



Features

- Shielded construction
- Inductance range: 1 to 100 μ H
- Heating current up to 3.6 A
- AEC-Q200 qualified
- RoHS compliant* and halogen free**

Applications

- Automotive systems:
 - Driver assistant
 - Infotainment
 - Lighting
- DC/DC converters
- Power supplies

SRR3818A Series - Shielded Power Inductors

Electrical Specifications @ 25 °C

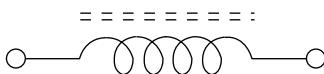
Bourns Part Number	Inductance @ 100 kHz/0.1 V		SRF (MHz) Typ.	DCR (m Ω)		I rms ¹ (A) Typ.	I rms ² (A) Typ.	I sat (A)
	L (μ H)	Tol. (%)		Typ.	Max.			
SRR3818A-1R0Y	1.0	± 30	165	27.5	37	2.75	3.6	2.1
SRR3818A-1R5Y	1.5	± 30	125	33	47	2.5	3.1	1.6
SRR3818A-2R2Y	2.2	± 30	95	45.5	60	2	2.6	1.4
SRR3818A-2R7Y	2.7	± 30	90	49.5	65	1.9	2.5	1.3
SRR3818A-3R3Y	3.3	± 30	75	64.5	85	1.7	2.1	1.15
SRR3818A-3R9Y	3.9	± 30	70	80	105	1.6	2	1.05
SRR3818A-4R7Y	4.7	± 30	60	90	120	1.5	1.9	0.95
SRR3818A-6R8Y	6.8	± 30	50	125	160	1.25	1.6	0.8
SRR3818A-100M	10	± 20	40	180	235	1	1.3	0.65
SRR3818A-150M	15	± 20	30	260	340	0.8	1.05	0.55
SRR3818A-220M	22	± 20	25	395	500	0.65	0.8	0.43
SRR3818A-330M	33	± 20	20	590	740	0.5	0.65	0.34
SRR3818A-470M	47	± 20	15	825	1030	0.45	0.56	0.3
SRR3818A-680M	68	± 20	13	1280	1600	0.38	0.46	0.24
SRR3818A-101M	100	± 20	11	2040	2600	0.28	0.34	0.2

How to Order

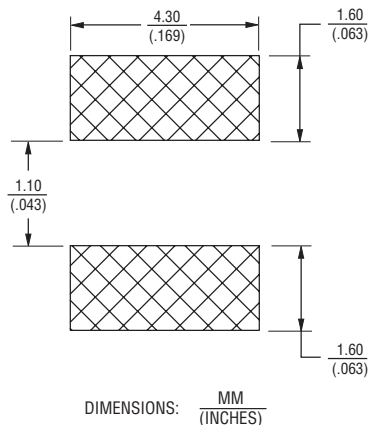
SRR3818A - 1R0Y

Model _____
Value Code (see table) _____

Electrical Schematic



Recommended Layout



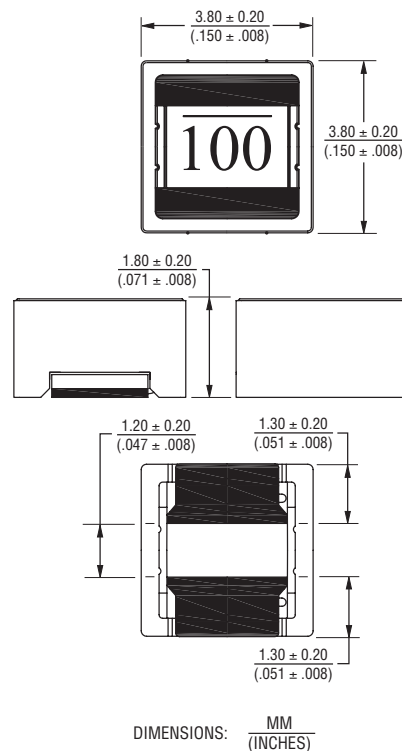
General Specifications

Operating Temp..... -40 °C to +150 °C
(Temperature rise included)
Storage Temperature .. -40 °C to +150 °C
Temperature Rise
..... 20 °C typ. at rated I rms¹
..... 40 °C typ. at rated I rms²
Rated Current
..... Inductance drops 35 % at I sat
Moisture Sensitivity Level 1
ESD Classification (HBM) 3B

Materials

Core Ferrite
Wire Enameled copper
Terminal Finish Sn
Packaging 1000 pcs. per 7-inch reel

Product Dimensions



*RoHS Directive 2015/863, Mar 31, 2015 and Annex.

