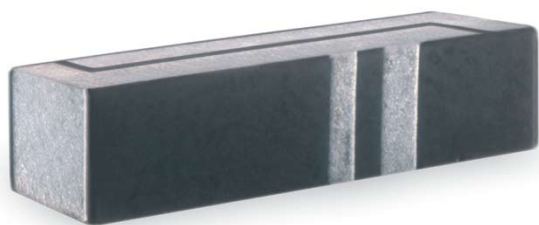


850/1900MHz Dual Band Diversity RX Ceramic Antenna

Ceramic Chip Antenna. PWB ground removal area under antenna 12.80 x 6.25 mm. Pulse Part Number: W3047A



Features

- PIFA antenna
- Dual band operation, single feed point
- SMD compatible
- Lead free materials
- Size W x L x H (12 x 3 x 3 mm)
- Weight: 530 mg
- RoHS Compliant

Applications

- Dual band US GSM Rx
- 850MHz/1900MHz Rx

W3047A Dual band diversity antenna typical performance @ +25 °C

Note: Performance figures are measured when antenna is mounted on Pulse evaluation board

Frequency Range [MHz]	Efficiency [%] / [dB]	Impedance [Ω]
869-894	50 / -3 (peak)	50
1930-1990	70 / -1,55 (peak)	

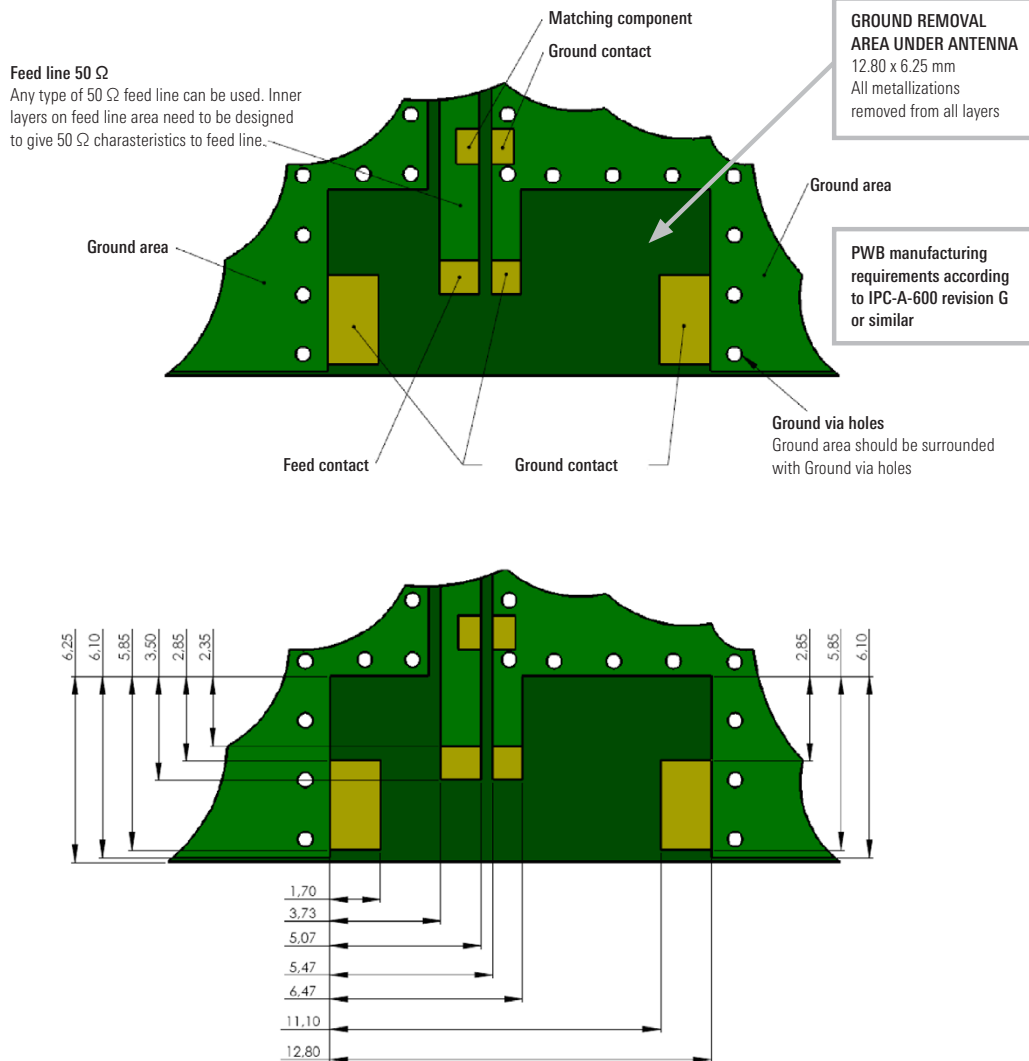
Pulse Finland Oy

Takatie 6
90440 Kempele, Finland
Tel: +358 207 935 500
Fax: +358 207 935 501
www.pulseeng.com/antennas



850/1900MHz Dual Band Diversity RX Ceramic Antenna

