

Automotive Ferrite Chip Beads



AFBC-Q4532

Request Samples



Check Inventory



4.50 x 3.20 x 1.50 mm
RoHS/RoHS II Compliant
MSL Level = 1

Features

- AEC-Q200 Qualified
- Operating Temperature: -55 ~ +150°C
- Wide range impedance
- Monolithic inorganic material construction
- Excellent heat resistance
- Current rating up to 6A

Applications

- Electronic control Units (ECUs)
- Battery Management Systems (BMS)
- Powertrain system
- DC/AC Converters
- Industrial connectivity (IIoT)

Electrical Specifications

Part Number	Impedance	DC Resistance	Rated Current
Units	$\Omega \pm 25\%$	Ω Max.	mA Max.
Symbol	Z	R _{DC}	I _R
AFBC-Q4532-800	80	0.01	6000
AFBC-Q4532-121	120	0.02	5000
AFBC-Q4532-131	130	0.04	3000
AFBC-Q4532-151	150	0.02	5000

Test Conditions and Equipment

Impedance Test Frequency: 100MHz

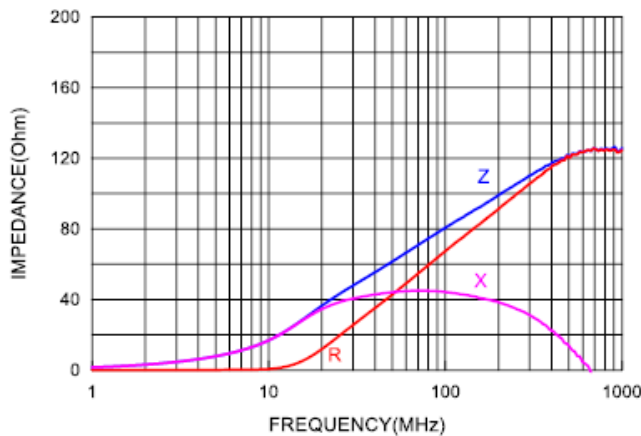
I_R: Temperature Rise: 40°C Max. At Rated Current $\geq 1A$.

Operating Temperature: -55°C to +150°C (Including self-temperature rise)

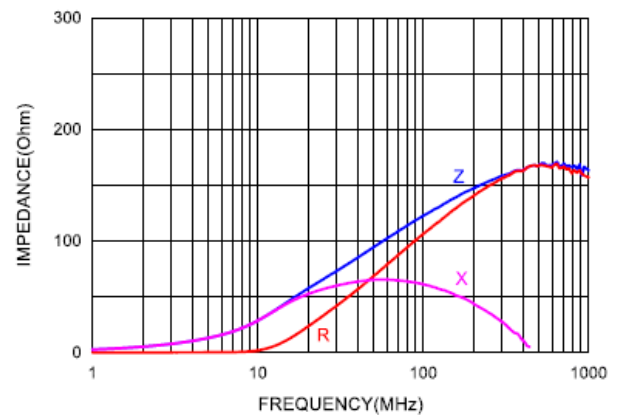
Storage Temperature: <+40°C and RH 60% (Max).

AFBC-Q4532 is RoHS Compliant and Pb free

AFBC-Q4532-800



AFBC-Q4532-121



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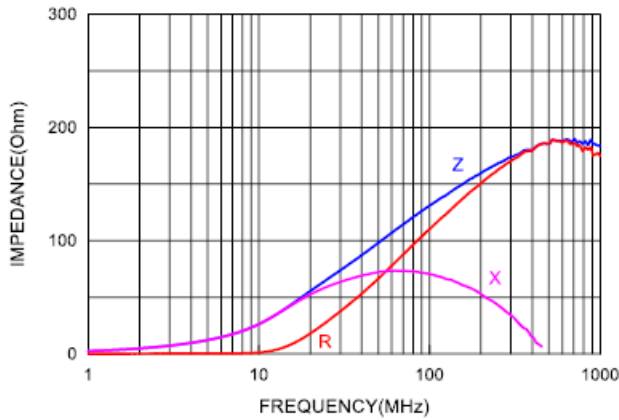
Check Inventory



