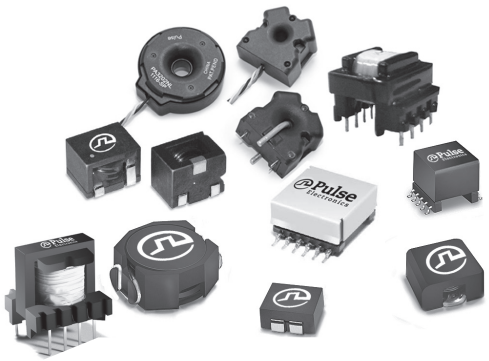
POWER MAGNETICS



Pulse offers a complete range of magnetics for both high-frequency switching and low-frequency laminated power supply applications. The switching power magnetics include power inductors, power transformers, current sense magnetics, gate drive transformers and common mode chokes. The laminated power magnetics include open-frame linear transformers. For complete product information, see the "Switching Power Magnetics" or the "Laminated Transformers" catalogs.

Pulse also designs and manufactures a wide array of custom and application specific magnetics. Contact Pulse Power Division for more information.

In the Americas: Prodinfo_power@pulseeng.com

In Europe and Africa: Power-Apps_Europe@pulseeng.com

In Asia: Asia@pulseeng.com

NOTE: For additional listings of Pulse Power magnetics, locate other Power data sheets at this URL: *http://www.pulseelectronics.com/power*

OVERVIEW: PULSE POWER MAGNETICS

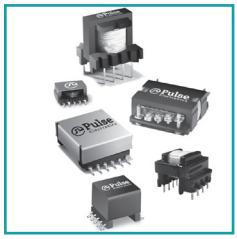
Power Inductors

Surface Mount (SMT)

- Unshielded Drum Core Inductors (up to 30 A)
- Shielded Drum Core Inductors (up to 17 A)
- Power Bead Inductors (up to 71 A)
- Flat Coil Inductors (up to 40 A)
- Planar and Round Wire Coil Inductors (up to 73 A)
- Toroid Inductors (up to 40 A)

Through Hole (THT)

- Toroid Inductors (up to 48 A)
- Power Cube Inductors (up to 50 A)
- Power Bead Inductors (up to 80 Apk)



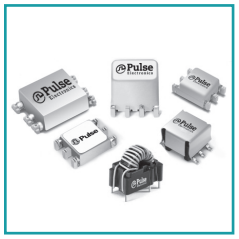
High-Frequency Switch Mode Transformers

Surface Mount (SMT)

- Planar Transformers (30 W, 75 W, 150 W, 300 W)
- Wirewound Transformers (Up to 200 W)
- Custom transformers available upon request

Through Hole (THT)

- Wirewound Transformers (Up to 500 W)
- Custom transformers available upon request



Gate Drive Transformers

Surface Mount (SMT)

- Operational and Basic Insulation for DC/DC applications >1500 VRMS)

Through Hole (THT)

- Reinforced Insulation for AC/DC applications (3000 Vrms)

Current Sense Magnetics

Surface Mount (SMT)

- Operational Insulation (500 VRMS)
- Five platforms (4 A, 10 A, 15 A, 20 A, 35 A)

Through Hole (THT)

- Reinforced Insulation (3000 VRMS)
- Multiple platforms (up to 30 A)

50/60Hz AC Current Sensing

- Sidewinder Product Line (1000A+)

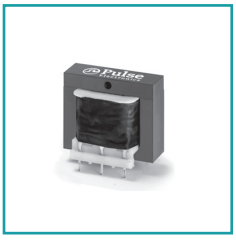
Common Mode Chokes

Surface Mount (SMT)

- Up to 14 A
- 500 VRMS and 1500 VRMS Isolation
- Over 10 package sizes available
- Customer designs available upon request

Through Hole (THT)