Ceramic Chip Antenna. PWB ground removal area under antenna 12.80 x 6.25 mm. Pulse Part Number: W3047A



Recommended Antenna Pad Dimensions on PWB Layout (top surface)

No.	Terminal Name	Terminal Dimensions [mm]
1	Feed	1.34 x 1.15
2	GND	1.00 x 1.15
3	GND	3.00 x 1.70
4	GND	3.00 x 1.70

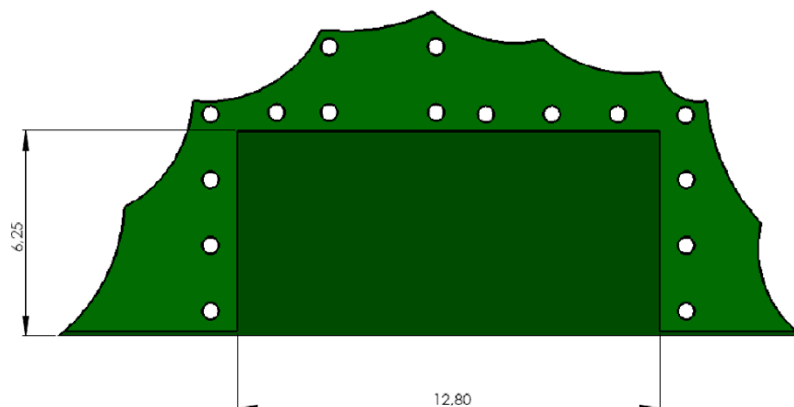
Pulse Finland Oy

Takatie 6
90440 Kempele, Finland
Tel: +358 207 935 500
Fax: +358 207 935 501
www.pulseeng.com/antennas

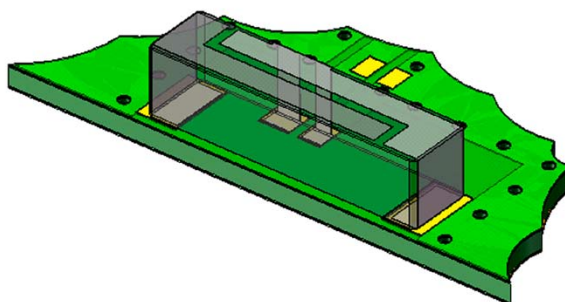
850/1900MHz Dual Band Diversity RX Ceramic Antenna

Ceramic Chip Antenna. PWB ground removal area under antenna 12.80 x 6.25 mm. Pulse Part Number: W3047A

Recommended ground clearance area under antenna on PWB (bottom surface)



3D-view of test setup



850/1900MHz Dual Band Diversity RX Ceramic Antenna

Ceramic Chip Antenna. PWB ground removal area under antenna 12.80 x 6.25 mm. Pulse Part Number: W3047A

