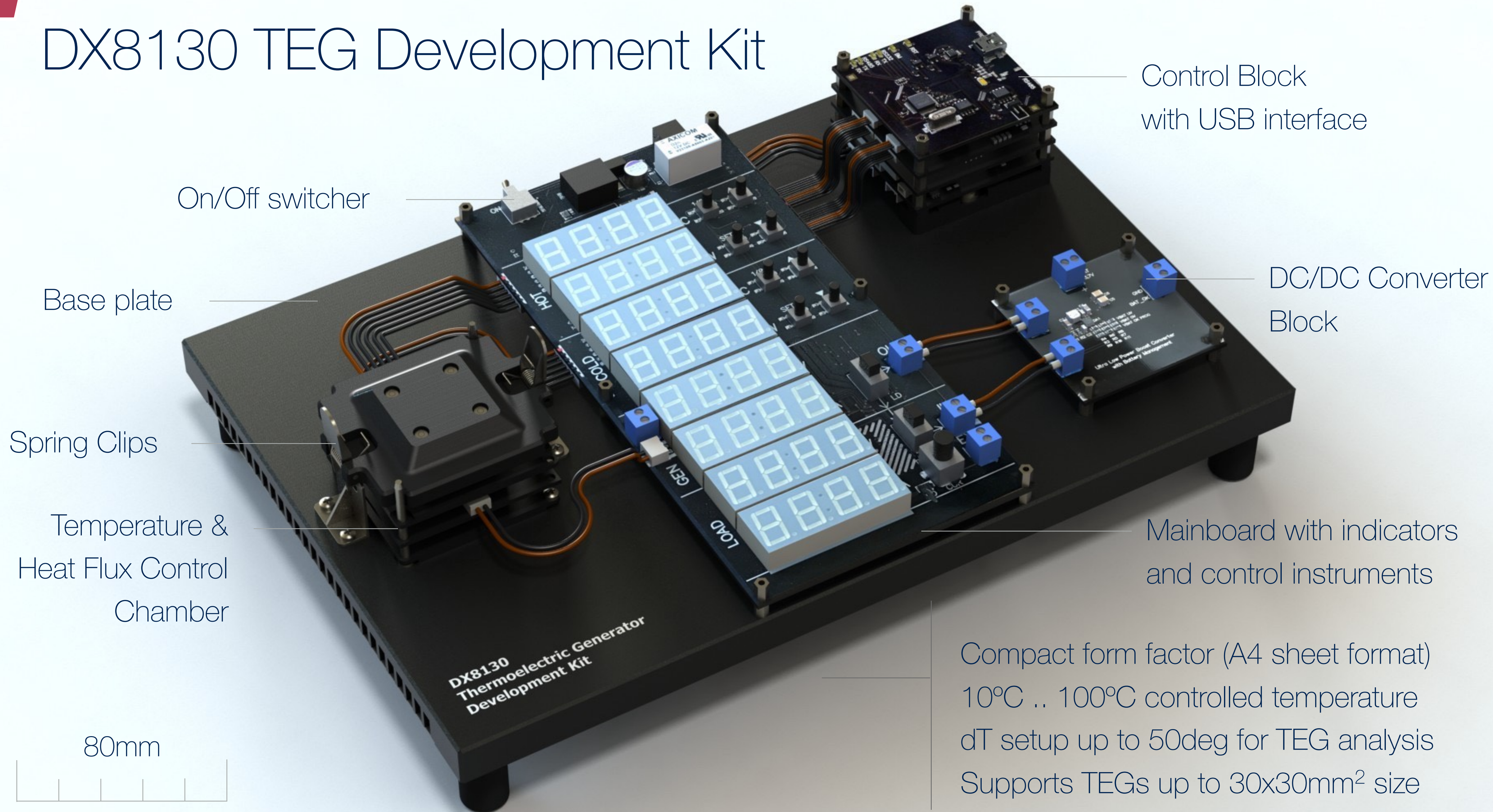




DX8130 TEG Development Kit



Control Block with USB interface

On/Off switcher

DC/DC Converter Block

Base plate

Spring Clips

Temperature & Heat Flux Control Chamber

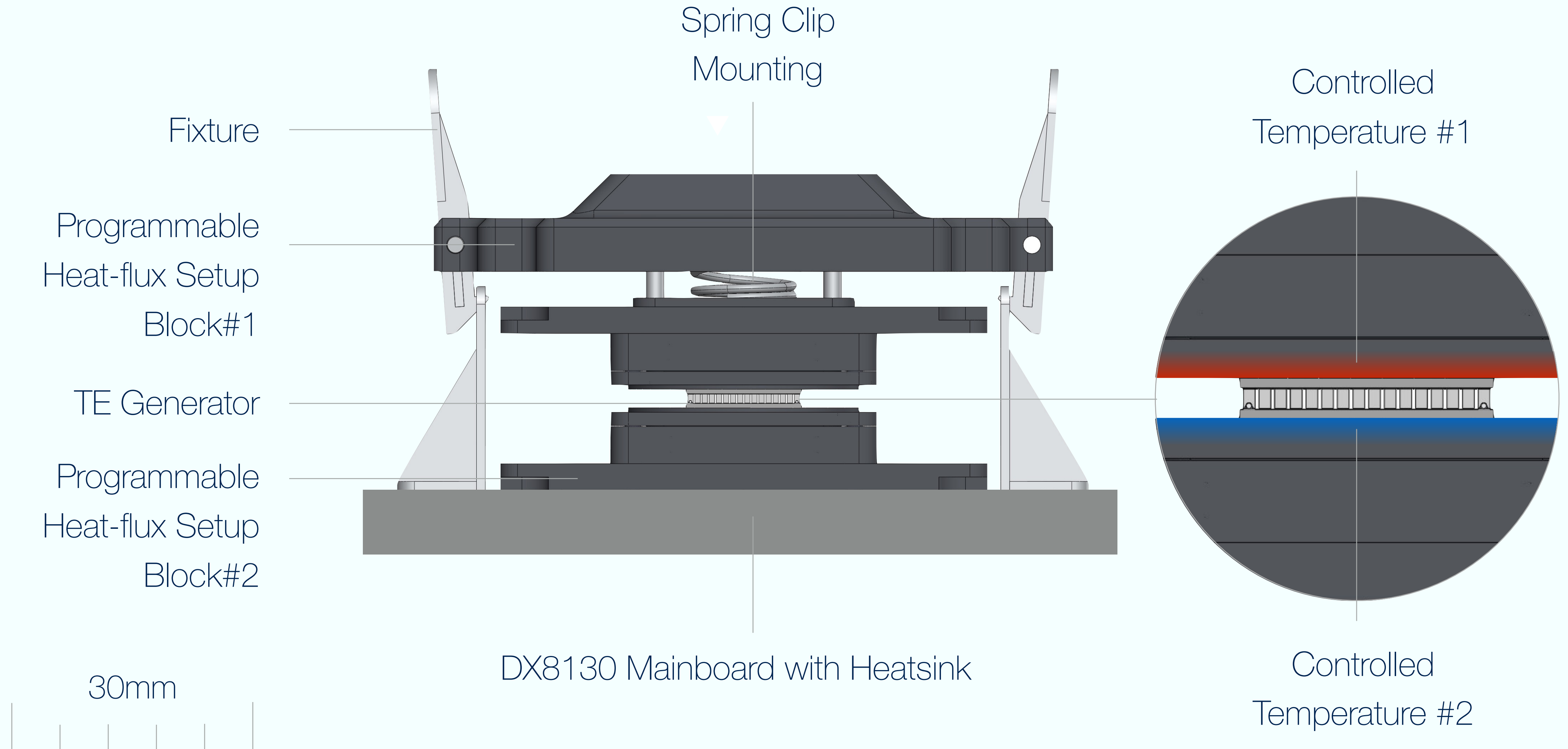
Mainboard with indicators and control instruments

Compact form factor (A4 sheet format)
10°C .. 100°C controlled temperature
dT setup up to 50deg for TEG analysis
Supports TEGs up to 30x30mm² size

80mm



DX8130 TEG Temperature Setup Block





DX8130 TEG Development Kit

Specifications

DX8130 PARAMETERS	UNITS	VALUE
Temperature stabilizing range	°C	+10 ... +100
Max temperature difference to set	°C	50
Output voltage range of TEG	V	0 ... 9.999
Electric current range of the TEG	A	0 ... 1.000
Heat flux range	W	0 ... 9.999
Output voltage of DC-DC converter	V	0 ... 9.999
Load current		
High current mode	A	0 ... 0.100
Low current mode	mA	0 ... 5.0
Computer interface		USB
TEGS DIMENSIONS SUPPORTED		
Length x Width (A x B)	mm	2x2 ... 30x30
TEG Height (H)	mm	0.5 ... 5.0
POWER SUPPLY		
DX8130 Power Supply	V	110 ... 240
Max power consumption	W	60

