

# Ultrasonic Transmitter, Sensor & Housing



**Transmitter  
SQ-40-T-10B**



**Sensor  
SQ-40-R-10B**

## Description

Ultrasonic ceramic transducers transfer acoustical energy to mechanical energy or vice versa. The Standard Open Type Transducer is constructed in a manner which incorporates the fundamental structure of piezoelectric ceramic element of the monomorph type with a conical metal resonator. This Special combination provides high sensitivity (Over – G5dB/V/μBar), wider bandwidth, excellent temperature and humidity durability, stable electrical and mechanical characteristics, and small size.



**Housing  
QHP10**

## Applications:

- Remote control devices
- Liquid & bulk sensors
- Level controls
- Intrusion alarms
- Motion detectors
- Auto doors
- Counting devices

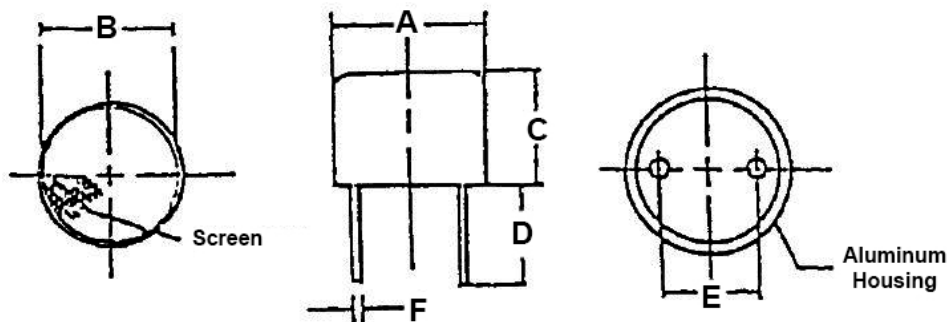
## Specification Table:

Item	SQ-40-T-10B	SQ-40-R-10B	Unit
Transmitting Sensitivity	110	-	SV db
Receiving sensitivity	-	-70	MV db
Resonant Freq. Trans.	40 ±1	-	kHz
Resonant Freq. Rec.	-	40 ±1	kHz
Directional Angle	Approx 60°		°
Max Input Volts	10	-	Vrms
Impedence	Approx 700	Approx 30k	-
Capacitance	2,000 ± 20%		pF
Pulse Rise Time	0.7	-	ms
Max Input Volts for Pulse Operation	Not recommended for Pulse Operation		V <sub>P,P</sub>
Temp. Range	-20 to +60		°C
Trans. Selectivity	20 min	-	Qsv
Rec. Selectivity	-	25 min	Qmv

# Ultrasonic Transmitter, Sensor & Housing



## Dimensions



A	9.8 (0.39)
B	7.7 (0.3)
C	6.6 (0.26)
D	8.5 (0.33)
E	4.8 (0.19)
F	0.5 (0.02)

Dimensions : Millimetres (Inches)

## Part Number Table

Description	Part Number
Transmitter, Ultrasonic	SQ-40-T-10B
Receiver, Ultrasonic	SQ-40-R-10B
Housing, Transducer, 10mm, PK2	QHP10

**Important Notice** : This data sheet and its contents (the "Information") belong to the members of the Premier Farnell group of companies (the "Group") or are licensed to it. No licence is granted for the use of it other than for information purposes in connection with the products to which it relates. No licence of any intellectual property rights is granted. The Information is subject to change without notice and replaces all data sheets previously supplied. The Information supplied is believed to be accurate but the Group assumes no responsibility for its accuracy or completeness, any error in or omission from it or for any use made of it. Users of this data sheet should check for themselves the Information and the suitability of the products for their purpose and not make any assumptions based on information included or omitted. Liability for loss or damage resulting from any reliance on the Information or use of it (including liability resulting from negligence or where the Group was aware of the possibility of such loss or damage arising) is excluded. This will not operate to limit or restrict the Group's liability for death or personal injury resulting from its negligence. Multicom is the registered trademark of the Group. © Premier Farnell plc 2012.

www.element14.com  
www.farnell.com  
www.newark.com