W3047A Dual band diversity antenna typical Return Loss and Smith chart

Antenna location is on side center of 40x100mm Pulse evaluation board

W3047A

2 Oct 2009 13:48:24

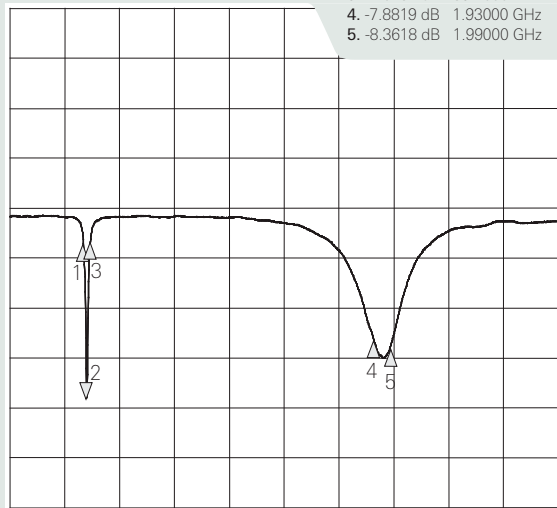
CH1 S11bLOG

3 dB/REF 0 dB

CH1Markers

1.	-2.1806 dB	869.000 MHz
2.	-11.348 dB	881.000 MHz
3.	-2.0187 dB	894.000 MHz
4.	-7.8819 dB	1.93000 GHz
5.	-8.3618 dB	1.99000 GHz

Cor



START 600.000 000 MHz

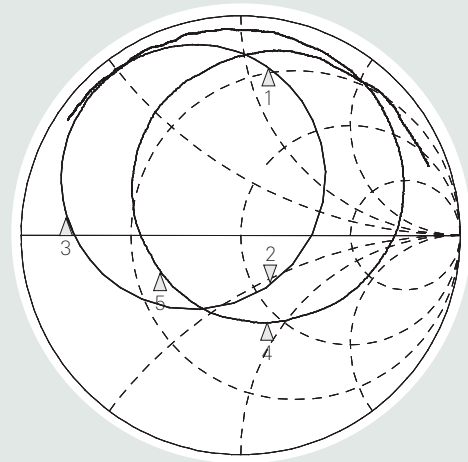
STOP 2 600.000 000 MHz

W3047A

2 Oct 2009 13:48:08

CH1 S11 1 U FS

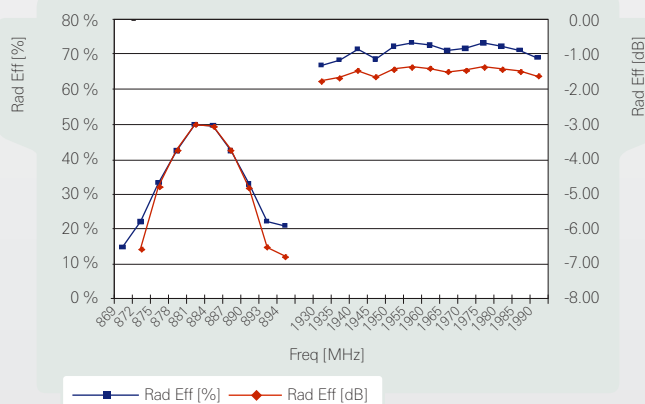
1.	14.805 Ω	56.750 Ω	869.000 MHz
2.	59.309 Ω	-27.367 Ω	6.6011 pF
		881.000 MHz	
3.	5.8682 Ω	2.4009 Ω	894.000 MHz
4.	44.785 Ω	-43.000 Ω	1.93000 GHz
5.	22.369 Ω	-8.9463 Ω	1.99000 GHz



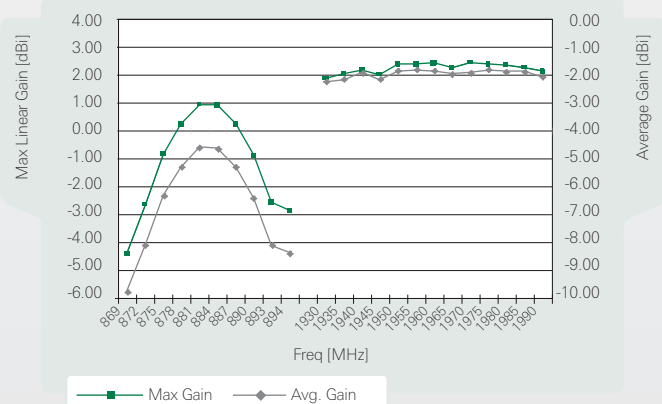
START 600.000 000 MHz

STOP 2 600.000 000 MHz

W3047A Efficiency



W3047A Gain



Pulse Finland Oy

Takatie 6
90440 Kempele, Finland
Tel: +358 207 935 500
Fax: +358 207 935 501

www.pulseeng.com/antennas



© 2008. All Rights Reserved.