- Up to 23 A
- 3000 VRMS Isolation
- Multiple package sizes available



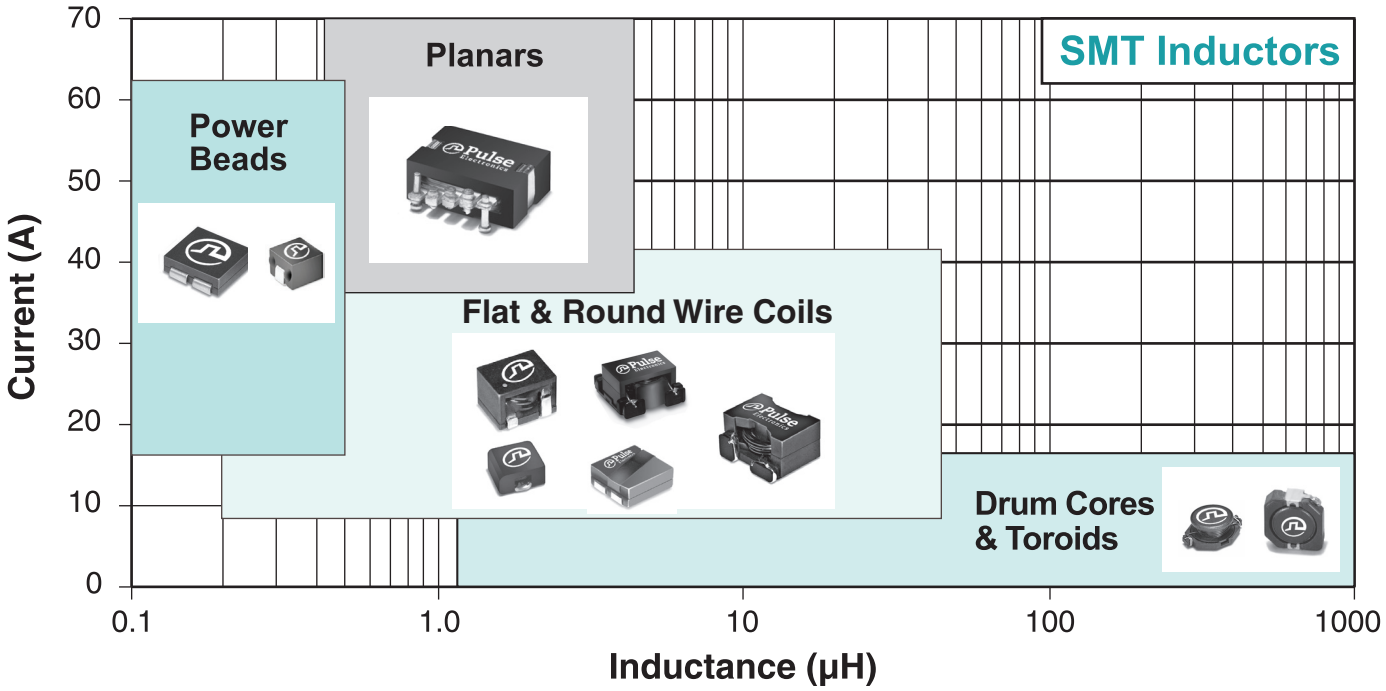
Laminated Transformers

Open-Frame Transformers

- Up to 140 VA
- THT, Low-Profile, and Chasis Mount options

PRODUCT OVERVIEW: SMT POWER INDUCTORS

Power Inductor Selection Charts, Surface Mount and Through-Hole

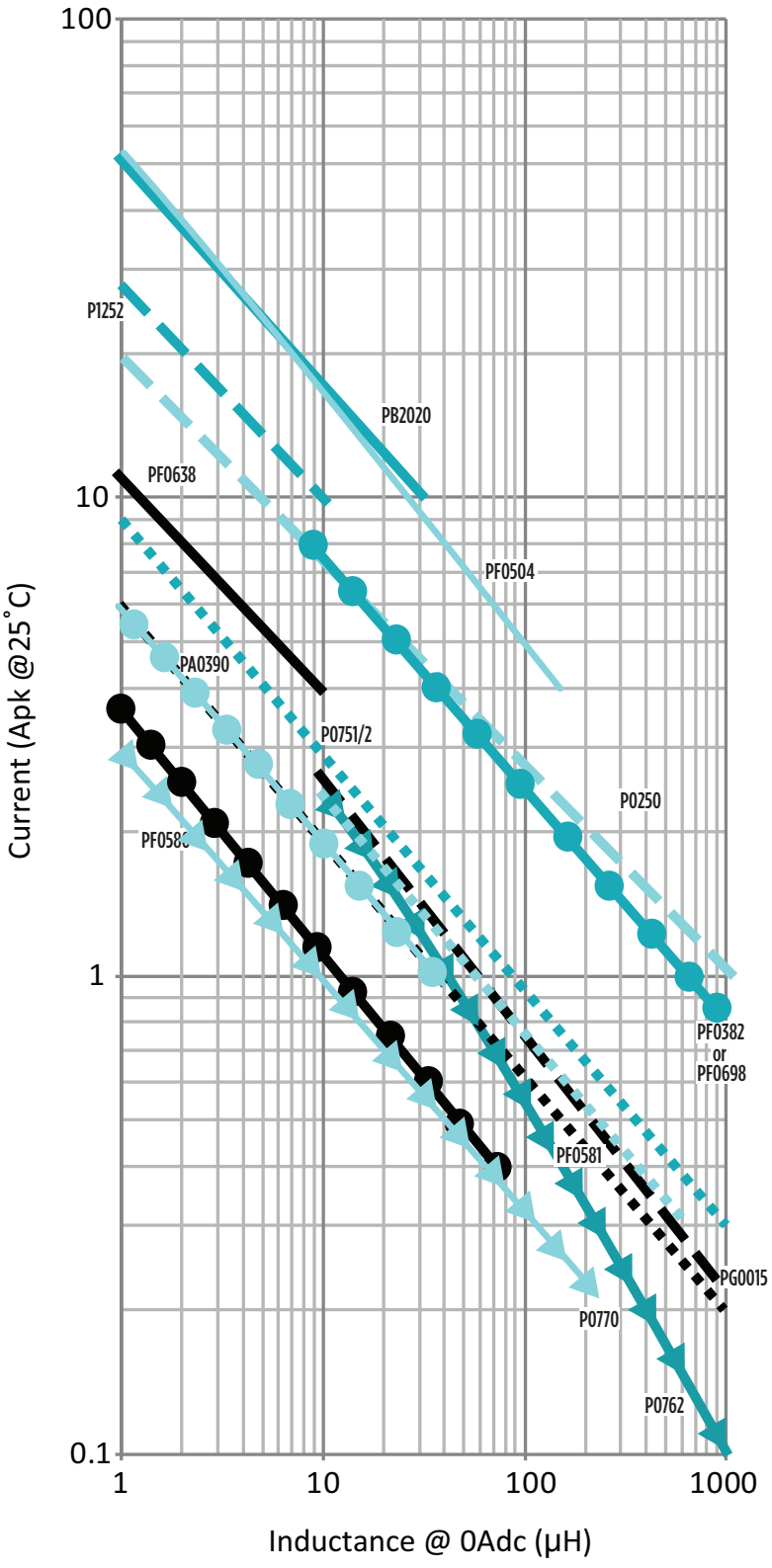


Unshielded Drum Core Inductors - typically for lower current application and less efficiency sensitive designs
Shielded Drum Core Inductors - typically for lower current applications, shielded designs helps with EMI
Toroid Inductors - versatile multi-use platforms for single and dual winding applications
Wire-wound Inductors - high-inductance (>5 µH) - mid to high current (15-40 A) applications
Flat Coil Inductors - mid-inductance (0.3 to 4 uH), mid-current (15-30A) applications, low switching losses
Round Wire Coil Inductors - mid-inductance, high-efficiency inductors (0.4 to 20uH) up to 40A
Power Bead Inductors - low-inductance (<0.5uH), high current (>25A) applications for single and multi-phase applications
Planar Inductors - mid-inductance (0.5 to 4uH), high current (>25A) applications

PRODUCT OVERVIEW: SMT UNSHIELDED DRUM CORE INDUCTORS

RoHS COMPLIANT

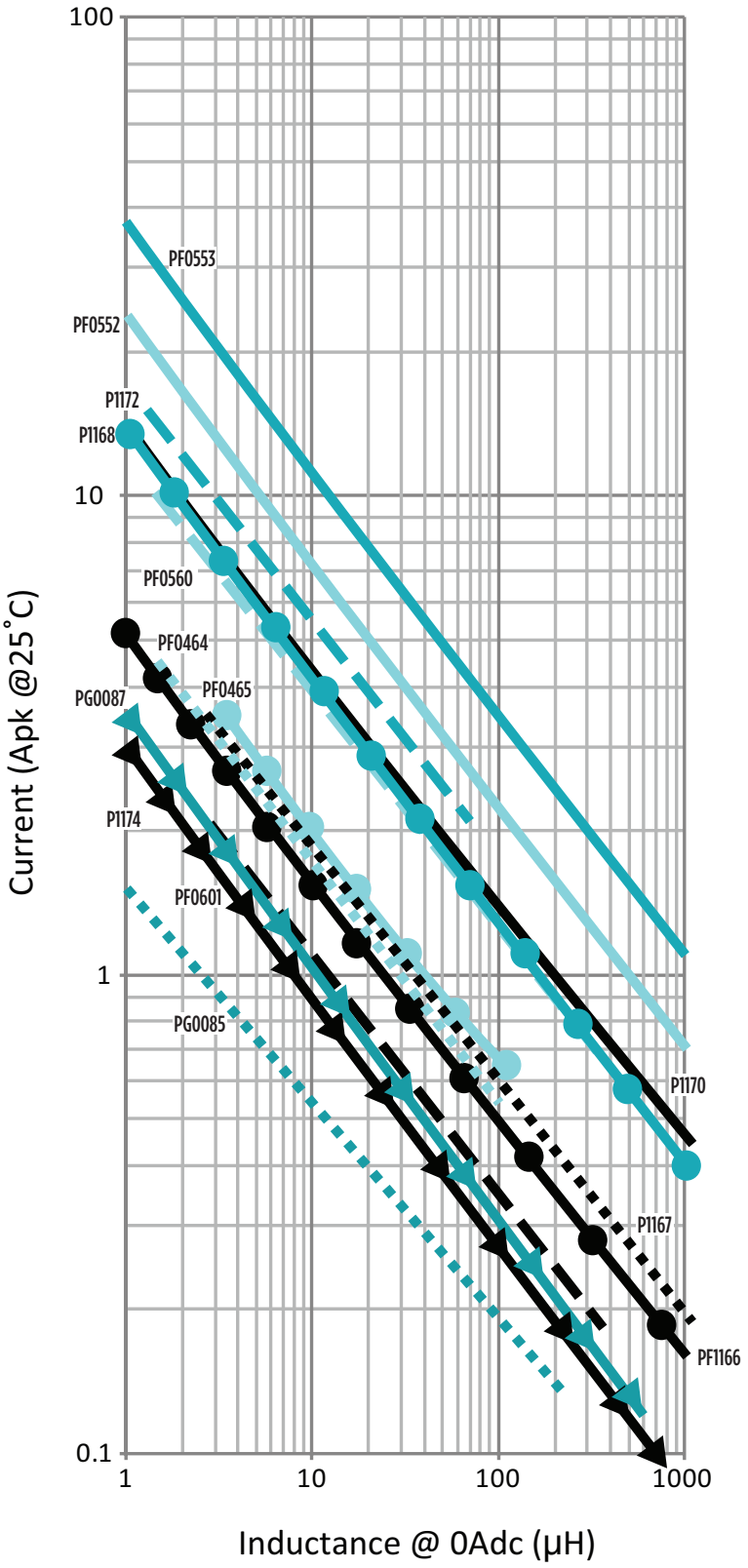
Pulse P/N	Size (mm MAX) (LxWxH)
PF0580 Series	4.7x4.2x3.5
P0770 Series	6.5x4.5x2.9
PA0390 Series	8.9x6.1x5.1
PF0581 Series	10.3x9.3x4.4
PG0015 Series	10.2x9.3x4.4
P0762 Series	13x9.4x3.0
P0751/752 Series	13x9.4x5.5
PF0382 Series or PF0698 Series	13x9.4x11.0
PF0638 Series	13x9.9x6.4
P0250 Series	18.6x15.2x7.4
PF0504 Series	18.5x15.2x11.4
P1252 Series	22.3x15.1x7.5
PB2020 Series	23.9x20.8x10.2



PRODUCT OVERVIEW: SMT SHIELDED DRUM CORE INDUCTORS

RoHS COMPLIANT

Pulse P/N	Size (mm Max) (LxWxH)
PG0085 Series	4.1x4.1x1.8
PG0087 Series	6.2x6.2x2.0
P1174 Series	6.7x4.5x2.8
PF0601 Series	6.9x6.5x3.0
PF0464 Series	7.2x7.2x3.0
PF0465 Series	7.2x7.2x4.0
P1166 Series	7.6x7.6x3.5
P1167 Series	10.4x10.3x4.0
PF0560 Series	12.3x12.3x4.5
P1168 Series (P1169 Series)	12.3x12.3x6.0
P1170 Series (P1171 Series)	12.3x12.3x6.0
P1172 Series (P1173 Series)	12.3x12.3x8.0
PF0552 Series (dual winding)	12.3x12.3x6.0
PF0553 Series (dual winding)	12.3x12.3x8.0