**Bourns considers a product to be "halogen free" if (a) the Bromine (Br) content is 900 ppm or less; (b) the Chlorine (Cl) content is 900 ppm or less; and (c) the total Bromine (Br) and Chlorine (Cl) content is 1500 ppm or less. Specifications are subject to change without notice.

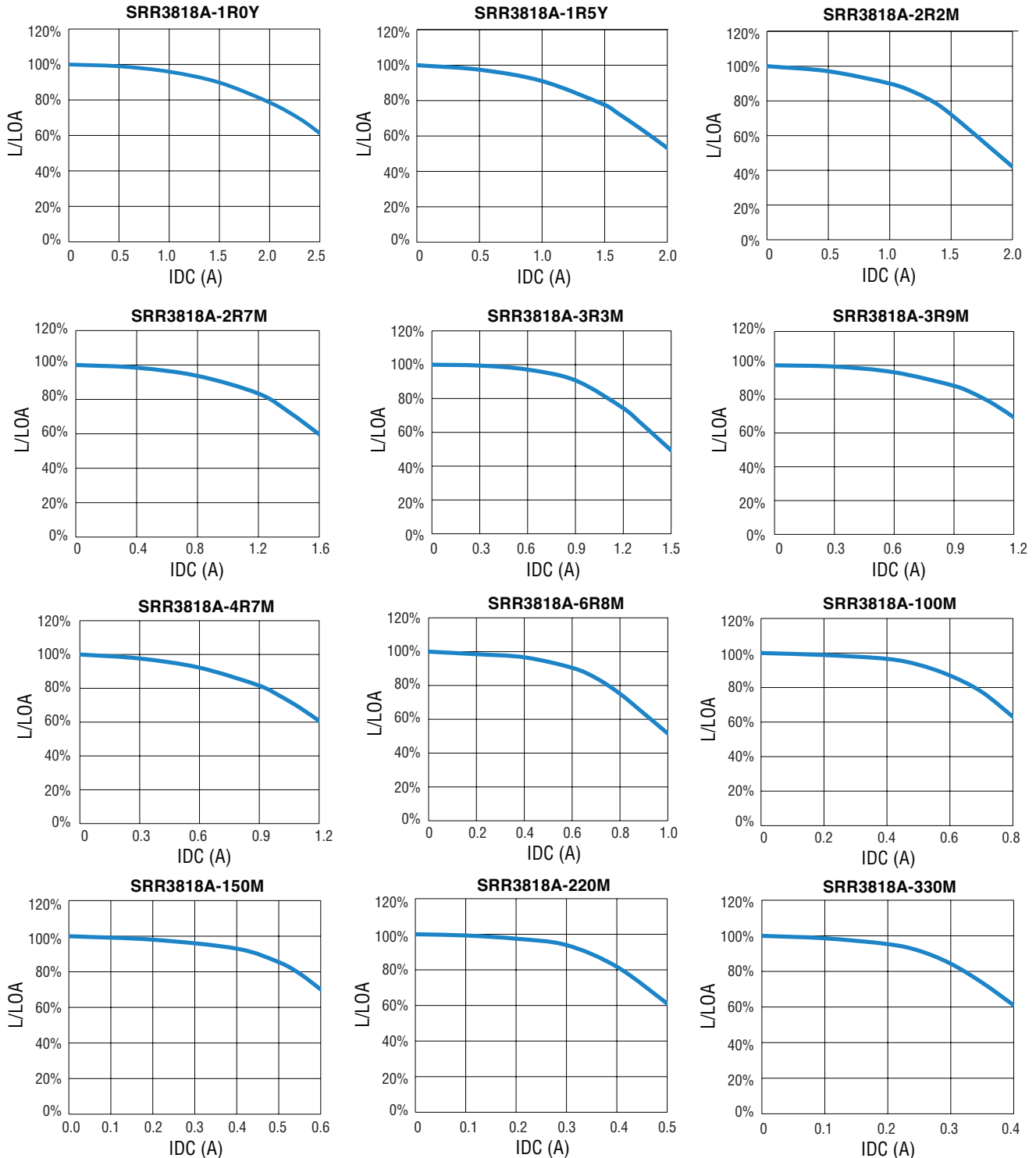
The device characteristics and parameters in this data sheet can and do vary in different applications and actual device performance may vary over time.

