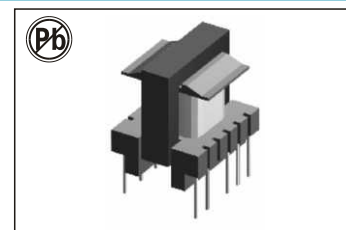


◆ Power ferrite transformers E16 Series

1-6W E16-SINGLE OUTPUT FLYBACK TRANSFORMERS T 74001, 74002 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

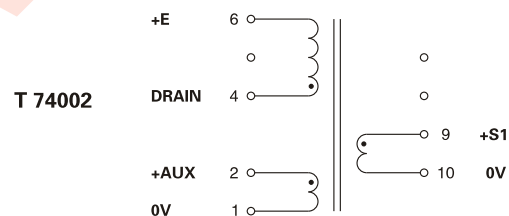
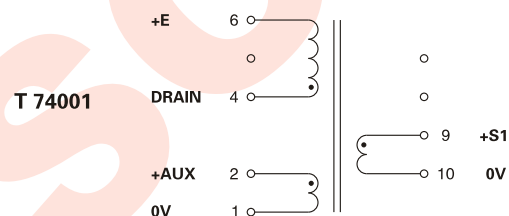
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Infineon	TDA16831	185 – 265 Vrms	6 w	100 kHz
Motorola	MC33369	85 – 265 Vrms	6 w	100 kHz
Power Integrations	TOP242P	85 – 265 Vrms	6 w	132 kHz
ST Microelectronics	VIPer20	85 – 265 Vrms	6 w	70 kHz
ST Microelectronics	VIPer20	85 – 265 Vrms	3 w	40 kHz

SIZE E16 – SINGLE OUTPUT : 5 or 12V – FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74001	6w	Pri	4-6	138	60 – 120 (VOR)	0.35 Apeak	3000 μ H
		Aux	2-1	16	8 – 16 Vdc	0.1 Adc	
		S1	9-10	8	3 – 6 Vdc	1.2 Adc	
T 74002	6w	Pri	4-6	150	60 – 120 (VOR)	0.38 Apeak	3000 μ H
		Aux	2-1	22	8.5 – 17 Vdc	0.1 Adc	
		S1	9-10	24	9 – 18 Vdc	0.5 Adc	

Note: Regulation with auxiliary winding

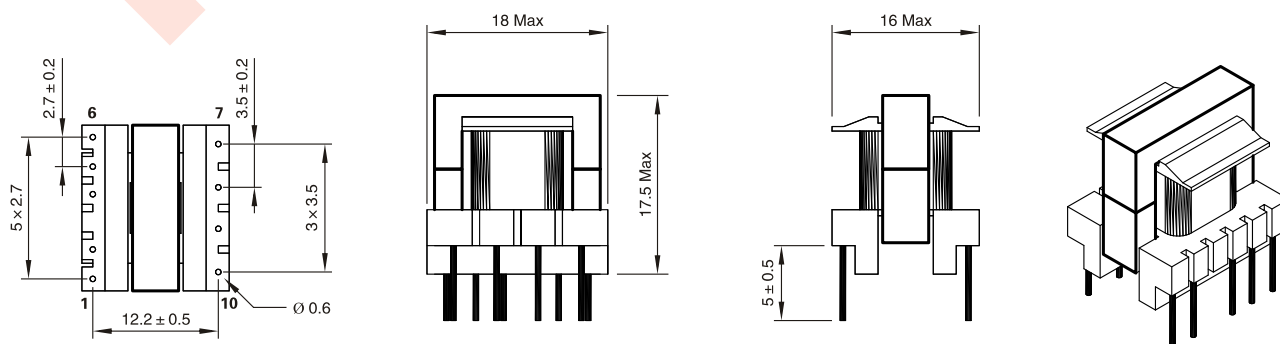
TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials



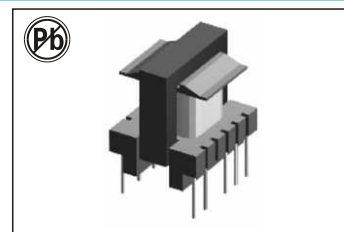
Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

PHYSICAL CHARACTERISTICS



Power ferrite transformers E16 Series

1-6W E16 – 2 OUTPUT FLYBACK TRANSFORMER SERIES T 74000, 74003 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

74000 E16 5w 5/12V				
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TOP242P	85 – 265 Vrms	5 w	132 kHz
ST Microelectronics	VIPer20	85 – 265 Vrms	4 w	70 kHz

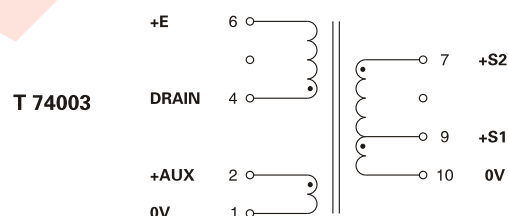
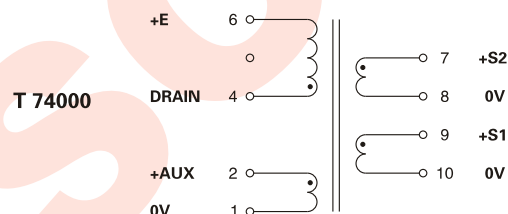
74003 E16 6w 3.3/5V				
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Infineon	TDA16831	185 – 265 Vrms	6 w	100 kHz
Motorola	MC33369	85 – 265 Vrms	6 w	100 kHz
Power Integrations	TOP242P	85 – 265 Vrms	5 w	132 kHz
ST Microelectronics	VIPer20	85 – 265 Vrms	6 w	70 kHz
ST Microelectronics	VIPer20	85 – 265 Vrms	3 w	40 kHz

SIZE E16 – 2 OUTPUT : 5 or 12V & 3.3 or 5V – FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74000	5w	Pri	4–6	138	62 – 130 (VOR)	0.27 Apeak	3900 μ H
		Aux	2–1	16	7 – 14 Vdc	0.1 Adc	
		S1	9–10	8	3.3 – 7 Vdc	1.2 Adc	
		S2	7–8	19	8 – 17 Vdc	0.4 Adc	
T 74003	6w	Pri	4–6	120	55 – 115 (VOR)	0.3 Apeak	3000 μ H
		Aux	2–1	17	8 – 16 Vdc	0.1 Adc	
		S1	9–10	5	2 – 4 Vdc	0.8 Adc	
		S2	7–10	7	3 – 6 Vdc	1.2 Adc	

Note: Regulation with auxiliary winding

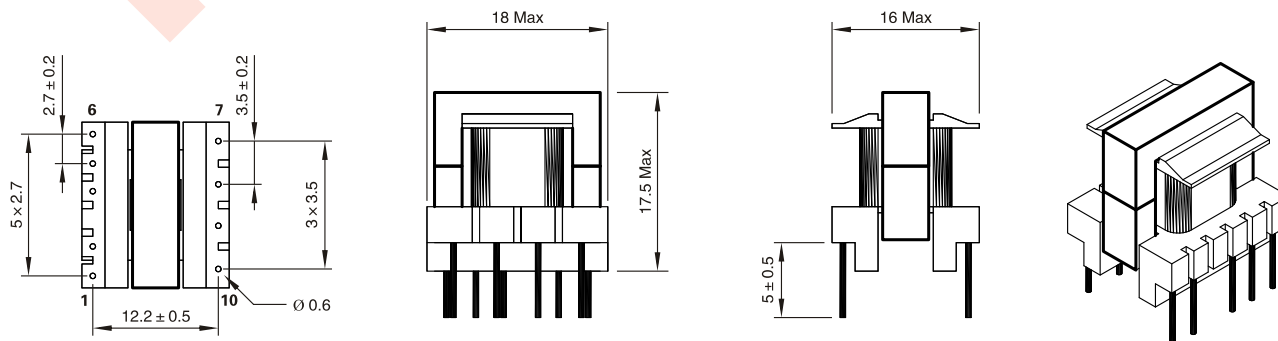
TECHNICAL INFORMATION

- Ambient temperature $< 70^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials



Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

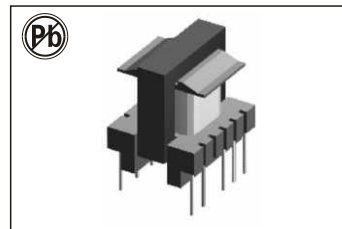
PHYSICAL CHARACTERISTICS



All dimensions in mm

◆ Power ferrite transformers E16 Series

1-9W E16-SINGLE OUTPUT TRANSFORMER FOR TINYSWITCHS T 74090, 74091 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

74090				
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TNY254	85 – 265 Vrms	1.5 w	44 kHz

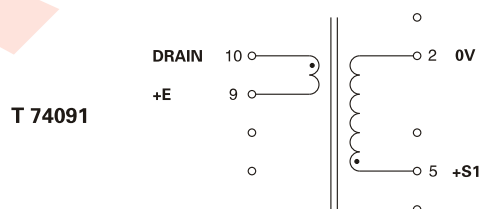
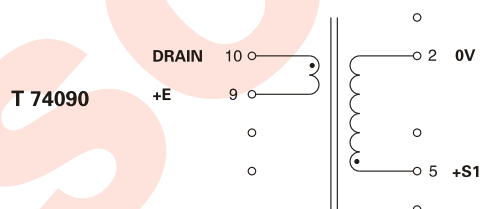
74091				
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TNY254	85 – 265 Vrms	1.5 w	44 kHz

SIZE E16 – SINGLE OUTPUT : 5 or 12V TRANSFORMER FOR TINYSWITCH							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74090	1.5w	Pri	10–9	228	50–95 (VOR)	0.28 Apeak	6000 μ H
		S1	5–2	16	3.3–6 Vdc	0.4 Adc	
T 74091	1.5w	Pri	10–9	228	65–130 (VOR)	0.28 Apeak	6000 μ H
		S1	5–2	28	7.5 – 15 Vdc	0.2 Adc	

Note: Regulation with auxiliary winding

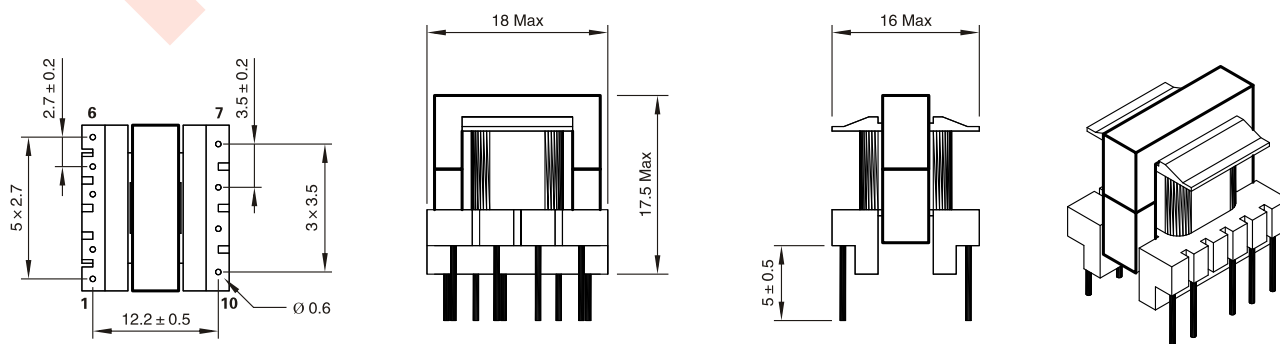
TECHNICAL INFORMATION

- Ambient temperature $< 85^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials



Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

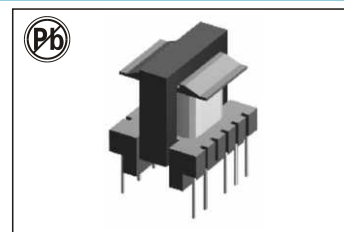
PHYSICAL CHARACTERISTICS



All dimensions in mm

◆ Power ferrite transformers E16 Series

1-9W E16-SINGLE OUTPUT TRANSFORMER FOR TINYSWITCHS T 74092, 74093 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

74092				
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TNY254	85 – 265 Vrms	3.1 w	44 kHz

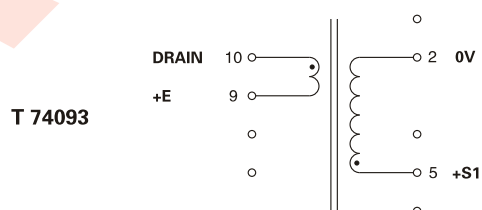
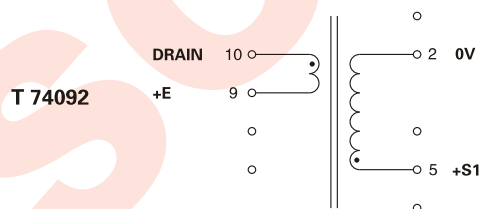
74093				
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TNY254	85 – 265 Vrms	3.1 w	44 kHz

SIZE E16 – SINGLE OUTPUT : 5 or 12V TRANSFORMER FOR TINYSWITCH							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74092	3.1w	Pri	10–9	191	55–100 (VOR)	0.34 Apeak	4200 μ H
		S1	5–2	13	3.3–6 Vdc	0.9 Adc	
T 74093	3.1w	Pri	10–9	191	65–125 (VOR)	0.34 Apeak	4200 μ H
		S1	5–2	24	7.5 – 15 Vdc	0.4 Adc	

Note: Regulation with auxiliary winding

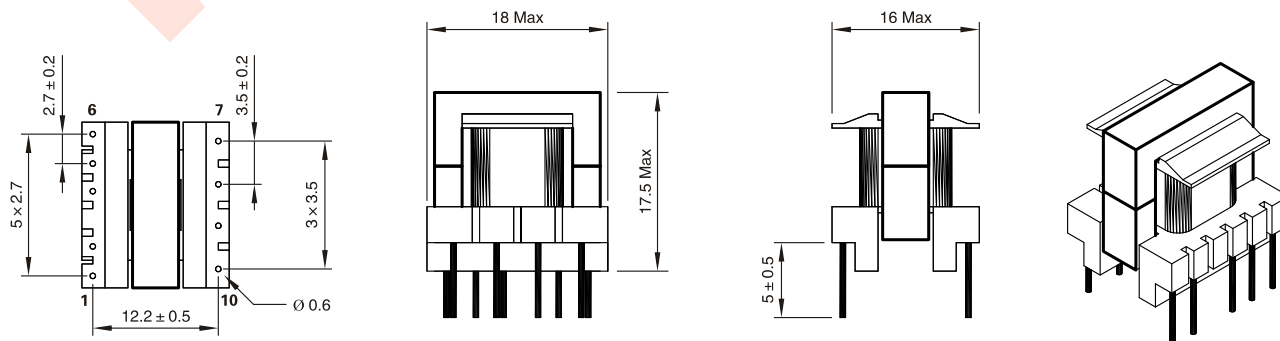
TECHNICAL INFORMATION

- Ambient temperature $< 70^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials



Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

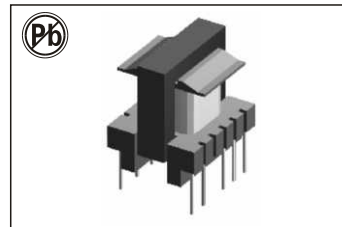
PHYSICAL CHARACTERISTICS



All dimensions in mm

Power ferrite transformers E16 Series

1-9W E16-SINGLE OUTPUT TRANSFORMER FOR TINYSWITCHS T 74094, 74095 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

74092				
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TNY254	85 – 265 Vrms	3.1 w	44 kHz

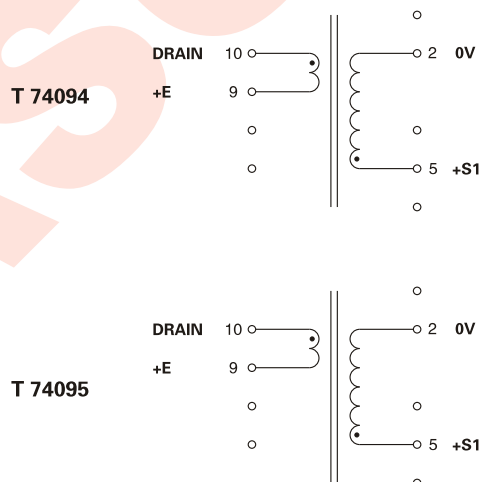
74093				
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TNY254	85 – 265 Vrms	3.1 w	44 kHz

