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With the principle of “Quality Parts,Customers Priority,Honest Operation,and Considerate Service”,our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip,ALPS,ROHM,Xilinx,Pulse,ON,Everlight and Freescale. Main products comprise IC,Modules,Potentiometer,IC Socket,Relay,Connector.Our parts cover such applications as commercial,industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



## Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832

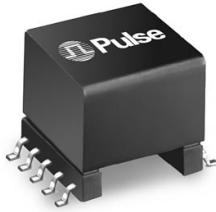
Email & Skype: info@chipsmall.com Web: www.chipsmall.com






Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China



# High Frequency Wire Wound Transformers

EP13Plus Platforms - SMT



-  Industry standard footprint, 30% more power handling
-  **Power Range:** Up to 70W
-  **Height:** 14.0mm Max
-  **Footprint:** 17.7mm x 14.5mm Max
-  **Topology:** Forward and Flyback

Pulse PN	Electrical Specifications @25C – Operating Temperature -40C to 130C <sup>1</sup>			Schematic	
PA3855.001NL	Pri. Inductance	(1-3)	54uH +/- 10%	<p>Flyback Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.67uH Max		
	DCR	(1-3)	62		mΩ Max
		(9-6)	6.5		
		(10-7)	6.5		
		(4-5)	120		
Hi-Pot	Pri-Sec	2250	Vdc		
K1 Factor	1125.0				
PA3855.002NL	Pri. Inductance	(1-3)	48uH +/- 10%	<p>Flyback Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.67uH Max		
	DCR	(1-3)	62		mΩ Max
		(9-6)	10		
		(10-7)	10		
		(4-5)	120		
Hi-Pot	Pri-Sec	2250	Vdc		
K1 Factor	1000.0				
PA3855.003NL	Pri. Inductance	(1-3)	41uH +/- 10%	<p>Flyback Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.67uH Max		
	DCR	(1-3)	62		mΩ Max
		(9-6)	20		
		(10-7)	23		
		(4-5)	120		
Hi-Pot	Pri-Sec	2250	Vdc		
K1 Factor	854.2				
PA3855.004NL	Pri. Inductance	(1-3)	21uH +/- 10%	<p>Flyback Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.3uH Max		
	DCR	(1-3)	31		mΩ Max
		(9-6)	10		
		(10-7)	10		
		(4-5)	180		
Hi-Pot	Pri-Sec	2250	Vdc		
K1 Factor	538.5				

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Pulse PN	Electrical Specifications @25C – Operating Temperature -40C to 130C <sup>1</sup>			Schematic	
PA3855.005NL	Pri. Inductance	(1-3)	21uH +/- 10%	<p>Flyback Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.3uH Max		
	DCR	(1-3)	31		mΩ Max
		(9-6)	14		
		(10-7)	14		
		(4-5)	180		
Hi-Pot	Pri-Sec	2250	Vdc		
K1 Factor	583.3				
PA3855.006NL	Pri. Inductance	(1-3)	21uH +/- 10%	<p>Flyback Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.3uH Max		
	DCR	(1-3)	31		mΩ Max
		(9-6)	58		
		(10-7)	58		
		(4-5)	180		
Hi-Pot	Pri-Sec	2250	Vdc		
K1 Factor	583.3				
PA3856.001NL	Pri. Inductance	(1-3)	100 uH +/- 15%	<p>Forward Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.4uH Max		
	DCR	(1-3)	29.4		mΩ Max
		(9-6)	6.5		
		(10-7)	6.5		
		(4-5)	120		
Hi-Pot	Pri-Sec	2250	Vdc		
K1 Factor	27.8				
PA3856.002NL	Pri. Inductance	(1-3)	100uH +/- 15%	<p>Forward Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.4uH Max		
	DCR	(1-3)	29.4		mΩ Max
		(9-6)	10		
		(10-7)	10		
		(4-5)	120		
Hi-Pot	Pri-Sec	2250	Vdc		
K1 Factor	27.8				
PA3856.003NL	Pri. Inductance	(1-3)	100uH +/- 15%	<p>Forward Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.4uH Max		
	DCR	(1-3)	29.4		mΩ Max
		(9-6)	31.6		
		(10-7)	36		
		(4-5)	120		
Hi-Pot	Pri-Sec	2250	Vdc		
K1 Factor	27.8				



