Bathfluid data sheet

Thermal H10

JULABO Thermal H10 is a bath fluid based on silicon.

Working temperature: -40 °C ... +180 °C

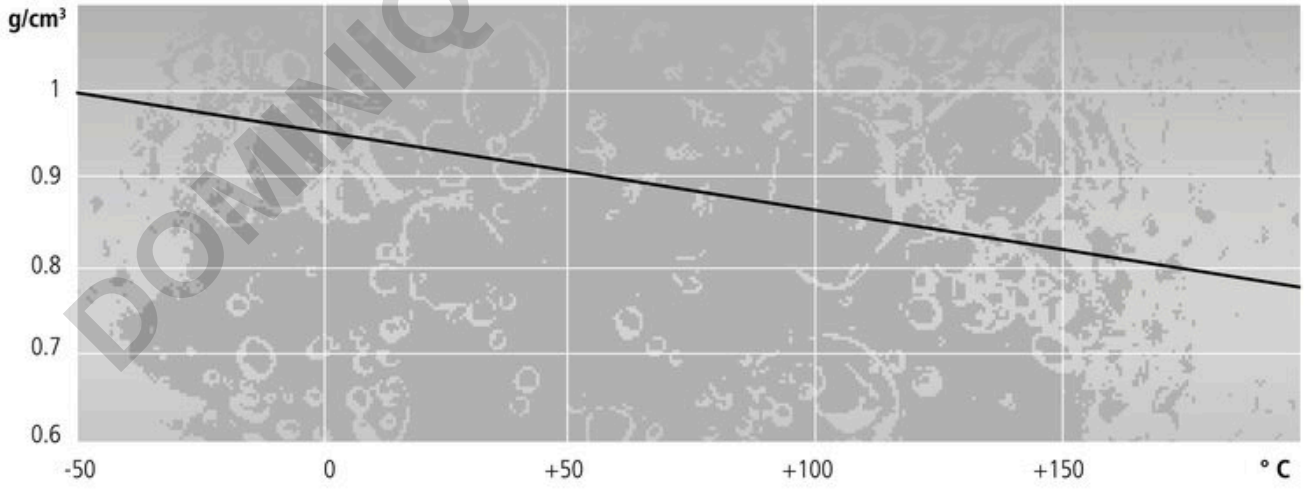
Advantages: JULABO thermal bath fluids are carefully selected and long-term proven media with ideal thermodynamic properties for a wide range of applications. They are ideal for temperature applications in JULABO Units and guarantee safe, hassle-free operation as well as efficient heat transfer and excellent heat conductivity.

JULABO silicone-based thermal fluids are chemically inert and do not attack metals such as iron, copper, zinc, aluminum, chrome or nickel. Compared to other fluids, they are characterized by extremely low electrical conductivity. They are also insensitive to climatic influences and have a shelf life of at least 12 months if stored properly.

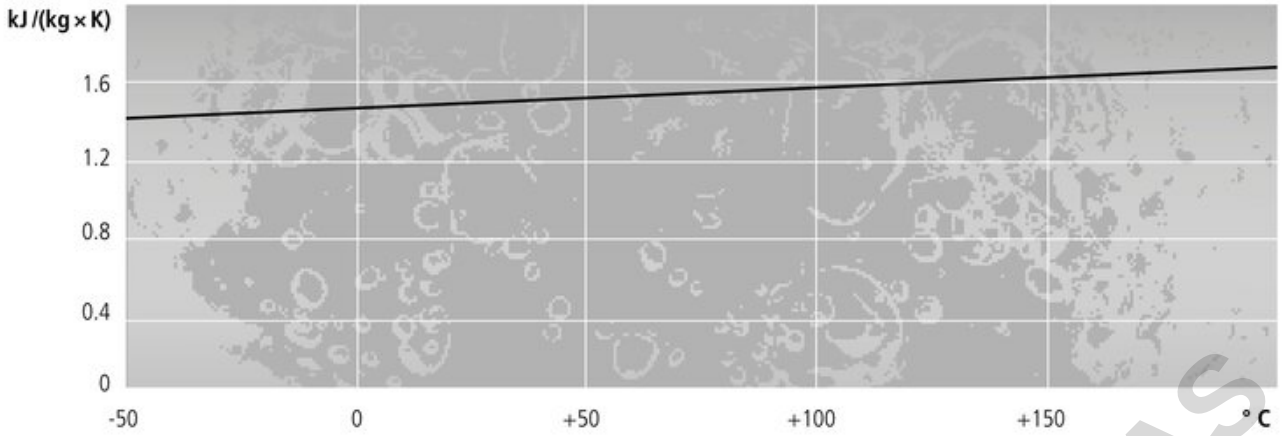
When used correctly, JULABO thermal fluids are extremely thermally stable and form only minimal amounts of cracking and oxidation products, which supports their long life-time. If the fluid is used close to the recommended limit temperatures, we recommend checking or replacing it every 2-3 months.