SIZE E16 – SINGLE OUTPUT : 5 or 12V TRANSFORMER FOR TINYSWITCH							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74092	3.1w	Pri	10–9	191	55–100 (VOR)	0.34 Apeak	4200 μ H
		S1	5–2	13	3.3–6 Vdc	0.9 Adc	
T 74093	3.1w	Pri	10–9	191	65–125 (VOR)	0.34 Apeak	4200 μ H
		S1	5–2	24	7.5 – 15 Vdc	0.4 Adc	

Note: Regulation with auxiliary winding

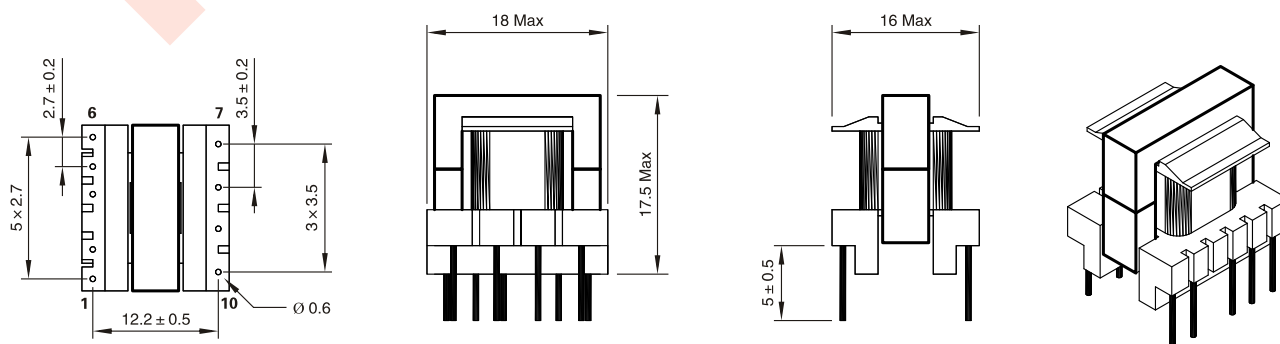
TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials



Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

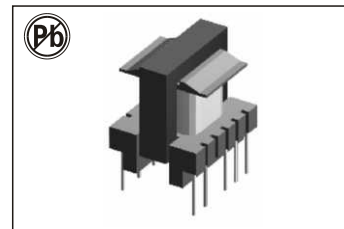
PHYSICAL CHARACTERISTICS



All dimensions in mm

◆ Power ferrite transformers E16 Series

6-12W E16 - 2 OUTPUT FLYBACK TRANSFORMERS T 74010 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

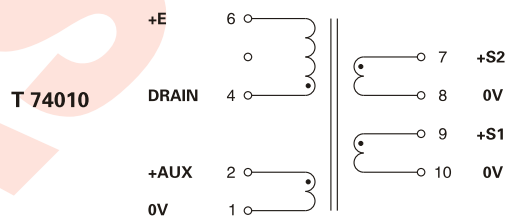
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Fairchild	KA5H0165RN	185 – 265 Vrms	10 w	100 kHz
Fairchild	KA5L0165R	85 – 265 Vrms	7 w	50 kHz
Infineon	TDA16831	92 – 265 Vrms	7.5 w	100 kHz
Infineon	TDA16831	185 – 265 Vrms	10 w	100 kHz
Motorola	MC33369	85 – 265 Vrms	8 w	100 kHz
Motorola	MC33369	185 – 265 Vrms	10 w	100 kHz
Power Integrations	TNY267	185 – 265 Vrms	12 w	132 kHz
Power Integrations	TOP242P	85 – 265 Vrms	10 w	132 kHz
Power Integrations	TOP242P	185 – 265 Vrms	12 w	132 kHz
Power Integrations	TOP242P	85 – 265 Vrms	10 w	132 kHz
ST Microelectronics	VIPer20	85 – 265 Vrms	8 w	70 kHz
ST Microelectronics	VIPer20	185 – 265 Vrms	10 w	70 kHz

SIZE E16 – 2 OUTPUTS : 5 & 12V – FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74010	12 w	Pri	4-6	120	60-125 (VOR)	0.55 Apeak	1660 μ H
		Aux	2-1	14	7-14 Vdc	0.1 Adc	
		S1	9-10	7	3.3-7 Vdc	2 Adc	
		S2	7-8	17	8-17 Vdc	1 Adc	

Note: Regulation with auxiliary winding

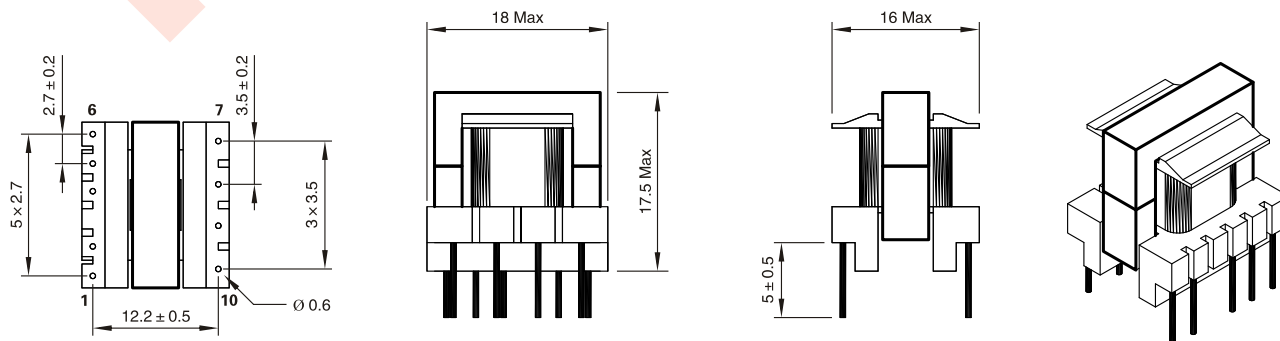
TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials



Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

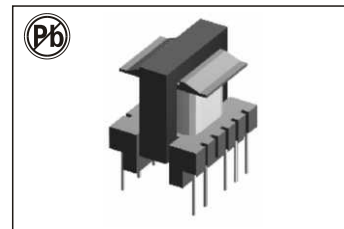
PHYSICAL CHARACTERISTICS



All dimensions in mm

◆ Power ferrite transformers E16 Series

6-12W E16 – 2 OUTPUT FLYBACK TRANSFORMERS T 74014 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

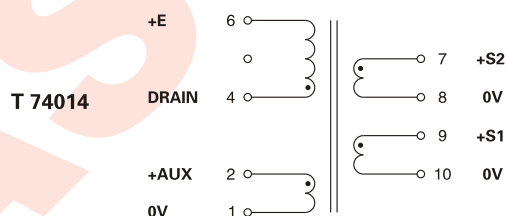
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TNY266	185 – 265 Vrms	12 w	132 kHz
Power Integrations	TNY266	85 – 265 Vrms	8 w	132 kHz
Power Integrations	TNY242P	185 – 265 Vrms	12 w	132 kHz
Power Integrations	TNY242P	85 – 265 Vrms	8 w	132 kHz

SIZE E16 – 2 OUTPUTS : 5 & 12V – FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74014	12 w	Pri	4-6	120	70-140 (VOR)	0.5 Apeak	1800 μH
		Aux	2-1	14	9-18 Vdc	0.2 Adc	
		S1	9-10	27	15-30 Vdc	0.4 Adc	
		S2	7-8	27	15-30 Vdc	0.4 Adc	

