

**SERIES:** HSE-BX-04H-01 | **DESCRIPTION:** HEAT SINK

**FEATURES**

- TO-220 package
- placement pins for secure PCB attachment
- round hole for component attachment
- multiple available cut lengths



**MODEL**

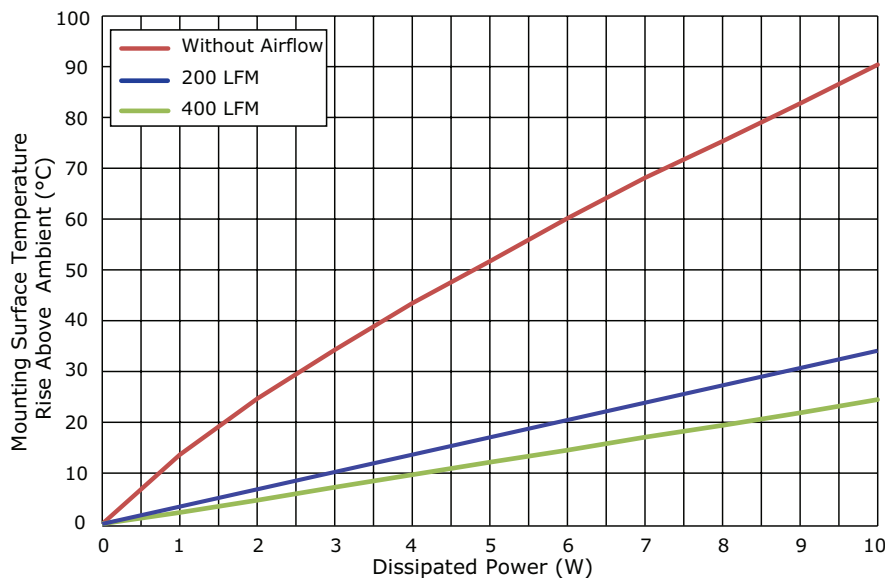
	length [mm]	thermal resistance <sup>1</sup>				power dissipation <sup>1</sup> @ 75°C ΔT, nat conv [W]
		@ 75°C ΔT, nat conv [°C/W]	@ 1 W, nat conv [°C/W]	@ 1 W, 200 LFM [°C/W]	@ 1 W, 400 LFM [°C/W]	
HSE-B250-04H	25	9.38	13.60	3.26	2.25	8.00
HSE-B500-04H	50	6.15	8.05	2.88	2.12	12.20
HSE-B630-04H	63	5.21	9.37	2.31	1.86	14.40

Note: 1. See performance curves for full thermal resistance details.  
2. Custom cut to length options available. Thermal data not available on custom lengths.

**PERFORMANCE CURVES**

**HSE-B250-04H**

Power [W]	Heatsink Temperature Rise Above Ambient (ΔT = Ths - Ta) [°C]		
	Natural Conv.	200 LFM	400 LFM
0	0	0	0
1	13.60	3.26	2.25
2	24.62	6.61	4.65
3	34.26	10.05	7.18
4	43.45	13.46	9.67
5	51.69	16.85	12.11
6	60.18	20.16	14.49
7	68.13	23.72	17.06
8	75.33	27.06	19.37
9	82.77	30.36	21.85
10	90.41	34.06	24.45

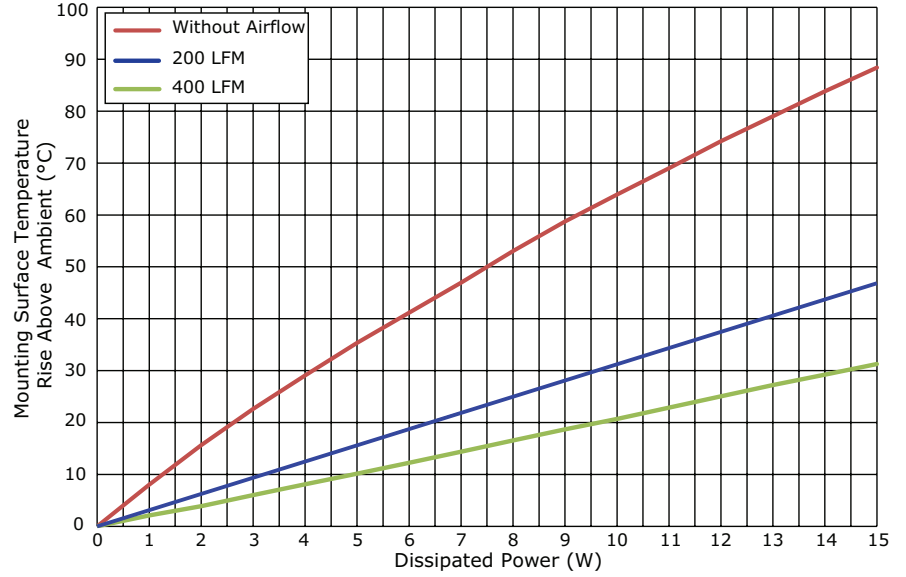


Ths: "hot spot" temperature measured on the heatsink  
Ta: ambient temperature

## PERFORMANCE CURVES (CONTINUED)

### HSE-B500-04H

Power [W]	Heatsink Temperature Rise Above Ambient ( $\Delta T = T_{hs} - T_a$ ) [°C]		
	Natural Conv.	200 LFM	400 LFM
0	0	0	0
1	8.05	2.88	2.12
2	15.65	6.20	3.91
3	22.61	9.34	6.03
4	29.06	12.43	8.12
5	35.34	15.82	10.15
6	41.17	18.99	12.26
7	46.96	22.14	14.37
8	53.06	24.84	16.58
9	58.73	28.02	18.67
10	63.92	31.30	20.68
11	69.02	34.30	22.85
12	74.20	37.50	25.06
13	78.99	40.75	27.25
14	83.83	43.67	29.22
15	88.40	46.82	31.27