Note: Do not use with silicon tubing! Silicone-based bath fluids can corrode silicone tubing. JULABO metal tubing, Viton tubing or PTFE tubing should therefore be used for external system temperature control applications.

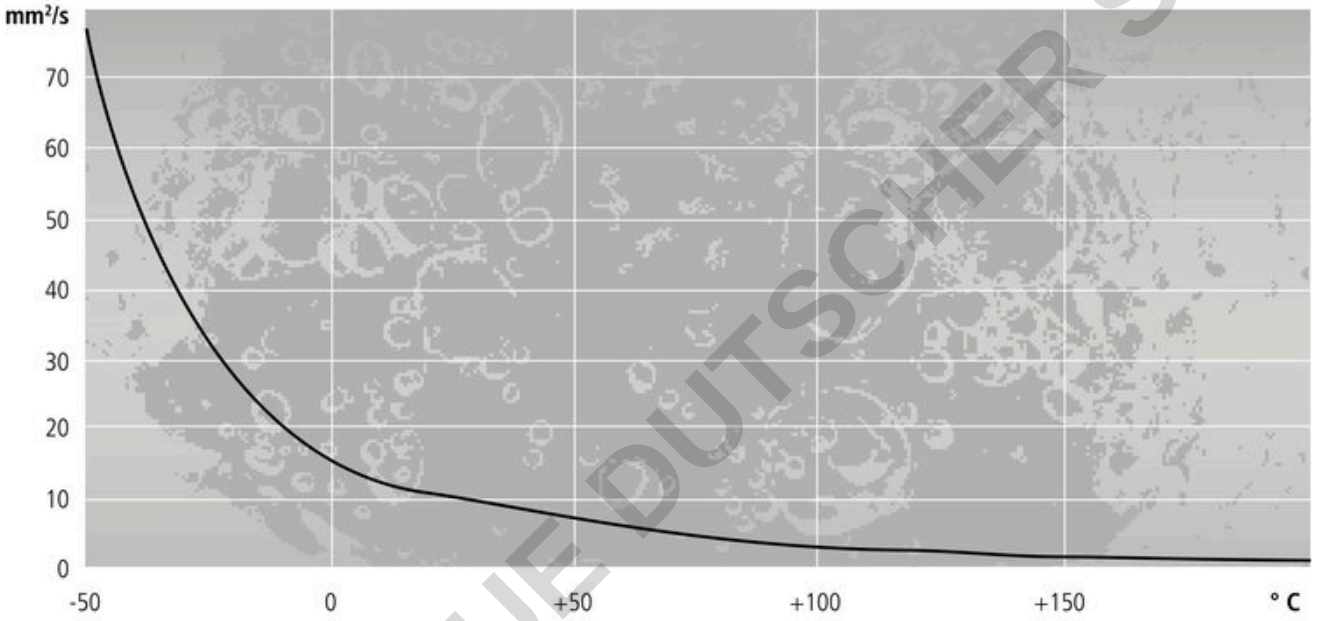
Density



Specific heat capacity



Viscosity



Technical data

Order number 5 liters	**8940115**
Order number 10 liters	**8940114**
	-40 ... +180
Flash point	>+165 °C
Fire point	+220 °C
Viscosity(kinematic at 20 °C)	10 mm²/s
Density(at 20 °C)	0.93 g / cm³
Pour point	<-60 °C
Boiling point	+288 °C
Ignition temperature	+370 °C
Thermal expansion coefficient	0.00092 (g/(ml × K))
Heat conductivity	0.14 (W/(m × K))
Specific heat capacity	1.41 (kJ/(kg x K)@20°C)
Specific volume resistivity	8x10¹⁴ (Ohm × cm)