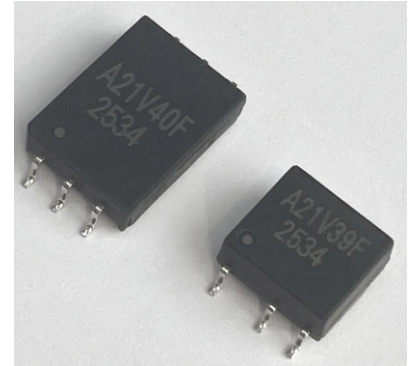




- Provide Hi-Pot isolation up to 4300V
- Support multiple BMS chipsets including ADI, NXP, TI and others
- Low profile with 3.45mm maximum height
- Temperature ranges for Automotive and Industrial applications
- Design for electric vehicles (EV), energy storage system (ESS) applications and others
- Support serial daisy chain isoSPI, SPI connection
- AECQ-Q200 for Automotive application



ELECTRICAL SPECIFICATION @ 25°C

Part Number	Turns Ratio	Inductance (100KHz, 0.1Vrms)	Operating Temp. Range	Hi-Pot Insulation (Pri : Sec)	Working Voltage	Insulation	Supported IC
A21V00039F	1.00 +/-2%	300 uH Min	-40 C to +150 C	4300VDC	1000VDC	Functional	ADI, TI
A21V00040F	1.00 +/-2%	150 uH Min	-40 C to +125 C	4300VDC	1000VDC	Functional	ADI, NXP
A21V00044F	1.00 +/-2%	500 uH Min	-40 C to +125 C	3200Vrms	600VDC	Functional	ADI, NXP
A21V00047F	1.00 +/-1%	150 uH Min	-40 C to +125 C	3000Vrms	1000VDC	Functional	ADI, NXP, TI
A21V00048F	1.00 +/-2%	500 uH Min	-40 C to +125 C	4300VDC	1500VDC	Functional	TI