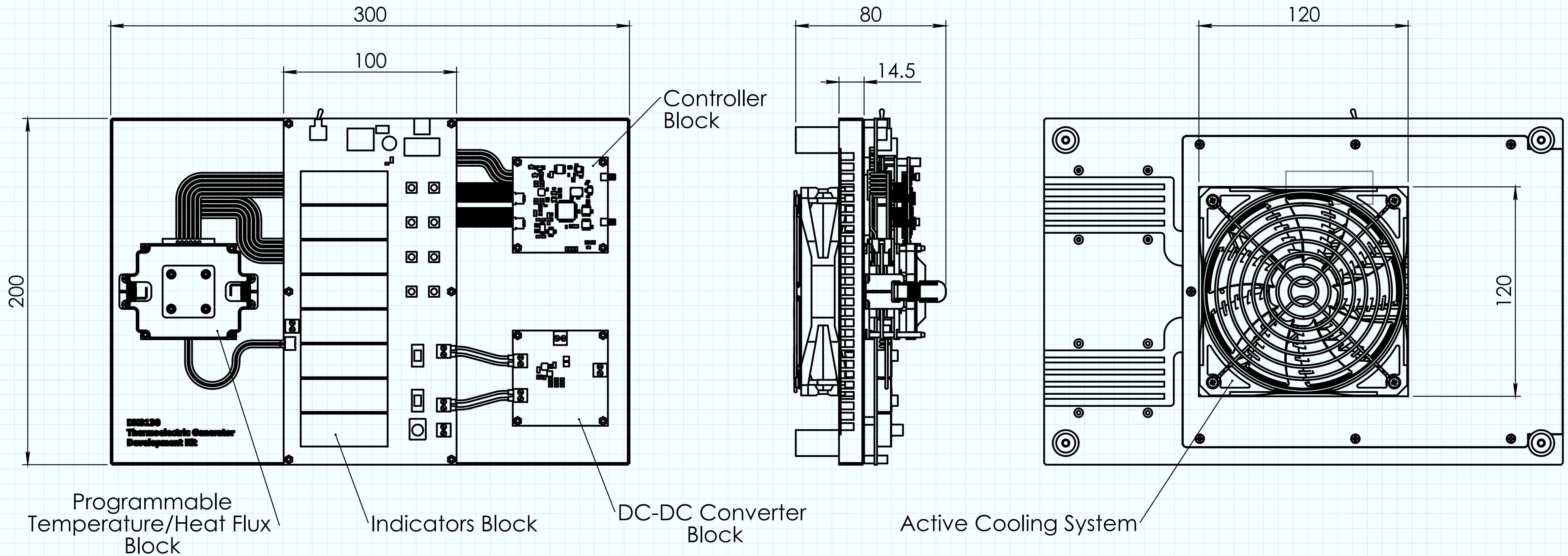
DIMENSIONS & WEIGHT		
Overall dimensions of Kit AxBxH, max	mm	200 x 300 x 80
Weight	kg	3.0
Dimensions of main modules		
- Mounting table	mm	200 x 300 x 20
- Electronic plate	mm	100 x 200 x 25
- Controller unit	mm	55 x 55 x 35
- Programmable heat flux unit	mm	55 x 55 x 8
- DC/DC converter unit	mm	55 x 55 x 10

DX8130 DELIVERY KIT	Q-TY
TE microgenerators samples	5
Standard mounting frame (for mounting of optional TEGs)	1 pc
Set of DC-DC converter boards with standard DC-DC circuits	
BQ25504RGT (Texas Instruments)	1pcs
LTC3108EGN (Linear Technology)	1pcs
Programmable precise heat flux unit	2 pc
DX5100 Controller to manage heat flux	1 set
Control electronic and indication board	1 pc
Software TEGLab	1 set
Power supply (AC 110-240V)	1 pc
User Guide	1 pc



DX8130 TEG Development Kit

Dimensions (mm)





DX8130 TEG Development Kit Software (Windows)

Connection state: Add to Log Show Chart

HOT 50,01 °C 4,627 W 50,00 °C SET STOP

COLD 25,04 °C 2,973 W 25,00 °C SET STOP

GEN 0,685 V 18,4 mA out 0,679 V power: 12,5 mW efficiency: 0,4 % N=127

LOAD 4,011 V 0,8 mA ext 4,011 V power: 3,2 mW efficiency: 25,7 %

PC Mode 26 % Low Current-voltage characteristic GEN LOAD Stabilization time [s] 2 number of measurement points 10 GO