Note: Regulation with auxiliary winding

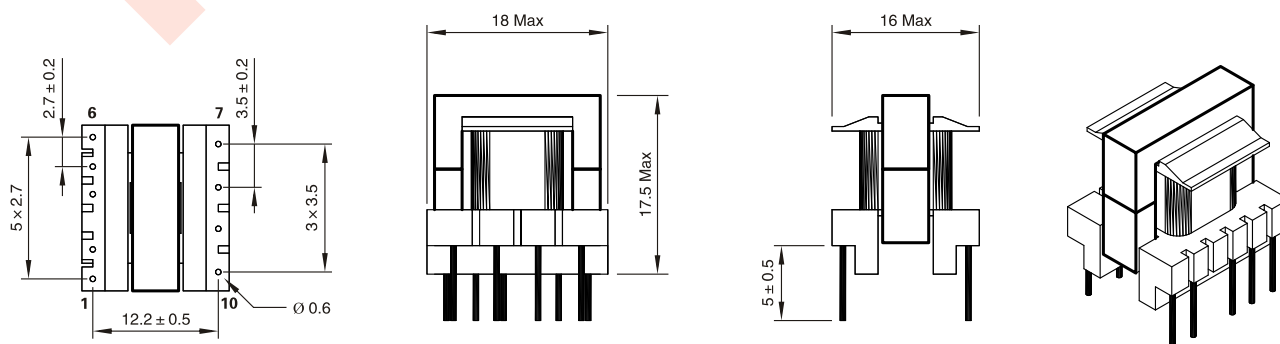
TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials
- Typical outputs : + 24V 0.5A with S1 – S2 in parallel
- + 48V 0.25A with S1 – S2 in series (8-9 connected)
- +15V / -15V 0.4A with pins 8-9 connected to 0V



Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

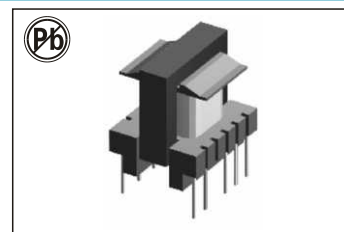
PHYSICAL CHARACTERISTICS



All dimensions in mm

◆ Power ferrite transformers E16 Series

6-12W E16 – 3 OUTPUT FLYBACK TRANSFORMERS T 74015 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

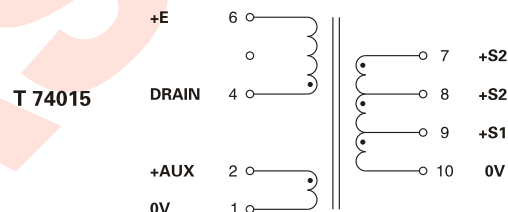
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TNY266	185 – 265 Vrms	10 w	132 kHz
Power Integrations	TNY266	85 – 265 Vrms	8 w	132 kHz
Power Integrations	TOP242P	185 – 265 Vrms	12 w	132 kHz
Power Integrations	TOP242P	85 – 265 Vrms	9 w	132 kHz

TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials

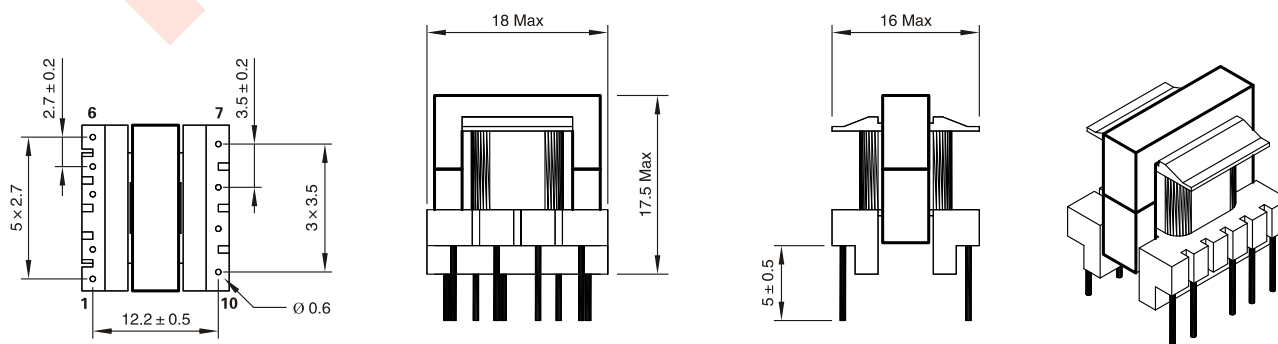
SIZE E16 – 2 OUTPUTS : 5 & 12V – FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74015	12 w	Pri	4-6	120	110 (VOR)	0.5 Apeak	1800 μH
		Aux	2-1	14	12 Vdc	0.2 Adc	
		S1	9-10	6	5 Vdc	1.5 Adc	
		S2	8-10	17	15 Vdc	0.6 Adc	
		S3	7-10	27	24 Vdc	0.4 Adc	

Note: Regulation with auxiliary winding



Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

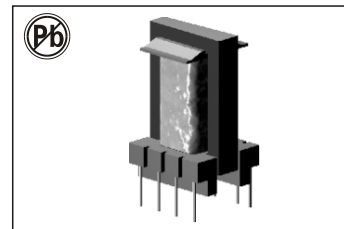
PHYSICAL CHARACTERISTICS



All dimensions in mm

◆ Power ferrite transformers EL19 Series

10-18W EL19 - 2 OUTPUT FLYBACK TRANSFORMERS T 74020 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

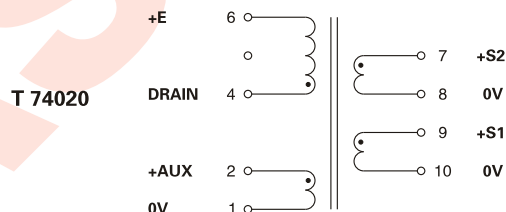
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TNY268	185 – 265 Vrms	18 w	132 kHz
Power Integrations	TOP243P	185 – 265 Vrms	18 w	132 kHz
Power Integrations	TOP243P	85 – 265 Vrms	12 w	132 kHz
ST Microelectronics	VIPer20	85 – 265 Vrms	10 w	100 kHz
ST Microelectronics	VIPer20	185 – 265 Vrms	12 w	100 kHz
ST Microelectronics	VIPer50	185 – 265 Vrms	16 w	100 kHz
Motorola	MC33370	185 – 265 Vrms	16 w	100 kHz
Infineon	TDA16832	185 – 265 Vrms	16 w	70 kHz

SIZE EL19 - 2 OUTPUTS : 5 & 12V - FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74020	18 w	Pri	4-6	108	65-130 (VOR)	0.8 Apeak	1250 μH
		Aux	2-1	12	7-14 Vdc	0.1 Adc	
		S1	9-10	6	3.3-7 Vdc	3 Adc	
		S2	7-8	14	8-16.5 Vdc	1.4 Adc	

Note: Regulation with auxiliary winding

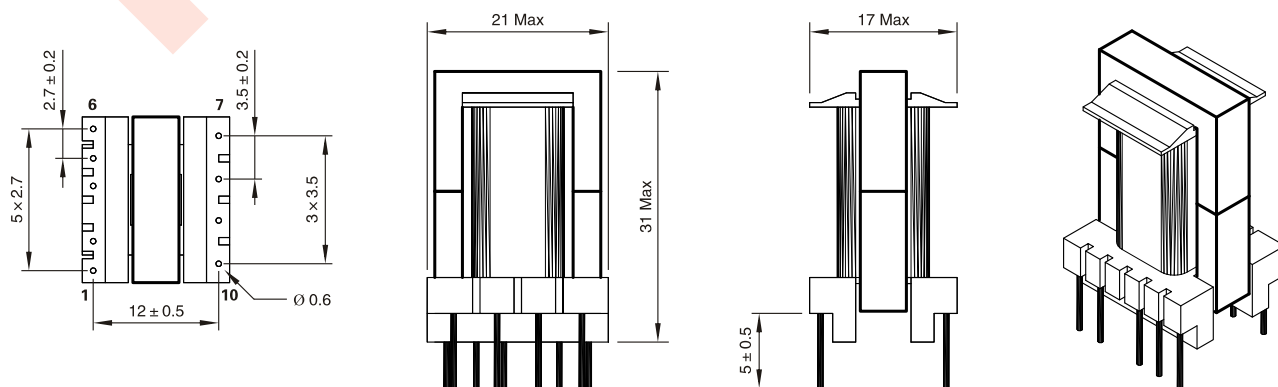
TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials



Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

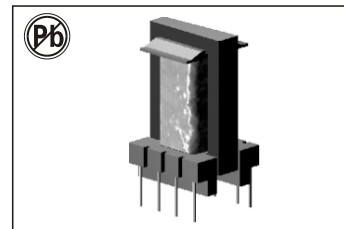
PHYSICAL CHARACTERISTICS



Note: All dimensions in mm

◆ Power ferrite transformers EL19 Series

10-18W EL19 - 5 OUTPUT FLYBACK TRANSFORMERS T 74021 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

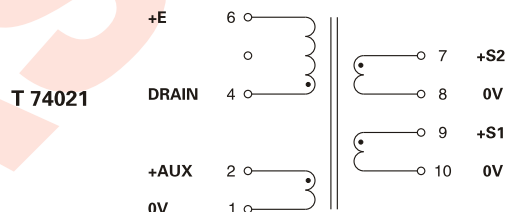
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TOP243Y	185 – 265 Vrms	18 w	132 kHz
Power Integrations	TOP243Y	85 – 265 Vrms	12 w	66 or 132 kHz
ST Microelectronics	VIPer50	85 – 265 Vrms	13 w	70 kHz
Motorola	MC33370	85 – 265 Vrms	13 w	100 kHz
Infineon	TDA16831	92 – 265 Vrms	10 w	100 kHz

TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials

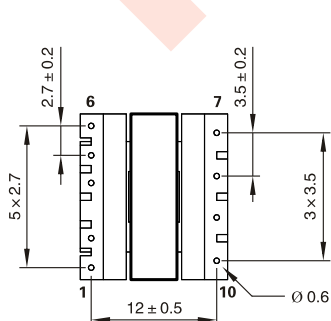
SIZE EL19 - 2 OUTPUTS : 5 & 12V - FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74021	18 w	Pri	4-6	108	65-130 (VOR)	1.1 Apeak	900 μH
		Aux	2-1	12	7-14 Vdc	0.1 Adc	
		S1	9-10	6	3.3-7 Vdc	3 Adc	
		S2	7-8	14	8-16.5 Vdc	1.4 Adc	

Note: Regulation with auxiliary winding

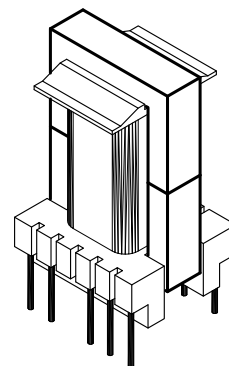
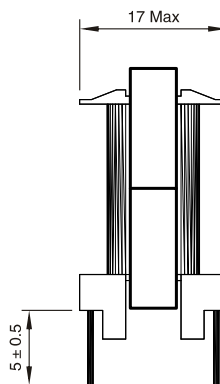
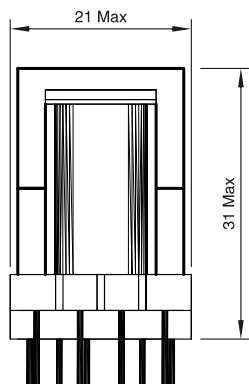


Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

PHYSICAL CHARACTERISTICS

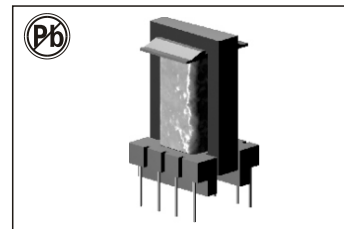


Note: All dimensions in mm



◆ Power ferrite transformers EL19 Series

10-18W EL19 - 5 OUTPUT FLYBACK TRANSFORMERS T 74023 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

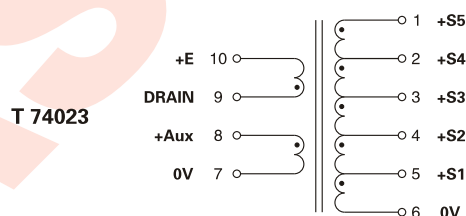
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TOP243P	185 - 265 Vrms	16 w	132 kHz
Power Integrations	TOP243P	85 - 265 Vrms	12 w	132 kHz

TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials

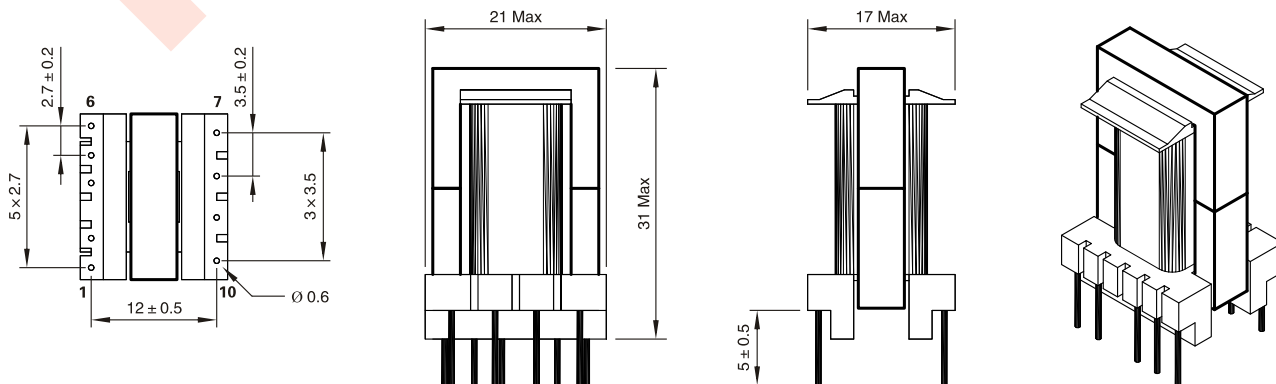
SIZE EL19 - 5 OUTPUTS : 3.3/5/12/18/30v - FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74023	16 w	Pri	9-10	120	110 (VOR)	0.85 Apeak	1250 μH
		Aux	8-7	17	15 Vdc	0.2 Adc	
		S1	5-6	4	3.3 Vdc	2 Adc	
		S2	4-6	6	5 Vdc	Sum S1+S2	
		S3	3-6	14	12 Vdc	0.8 Adc	
		S4	2-6	20	18 Vdc	0.8 Adc	
		S5	1-6	33	30 Vdc	0.2 Adc	

Note: Regulation with auxiliary winding



Note: PIN 3 Removed, PCB Drilling Diameter = 1.1mm

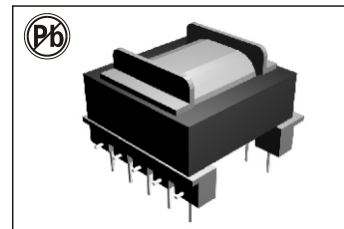
PHYSICAL CHARACTERISTICS



Note: All dimensions in mm

Power ferrite transformers EF20 Series

12-24W EF20 – 2 OUTPUT FLYBACK TRANSFORMERS T 74080, 74082 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

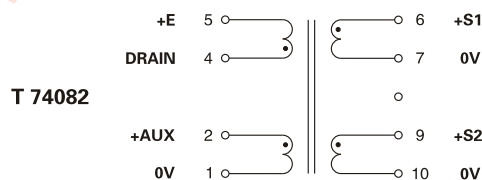
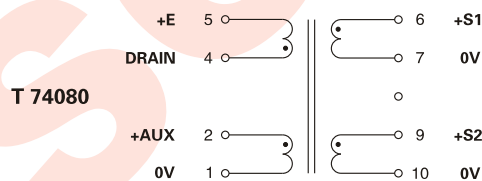
Part No.	Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
T 74080	Power Integrations	TOP243P	185-265 Vrms	24 w	132 kHz
	Power Integrations	TOP243P	85-265 Vrms	15 w	132 kHz
T 74082	Power Integrations	TNY268	185-265 Vrms	17 w	132 kHz
	Power Integrations	TOP243P	185-265 Vrms	20 w	132 kHz
	Power Integrations	TOP243P	85 - 265 Vrms	14 w	132 kHz

