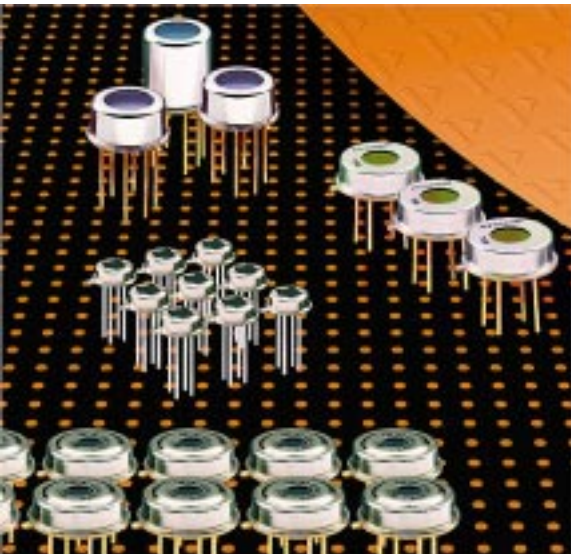


Thermopile Infrared Detectors

Thermopile Detector TPS 334 L10.6



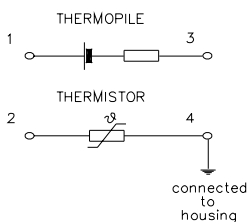
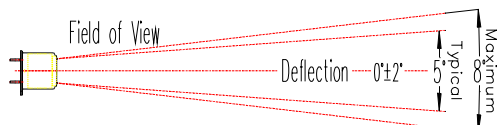
New: Integrated silicon lens

Small spot size: distance – spot size ratio: D:S = 11:1

For industrial remote temperature measurement applications

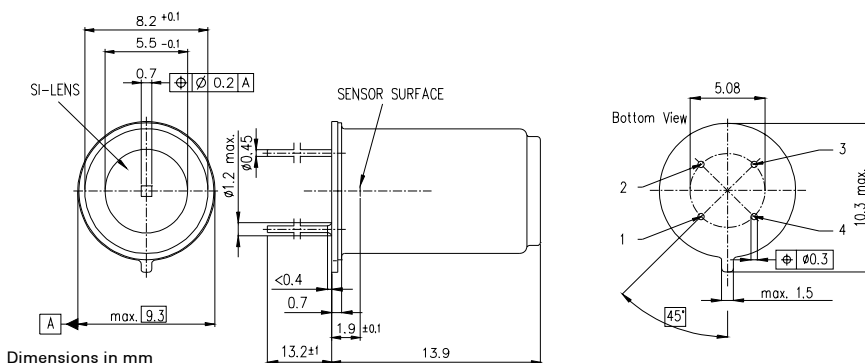
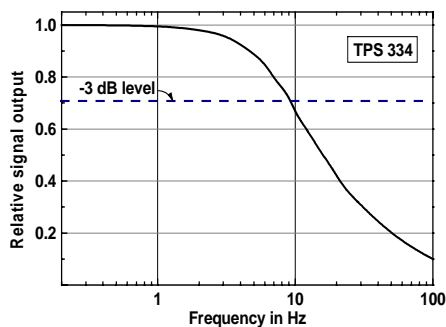
The **TPS 334 L10.6** detector extends the features of the TPS 334 through an integrated micromachined silicon lens optics.

In TO 5 type housing it employs a chip of 0.7 x 0.7 mm² absorber size with a 30 kΩ thermistor as temperature reference and a lens with 10.6 mm focal length. An inlay in the housing suppresses reflections at the cap. The lens is not coated, but if a restricted wavelength region is desired (e.g. 8..14 μm), it is possible to equip the inlay with an additional filter (e.g. G9). The sensor shows a flat sensitivity characteristics over the wavelength.



Parameters	TPS 334 L10.6		
	typical	units	condition
Sensitive area	0.7 x 0.7	mm ²	absorbing area
Window size	5.5	mm	diameter
DC sensitivity	75	V/W	500K BB w/o optics
Resistance	75	kΩ	
Noise	21	nV/√Hz	r.m.s. 300K,
NEP	0.28	nW/√Hz	500K BB w/o optics
D*	1.6 x 10 ⁸	cm√Hz/W	500K BB w/o optics
TC of sensitivity	0.02	%/K	
TC of resistance	0.02	%/K	
Time constant	25	ms	
Storage temperature	-40	100	°C non permanent
Operating temperature	-40	100	°C non permanent
Thermistor resistance	30	kΩ	25°C
beta	3964	K	25°C/100°C
Field of view	5	°	at 50% points

Right for modification reserved / WS / 21.5.2001



Europe:
PerkinElmer Optoelectronics GmbH
 Wenzel Jaksch Str 31
 Wiesbaden / Germany
 Phone +49(0)611 492 0
 Fax +49(0)611 492 170

USA:
PerkinElmer Optoelectronics
 2175 Mission College Blvd
 Santa Clara, CA 95054
 Phone +408 565 0830
 Fax +408 565 0703

Asia:
PerkinElmer Optoelectronics
 47, Ayer Rajah Crescent #06-12
 Singapore 139947
 Phone +65 775 2022
 Fax +65 775 1008