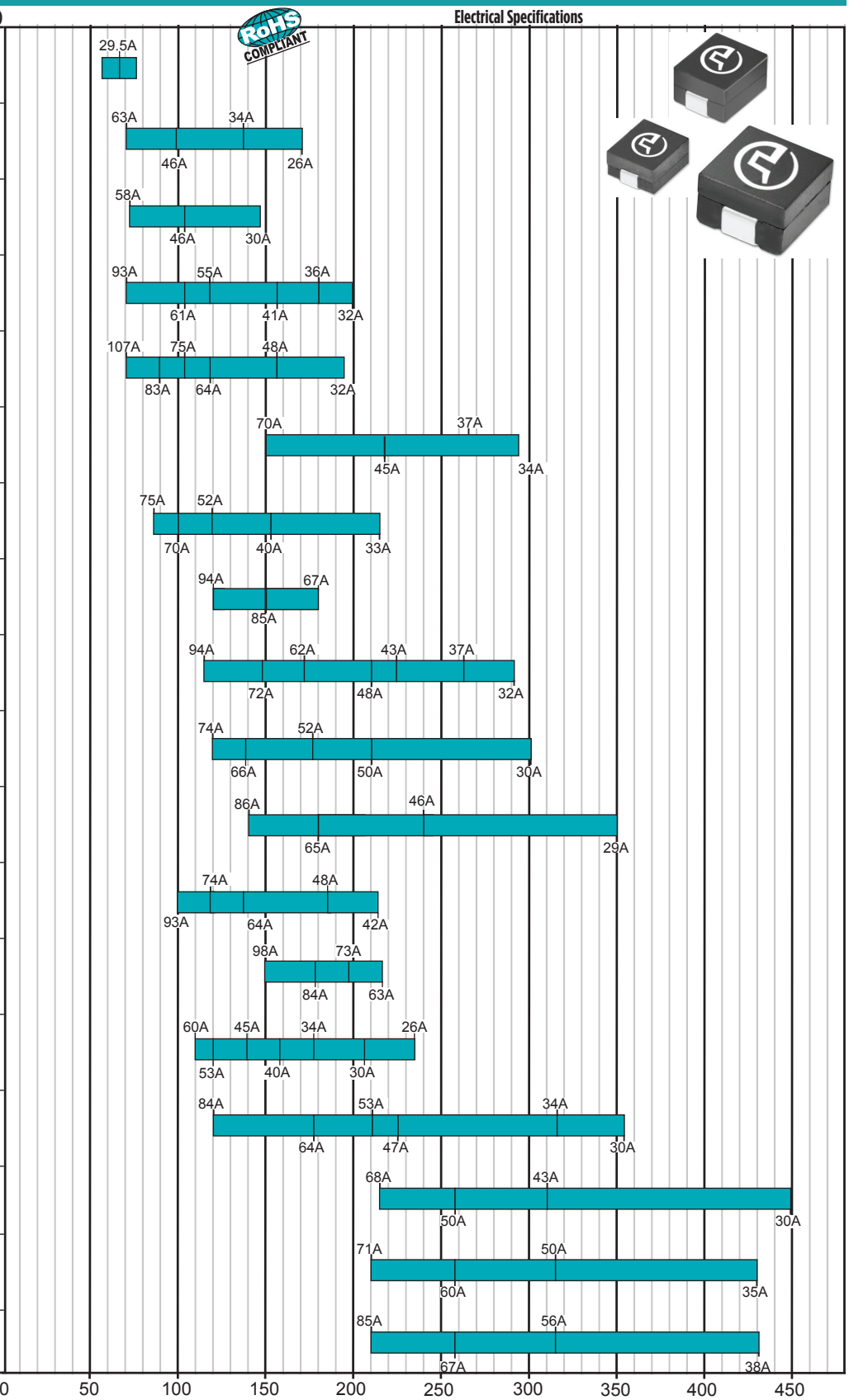


Pulse Electronics

POWER MAGNETICS

PRODUCT OVERVIEW: SMT POWER BEAD INDUCTORS

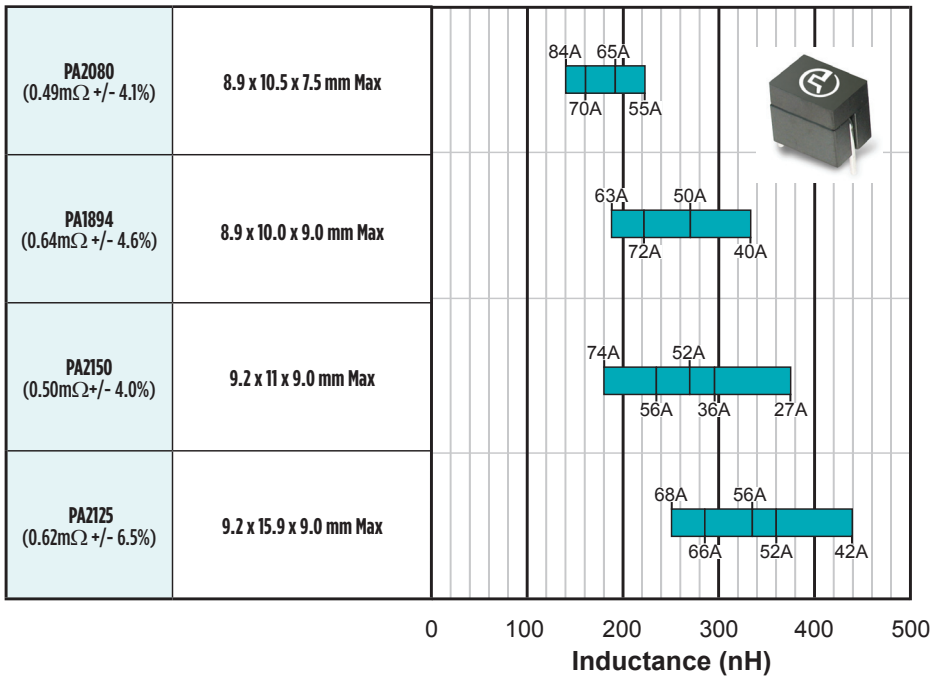
Pulse PN Series	Dimensions (LxWxH mm Max)
PA2983 (0.33mΩ +/- 10%)	4.0 x 5.0 x 4.0 mm Max
PA1682 (0.5mΩ +/- 8%)	8.0 x 7.0 x 4.0 mm Max
PA0512 (0.32mΩ +/- 9.4%) PA1212 (0.46mΩ +/- 6.5%)	7.0 x 7.0 x 5.0 mm Max
PA2083 (0.60mΩ +/- 8%)	7.6 x 7.4 x 7.0 mm Max
PA2509 (0.35mΩ +/- 8.5%)	7.0 x 8.5 x 8.0 mm Max
PA3288 (0.29mΩ +/- 5%)	9.6 x 6.4 x 8.0 mm Max
PA0511 (0.39mΩ +/- 7.7%) PA1211 (0.55mΩ +/- 7.3%)	10.2 x 7.0 x 5.0 mm Max
PA3784 (0.18mΩ +/- 5%)	10.0 x 8.0 x 8.0 mm Max
PA2607 (0.29mΩ +/- 7%) (+/- 5% also available)	10.4 x 7.9 x 7.5 mm Max
PA1320 (0.48mΩ +/- 8%)	10.4 x 8.0 x 6.5 mm Max
PA3779 (0.29mΩ +/- 5%) (+/- 5% also available)	11.4 x 7.0 x 8.0 mm Max
PA2982 (0.35mΩ +/- 8.6%)	11.0 x 8.0 x 5.0 mm Max
PA3790 (0.29mΩ +/- 5%)	12.5 x 8.0 x 8.0 mm Max
PA3136 (0.23mΩ +/- 10%)	13.8 x 8.0 x 4.0 mm Max
PA2202 (0.48mΩ +/- 6.5%)	12.1 x 10.0 x 6.0 mm Max
PA0515 (0.63mΩ +/- 9.5%)	11.2 x 11.2 x 9.0 mm Max
PA0513 (0.32mΩ +/- 9.4%) PA1513 (0.53mΩ +/- 11.3%)	13.5 x 13.0 x 8.0 mm Max
PA2891 (0.22mΩ +/- 10%)	13.7 x 13.0 x 8.0 mm Max



Use the X-axis to locate your required inductance and then follow this line up to find a part that has a suitable peak current for your application. The peak currents listed are at 25°C. The complete datasheet for a given series should be reviewed to determine peak currents at other ambient temperatures.

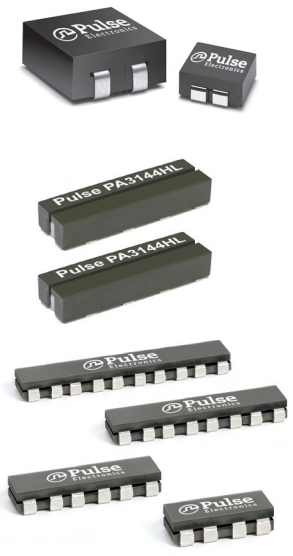
PRODUCT OVERVIEW: THT POWER BEAD INDUCTORS

- *High current, low inductance solutions for VRD, VRM, Graphic Card and PoL Applications*
- *Highest efficiency inductor solutions*
- *Lowest loss ferrite core solutions*
- *Tighest DCR Tolerance*



Use the X-axis to locate your required inductance and then follow this line up to find a part that has a suitable peak current for your application. The peak currents listed are at 25C. The complete datasheet for a given series should be reviewed to determine peak currents at other ambient temperatures.