SIZE EF20 2 OUTPUTS : 5 /5v or 12/12v – FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74080	24 w	Pri	4-5	86	80-135 (VOR)	1.0 Apeak	1000 μ H
		Aux	2-1	12	11- 8 Vdc	0.3 Adc	
		S1	6-7	10	9- 5 Vdc	1.5 Adc	
		S2	9-10	10	9-15 Vdc	1.5 Adc	
T 74082	20 w	Pri	4-5	86	30-135 (VOR)	0.9 Apeak	1300 μ H
		Aux	2-1	12	7-18 Vdc	0.3 Adc	
		S1	6-7	5	3-7.5 Vdc	2.0 Adc	
		S2	9-10	5	3 - 7.5 Vdc	2.0 Adc	

Note: Regulation with auxiliary winding

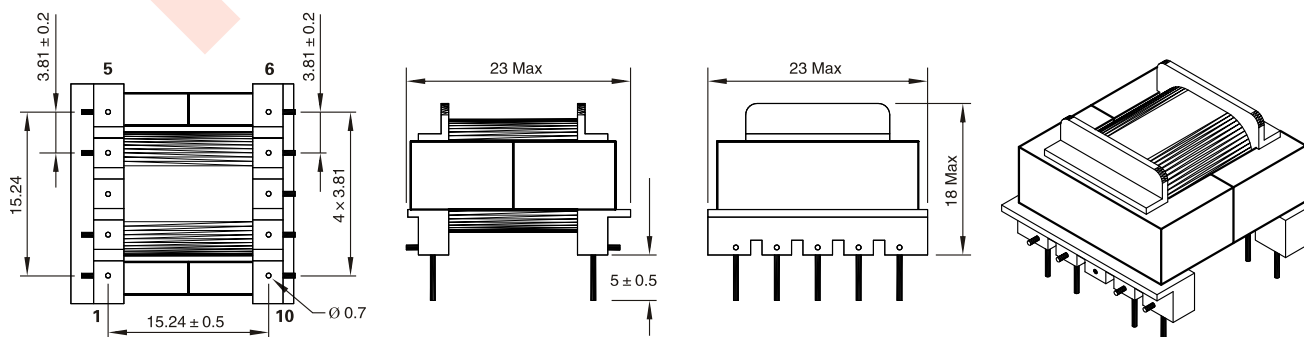
TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials



Note: PIN 3 Removed, PCB Drilling Diameter = 1.2mm

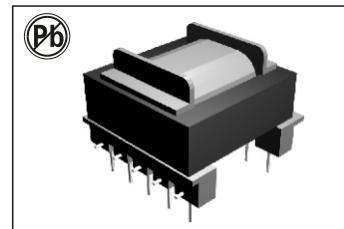
PHYSICAL CHARACTERISTICS



All dimensions in mm

◆ Power ferrite transformers EF20 Series

12-24W EF20 – 3 OUTPUT FLYBACK TRANSFORMERS T 74081 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

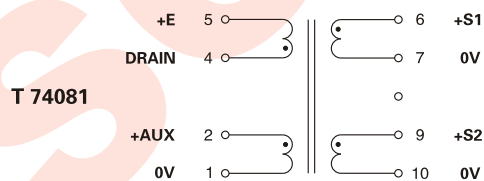
Part No.	Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
T 74081	Power Integrations	TOP243P	185-265 Vrms	20 w	132 kHz
	Power Integrations	TOP243P	85-265 Vrms	12 w	132 kHz

SIZE EF20 3 OUTPUTS : 5 /5v or 12/12v – FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74081	20 w	Pri	4-5	80	75 (VOR)	0.9 Apeak	1100 μ H
		Aux	2-1	17	15 Vdc	0.3 Adc	
		S1	7-8	4	3.3 Vdc	3 Adc	
		S2	6-8	6	5 Vdc	sum S1+S2	
		S3	9-10	14	12 Vdc	1.3 Adc	

Note: Regulation with auxiliary winding

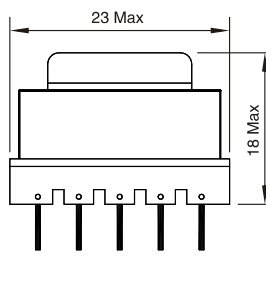
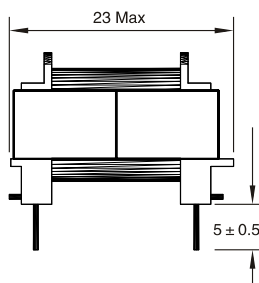
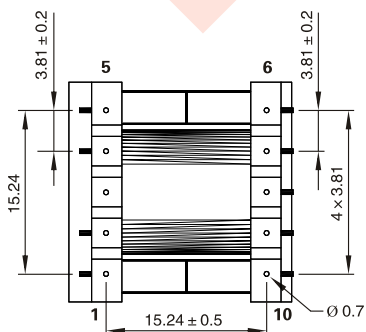
TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials

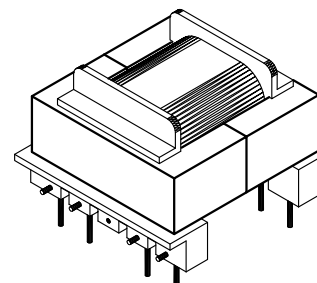


Note: PIN 3 Removed, PCB Drilling Diameter = 1.2mm

PHYSICAL CHARACTERISTICS

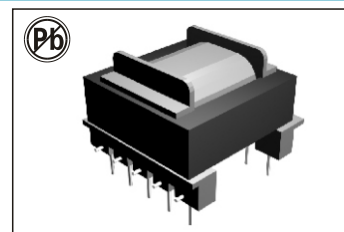


All dimensions in mm



◆ Power ferrite transformers E25 Series

15-30W E25 – 3 or 1 OUTPUT FLYBACK TRANSFORMERS T 74030, 74032 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

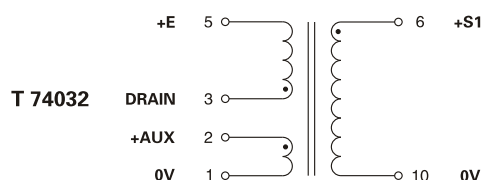
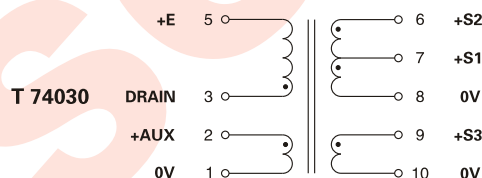
ELECTRICAL CHARACTERISTICS

Part No.	Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
T 74030	Fairchild	KA1H0265R	85-265 Vrms	22 w	100 kHz
	Infineon	TDA16832	185-265 Vrms	30 w	100 kHz
	Motorola	MC33371	85-265 Vrms	22 w	100 kHz
	Motorola	MC33371	185-265 Vrms	30 w	100 kHz
	Power Integrations	TOP244P	185-265 Vrms	30 w	132 kHz
	Power Integrations	TOP244Y	85-265 Vrms	25 w	66 or 132kHz
	ST Microelectronics	VIPer50	85-265 Vrms	22 w	70 kHz
	ST Microelectronics	VIPer50	185- 65 Vrms	30 w	70 kHz
T 74032	Power Integrations	TOP244P	185-265 Vrms	25 w	132 kHz

SIZE E25 – 3 or 1 OUTPUTS : 5 + 12/12v or 24v – FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74030	30 w	Pri	3-5	70	65-130 (VOR)	1.5 Apeak	750 μ H
		Aux	2-1	8	7-14.5 Vdc	1 Adc	
		S1	7-8	4	3.3-7	3 Adc	
		S2	6-8	9	8-16 Vdc	1.5 Adc	
		S3	9-10	9	8-16 Vdc	1.5 Adc	
T 74032	35w	Pri	3-5	72	65-125 (VOR)	1.1 Apeak	1100 μ H
		Aux	2-1	10	8-16 Vdc	1 Adc	
		S1	6-10	18	15-30 Vdc	1.4 Adc	