Connection state: Add to Log Show Chart

HOT 49,96 °C 5,417 W 50,00 °C SET STOP V sensor: INF

COLD 20,08 °C 4,065 W 20,00 °C SET STOP V sensor: INF

GEN 0,498 V 47,5 mA out 0,482 V power: 22,9 mW efficiency: 0,6 % N=127

LOAD 3,968 V 3,7 mA ext 3,967 V power: 14,7 mW efficiency: 64,1 %

PC Mode 87 % Low Current-voltage characteristic GEN LOAD Stabilization time [s] 1 number of measurement points 25 STOP

Current-voltage characteristic LOAD

Save Clear Load Add source LOAD point 21 wait for 0 sec

Current [A]	Voltage [V]
3,975	3,4
3,98	3,0
3,985	2,6
3,99	2,8
3,995	2,4
4,0	2,2
4,005	1,8
4,01	1,4
4,015	1,0
4,02	0,6
4,025	0,2
4,03	0,0
4,035	0,0
4,04	0,0

TabDebug TabGenerator

Send

{	00009792	50.06	19.97	5.8235	4.4676	0.9241	3.9282	0.0000	0.0000	12.2117	0F	0D	50.0	20.0	87FF	0C00 }
{	00009802	50.15	19.87	5.6385	4.3774	0.9529	3.9270	0.0000	0.0000	12.2150	0F	0D	50.0	20.0	87FF	0C00 }
{	00009812	50.29	19.71	5.3897	4.2484	0.9574	3.9260	0.0000	0.0000	12.2332	0B	0D	50.0	20.0	87FF	0800 }
{	00009822	50.31	19.66	4.8786	3.9726	0.9613	3.9246	0.0000	0.0000	12.2348	0B	09	50.0	20.0	87FF	0000 }
{	00009832	50.30	19.63	4.7040	3.8645	0.9607	3.9239	0.0000	0.0000	12.2364	0B	09	50.0	20.0	87FF	0000 }
{	00009842	50.24	19.61	4.6031	3.7720	0.9594	3.9232	0.0000	0.0000	12.2548	0B	09	50.0	20.0	87FF	0000 }
{	00009852	50.19	19.62	4.6340	3.6616	0.9555	3.9214	0.0000	0.0000	12.2392	0B	09	50.0	20.0	87FF	0000 }
{	00009862	50.11	19.64	4.7131	3.6458	0.9534	3.9208	0.0000	0.0000	12.2510	0B	09	50.0	20.0	87FF	0000 }
{	00009872	50.09	19.68	4.9208	3.6328	0.9511	3.9199	0.0000	0.0000	12.2370	0B	09	50.0	20.0	87FF	0000 }
{	00009882	50.07	19.70	4.9838	3.6459	0.9500	3.9184	0.0000	0.0000	12.2362	0B	09	50.0	20.0	87FF	0000 }
{	00009892	50.08	19.73	5.0376	3.6587	0.9499	3.9179	0.0000	0.0000	12.2502	0B	09	50.0	20.0	87FF	0000 }
{	00009902	50.08	19.75	5.0491	3.6748	0.9497	3.9162	0.0000	0.0000	12.2364	0F	09	50.0	20.0	87FF	0400 }

- TEG Operating conditions setup and monitoring
- TEG CVC (Current-Voltage) Charts analysis
- Complete telemetry output



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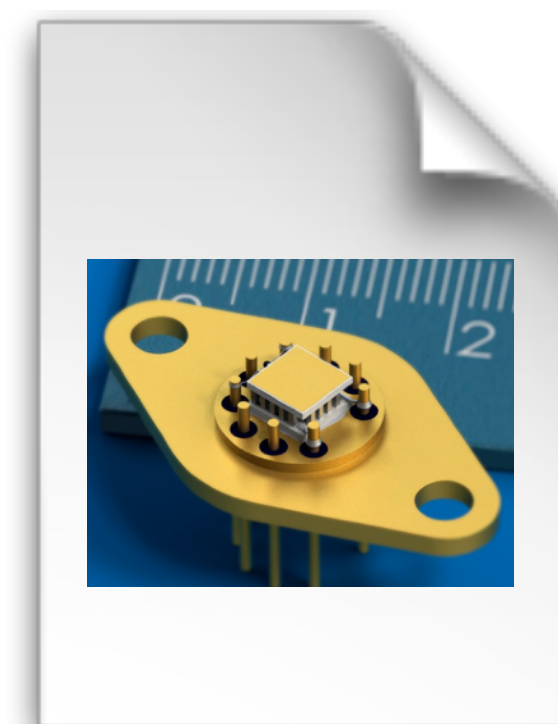
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