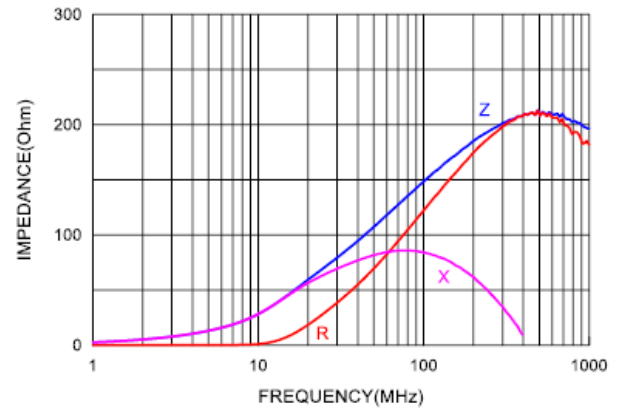
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Electrical Specifications (Cont'd)

AFBC-Q4532-131



AFBC-Q4532-151



Part Number Identification

AFBC-Q4532 - -

Impedance Code

Please refer to the Electrical Specification table

Packaging

T: Tape and Reel
(1kpcs / reel)

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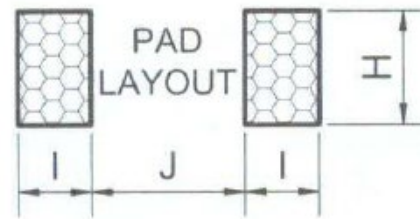
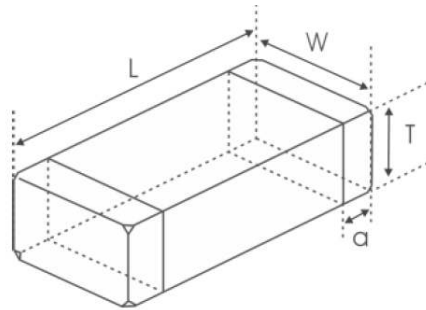


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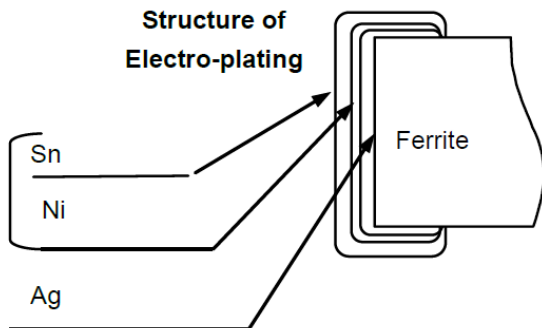
Mechanical Specifications



L	W	T	a	H	I	J
4.50±0.20	3.20±0.20	1.50±0.20	0.50±0.30	3.40 Ref.	1.05 Ref.	3.30 Ref.

Dimension: mm

Materials



	Structure Description
1	Ferrite for Beads
2	Internal Terminal Electrode: Ag (100%)
3	Electro-plating: Ni (100%)
4	External Electro-plating: Sn (100%)