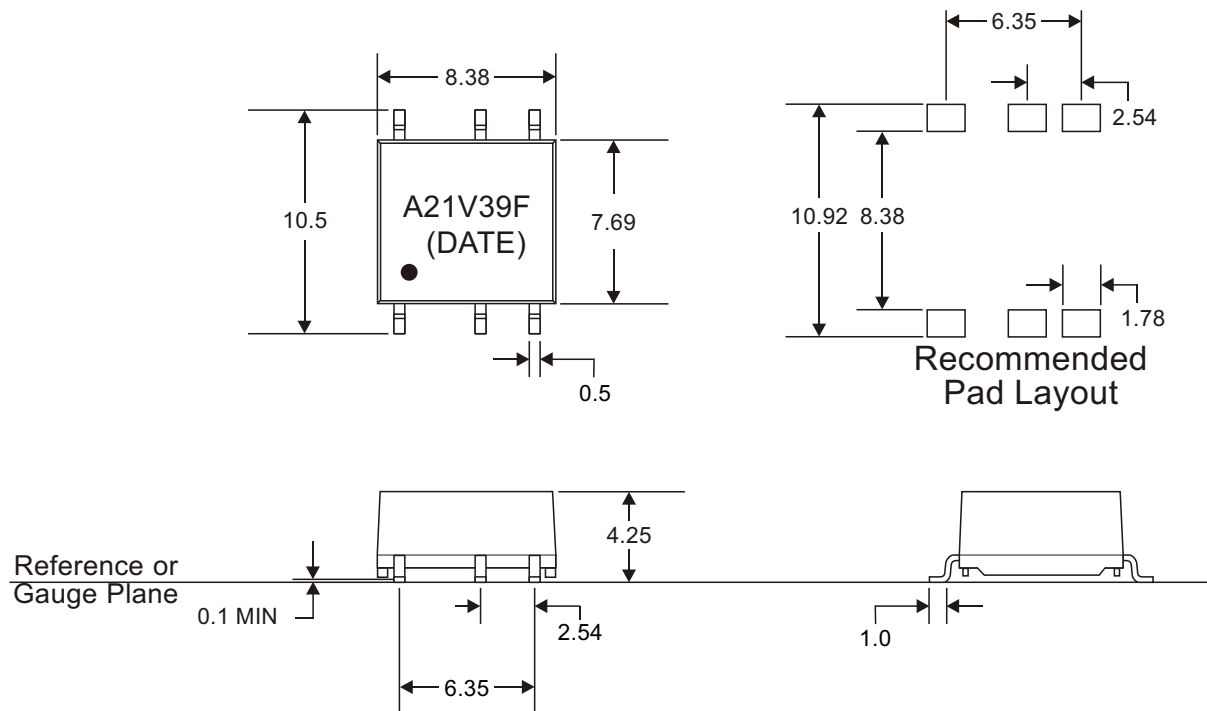
ELECTRICAL SPECIFICATION @ 25°C

Part Number	Leakage Inductance (uH Max)	Winding DCR (Max)		Insertin Loss (dB Max)	Return Loss (dB Min) IZlout=100ohm	CMRR (dB Typ)	
		PHY Side	Line Side			1-10MHz	10-1000MHz
A21V00040F	0.50 @100KHz	0.45	0.85	-0.25 @4MHz	-20 @4MHz	-35	-20
A21V00047F	0.50 @2000KHz	0.50	0.50	-0.25 @2MHz	-20 @4MHz	-	-
A21V00048F	0.50 @2000KHz	0.50	0.50	-0.25 @2MHz	-20 @4MHz	-	-