Users should verify actual device performance in their specific applications.

SRR3818A Series - Shielded Power Inductors

BOURNS®

Inductance vs. IDC



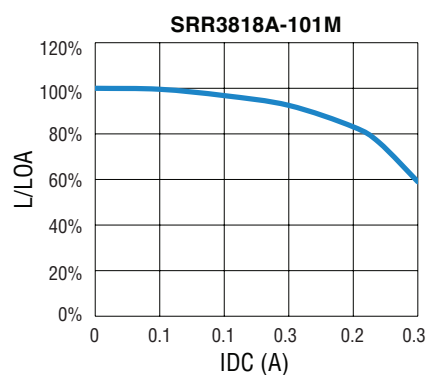
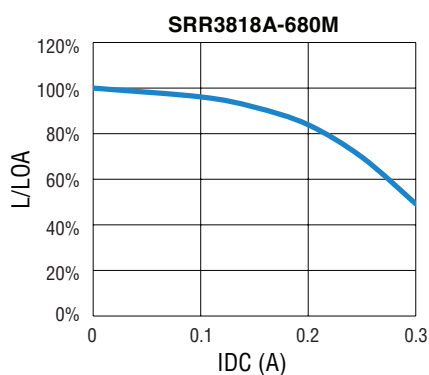
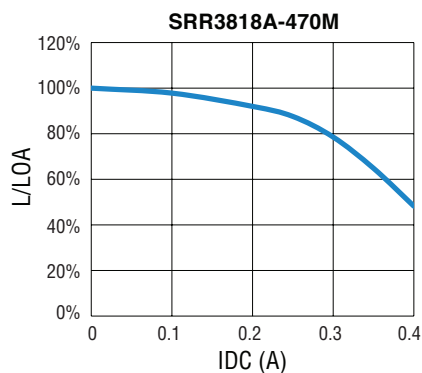
Specifications are subject to change without notice.

The device characteristics and parameters in this data sheet can and do vary in different applications and actual device performance may vary over time. Users should verify actual device performance in their specific applications.