INTEGRATED AND COUPLED POWER BEAD INDUCTORS



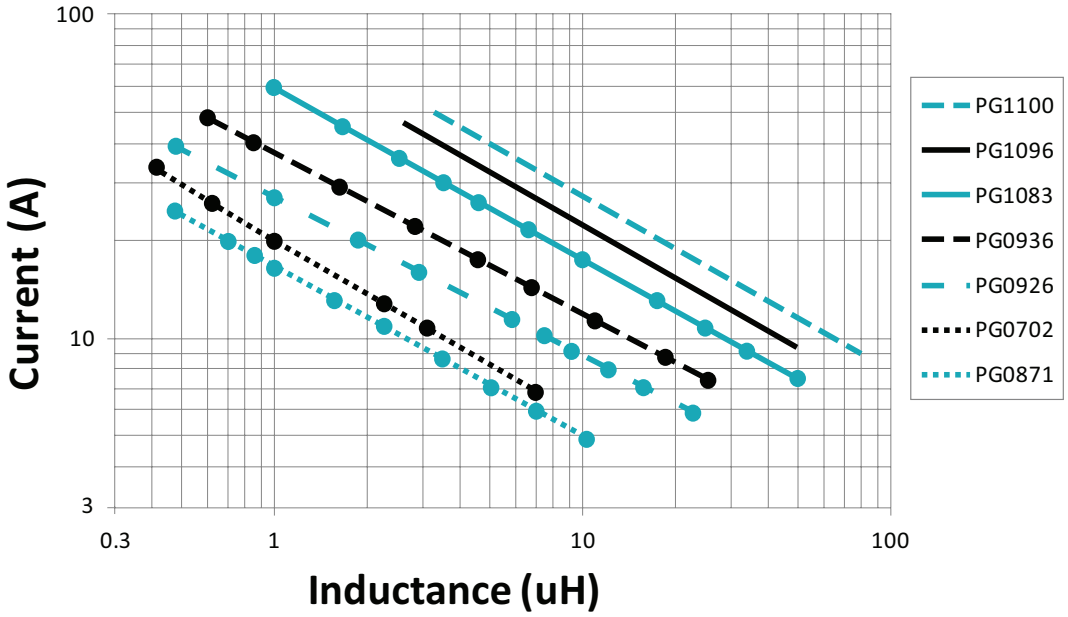
Integrated Inductors

- *Combine two inductors into a single package*
- *Designed to have no magnetic coupling between inductors*
- *Same circuit performance as two separate inductors*
- *Reduces total footprint*
- *Catalog PNs PA0766.XXXNL and PA3146.XXXHL Series*

Coupled Inductors

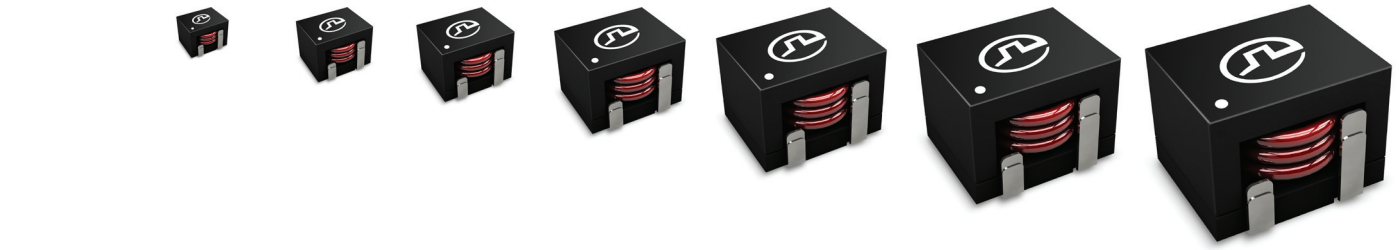
- *Combine two or more inductors into a single package*
- *Designed to have magnetic coupling between inductors*
- *Coupling enables lower phase ripple current resulting in higher system efficiency*
- *Reduces total footprint*
- *Catalog PNs for up to 5-phases PA131xNL, PA131xAHL, PA249xHL and PA314xHL as well as PA2143NL and PA2156NL for 2-phase low profile applications*

PRODUCT OVERVIEW: SMT ROUND WIRE COIL INDUCTORS



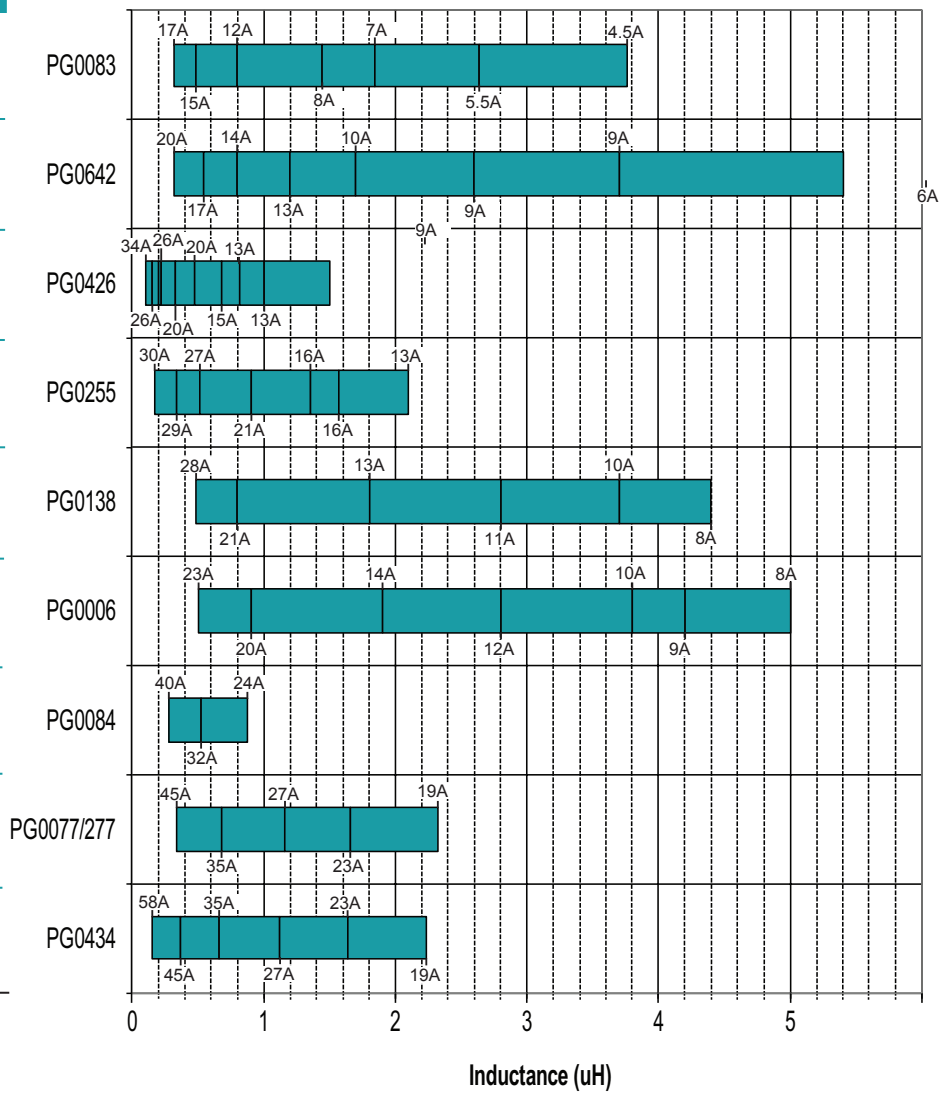
- High efficiency for datacom, computing, industrial applications
- Inductance Range: 0.47µH to 80µH
- Sizes 8x7x6.4mm - 32x31x15.5mm
- Low DCR
- Low loss ferrite material
- No thermal aging

Pulse P/N	PG0871	PG0702	PG0926	PG0936	PG1083	PG1096	PG1100
Size (mm)	8x7x6.4	11x9x8	13x13x8	18x17x10	22x22x12.5	26x26x14.5	32x31x15.5



PRODUCT OVERVIEW: SMT FLAT COIL INDUCTORS

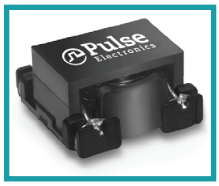
Pulse P/N	Size (mm Max) (LxHxW)
PG0083 Series	6.8x6.8x4.2
PG0642 Series	7.9x7.6x5.0
PG0426 Series	7.5x7.0x3.2
PG0255 Series	11.5x10.3x4.0
PG0138 Series	13.0x12.8x4.8
PG0006 Series	13.4x13.3x6.0
PG0084 Series	14.5x13.0x4.4
PG0077, PG0277 & PG0377 Series	14.5x13.0x6.5
PG0434 Series	14.5x13.0x6.5



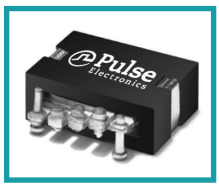
Use the X-axis to locate your required inductance and then follow this line up to find a part that has a suitable rated currents listed are at 25˚C. The complete datasheet for a given series should be reviewed to determine currents at other ambient temperatures.