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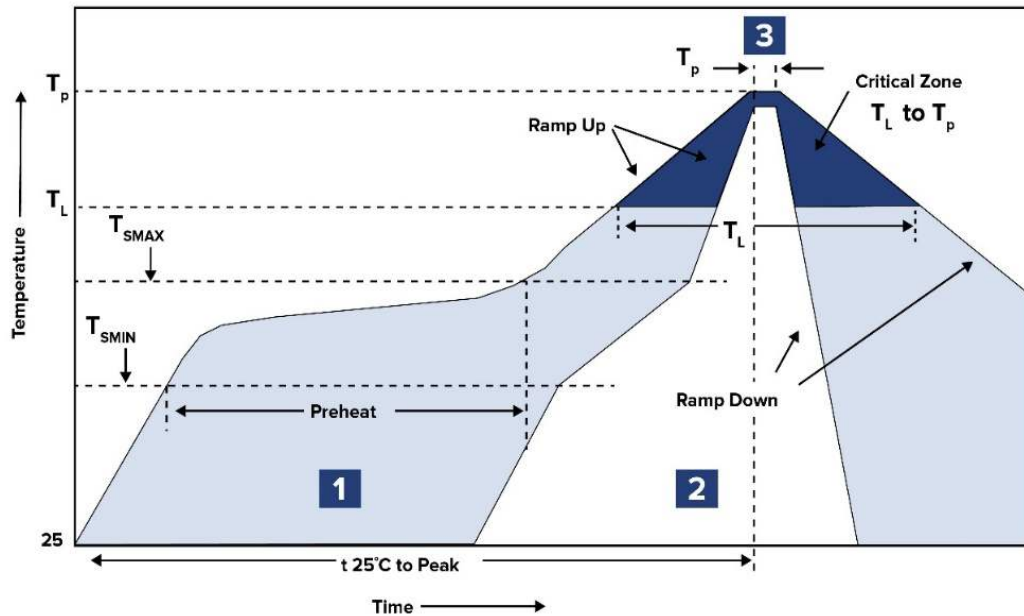


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4.50 x 3.20 x 1.50 mm
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Reflow Profile



Zone	Description	Temperature	Times
1	Preheat	$T_{SMIN} \sim T_{SMAX}$ 150°C ~ 200°C	60 ~ 180 sec.
2	Reflow	T_L 245°C	20 ~ 40 sec.
3	Peak heat	T_P 260°C	10 sec. MAX

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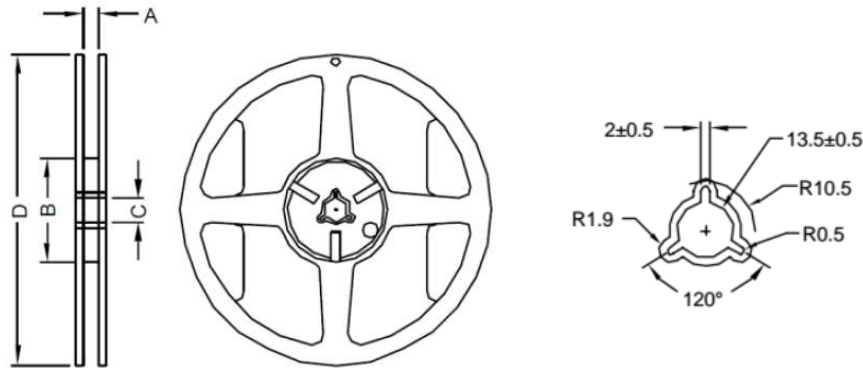
Check Inventory



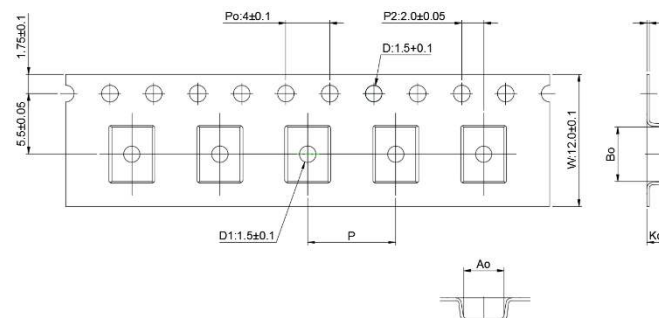
4.50 x 3.20 x 1.50 mm
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Packaging

T= Tape and reel (1,000 pcs/reel)



Type	A	B	C	D
7"x12mm	13.5 ± 0.5	60.0 ± 2.0	13.5 ± 0.5	178.0 ± 2.0



Series	Bo	Ao	Ko	P
AFBC-Q4532	4.70 ± 0.1	3.45 ± 0.1	1.60 ± 0.1	8.00 ± 0.10

Dimension: mm

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