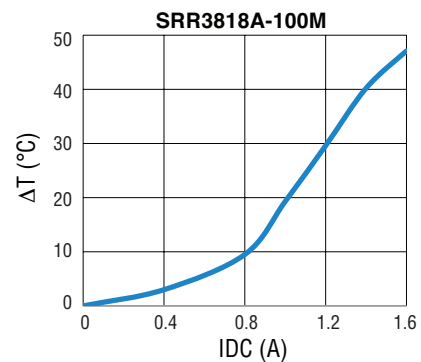
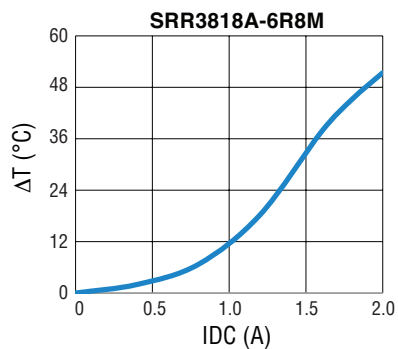
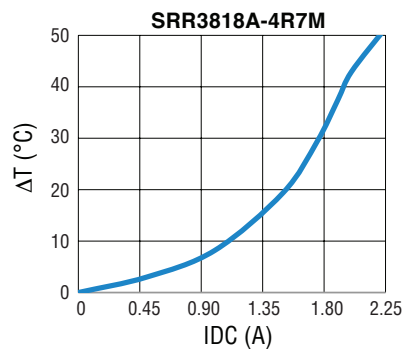
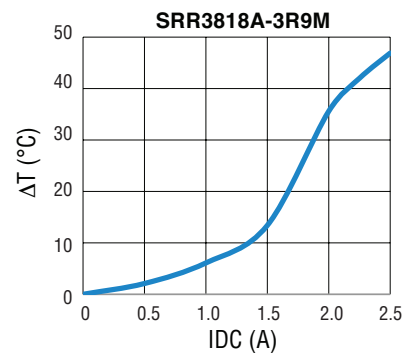
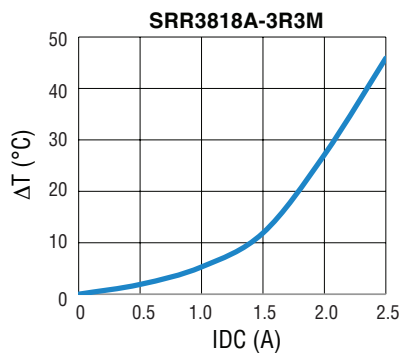
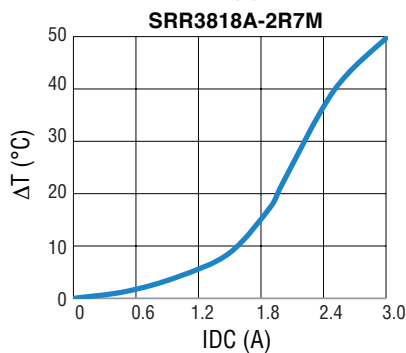
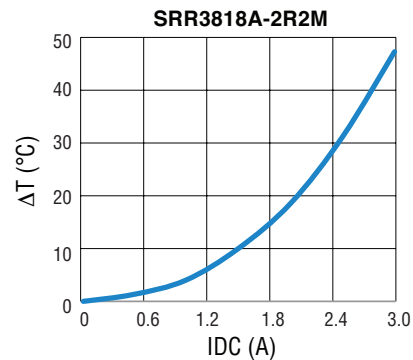
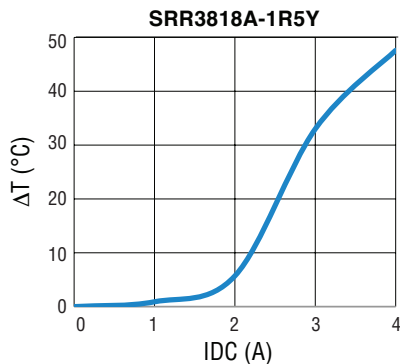
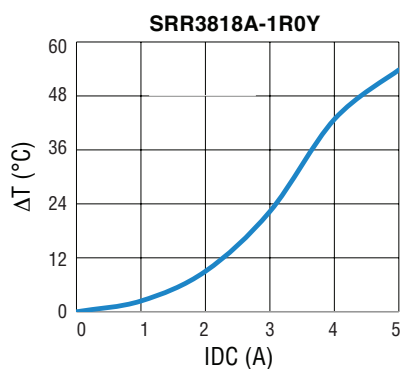
SRR3818A Series - Shielded Power Inductors

BOURNS®

Inductance vs. IDC (Continued)