POWER MAGNETICS

PRODUCT OVERVIEW: SMT PLANAR AND WIRE WOUND INDUCTORS



PD0120.XXXNL Series
- 16.2mm x 16.0m x 8.2mm Max
- 3.4A (55.4uH) up to 15.4A (1.2uH)



PA1x9x.XXXNL Series
- 19.8mm x 19.6mm x 7.4mm Max
- 9A (5.8uH) up to 73A (0.45uH)

PA2050.XXXNL Series
- 22.2mm x 19.1mm x 12.2mm Max
- 5.0A (57.8uH) up to 14.4A (5.8uH)

PA2729.XXXNL Series
- 22.2mm x 19.1mm x 12.2mm Max
- 5.1A (60.3uH) up to 16.4A (4.9uH)

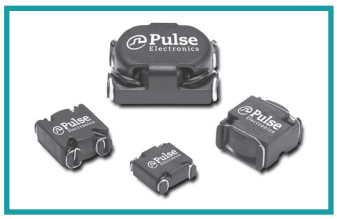
PRODUCT OVERVIEW: SMT TOROID INDUCTORS

Bobcat Series
- 12.7mm x 12.7m x 5.5mm Max
- 0.53A (472uH) up to 3.8A (10.4uH)

Polecat Series
- 12.7mm x 12.7mm x 5.5mm Max
- 0.64A (364uH) up to 8.3A (2.2uH)

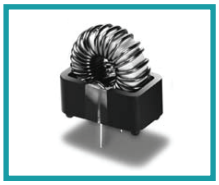
Tomcat Series
- 18.2mm x 15.0mm x 7.6mm Max
- 1.77A (161uH) up to 14.4A (2.2uH)

HCCI-80 Series
- 31.0mm x 25.4mm x 12.7mm Max
- 9.5A (42uH) up to 38A (2.1uH)

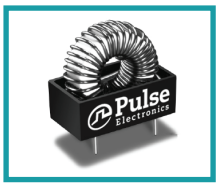


SLIC Series
- Nine different packages
- 8.6 x 8.6 x 6.4 mm to 28.2 x 25.4 x 9.9 mm Max
- 0.71A (1070uH) to 15.4A (5.2uH)

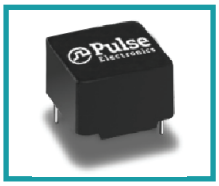
PRODUCT OVERVIEW: THT TOROID INDUCTORS



Klip Mount Inductors
- 1.5A (250uH) up to 5A (33uH)

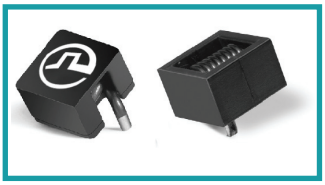


Boat Header Inductors
- 9A (5.8uH) up to 73A (0.45uH)



Low Profile Inductors
- 0.5A (1000uH) up to 1.7A (150uH)

Bare Coil Inductors
- 3A (145uH) up to 48A (0.5uH)



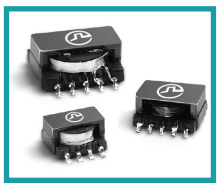
Power Cube Inductors
- 14A (2.5uH) up to 50A (0.25uH)

PRODUCT OVERVIEW: SMT POWER TRANSFORMERS

Pulse offers a wide selection of SMT catalog power transformers. Custom transformers are also available, please contact the Pulse Power Division for details.

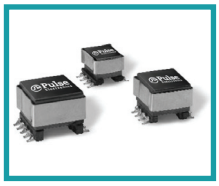
Low Power Flyback Transformers (up to 2W)

- PA0648NL, PA1546NL, PA1788NL
- 24v/48v inputs to 8-10v/200mA
- Hi-pot Voltage: 1500Vdc
- Functional Insulation



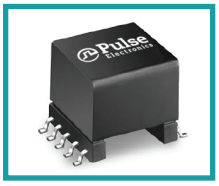
ER Platforms - ER9.5, ER11 and ER14.5

- 1W to 10W Flybacks
- Hi-pot Voltage: 1500Vrms
- Functional Insulation



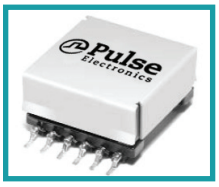
EP Platforms - EP7, EP10, E13

- 0.3W to 60W Flybacks and Forwards
- Hi-pot Voltage: 1500Vrms
- Functional Insulation



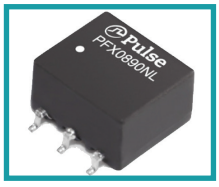
EP13 Plus Platform

- PA3855.XXXNL and PA3856.XXXNL
- Up to 70W
- Hi-pot Voltage: 1500Vrms
- Functional Insulation



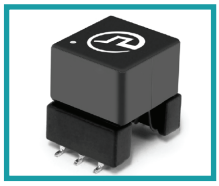
EFD Platforms - EFD15, EFD20, EFD25

- 3W to 105W Flybacks and Forwards
- Hi-pot Voltage: 1500Vrms
- Functional and Basic Insulation



RS-485/RS-232 Toroid Platforms with Functional Insulation

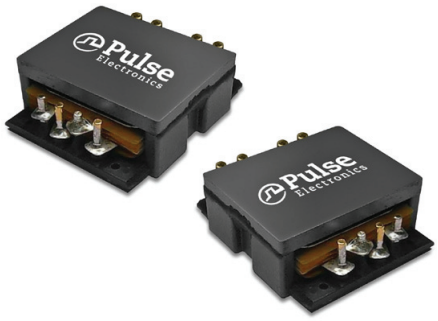
- PFX0890.XXXNL Series
- Class B Insulation System
- Hi-pot Voltage: 2000Vrms
- Functional Insulation



EP7 Platform with Reinforced Insulation for RS-485/RS-232

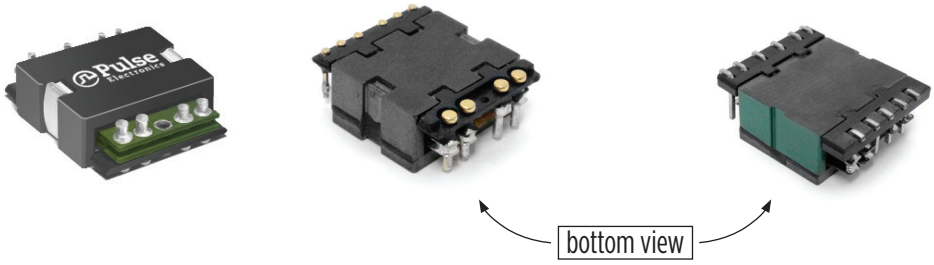
- PH9185.XXXNL Series
- UL Class F Insulation System
- Hi-pot Voltage: 4000Vrms
- Reinforced Insulation

PRODUCT OVERVIEW: SMT PLANAR TRANSFORMERS



New Generation Product Offering

- *Gen 2 Planar: Flat Coil Winding*
- *20% price reduction compared to PCB*
- *50% lower DCR*
- *Power Rating: up to 300W*
- *Platforms: 2 sizes, 23x22mm to 29x27mm*
- *Height: < 11.9mm profile*
- *SMD, 1500Vdc Isolation*
- *Custom design capability up to 1KW/4KV*



Gen 1
Legacy PCB product line

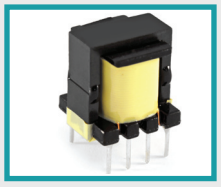
Gen 2
Flat Coil, pin compatable with Gen 1

Gen 3
Pinned header & flat coil

Series	Platform	Power Rating	Footprint (mm)	Height (mm)	Primary Numbers Turns	Primary DCR (mOhms)	Secondary Number Turns	Secondary DCR (mOhms)
PA08xxNL	ER19 Gen 1	up to 140W	23.4 x 21.6	<9.7	4T to 12T	9 - 50	1T to 4T	0.45 - 7
PH08xxNL	ER19 Gen 2	Up to 160W	23.4 x 21.6	<9.1	4T to 12T	4 - 28	1T to 4T	0.45 - 7
PH08xxCNL	ER19 Gen 3	Up to 160W	24.7 x 21.6	<9.6	3T to 12T	3.5 - 28	1T to 4T	0.5 - 7
PA09xxNL	ER25 Gen 1	up to 250W	29.5 x 25.4	<10.4	4T to 16T	6 - 120	1T to 4T	0.28 - 80
PH09xxNL	ER25 Gen 2	Up to 300W	29.5 x 26.7	<11.9	4T to 16T	3.4 - 27	1T to 4T	0.28 - 4.5
PH09xxCNL	ER25 Gen 3	Up to 300W	30.5 x 27.0	<12.6	2T to 16T	1.8 - 27	1T to 4T	0.38 - 4.6