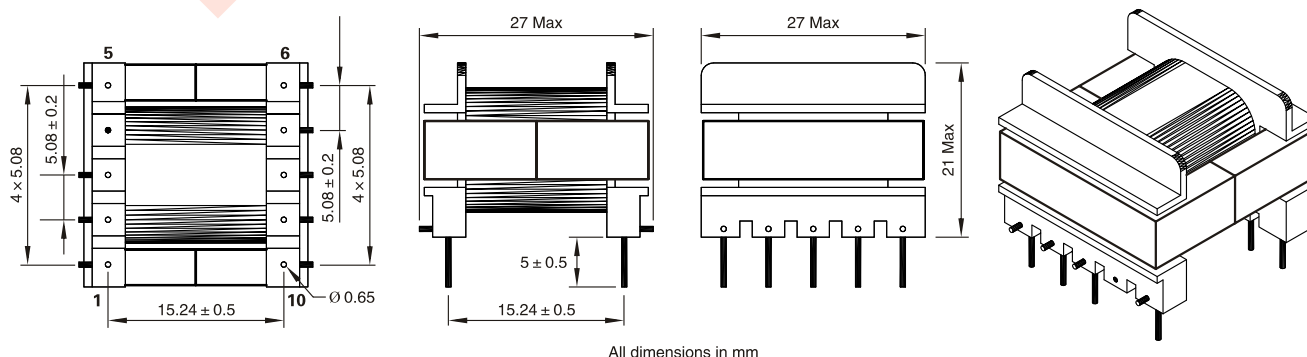
TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials



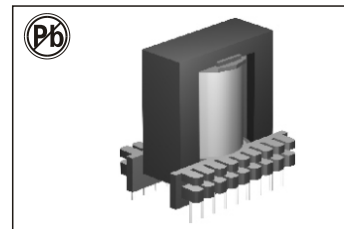
Note: PIN 3 Removed, PCB Drilling Diameter = 1.2mm

PHYSICAL CHARACTERISTICS



◆ Power ferrite transformers ERL28 Series

30-60W ERL28 – 40OUTPUT FLYBACK TRANSFORMERS T 74043 SERIES



FEATURES:

- Primary / Secondary Insulation $\geq 4000V$
- Primary Auxiliary Insulation $\geq 1500V$
- Creepage distances Primary / secondary $\geq 6mm$

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- AC-DC converters
- DC-DC converters
- Switch Power supplies
- SMPS: Flyback, Forward and Push-pull
- SMPS: Half Bridge and Full Bridge

ELECTRICAL CHARACTERISTICS

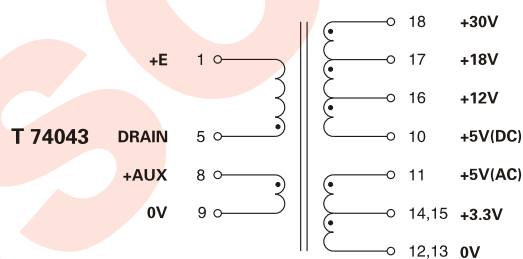
Control IC Manufacturer	Control IC P/N	Input voltage	Power	Frequency
Power Integrations	TOP246Y	185 – 265 Vrms	60 w	66 or 132 kHz
Power Integrations	TOP246Y	85 – 265 Vrms	45 w	66 or 132 kHz

SIZE ETD29 – 4 OUTPUTS : 5 + 12/5 + 12v – FLYBACK TRANSFORMER							
Part Number	Output Power max	Windings					
			Pins	Turns	Voltage	Current max	Inductance (+/-10%)
T 74043	60w	Pri	5-1	45	90 (VOR)	3Apeak	500 μ H
		Aux	8-9	7	15 Vdc	0.5 Adc	
		S1	14+15/12+13	2	3.3 Vdc	7 Adc	
		S2	11/12+13	3	5 Vdc	sum S1+S2	
		S3	16-10	4	12 Vdc	2 Adc	
		S4	17-10	7	18 Vdc	2 Adc	
		S5	18-10	13	30 Vdc	0.5 Adc	

Note: Regulation with auxiliary winding

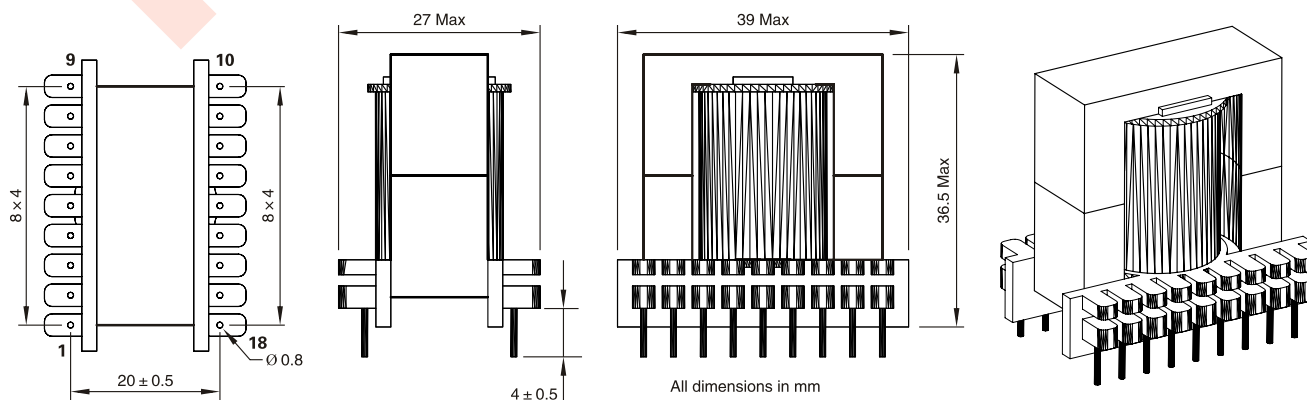
TECHNICAL INFORMATION

- Ambient temperature $< 60^{\circ}C$
- Construction conforms to CEI950, CEI335, CEI61558 for reinforced insulation
- Exclusively uses UL94-VO listed materials

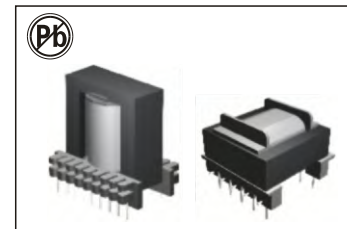


Note: PIN 3 Removed, PCB Drilling Diameter = 1.2mm

PHYSICAL CHARACTERISTICS



Switching transformer TEE, TEI Series



FEATURES:

- Possessing of high permeability
- High saturation flux density
- Low loss, at 100°C the power loss goes bottom

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- Drive transformers
- Main transformers
- Smoothing chokes
- General purpose use

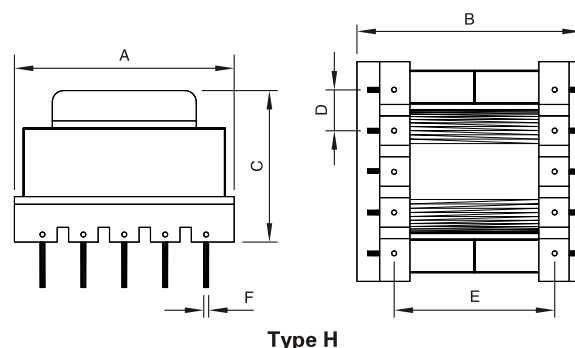
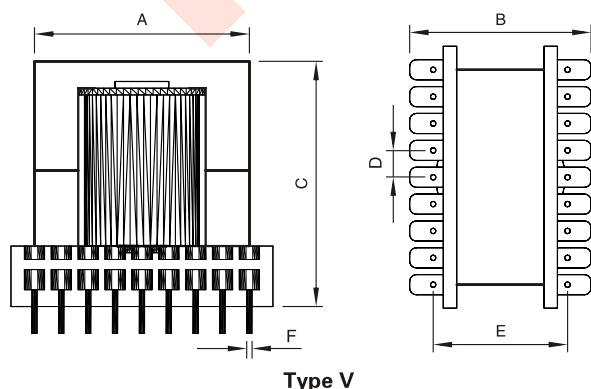
ELECTRICAL CHARACTERISTICS

