

Cable Solutions for Flexible Site Setups

ROFLEX[®] – Universal Charging Cable for Construction Sites and Docks



Power and control cables with a polyurethane outer sheath (PUR/TPU) are increasingly replacing traditional rubber cables in flexible power supply systems. The standard versions H05BQ-F and H07BQ-F are available from various suppliers. But **ROFLEX**[®] from Studer Cables offers even more advantages.

Robust cables with excellent water resistance

The combination of cross-linked ethylene-propylene rubber (EPR) as halogen-free wire insulation and the outstanding properties of PUR as the outer sheath ensures excellent water resistance and improved electrical insulation properties. Another highlight of **ROFLEX**[®] is the specially developed polyurethane compound with permanently excellent sliding properties. This high-quality material is used for the entire outer sheath, providing excellent mechanical protection – even if the cable is run over by a vehicle.

Reliable under extreme conditions

ROFLEX[®] has also proven itself under extreme conditions: It withstands a pressure of up to 20 bar, which corresponds to an immersion depth of around 200 meters. Permanent use in water up to +50 °C is possible without any problems. Thanks to its additional UV resistance, **ROFLEX**[®] is ideal for flexible indoor and outdoor use, even in harsh conditions where conventional cables reach their limits.

Advantages

- Very robust with high flexibility
- Suitable for permanent water storage (AD8)
- Good abrasion resistance
- Flexible at low temperatures down to $-40\text{ }^{\circ}\text{C}$
- Halogen-free
- RoHS and REACH compliant
- Oil and fuel resistant
- Good weather, ozone and UV resistance
- Hydrolysis resistant

Quality and innovation from Switzerland

You can rely on our many years of experience and our proven Swiss quality. Thanks to a high level of vertical integration and innovative technologies, we also develop customized cable solutions for specific customer requirements. Studer Cables stands for first-class, customer-specific products and pioneering solutions in industrial and energy supply.

Our modern production facilities and ongoing research in our own laboratories guarantee maximum product safety and quality. By developing innovative polymer plastics, we optimize the insulation properties, temperature resistance, service life and handling of our cables.

Rely on ROFLEX® – the high-quality and flexible universal cable for the toughest applications.



The following table shows further advantages of **ROFLEX®** compared to the requirements for H05BQ-F and H07BQ-F in accordance with EN 50525-2-21:

Comparison Standard – ROFLEX®

	$\leq 1,0\text{ mm}^2$		$\geq 1,5\text{ mm}^2$	
	H05BQ-F	ROFLEX®	H07BQ-F	ROFLEX®
Nominal voltage U / U	300 / 500 V	300 / 500 V	450 / 750 V	600 / 1000 V
Test voltage	2000 V	3500 V	2500 V	3500 V
Short-term conductor temperature	+90 °C	+120 °C	+90 °C	+120 °C
Fixed operating temperature	$-40\text{ }^{\circ}\text{C}$ to $+80\text{ }^{\circ}\text{C}$	$-55\text{ }^{\circ}\text{C}$ to $+90\text{ }^{\circ}\text{C}$	$-40\text{ }^{\circ}\text{C}$ to $+80\text{ }^{\circ}\text{C}$	$-55\text{ }^{\circ}\text{C}$ to $+90\text{ }^{\circ}\text{C}$
Operating temperature occasionally moved	$-30\text{ }^{\circ}\text{C}$ to $+80\text{ }^{\circ}\text{C}$	$-40\text{ }^{\circ}\text{C}$ to $+80\text{ }^{\circ}\text{C}$	$-30\text{ }^{\circ}\text{C}$ to $+80\text{ }^{\circ}\text{C}$	$-40\text{ }^{\circ}\text{C}$ to $+80\text{ }^{\circ}\text{C}$



Further information can be found in our data sheets on our website: <https://studercables.com/en/products/>

In addition to first-class products, Studer Cables offers comprehensive advice, precise calculations and other services. If you have any questions, please do not hesitate to contact us personally.