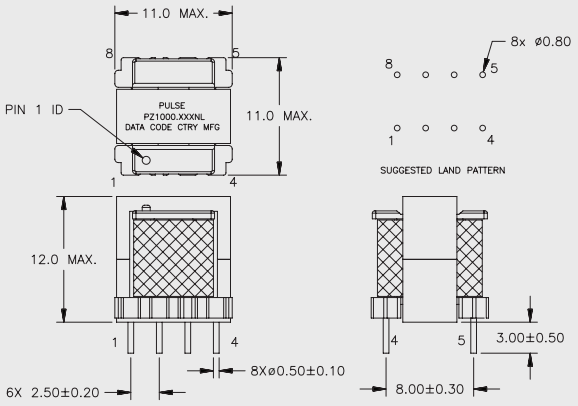
PRODUCT OVERVIEW: THT POWER TRANSFORMERS

EE10 Platforms - 8 Pins, THT, Vertical

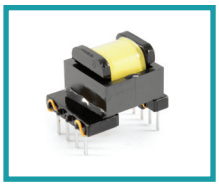


Power Level: 5W
* 100kHz, Flyback

Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.103	0.486	2.51	6.8	1.85	19

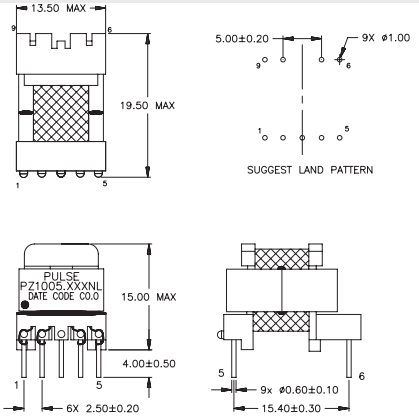


EE13 Platforms - 9 Pins, THT, Horizontal, Offset

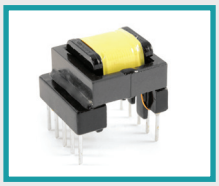


Power Level: 10W
* 100kHz, Flyback

Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.168	0.506	3.06	7.60	2.60	25.90

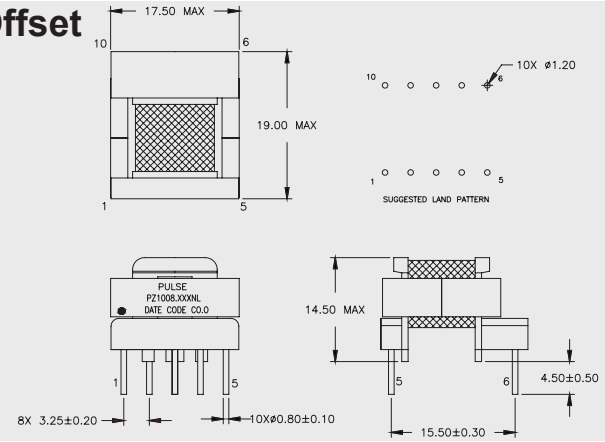


EE16 Platforms - 10 Pins, THT, Horizontal, Offset

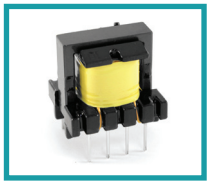


Power Level: 15W
* 100kHz, Flyback

Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.198	0.683	3.44	8.00	2.55	24.00

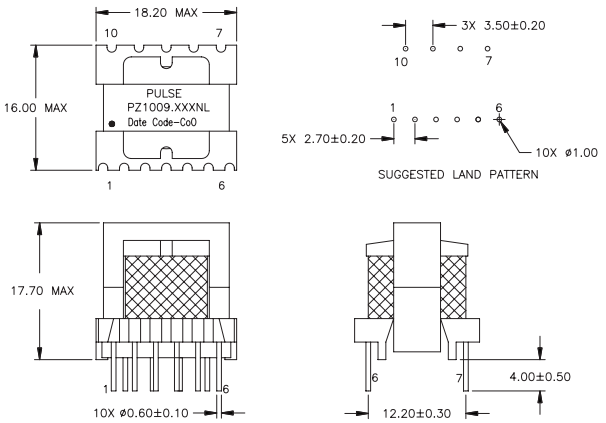


EE16 Platforms - 10 Pins, THT, Vertical



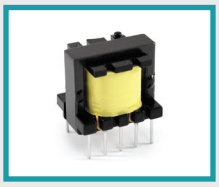
Power Level: 15W
* 100kHz, Flyback

Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.198	0.683	3.44	8.10	2.90	25.00



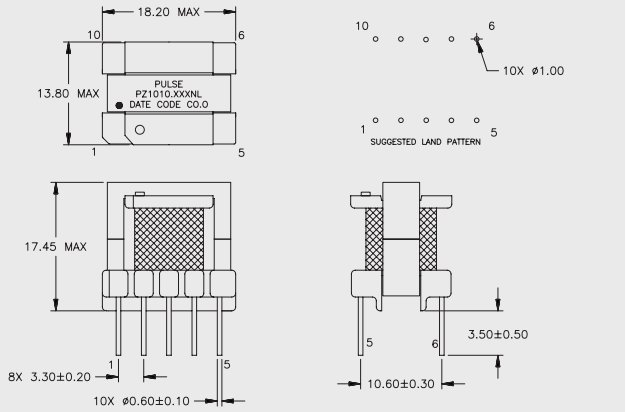
PRODUCT OVERVIEW: THT POWER TRANSFORMERS

EE16 Platforms - 10 Pins, THT, Vertical

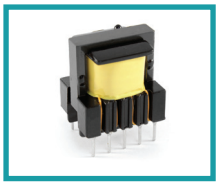


Power Level: 15W
* 100kHz, Flyback

Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.198	0.683	3.44	8.20	2.85	23.80

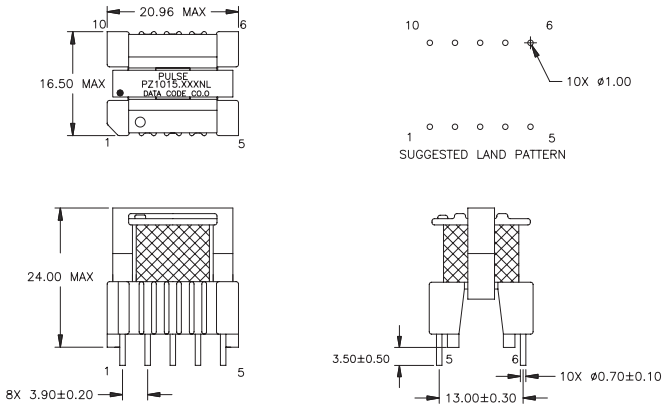


EE19 Platforms - 10 Pins, THT, Vertical

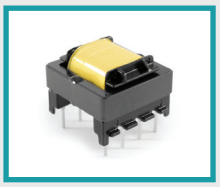


Power Level: 20W
* 100kHz, Flyback

Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.226	0.900	3.95	8.80	3.15	28.80

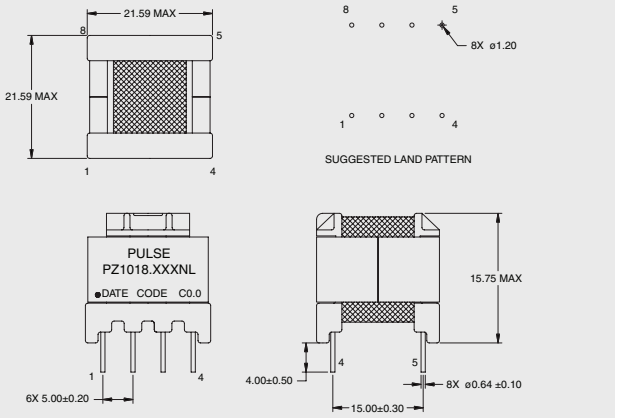


EF20 Platforms - 8 Pins, THT, Horizontal

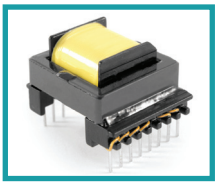


Power Level: 25W
* 100kHz, Flyback

Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.32	1.476	4.49	11.80	3.22	30.00