Temperature vs. IDC



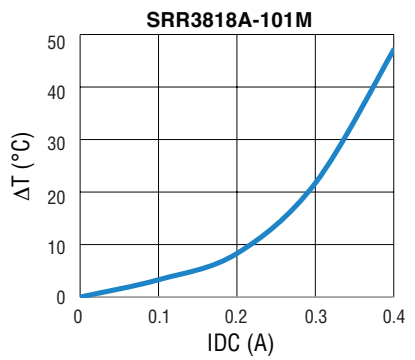
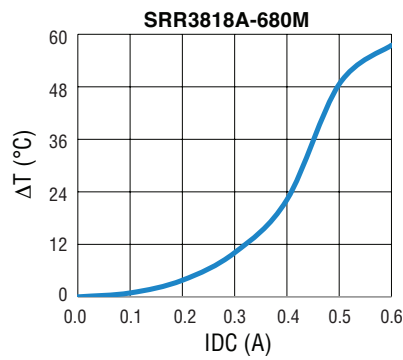
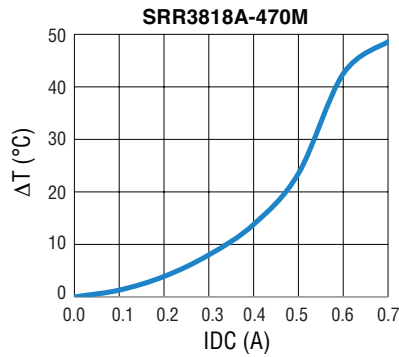
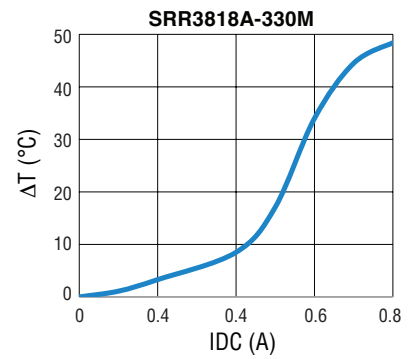
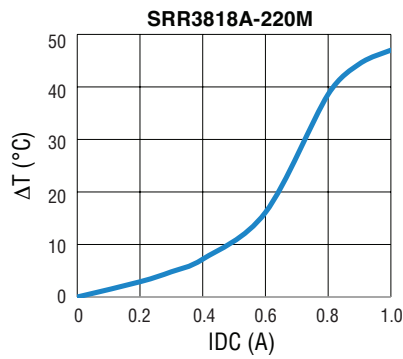
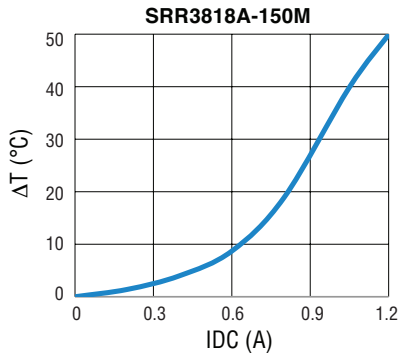
Specifications are subject to change without notice.

The device characteristics and parameters in this data sheet can and do vary in different applications and actual device performance may vary over time. Users should verify actual device performance in their specific applications.

SRR3818A Series - Shielded Power Inductors

BOURNS®

Temperature vs. IDC (Continued)

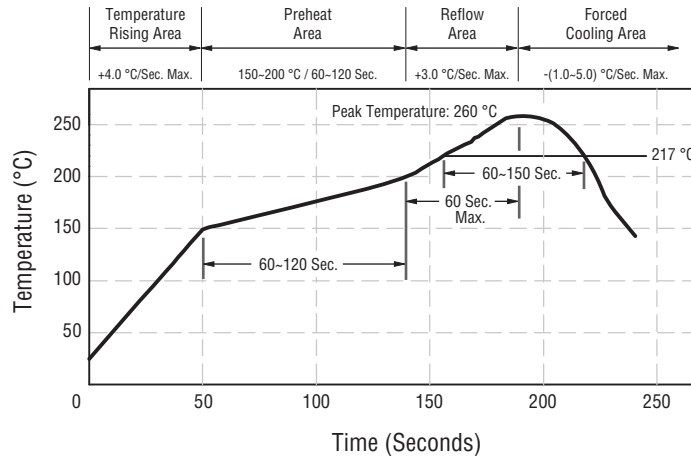


Specifications are subject to change without notice.
The device characteristics and parameters in this data sheet can and do vary in different applications and actual device performance may vary over time.
Users should verify actual device performance in their specific applications.