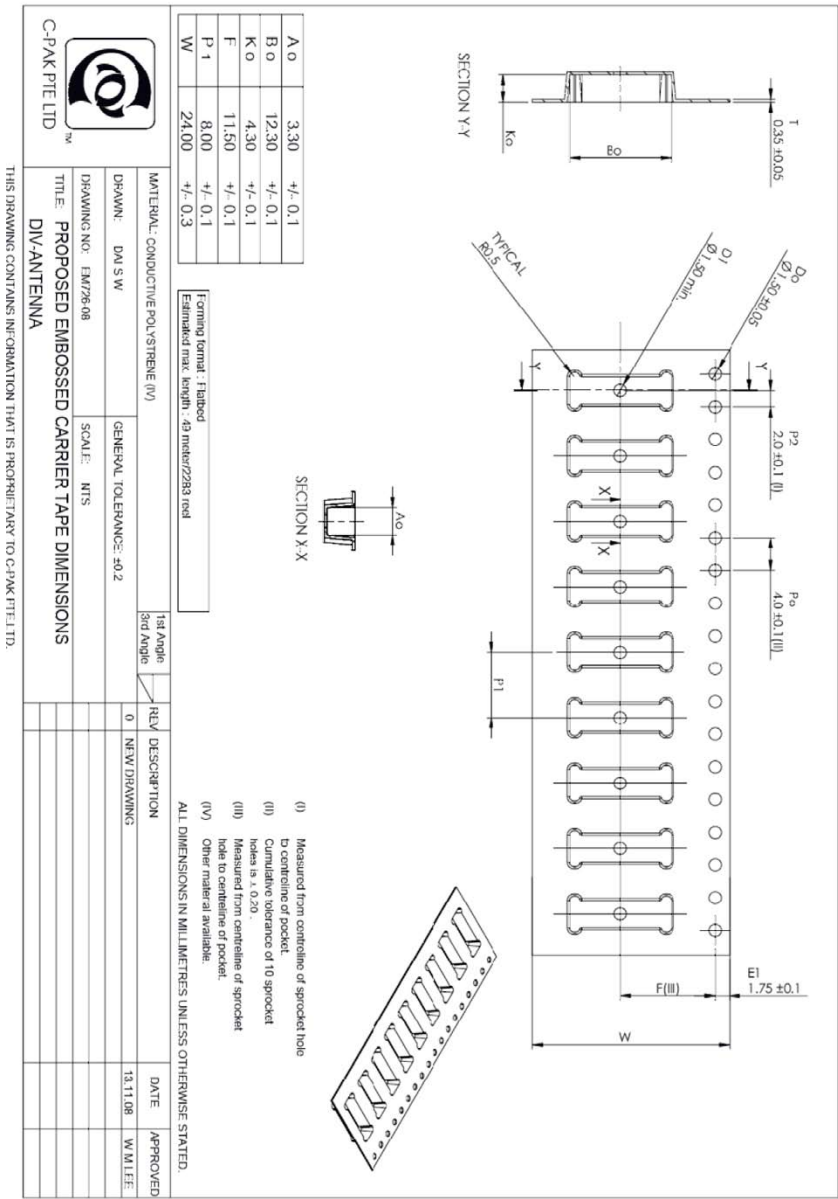
850/1900MHz Dual Band Diversity RX Ceramic Antenna

Ceramic Chip Antenna. PWB ground removal area under antenna 12.80 x 6.25 mm. Pulse Part Number: W3047A

General

Tape and reel packing is used. Carrier tape, reel and box dimensions are presented in following pictures.