# High Frequency Wire Wound Transformers

EP13Plus Platforms - SMT



Pulse PN	Electrical Specifications @25C – Operating Temperature -40C to 130C <sup>1</sup>			Schematic	
PA3856.004NL	Pri. Inductance	(1-3)	128uH +/- 25%	<p>Forward Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.15uH Max		
	DCR	(1-3)	17.6		mΩ Max
		(9-6)	14.4		
		(10-7)	17		
		(4-5)	410		
	Hi-Pot	Pri-Sec	2250		Vdc
K1 Factor	41.7				
PA3856.005NL	Pri. Inductance	(1-3)	128uH +/- 15%	<p>Forward Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.15uH Max		
	DCR	(1-3)	17.6		mΩ Max
		(9-6)	31.6		
		(10-7)	36		
		(4-5)	410		
	Hi-Pot	Pri-Sec	2250		Vdc
K1 Factor	41.7				
PA3856.006NL	Pri. Inductance	(1-3)	128uH +/- 15%	<p>Forward Transformer</p>	
	Lk. Inductance	(1-3) w/ (10,9,6,7,4,5) shorted	0.15uH Max		
	DCR	(1-3)	17.6		mΩ Max
		(9-6)	105.6		
		(10-7)	122		
		(4-5)	426		
	Hi-Pot	Pri-Sec	2250		Vdc
K1 Factor	41.7				

- Notes:**
- The temperature of the component (ambient plus temperature rise) must be within the stated operating temperature range.
  - For flyback topology applications, it is necessary to ensure that the transformer will not saturate in the application. The peak flux density (Bpk) should remain below 2700Gauss. To calculate the peak flux density use the following formula:  
 $Bpk \text{ (Gauss)} = K1\_Factor * Ipk(A)$
  - In high volt- $\mu$ sec applications, it is important to calculate the core loss of the transformer. Approximate transformer core loss can be calculated as:  
 $CoreLoss \text{ (W)} = 3.84E-14 * (Freq\_kHz)^{1.65} * (\Delta B\_Gauss)^{2.65}$   
 where  $\Delta B$  can be calculated as:  
 For Flyback Topology:  $\Delta B = K1\_Factor * \Delta I(A)$   
 For Forward Topology:  $\Delta B = K1\_Factor * Volt\text{-}\mu\text{sec}$
  - The standard pin-numbering for this package is indicated in the below mechanical drawing showing pin 1 on the lower right corner and the numbers proceeding clockwise to pin 10 on the upper right corner.
  - Optional Tape & Reel packaging can be ordered by adding a "T" suffix to the part number (i.e. PA3855.001NL becomes PA3855.001NLT). Pulse complies with industry standard tape and reel specification EIA481. The tape and reel for this product has a width (W=32mm), pitch (Po=24mm) and depth (Ko=13.2mm).