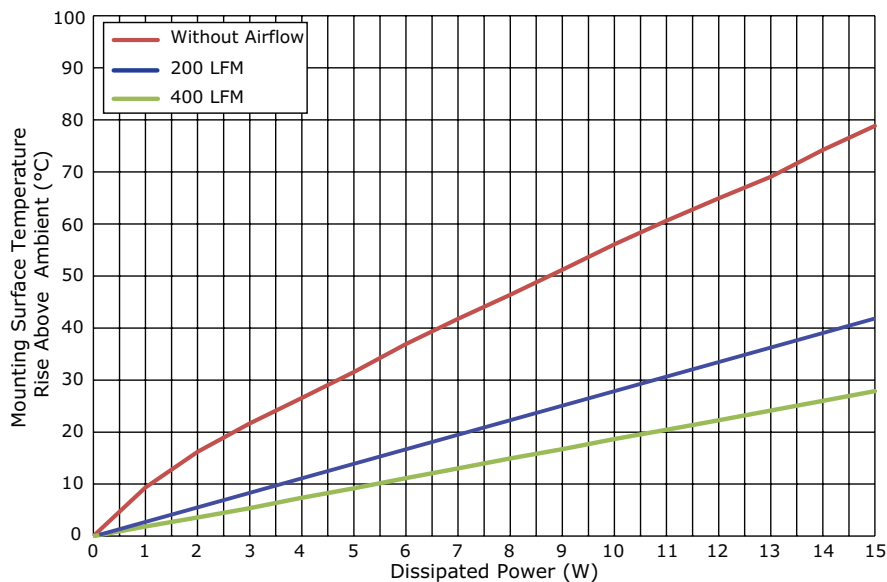


T<sub>hs</sub>: "hot spot" temperature measured on the heatsink  
 T<sub>a</sub>: ambient temperature

## PERFORMANCE CURVES (CONTINUED)

### HSE-B630-04H

Power [W]	Heatsink Temperature Rise Above Ambient ( $\Delta T = T_{hs} - T_a$ ) [°C]		
	Natural Conv.	200 LFM	400 LFM
0	0	0	0
1	9.37	2.31	1.86
2	16.20	5.02	3.59
3	21.68	7.73	5.38
4	26.57	10.57	7.35
5	31.54	13.41	9.19
6	36.91	16.34	11.16
7	41.76	19.19	13.04
8	46.40	22.17	14.92
9	51.20	24.95	16.72
10	56.07	27.66	18.66
11	60.60	30.53	20.46
12	64.94	33.33	22.27
13	69.05	36.12	24.13
14	74.21	38.78	26.01
15	78.87	41.82	27.89

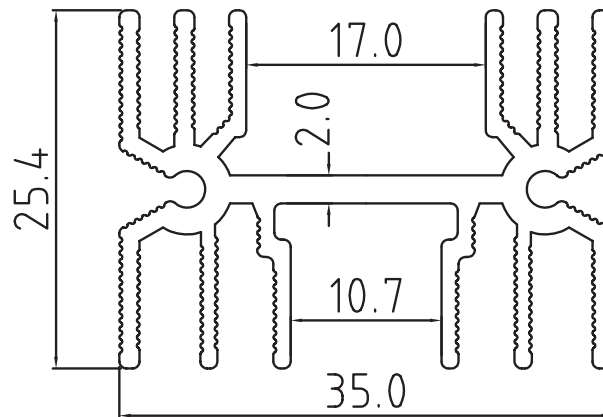
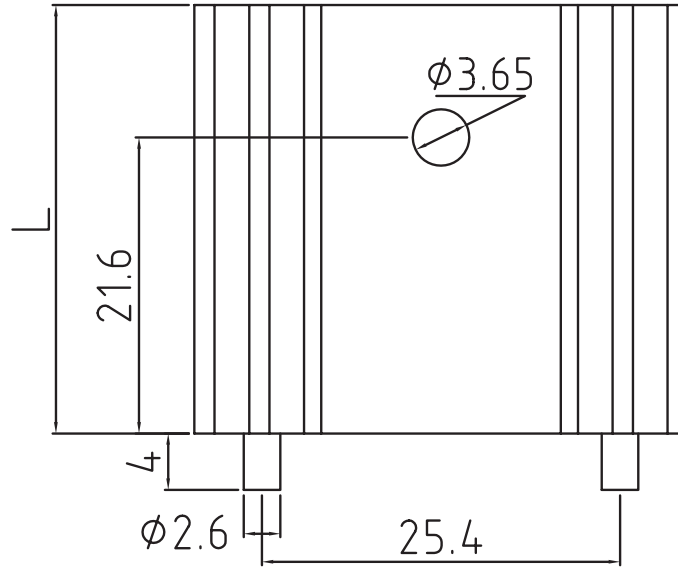


T<sub>hs</sub>: "hot spot" temperature measured on the heatsink  
 T<sub>a</sub>: ambient temperature

## MECHANICAL DRAWING

units: mm  
tolerance: ±0.5 mm

MATERIAL	AL 6063-T5
FINISH	black anodized
PIN MATERIAL	steel
PIN PLATING	tin



MODEL NO.	LENGTH, L [mm]	WEIGHT [g]
HSE-B250-04H	25	21.33
HSE-B500-04H	50	35.7
HSE-B630-04H	63	43.4

## REVISION HISTORY

rev.	description	date
1.0	initial release	05/08/2017
1.01	brand update	02/11/2020
1.02	logo, datasheet style update	08/05/2022

The revision history provided is for informational purposes only and is believed to be accurate.



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