



FEATURES

- AEC-Q200 Qualified
- Shielded construction
- Soft saturation
- Low DCR per cubic mm
- Designed for switching frequencies between 100KHz-5MHz



ELECTRICAL SPECIFICATIONS @ 25°C

PART NUMBER*	INDUCTANCE (uH)	TOLERANCE (%)	IRMS (A)	ISAT (A)	DC RESISTANCE (mΩ)		TYPE
					TYP	MAX	
AMDLA4010Q-R22MT	0.22	20	11	18	9.8	12	Lead Frame
AMDLA4010Q-R33MT	0.33	20	10	14	11.7	14.5	Lead Frame
AMDLA4010Q-R47MT	0.47	20	8.5	11	15.2	18.5	Lead Frame
AMDLA4010Q-1R0MT	1.0	20	4.2	6.5	35	42	Lead Frame
AMDLA4010Q-2R2MT	2.2	20	2.8	4.5	90	108	Lead Frame
AMDLA4010Q-6R8MT	6.8	20	1.4	2.8	224	268	Lead Frame
AMDLA4010Q-100MT	10	20	1.1	1.7	260	312	Lead Frame

* Please refer to Part Identification section

Test Conditions

Inductance: 1 MHz, 1 V, 0 Adc

Humidity Range: 65% RH

Temperature Rise Current: Current measured at Δ T of 40°C

Saturation Current: Current measured at Δ L of 30%

GENERAL SPECIFICATIONS

Operating Temperature:

-55°C to +125°C with (40°C rise) Irms current.

Maximum Part Temperature: +125°C

Components Storage Temperature:

-55°C to +125°C

Tape and Reel Packaging

Temperature: -20°C to +65°C

MSL: Level 1

MATERIALS

Core: Metal Alloy

Wire: Copper

Terminal: Tin Plating

Ink: Black

PART BUILDER



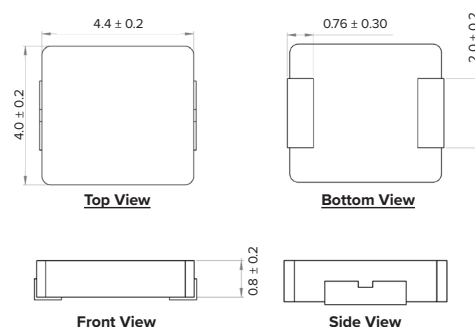
1. Tolerance: M = 20%

2. Packaging: B = Bulk

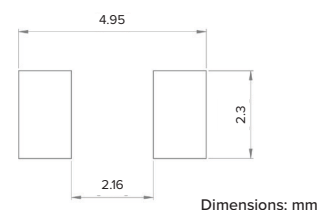
T = Tape and Reel (4,000pcs/reel)

*Refer to Electrical Specification table

PRODUCT DIMENSIONS



RECOMMENDED LANDING PATTERN

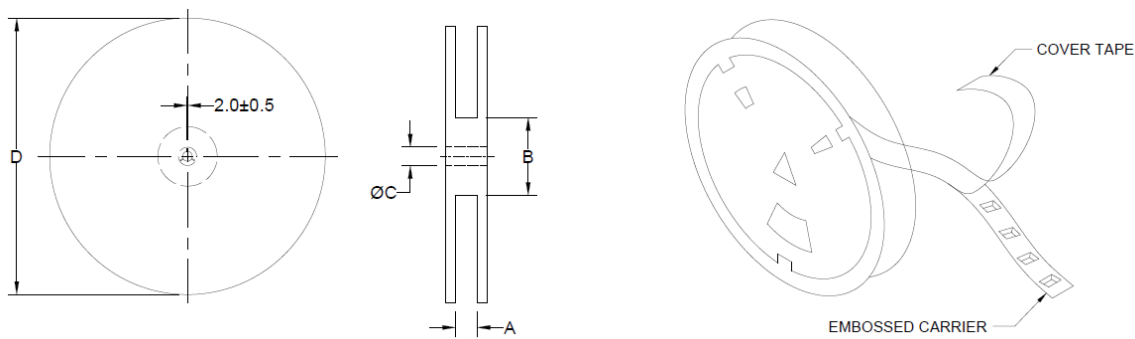


The graph illustrates the temperature profile of a fire over time. The vertical axis represents Temperature, and the horizontal axis represents Time. The curve begins at a baseline of 25°C. It enters Region 1 (Preheat), where the temperature rises slowly. This is followed by Region 2 (Ramp Up), where the temperature increases more rapidly. The peak temperature is T_p . Region 3 (Critical Zone) shows the temperature dropping from T_p to T_L , a period labeled as the Critical Zone. The graph is divided into three numbered regions: 1 (Preheat), 2 (Ramp Up), and 3 (Critical Zone). Key temperature levels T_L , T_{SMAX} , and T_{SMIN} are marked. A horizontal double-headed arrow indicates the time from 25°C to the peak.

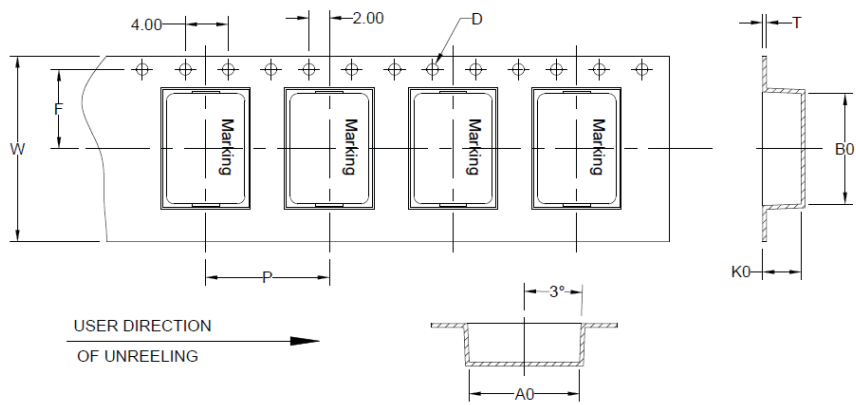
ZONE	DESCRIPTION	TEMPERATURE	TIMES
1	Preheat	$T_{smin} \sim T_{smax}$ 150°C ~ 180°C	60 ~ 120 sec.
2	Reflow	T_L 230°C	30 ~ 40 sec.
3	Peak Heat	T_P 250°C±0/-5°C	10 sec. MAX

PACKAGING

Tape and Reel: 4,000
Units per Carton: 32,000
T&R per Carton: 8
Weight per Carton: 13.2 kg
Weight per Unit: 0.34 g
Carton Dimensions: 360 x 360 x 400 mm



TYPE	A	B	C	D
13" x 12 mm	12.4 +2/-0	100.0 ± 0.5	13.0 +0.5/-0.2	330.0



B ₀	A ₀	K ₀	P	W	F	T	D
4.85 ± 0.10	4.45 ± 0.10	1.40 ± 0.10	8.00 ± 0.10	12.00 ± 0.30	5.50 ± 0.10	0.30 ± 0.05	1.50

Dimensions: mm

This product is commercial off-the-shelf (COTS) and not specifically designed for automotive, military, aviation, aerospace, implantable, life-dependent medical or safety applications. This product is not recommended for use in any application requiring high reliability in which component failure could result in loss of life and/or property damage without prior written approval from Abracon. Specifications are subject to change without notice. Contact Abracon for more information.