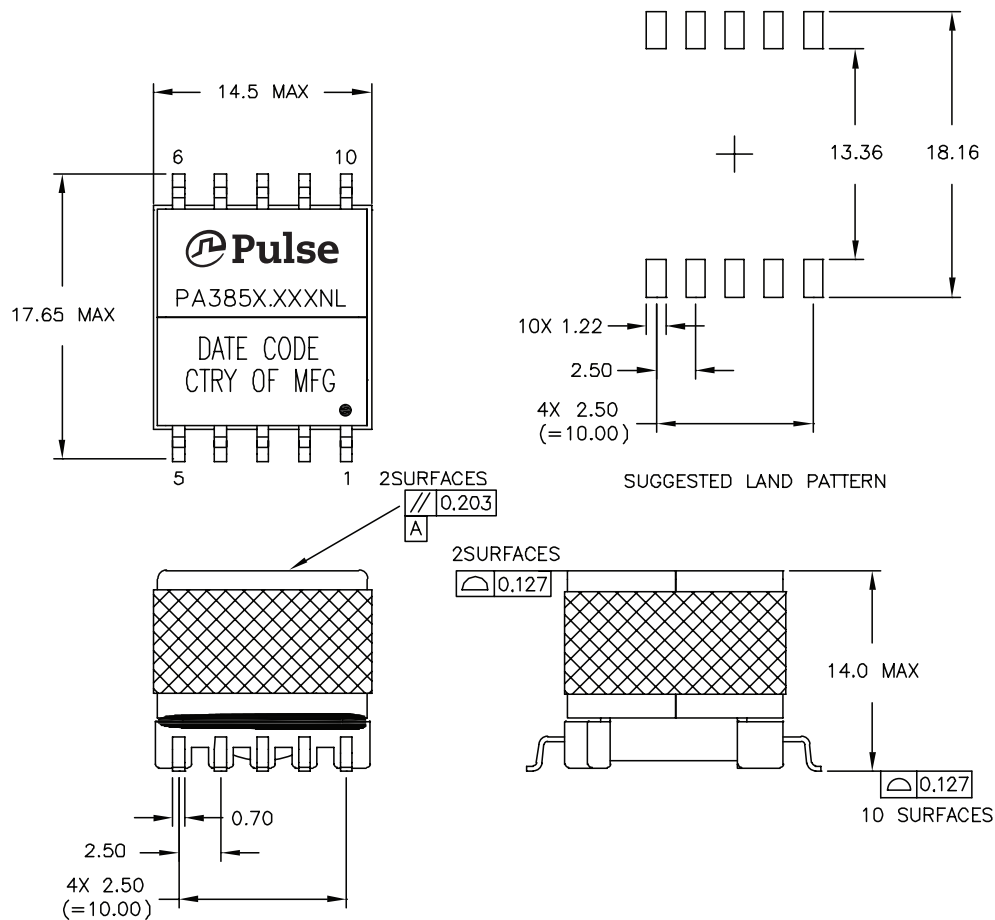
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EP13Plus Platforms - SMT



## Mechanical

### PA3855.XXNL/ PA3856.XXNL



## For More Information

**Pulse Worldwide Headquarters**  
12220 World Trade Drive  
San Diego, CA 92128  
U.S.A.

**Pulse Europe**  
Zeppelinstrasse 15  
71083 Herrenberg  
Germany

**Pulse China Headquarters**  
B402, Shenzhen Academy of  
Aerospace Technology Bldg.  
10th Kejinan Road  
High-Tech Zone  
Nanshan District  
Shenzhen, PR China 518057  
Tel: 86 755 33966678  
Fax: 86 755 33966700

**Pulse North China**  
Room 2704/2705  
Super Ocean Finance Ctr.  
2067 Yan An Road West  
Shanghai 200336  
China  
Tel: 86 21 62787060  
Fax: 86 2162786973

**Pulse South Asia**  
135 Joo Seng Road  
#03-02  
PM Industrial Bldg.  
Singapore 368363

**Pulse North Asia**  
3F No. 198, Zhongyuan Road  
Zhongli City  
Taoyuan County (32068)  
Taiwan  
Tel: 886 3 4356768  
Fax: 886 3 4356823

Tel: 858 674 8100  
Fax: 858 674 8262

Tel: 49 7032 7806 0  
Fax: 49 7032 7806 12

Tel: 86 21 62787060  
Fax: 86 2162786973

Tel: 65 6287 8998  
Fax: 65 6287 8998

Tel: 886 3 4356768  
Fax: 886 3 4356823

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