

PRODUCT SPECIFICATION

SPEC. No.

T-0653-110B



1. Scope

This specification applies High Current Power Inductors PHC0730-Series-IY to be delivered to user.

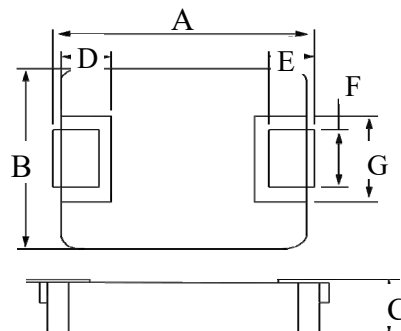
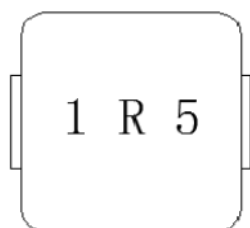
2. Product Identification

PHC 0730 - R68M - IY




(1) (2) (3) (4) (5)

- (1) Product name
- (2) Shapes and dimensions
- (3) Inductance
R68: 0.68 μ H
- (4) Tolerance(%)
M: $\pm 20\%$, N: $\pm 30\%$
- (5) For Customer Design

3. Shapes and Dimensions [Dimensions in mm]



A : 7.0 \pm 0.3 mm
 B : 6.6 \pm 0.2 mm
 C : 2.8 \pm 0.2 mm
 D : 2.0 \pm 0.1 mm
 E : 1.6 \pm 0.3 mm
 F : 3.0 \pm 0.3 mm
 G : 3.6 \pm 0.2 mm

Drawn by	Checked by	Approved by
 Mar. 8. 2022	 Mar. 8. 2022	 Mar. 8. 2022

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4. Electrical Characteristics

4-1 Electrical Spec.

Customer Part Number	EMTEK Part No.	Inductance (μH)	Tol.	Rdc (mΩ)		Heat Rating Current Idc(A) Typ.		Saturation Current Isat(A) Typ.
				Typ.	Max.			
	PHC0730-R33□-IY	0.33	M	3.0	3.5	21	25	
	PHC0730-R47□-IY	0.47	M	3.5	4.1	18	20	
	PHC0730-R68□-IY	0.68	M	4.8	5.3	16	17	
	PHC0730-1R0□-IY	1.0	M	6.7	7.4	12	15	
	PHC0730-1R5□-IY	1.5	M	10.6	12.1	10	14	
	PHC0730-2R2□-IY	2.2	M	13.5	15	8	10	
	PHC0730-3R3□-IY	3.3	M	18	22	6.5	9.5	
	PHC0730-4R7□-IY	4.7	M	28	33	5.5	6.5	
	PHC0730-6R8□-IY	6.8	M	42.5	48	4.5	6	
	PHC0730-100□-IY	10	M	62	67	4	5.5	
	PHC0730-150□-IY	15	M	104	115	3	4.5	
	PHC0730-220□-IY	22	M	180	200	2.3	3.0	
	PHC0730-330□-IY	33	M	280	310	2	2.5	
	PHC0730-470□-IY	47	M	340	385	2	1.5	

1. Test frequency: 100KHz, 1.0V
2. Testing instrument: Wayne kerr 3260B/G LCR Meter
Wayne kerr 3265B Bias Current Source
3. DC current(Idc) that will cause an approximate ΔT of 40°C
4. DC current(Isat) that will cause Lo to drop approximately 30%
5. All test data is referenced to 25°C ambient
6. Operating Temperature Range -55°C to +125°C
7. The part number(ambient + temp rise) should not exceed 125°C unde the worst operating conditions. Circuit design, component placement, PWB trace size and thickness, airflow and other cooling provisions all affcet the part temperature. Part temperature should be verified in the end application.