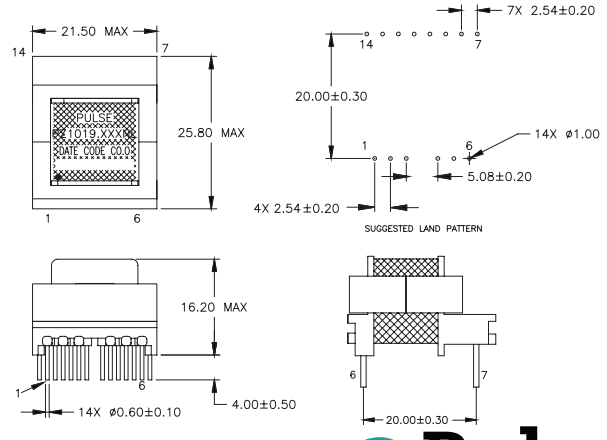


EF20 Platforms - 14 Pins, THT, Horizontal, Offset



Power Level: 25W
* 100kHz, Flyback

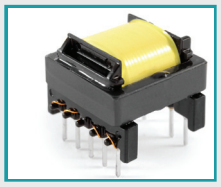
Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.32	1.476	4.49	12.50	3.15	30.40



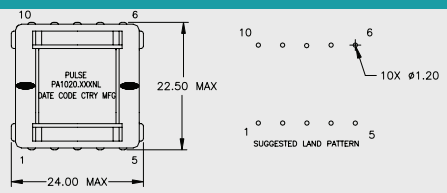
Pulse Electronics

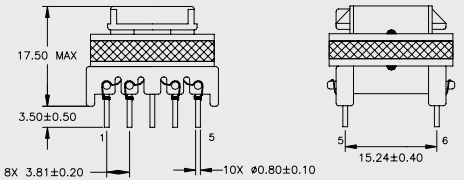
PRODUCT OVERVIEW: THT POWER TRANSFORMERS

EF20 Platforms - 10 Pins, THT, Horizontaal



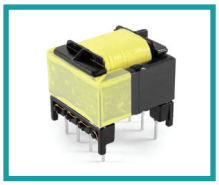
Power Level: 25W
* 100kHz, Flyback



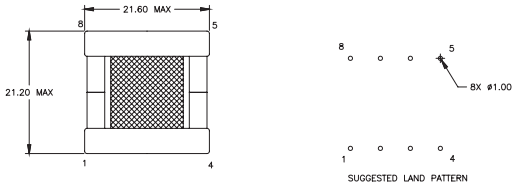


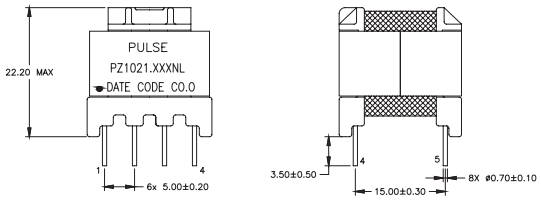
Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.32	1.476	4.49	12.50	3.15	30.40

EE20/11 Platforms - 8 Pins, THT, Horizontal



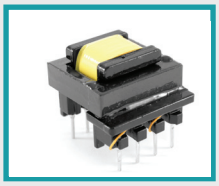
Power Level: 60W
* 100kHz, Flyback



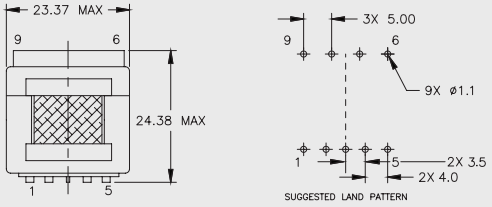


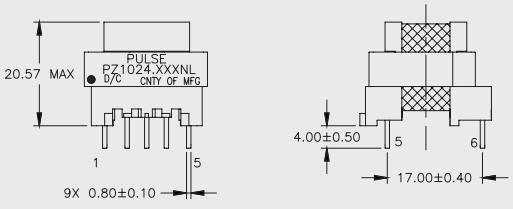
Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.59	2.78	4.62	12.30	3.35	39.40

EI22 Platforms - 9 Pins, THT, Horizontal, Offset



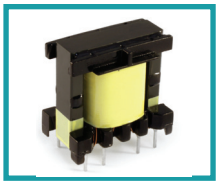
Power Level: 30W
* 100kHz, Flyback



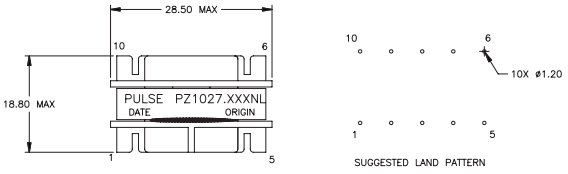


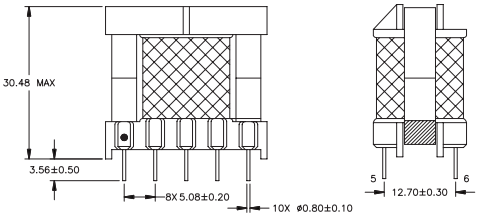
Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.37	2.99	3.95	8.60	3.50	33.60

EF25 Platforms - 10 Pins, THT, Vertical



Power Level: 40W
* 100kHz, Flyback

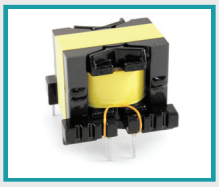




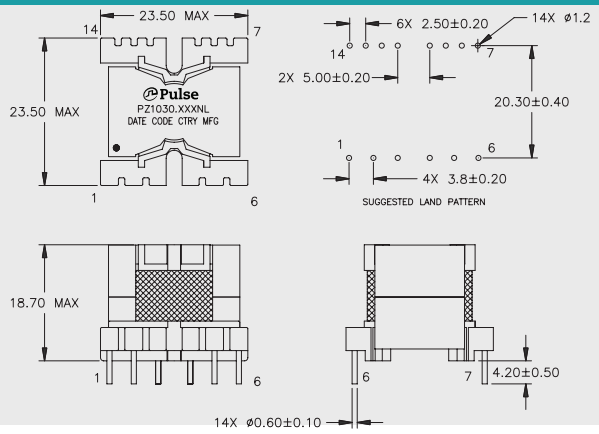
Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.52	2.99	5.78	15.30	3.90	38.80

PRODUCT OVERVIEW: THT POWER TRANSFORMERS

PQ2016 Platforms - 14 Pins, THT, Vertical



Power Level: 40W
* 100kHz, Flyback



Core Parameters			Bobbin Winding Area (mm)		
Ae (cm^2)	Ve (cm^3)	le (cm)	Winding Length	Winding Height	Winding Perimeter
0.62	2.31	3.74	7.82	3.12	34.30

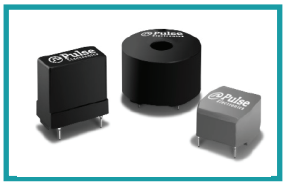
PRODUCT OVERVIEW: SMT AND THT COMMON MODE CHOKES

SMT Common Mode Chokes

- 9.1 x 8.9 x 3.8 mm to 31.0 x 25.4 x 12.7 mm Max
- 0.5Arms (13.2mH) to 14Arms (0.20mH)
- Hi-pot Voltage: 1500Vrms

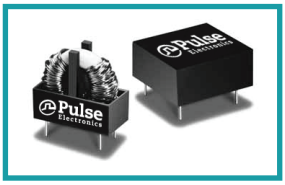
THT PB01xxNL Series

- 38.8 x 35.6 x 15.6 mm to 43.2 x 45.7 x 21.6 mm Max
- 5.5Arms (0.15mH) to 23.4Arms (0.06mH)
- Hi-pot Voltage: 3000Vrms



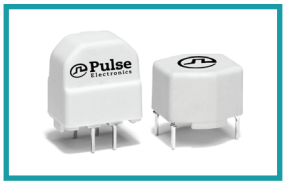
THT PE-961xxNL Series

- 33.0 x 18.3 x 34.0 mm to 43.2 x 43.2 x 26.2 mm Max
- 0.5Arms (33mH) to 15Arms (1mH)
- Hi-pot Voltage: 2500Vrms



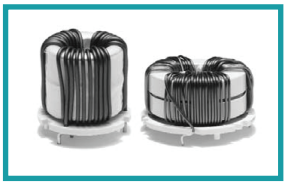
THT PE-62xxxNL Series

- 29.2 x 14.2 x 10.2 mm to 38.1 x 20.3 x 32.5 mm Max
- 1.8Arms (10mH) to 7.5Arms (2mH)
- Hi-pot Voltage: 2500Vrms



THT FE 2X Series

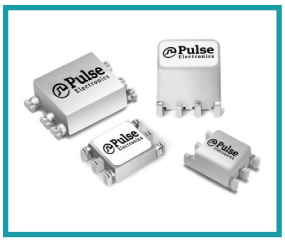
- 17.9 x 17.9 x 12.9 mm to 43.4 x 42.4 x 25.4 mm Max
- 0.4Arms (47mH) to 8Arms (3.3mH)
- Hi-pot Voltage: 1500Vrms