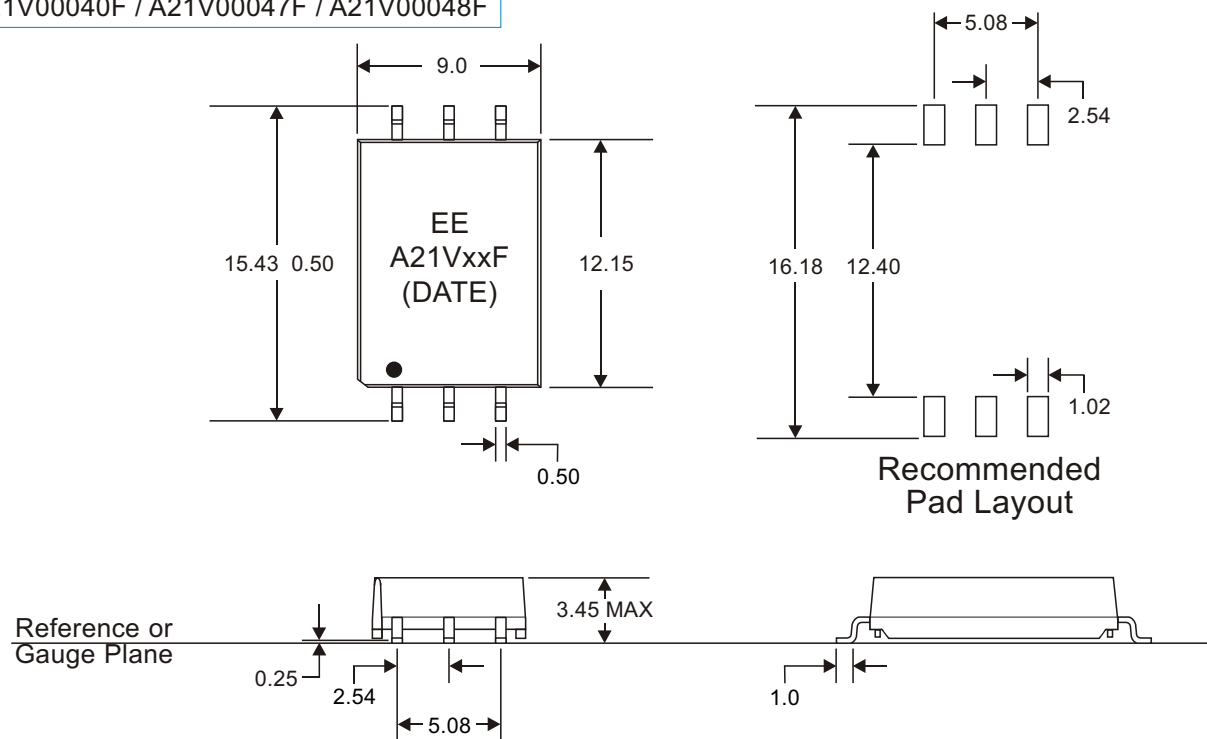


MECHANICAL DIMENSIONS

A21V00039F



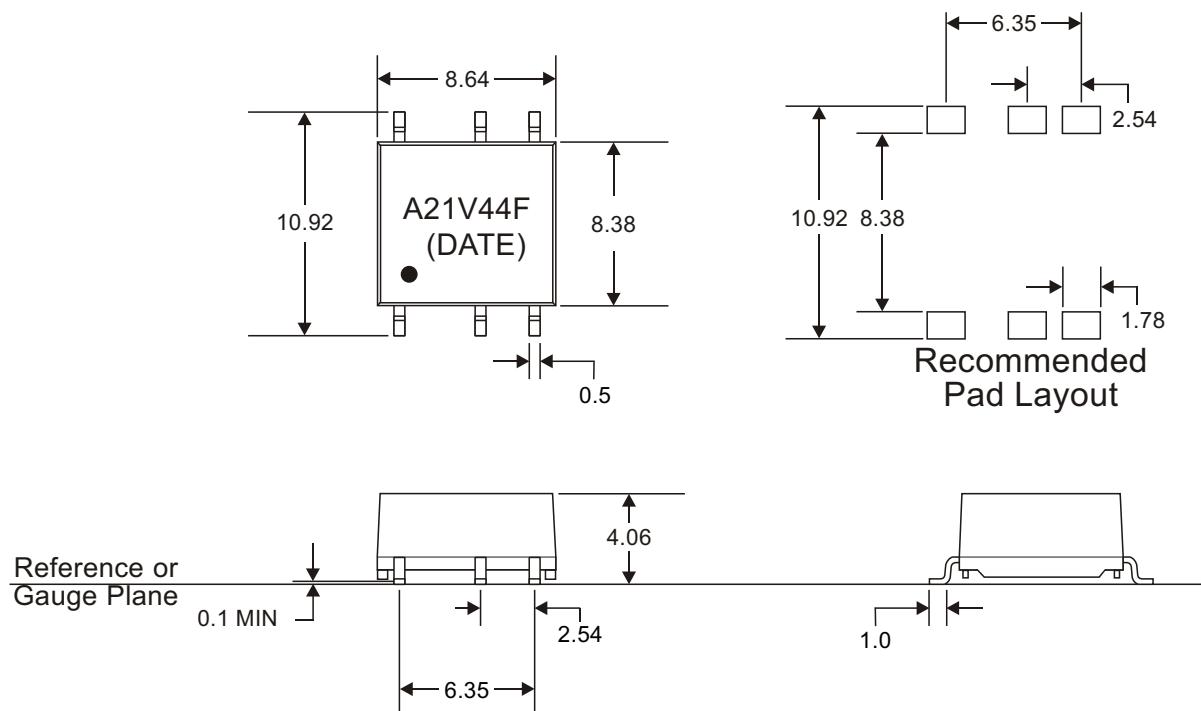
A21V00040F / A21V00047F / A21V00048F





MECHANICAL DIMENSIONS

A21V00044F

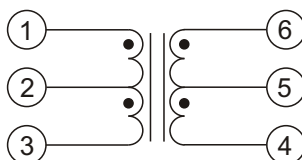


Notes:

1. Dimensions are specified in mm.
2. Unless otherwise specified, all tolerances are ± 0.25 .
3. "(DATE)" includes at least the manufacturing date code (in YYWW format).
4. When ordering, please add suffix "T" to the part number for tape & reel packaging (330mm reel).

SCHEMATICS

A21V00047F / A21V00048F

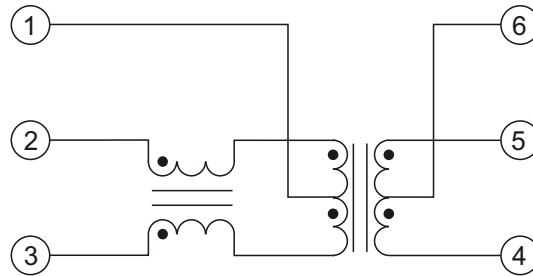


SCHEMATIC



SCHEMATICS

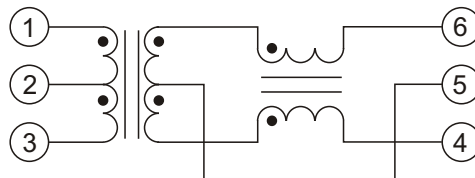
A21V00039F / A21V00044F



SCHEMATIC

SCHEMATICS

A21V00040F



SCHEMATIC

FOR MORE INFORMATION, PLEASE CONTACT

HONG KONG
Flat G, 5/F, Valiant Industrial Centre,
2-12 Au Pui Wan Street, Fotan, Shatin, N.T.
Hong Kong
Tel: (852) 2954 3027 Fax: (852) 2954 3304
Email: eempl@eleceltek.com
Website: <http://www.eemagnetic.com>

PRC
Rm1301-1308, Building 2,
No.4 Hongming Road, Huangpu District,
Guangzhou Economic & Technological Development District,
Guangzhou, China
Tel: (86) 20-8221-4480 Ext. 261 Fax: (86) 20-8114-9279 & 20-8114-9283

Information herein is for reference only and subject to change without notice. It does not constitute any representation, warranty or commitment of the company in respect of the products in any aspect. All logos, brands and product names mentioned herein are trademarks or registered trademarks of their respective owners. The company does not assume any liability arising out of the application or use of any product or circuit described herein. Copyrights 2025, E & E Magnetic Products Limited.

Flat G, 5/F, Valiant Industrial Centre, 2-12 Au Pui Wan Street, Fotan, Shatin, N.T. Hong Kong

Tel: (852) 2954 3027 • Fax: (852) 2954 3304