

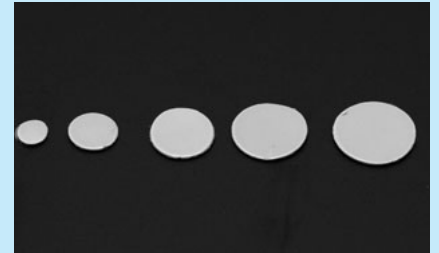
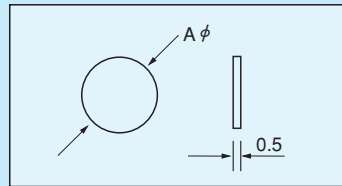
## Heat dissipation gel sheet for "Netsutorimushi" CLB series [CLS series] (100shts/pack)

- The heat dissipation effect can be better by inserting CLS series among CLB series, the chassis, and the radiator to eliminate the clearance.
- Material:  $\lambda$  Gel [ $\lambda$  Gel is the registered trade mark of TAICA Corporation.]
- Thickness: 0.5 mm

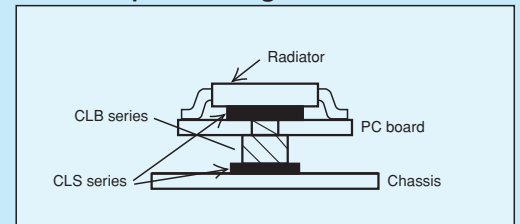
## Part number

Part number	A ( $\phi$ )
CLS-0.5-4	4
CLS-0.5-6	6
CLS-0.5-8	8
CLS-0.5-9	9
CLS-0.5-10	10

## Dimension



## Example of usage



## Properties

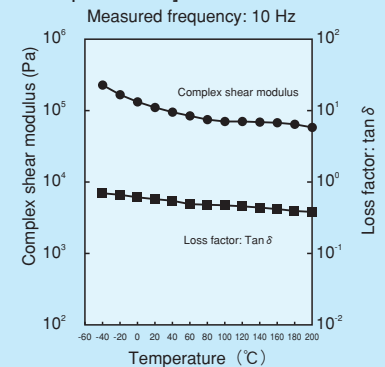
Property item		Property value	Remarks
Thermal conductivity (W/m·k)	Internal measurement method	6.5	—
	Hot wire method (Note 1)	2.1	JIS R 2616
Hardness (penetration: 1/10 mm)		45	JIS K 2207
Appearance		Gray	—
Specific gravity		2.9	JIS K 6249
Tensile strength (MPa)		0.35	JIS K 6249
Volume resistivity ( $\Omega \cdot \text{cm}$ )		$7.1 \times 10^{13}$	JIS K 6249
Dielectric breakdown strength (kV/mm)		12.5	JIS K 6249
Elongation (%)		68	JIS K 6249
Compression permanent set (%)		72	JIS K 6249
Dielectric constant	(50Hz)	5.6	JIS K 6249
	(1 kHz)	5.0	JIS K 6249
	(1 MHz)	5.5	JIS K 6249
Dielectric loss tangent	(50Hz)	0.006	JIS K 6249
	(1 kHz)	0.002	JIS K 6249
	(1 MHz)	0.0004	JIS K 6249
Low-molecular siloxane content $\Sigma$ D4-10 (ppm)	Solvent extraction method	13	—
	Head space method (Note 2)	0.1 or less	—
Incombustibility		V-0	UL94
Six RoHS restriction substances		Not contained	—
Operating temperature range ( $^{\circ}\text{C}$ ) (Note 3)		-40~150	—

Hot wire method (Note 1): Using the quick thermal conductivity meter of Kyoto Electronics Manufacturing Co., Ltd., QTM-500

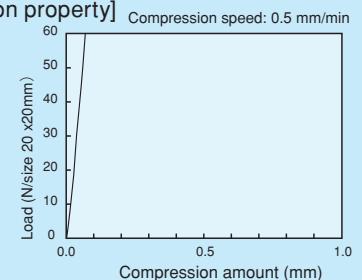
Head space method (Note 2): Measured at 70 $^{\circ}\text{C}$  at Panasonic Electric Works Analysis Center Co., Ltd

Operating temperature range (Note 3): This is judged by the values measured for thermal conductivity and the hardness variations and it is not the guaranteed value. Please confirm the durability under the actual use conditions.

## [Temperature dependence]



## [Compression property]



## [Thermal resistance property]

Transistor: TO-3  
Applied voltage: 20W

Thermal resistance ( $^{\circ}\text{C}/\text{W}$ )		
Compression rate: 10%	20%	30%
0.14	0.10	0.06