Carrier tape

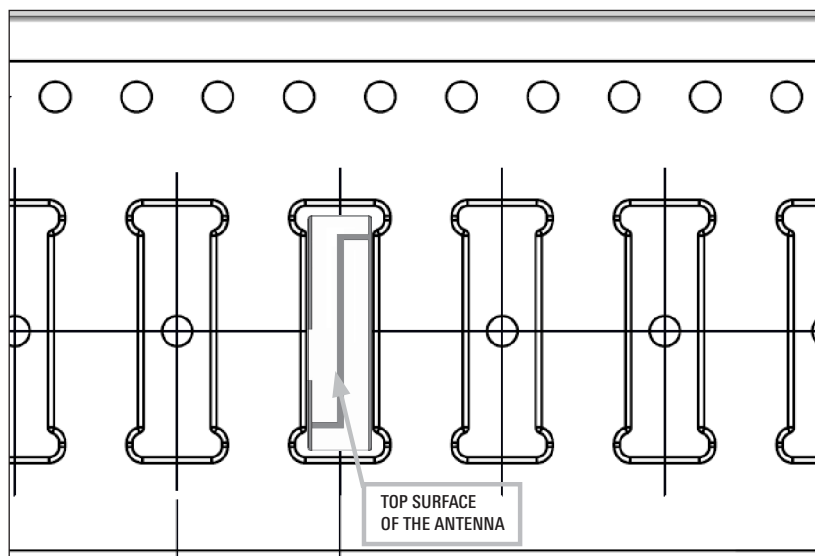


850/1900MHz Dual Band Diversity RX Ceramic Antenna

Ceramic Chip Antenna. PWB ground removal area under antenna 12.80 x 6.25 mm. Pulse Part Number: W3047A

Block orientation

Antenna soldering pads facing down to the bottom of the carrier tape.



Top View of the Carrier Tape

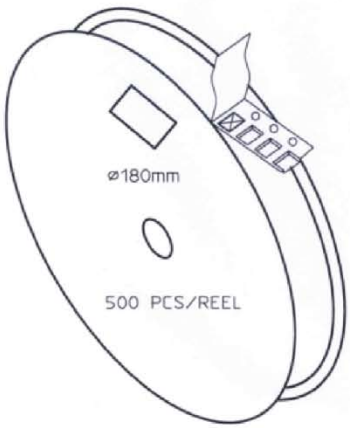
Pulse Finland Oy

Takatie 6
90440 Kempele, Finland
Tel: +358 207 935 500
Fax: +358 207 935 501
www.pulseeng.com/antennas



850/1900MHz Dual Band Diversity RX Ceramic Antenna

Ceramic Chip Antenna. PWB ground removal area under antenna 12.80 x 6.25 mm. Pulse Part Number: W3047A

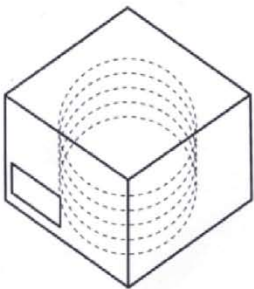


CARRIER TAPE H85-00201
width=24,00 depth=4.30
COVER TAPE H85-00195
width=21.20

LENGTH OF TAPE:

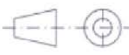
- Leader section: min 350 mm before component section
- Trailer section: min 40 mm after component section.

Empty part cavities at leader and trailer section of the tape must be sealed with top cover tape.



BOX H85-00128 1 pcs
(182x182x125)
- LABEL 1 pcs/BOX

REEL H85-00196 4 pcs
(D180, W28)
- REEL LABEL 1 pcs/REEL

MATERIAL			
HANDLINGS			
		RATIO	DRWN 250509 PeHa H
			DGNER
			CHKD
			APPRD
			APPRD BY
PRODUCT			C
DENOMINATION			B
PACKING FORM		VERSION	MOD/DATE/NAME

Pulse Finland Oy

Takatie 6
90440 Kempele, Finland
Tel: +358 207 935 500
Fax: +358 207 935 501
www.pulseeng.com/antennas



Mouser Electronics

Authorized Distributor

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

Pulse:

W3047A