



## PRO DUCTS

Fuxin designs and manufactures thermoelectric coolers, thermoelectric generators for multiple industries.



# **TEG**

Thermoelectric Generator



- All products are produced in large scale by advanced facilities under strict quality control system.
- All products are costeffective and reliable.





# APPLICATIONS



**Photonics** 



Telecom



Medical / Analytical



Industrial / Commercial



**Consumer Products** 

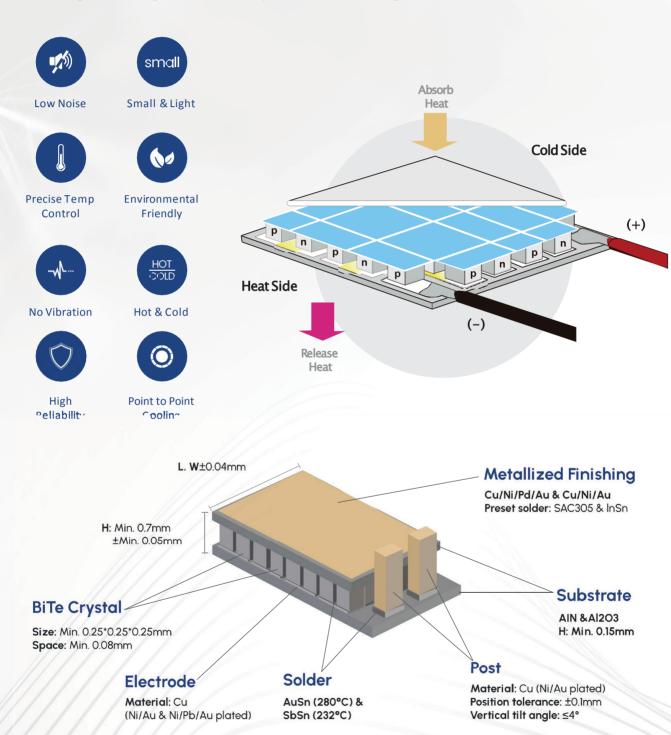


Automotive



## TEC ADVANTAGES

Fuxin TECs take advantage of Peltier effect of semiconductor materials to achieve cooling or heating functions. They have the following features.





## MICRO TECs

The Micro TECs are miniature thermoelectric coolers specially developed to satisfy demanding requirements in the optical communication field. They are made of high-performance thermoelectric materials and produced by advanced and

automated manufacturing process. These TECs have the features of miniaturization, higher COP and reliability, and they are ideal for precise temperature control.

#### **Packaging**

TO

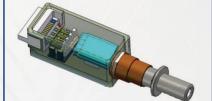




- •10G PON OLT 1577nm EMLTO
- •1.25G/10G/25G DWDM TOSA
- •5G Trans. 25G EMLTOSA
- •5G MWDM W/cooling25G DFBTOSA

**BOX** 





•100G LK4 4X25G DFB LOSA •100G ER4 4X25G EMLTOSA BUTTERFLY





- •The transmitting device ITLA in coherent module
- ROSA

#### Reliability of the TECs can meet international standards GR-468-CORE and MIL-STD-883.

Th=27°C

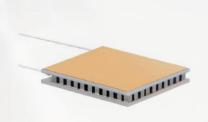
TEC Model NO.	ΔT <sub>max</sub> (°C)	Qc <sub>max</sub> (W)	U <sub>max</sub> (V)	I <sub>max</sub> (A)	Size (mm)			
					W	L1	L2	Н
TEM1-008012A-NM-3B	70	0.6	1.0	11	1.6	2.2	1.6	0.9
TEM1-010010A-NM-3B	70	0.7	1.2	1.0	1.5	2.6	2.0	0.8
TEM1-010012A-NM-3B	70	0.9	1.2	1.2	1.8	2.6	2.0	0.8
TEM1-020016A-NM-3P	70	2.2	2.4	1.6	2.9	5.4	4.7	1.2
TEM1-020012A-NM-3P	70	2.3	2.4	1.2	3.4	6.2	5.5	0.8
TEM1-028014A-NM-3P	70	2.9	3.2	1.4	4.0	5.1	4.4	1.2
TEM1-038021A-NM-3P	70	5.7	4.6	2.1	4.0	6.8	5.9	0.9
TEM1-024020A-NM-3B	70	3.7	2.8	2.1	4.0	5.8	5.0	1.2
TEM1-036025A-NM-3B	70	6.8	4.2	2.6	4.0	8.1	7.4	0.9
TES1-038027A-NM-2W	70	7.2	4.6	2.7	6.1	12.2	12.2	1.7
TES1-063034A-NM-2P	70	14.8	7.6	3.2	6.0	16.5	15.5	1.7



### TEC s AND SO LUTIONS - IR

Th=27°C

TEC Model NO.	ΔT <sub>max</sub> (°C)	Qc <sub>max</sub> (W)	U <sub>max</sub> (V)	I <sub>max</sub> (A)	Size (mm)			
					W	L1	L2	Н
TES1-031018A-ON-2W	70	3.9	3.7	18	8.0	8.0	8.0	1.7
TES1-071015A-ON-2W	70	7.0	8.4	1.5	12.0	11.0	11.0	2.0
TES1-035020A-OM-2W	70	5.3	4.2	2.3	12.0	12.0	12.0	3.2
TES1-031040A-OH-2W	70	8.6	3.7	4.0	18.0	18.0	18.0	2.8
TES1-049050A-ON-2W	70	17.2	5.9	4.7	9.0	15.0	15.0	2.0
TES1-059038A-OH-2W	70	15.5	7.0	3.8	18.0	21.0	21.0	2.8







### TEC s AND SO LUTIONS - PCR (MEDICAL)

Th=27°C

TEC Model NO.	ΔT <sub>max</sub> (°C)	Qc <sub>max</sub> (W)	U <sub>max</sub> (V)	I <sub>max</sub> (A)	Size (mm)			
					W	L1	L2	Н
TEC1-127050A-FG-2WS	70	44.1	15.5	5.0	30.0	30.0	30.0	3.2
TEC1-127040A-FG-2WS	70	36.8	15.5	4.2	30.0	30.0	30.0	3.4
TEC1-127120A-FG-2WS	70	120.0	15.6	12.6	40.0	40.0	40.0	3.5
TEC1-220280A-FG-2WS	70	433.0	26.6	28.1	50.0	54.0	50.0	3.0









### TEC s AND SO LUTIONS - AUTOMOTIVE



Th=27°C

TEC Model NO.	ΔT <sub>max</sub> (°C)	Qc <sub>max</sub> (W)	U <sub>max</sub> (V)	I <sub>max</sub> (A)	Size (mm)			
					W	L1	L2	Н
TEM1-054018A-NM-3B	70	6.6	6.5	1.8	5.3	12.5	12.5	13
TES1-090050A-OG-2WS	70	31.5	10.9	5.0	16.0	33.0	30.0	2.5
TES1-128041B-OG-2WS	70	36.0	15.4	4.1	30.0	34.0	30.0	3.4
TES1-160040A-CMM-2WS	70	44.4	19.4	4.0	54.0	30.0	27.7	3.5

#### **GET DATASHEET**

Fuxin has more TECs (for much more applications) including single-stage, multi-stage, high power, micro, or customized for specific needs. Please contact us to obtain datasheets of Fuxin TECs, or tell us your needs in application.

