Without temperature transmitter	With temperature transmitter
Net weight, approx.	550 g	600 g



Ordering standard



Dimensions



Danfoss can accept no responsibility for possible errors in catalogues, brochures and other printed material. Danfoss reserves the right to alter its products without notice. This also applies to products already on order provided that such alterations can be made without subsequential changes being necessary in specifications already agreed.

All trademarks in this material are property of the respective companies. Danfoss and the Danfoss logotype are trademarks of Danfoss A/S. All rights reserved.