THT FE 3X Series

- 17.9 x 17.9 x 12.9 mm to 43.4 x 42.4 x 25.4 mm Max
- 0.4Arms (47mH) to 8Arms (3.3mH)
- Hi-pot Voltage: 1500Vrms

PRODUCT OVERVIEW: SMT AND THT GATE DRIVE TRANSFORMERS



SMT Gate Drive Transformers

- 8.6 x 6.7 x 2.5 mm to 11.8 x 8.8 x 4.0 mm Max
- Functional and Basic Insulation
- Multiple Winding Configurations and Sizes
- Hi-pot Voltage: 1500Vrms

THT P058xNL Series

- 20.6mm x 12.2mm x 19.1 mm Max
- UL, C-UL, and TUV Approved Components
- Turns Ratios: 1:1:1 and 1:1:1:1:1
- Hi-pot Voltage: 3000Vrms

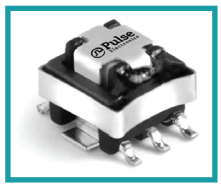
THT PE-6338xNL Series

- 27.7mm x 27.4mm x 30.5 mm Max
- VDE Approved
- Multiple Winding Configurations
- Hi-pot Voltage: 3750Vrms

PRODUCT OVERVIEW: SMT CURRENT SENSE MAGNETICS (FOR SWITCHING POWER SUPPLIES)

SMT PA0368.xxxNL Series

- 8.4mm x 8.4mm x 3.3mm Max
- Turns Ratio: 1:50 up to 1:125
- RMS current: 4Arms
- Hi-pot Voltage: 500Vrms



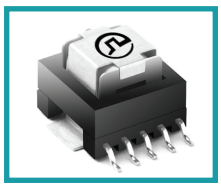
SMT PA1005.XXXNL Series

- 8.4mm x 7.2mm x 5.1mm Max
- Turns Ratio: 1:20 up to 1:125
- RMS current: 20Arms
- Hi-pot Voltage: 500Vrms

  (higher current version of P82xNL series)

SMT PE-68xxxNL Series

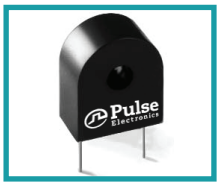
- 18.2mm x 15.0mm x 7.6mm Max
- Turns Ratio: 1:1:50 up to 1:1:200
- RMS current: 15Arms
- Hi-pot Voltage: 500Vrms



SMT PB002xNL Series

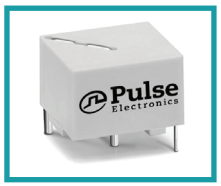
- 19.9mm x 14.5mm x 10.0mm Max
- Turns Ratio: 1:50 up to 1:200
- RMS current: 35Arms
- Hi-pot Voltage: 500Vrms

PRODUCT OVERVIEW: THT CURRENT SENSE MAGNETICS (FOR SWITCHING POWER SUPPLIES)



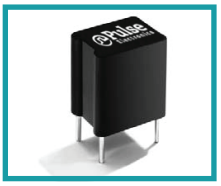
THT PE51.xxxNL Series

- 17.1mm x 9.9mm x 20.4mm Max
- VDE recognized component
- Turns Ratio: 50T to 200T CT
- RMS current: 20Arms
- Hi-pot Voltage: 3000Vrms
  (available also as FIS1x1 Series)



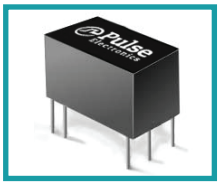
THT FIS 1x5NL Series

- 17.6mm x 15.0mm x 12.0mm Max
- Turns Ratio: 1:50 up to 1:500
- RMS current: 25Arms
- Hi-pot Voltage: 4000Vrms



THT PE-67xxxNL Series

- 19.1mm x 14.4mm x 19.1mm Max
- Turns Ratio: 1:50 up to 1:300
- RMS current: 35Arms
- Hi-pot Voltage: 500Vrms



THT PE-6xxxNL Series

- 22.9mm x 17.8mm x 17.8mm Max
- VDE Approved
- Turns Ratio: 1:50 up to 1:300
- RMS current: 20Arms
- Hi-pot Voltage: 3000Vrms

THT P058xNL Series

- 20.6mm x 14.7mm x 19.1mm Max
- UL/C-UL recognized component
- Turns Ratio: 1:1:50 up to 1:1:200
- RMS current: 35Arms
- Hi-pot Voltage: 3000Vrms

POWER MAGNETICS

PRODUCT OVERVIEW: CURRENT SENSE MAGNETICS (SIDEWINDER FOR 50/60HZ AC)

The Pulse Sidewinder© products are the ultimate evolution of the Rogowski Coil principle for AC current sensing applications. Pulse' patent pending winding technique has been engineered to provide highly linear output voltage over a very wide dynamic range from 1.0 to 1000 Amperes (A), making them especially suited for applications such as distributed power generation, renewable energy and storage, load balancing, power monitoring, advanced metering infrastructure (AMI), circuit breaker panels, and smart meters.

PA3202NL

PA3206NL

PA3207NL

PA3208NL

PA3209NL

SIDEWINDER®

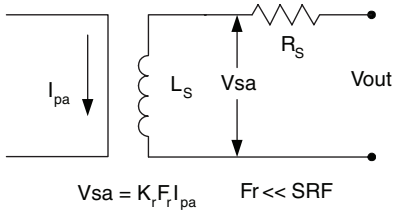
- *50/60 Hz, Single Phase, AC Current Sensor*
- *Dynamic Range from 0.1 to 1000 Amps*
- *For ANSI C12.20 Smart Meters*
- *For IEC 62053-22 Smart Meters*
- *Phase error < 0.05 degree*
- *Bandwidth 300KHz*
- *Immune to external AC magnetic fields*
- *Immune to DC current & DC magnetic field*
- *Very low temperature coefficient*
- *Patent pending*

Go to www.pulseelectronics.com/SIDEWINDER

For more information, including product data sheets, Sidewinder Overview, Sidewinder Reliability Report, IC Cross Reference List, and Metering Application Notes.

Electrical Specifications at 25°C Temp Range -40°C to 130°C			Actual Secondary Output Voltage (Vsa)	
Part Number	Accuracy Class[3]	Kr[4] (μΩ/Hz typ)	@ 60 Hz (μV/A)[1]	Curent Range
PA3202NL	0.2	8.33	500	500
PA3206NL	0.2	7.66	460	460
PA3207NL	0.2	7.66	460	460
PA3208NL	0.2	7.66	460	460
PA3209NL	0.2	7.66	460	460

Low Frequency Equivalent Circuit

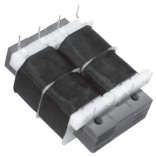


POWER MAGNETICS

PRODUCT OVERVIEW: LAMINATED TRANSFORMERS

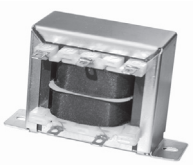
Pulse offers power ratings from 1.1 VA to 175 VA, open frame transformers, with a wide variety of domestic and international agency approvals. Pulse is truly the one-stop-shop for all your 50/60 Hz transformer needs.

This catalog serves as an overview for the Pulse Laminated Transformers product line. Contact Pulse Power Applications Engineering by email *prodinfo_power@pulseeng.com*, for more information.



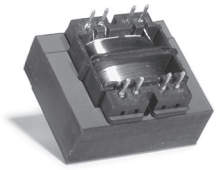
Low Profile Plug-In

- Print circuit mounting
- 1500 V, primary to secondary isolation
- Low profile design
- Vacuum impregnated
- Baked resin



Chasis Tran

- Channel frame mounting
- 2500 V, primary to secondary isolation
- Non-concentric design
- Vacuum impregnated
- Baked resin

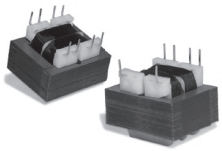


International PC Plug-In

- PC board plug-in mounting
- Dual bobbin, high (4000 V) primary to secondary isolation
- Non-concentric design
- Vacuum impregnated
- Baked resin

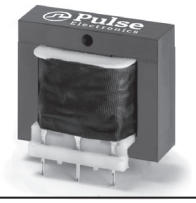
International High Power

- Chassis mounting
- Dual bobbin; high (4000 V) primary to secondary isolation
- Non-concentric design
- Vacuum impregnated
- Baked resin



Split Bobbin, Horizontal Plug-In

- Print circuit mounting
- 2500 VRMS Hipot
- Non-concentric design
- Vacuum impregnated
- Baked resin



Concentric, Vertical Profile, PC Plug-In

- Industry standard footprint
- 1500 V primary to secondary isolation
- Concentric vertical mount
- Vacuum impregnated
- Baked resin