



DC COMPONENTS CO., LTD.

RECTIFIER SPECIALISTS

DLQ4148

DLQ4448

TECHNICAL SPECIFICATIONS OF SURFACE MOUNT SWITCHING DIODES

VOLTAGE RANGE - 100 Volts

CURRENT - 0.15 Ampere

FEATURES

- * Low power loss, high efficiency
- * Low leakage
- * Low forward voltage drop
- * High speed switching
- * High current capability
- * High reliability

MECHANICAL DATA

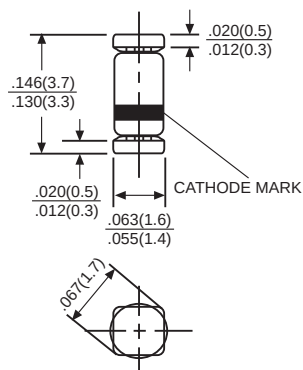
- * Case: Glass sealed case Quadro Melf
- * Terminals: Solder plated, solderable per MIL-STD-750, Method 2026 guaranteed
- * Polarity: Color band denotes cathode end
- * Mounting position: Any
- * Weight: 0.05 grams Approx.

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25 °C ambient temperature unless otherwise specified.
Single phase, half wave, 60 Hz, resistive or inductive load.
For capacitive load, derate current by 20%.



Quadro Melf



Dimensions in inches and (millimeters)

	SYMBOL	DLQ4148	DLQ4448	UNITS
Maximum Reverse Voltage	V_R	75		V
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	100		V
Maximum Average Rectified Current	I_o	150		mA
Peak Forward Surge Current 8.3 ms single half sine-wave superimposed on rated load (JEDEC Method)	I_{FSM}	0.5		A
Maximum Power Dissipation $T_{amb}=25^{\circ}C$	P_{tot}	500		mW
Maximum Forward Voltage	V_F	1.0 / 10mA	0.72 / 5mA 1.0 / 10mA	V
Maximum Reverse Current at Rated DC Blocking Voltage @ $T_A=25^{\circ}C$	I_R	5.0		μA
Maximum Reverse Recovery Time(Note 1)	t_{rr}	4.0		ns
Typical Junction Capacitance(Note 2)	C_J	4.0		pF
Operating and Storage Temperature Range	T_J, T_{STG}	-55 to + 125		$^{\circ}C$

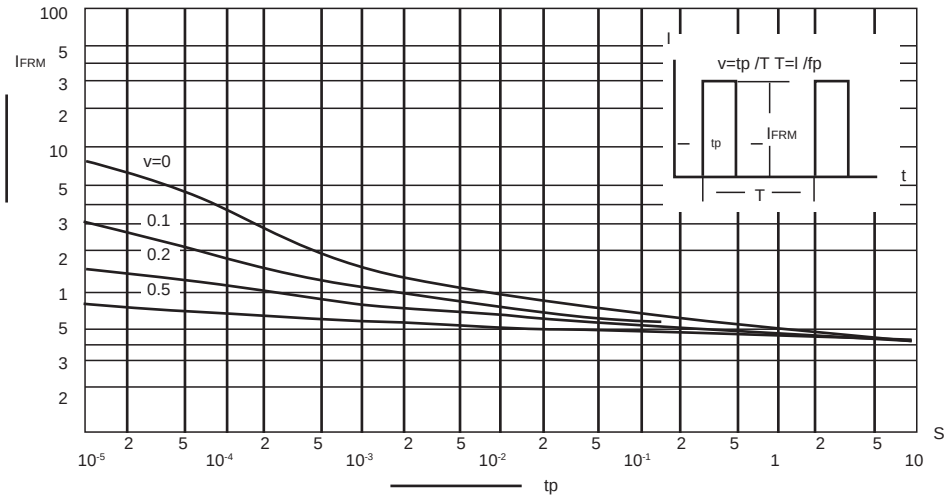
Note: 1. Test conditions: $I_F=I_R=10mA$, $R_L=100\Omega$, measured at $I_R=1mA$

2. Measured at 1MHz and $V_R=0$

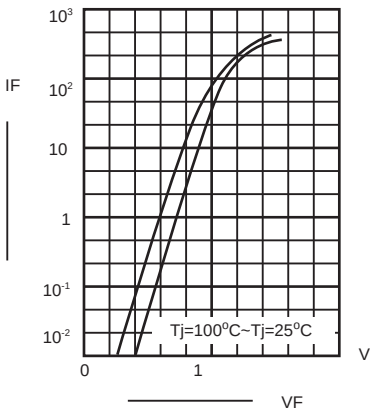
RATING AND CHARACTERISTIC CURVES (DLQ4148 AND DLQ4448)

REF: DLQ4148

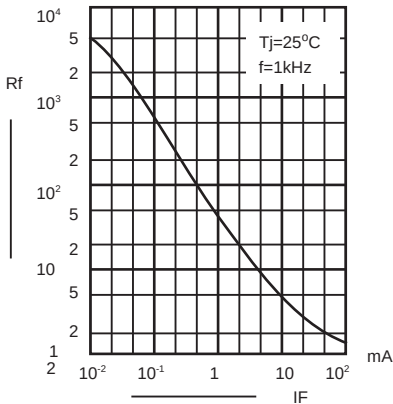
A Admissible repetitive peak forward current versus pulse duration



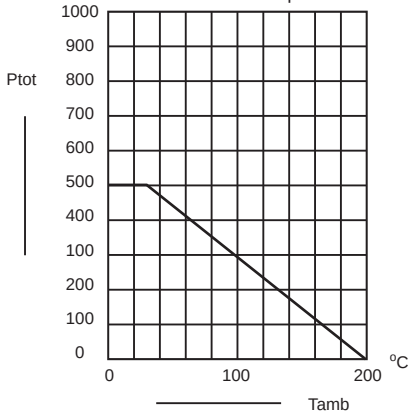
Forward characteristics



Dynamic forward resistance versus forward current



Admissible power dissipation versus ambient temperature



Relative capacitance versus reverse voltage

