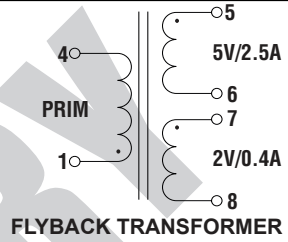
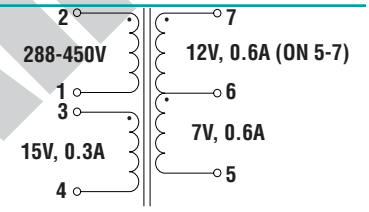
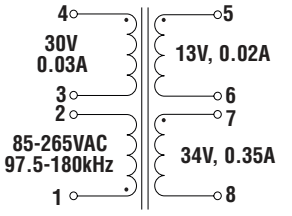
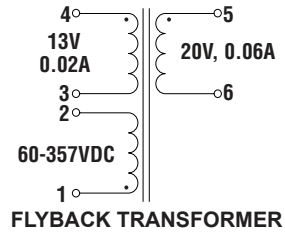
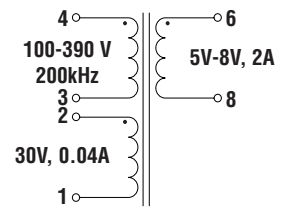
High Frequency Wire Wound Transformers

EF20 Platforms - THT Type

- ***AC/DC and DC/DC Switching Transformers***
- ***Reinforced Insulation***
- ***3000Vrms Hi-pot***
- ***Topology:*** *Flyback*
- ***Custom Design Available***

Electrical Specifications @ 25°C - Operating Temperature -40°C to 130°C[1]

PF0586NL	*Pri. Inductance*	*(1-4)*	*1.64 mH NOM.*		
	Lk. Inductance w/		*µH MAX shorted*		
	DCR	*(1-4)* *(7-8)* *(5-6)*	2800 17.5 7.3	m Ω Max	
	Hi-Pot	*Pri-Sec*	*4200 Vrms*		
	K1 Factor	*5229.6*			
PA2872NL	*Pri. Inductance*	*(2-1)*	*1800 µH +/- 10%*		
	Lk. Inductance w/	*(2-1)* *(5,6,7)*	*42 µH MAX shorted*		
	DCR	*(2-1)* *(5-7)* *(3-4)*	2020 210 510	m Ω Max	
	Hi-Pot	*Pri-Sec*	*3000 Vrms*		
	K1 Factor	*4687.5*			
PA2959NL	*Pri. Inductance*	*(1-2)*	*380 µH +/- 20%*		
	Lk. Inductance w/	*(1-2)* *(3,4,5,6,7,8)*	*5.6 µH MAX shorted*		
	DCR	*(1-2)* *(4-3)* *(5-6)* *(7-8)*	740 1050 240 280	m Ω Max	
	Hi-Pot	*Pri-Sec*	*3000 Vrms*		
	K1 Factor	*3044.8*			
PA2979NL	*Pri. Inductance*	*(1-2)*	*864 µH +/- 20%*		
	Lk. Inductance w/	*(1-2)* *(3,4,5,6)*	*TBD µH MAX shorted*		
	DCR	*(1-2)* *(4-3)* *(5-6)*	1000 6800 300	m Ω Max	
	Hi-Pot	*Pri-Sec*	*3000 Vrms*		
	K1 Factor	*2755.1*			
PA3072NL	*Pri. Inductance*	*(4-3)*	*290 µH +/- 10%*		
	Lk. Inductance w/	*(4-3)* *(2,1,6,8)*	*7.4 µH MAX shorted*		
	DCR	*(4-3)* *(6-8)* *(2-1)*	560 22 160	m Ω Max	
	Hi-Pot	*Pri-Sec*	*3000 Vrms*		
	K1 Factor	*1295*			

PRELIMINARY

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NOTES:

1. The temperature of the component (ambient plus temperature rise) must be within the stated operating temperature range.
2. 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 (Gauss) = K1_Factor * Ipk(A)

3. In high volt-µsec applications, it is important to calculate the core loss of the transforme

   Approximate transformer core loss can be calculated as:

   CoreLoss (W) = 3.97444x10 $^{-7}$ x * (Freq_kHz)$^{1.62}$ x (DB_Gauss)$^{2.65}$

   where DB can be calculated as:

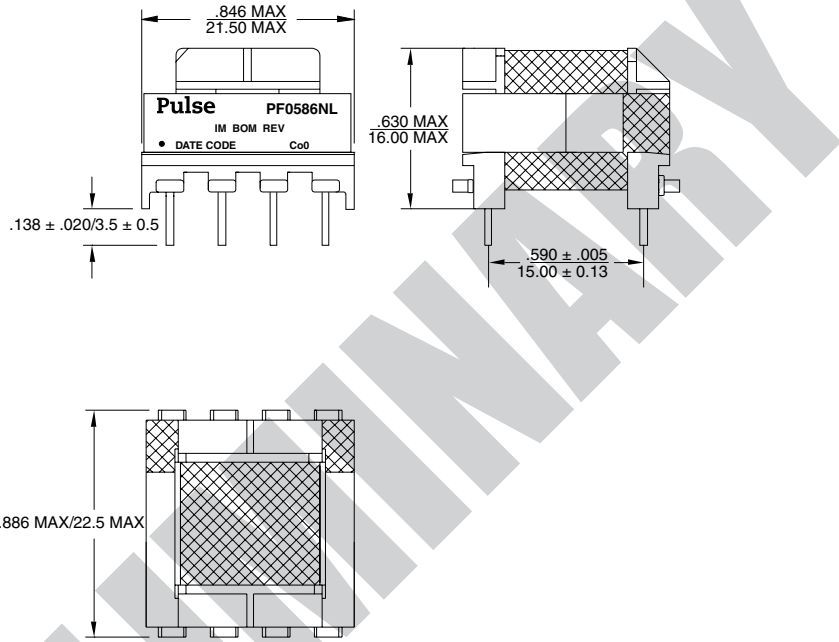
   For Flyback Topology: DB = K1_Factor * D(A)

   For Forward Topology: DB = K1_Factor * Volt-µsec

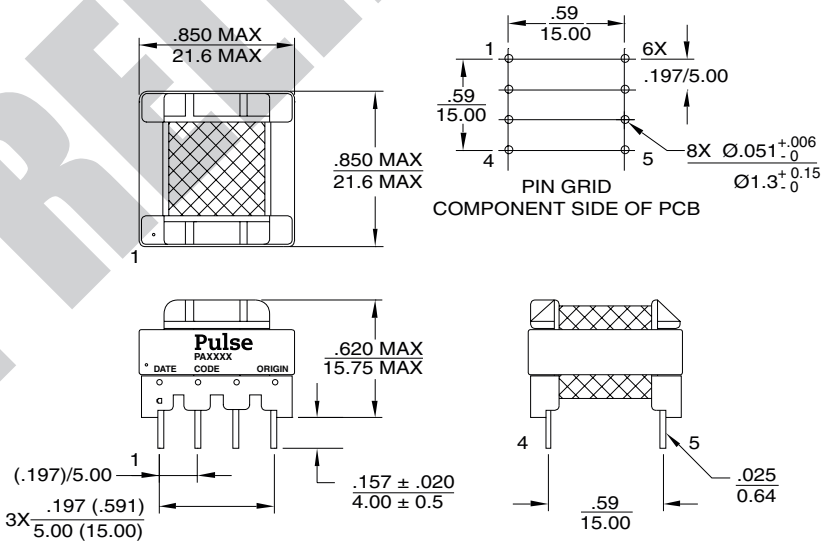
4. The "**NL**" suffix indicates an RoHS-compliant part number.

Mechanicals

PF0586NL



PA2872NL, PA2959NL, PA2979NL



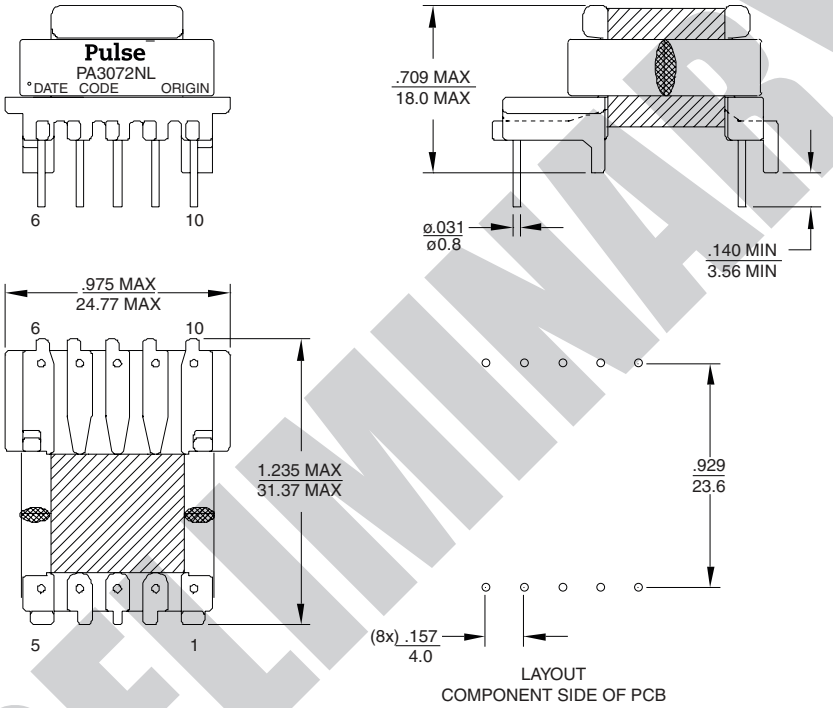
PRELIMINARY

High Frequency Wire Wound Transformers

EF20 Platforms - THT Type

Mechanical *(continued)*

PA3072NL



PRELIMINARY

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