SRR3818A Series - Shielded Power Inductors

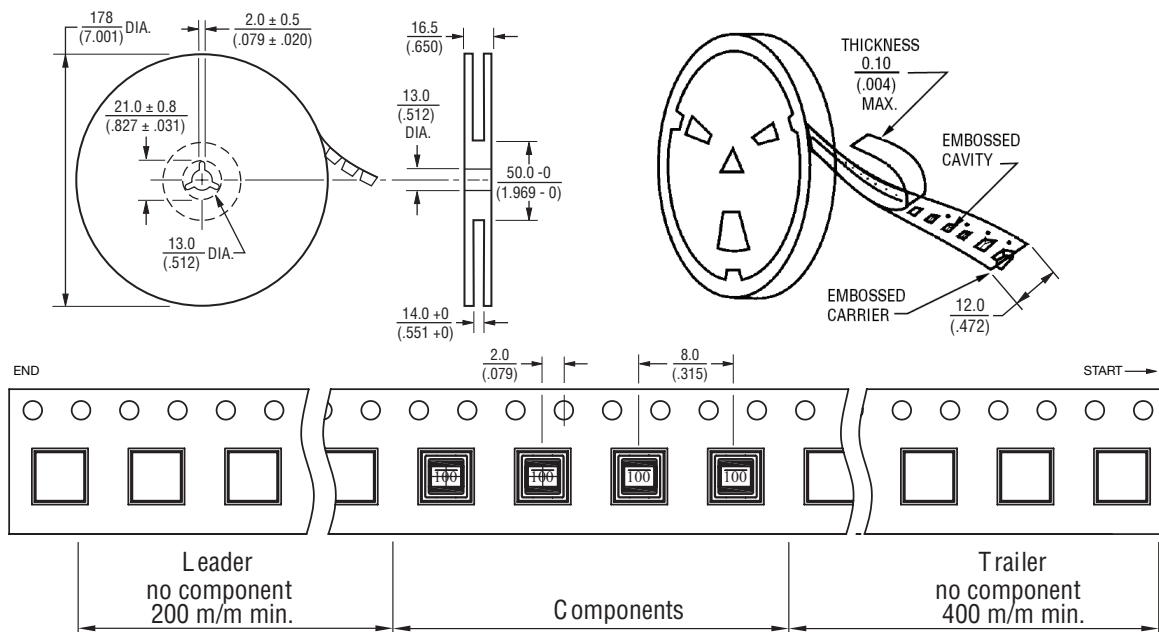
BOURNS®

Soldering Profile



Peak Temperature: 260 °C max.
 Max. Peak Temperature -5 °C: 30 sec. max.
 Max. Time Above 217 °C: 60-150 sec. max.

Packaging Specifications



USER DIRECTION OF FEED

QTY: 1000 PCS. PER REEL

DIMENSIONS: $\frac{\text{MM}}{(\text{INCHES})}$



Компания «ЭлектроПласт» предлагает заключение долгосрочных отношений при поставках импортных электронных компонентов на взаимовыгодных условиях!

Наши преимущества:

- Оперативные поставки широкого спектра электронных компонентов отечественного и импортного производства напрямую от производителей и с крупнейших мировых складов;
- Поставка более 17-ти миллионов наименований электронных компонентов;
- Поставка сложных, дефицитных, либо снятых с производства позиций;
- Оперативные сроки поставки под заказ (от 5 рабочих дней);
- Экспресс доставка в любую точку России;
- Техническая поддержка проекта, помощь в подборе аналогов, поставка прототипов;
- Система менеджмента качества сертифицирована по Международному стандарту ISO 9001;
- Лицензия ФСБ на осуществление работ с использованием сведений, составляющих государственную тайну;
- Поставка специализированных компонентов (Xilinx, Altera, Analog Devices, Intersil, Interpoint, Microsemi, Aeroflex, Peregrine, Syfer, Eurofarad, Texas Instrument, Miteq, Cobham, E2V, MA-COM, Hittite, Mini-Circuits, General Dynamics и др.);

Помимо этого, одним из направлений компании «ЭлектроПласт» является направление «Источники питания». Мы предлагаем Вам помощь Конструкторского отдела:

- Подбор оптимального решения, техническое обоснование при выборе компонента;
- Подбор аналогов;
- Консультации по применению компонента;
- Поставка образцов и прототипов;
- Техническая поддержка проекта;
- Защита от снятия компонента с производства.



Как с нами связаться

Телефон: 8 (812) 309 58 32 (многоканальный)

Факс: 8 (812) 320-02-42

Электронная почта: org@eplast1.ru

Адрес: 198099, г. Санкт-Петербург, ул. Калинина, дом 2, корпус 4, литера А.