Part No.	Type	No. of Terminal pins	Dimensions(mm)						Max. output (VA)
			Max	Max	Max	± 0.3	± 0.5	± 0.1	
			A	B	C	D	E	F	
TEI 8.3-A	V	6	8.5	8.5	9.0	2.5	6.0	0.5	3
TEE 8.3-B	H	6	8.5	8.5	7.0	2.5	6.0	0.5	3
TEE 8.3-C	H	4	8.5	9.5	9.0	5.0	6.8	0.5	3
TEI 10-A	V	8	10.5	11.0	11.0	2.5	8.0	0.5	5
TEI 10-B	H	8	11.0	13.0	10.5	2.5	10.5	0.5	5
TEI 10-C	H	4	10.0	9.5	10.0	5.0	6.8	0.5	5
TEI 12.5-A	V	10	13.0	13.0	10.0	2.5	7.5	0.6	8
TEE 12-A	H	4	12.5	11.0	12.5	8.0	9.0	0.6	8
TEE 13-A	V	10	13.5	13.0	12.0	2.5	8.7	0.6	9
TEI 14-A	V	6	14.5	14.5	13.0	3.5	11.0	0.6	15
TEE 16-A	V	6	16.5	13.5	13.0	3.0	9.0	0.6	25
TEE 16-B	H	8	16.5	14.5	15.0	3.0	11.0	0.6	25
TEE 16-C	H	8	16.5	14.5	15.0	3.5	12.0	0.6	25
TEE 16-D	V	10	16.5	13.5	14.5	3.25	10.5	0.6	25
TEE 16-F	H	10	16.5	19.0	14.0	3.2	15.5	0.8	25
TEEL 16-A	V	10	22.0	16.5	30.0	4.0	10.3	0.6	25
TEE 19-A	V	6	20.0	18.0	18.0	4.1	14.0	0.7	35
TEE 19-B	V	6	20.0	16.0	18.0	4.7	11.6	0.6	35
TEE 19-C	H	8	20.0	18.0	16.5	3.8/5	12.5	0.7	35
TEEL 19-A	V	8	20.0	20.5	32.0	3.8/4.8	15.0	0.8	35
TEEL 19-B	H	6	19.5	32.0	13.0	5	24.2	0.8	35
TEEL 19-C	V	10	23.0	16.5	32.0	4	10.0	0.8	35
TEE 20-A	H	8	20.5	19.0	13.0	5	15.0	0.8	35
TEE 22-A	V	10	22.5	16.5	20.0	4	10.2	0.8	45
TEE 22-B	V	8	22.5	17.0	20.0	5	12.4	0.8	45
TEE 22-C	H	9	22.5	24.5	16.5	3.5/5	17.2	0.8	45
TEE 22-A	V	8	25.5	18.0	22.0	5	12.4	0.8	65
TEE 25-B	V	10	26.0	20.5	22.0	5	15.2	0.8	65
TEE25-C	H	10	27.0	24.0	24.0	4.0/5	14.6	0.8	65
TEEL 25-A	H	14	27.5	33.5	21.0	4.0	27.1	0.8	65

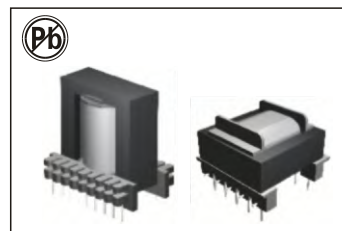
Part No.	Type	No. of Terminal pins	Dimensions(mm)						Max. output (VA)
			Max	Max	Max	± 0.3	± 0.5	± 0.1	
			A	B	C	D	E	F	
TEL 25-B	V	14	27.5	21.0	35.0	4.0	15.0	0.8	65
TEI 28-A	V	12	29.5	25.0	24.0	5.0	17.5	0.8	100
TEI 28-B	V	10	28.5	25.0	35.0	5.0	20.0	0.8	100
TEI 28-C	H	8	28.5	25.0	25.0	5.0	17.5	0.8	100
TEI 30-A	V	10	31.0	22.0	26.0	5.0	17.6	0.8	155
TEI 30-B	V	12	31.0	26.0	26.0	5.0	20.0	0.8	155
TEE 30-A	H	10	30.5	30.0	20.5	5.0	25.0	0.8	155
TEE 30-B	H	12	30.5	30.0	20.5	5.0	25.0	0.8	155
TEI 33-A	V	14	34.0	28.0	30.0	5.0	22.5	0.8	200
TEI 33-B	V	12	34.0	28.0	30.0	5.0	22.5	0.8	200
TEI 33-C	V	16	39.0	29.0	30.0	5.0	22.5	0.8	200
TEE 35-A	H	12	38.0	30.0	26.0	3.8/5.1	22.0	0.8	215
TEE 35-B	V	10	35.5	26.0	28.0	5.0	20.0	0.8	215
TEE 35-C	V	14	35.5	26.0	28.0	5.0	20.0	0.8	215
TEEL 35-A	V	15	36.5	27.5	50.0	5.0	22.5	0.8	215
TEI 35-A	V	12	35.5	28.5	29.0	5/7.5	20.0	1.0	215
TEI 40-A	V	12	40.5	29.0	32.0	5.0	22.5	0.8	345
TEI 40-B	H	12	40.5	37.0	27.0	5.0	28.2	1.0	345
TEI 40-C	V	16	42.0	28.0	35.0	5.0	22.5	0.8	345
TEI 40-D	H	14	40.5	35.0	29.0	5.0	25.8	0.8	345
TEE 42-A	H	16	44.5	42.0	41.5	5.0	34.0	1.0	400
TEE 42-B	H	12	47.0	42.0	39.5	5/7.5	33.0	1.0	400
TEE 42-C	V	18	46.0	32.5	46.0	5.0	27.5	1.0	400
TEE 42-D	V	12	46.0	42.5	37.0	7.4	36.4	1.0	420
TEE 42-E	V	12	43.0	40.5	45.0	5.0	32.5	1.0	420
TEE 42-F	H	17	43.0	47.0	45.0	2.5/5	37.7	1.0	420
TEE 42-G	V	18	46.0	38.0	47.0	5.0	30.0	1.0	420
TEE 50-A	V	18	51.0	40.0	40.0	5.0	30.5	1.0	500
TEE 55-A	H	20	56.0	55.0	50.5	5/7.5	45.2	1.0	814

Note: The output power is only for forward model and the frequency at 100kHz

PHYSICAL CHARACTERISTICS



Switching transformer TEE, TEI Series



FEATURES:

- Possessing of high permeability
- High saturation flux density
- Low loss, at 100°C the power loss goes bottom

OPTIONS:

- Bulk packaging is standard
- Custom design available

COMMON APPLICATIONS:

- Drive transformers
- Main transformers
- Smoothing chokes
- General purpose use

ELECTRICAL CHARACTERISTICS

Part No.	Type	No. of Terminal pins	Dimensions(mm)						Max. output (VA)
			Max	Max	Max	± 0.3	± 0.5	± 0.1	
			A	B	C	D	E	F	
TER 11.5-A	V	8	14	14	12	2.6	9.0	0.6	3
TER 25-A	V	8	27	22	28	5.0	12.5	0.8	87
TER 25-B	V	10	27	22	28	5.0	15.0	0.8	87
TER 28-A	H	20	35	32	25	2.54	28.0	0.5	203
TER 25-B	H	12	31	32	25	5.0	25.0	0.8	203
TER 28-C	V	10	27	25	32	5.0	17.3	0.8	203
TER 28-D	V	12	32	28	32	4.9	22.0	0.6	203
TERL 28-A	V	10	32	25	36	5.0	17.5	0.8	228
TERL 28-B	V	12	32	25	38	5.0	17.5	0.8	228
TERL 28-C	V	12	32	25	36	5.0	20.2	0.8	228
TERL 28-D	V	18	30	25	38	4.0	20.0	0.8	228
TERL 28-E	V	10	30	25	38	5.0	17.5	0.8	228
TERL 28-F	V	14	32	28	38	5.0	20.0	0.8	228
TERL 28-G	H	11	36	38	26	5.0	25.5	0.8	228
TERL 28-H	H	12	32	38	28	5.0	30.4	0.8	228
TER 33-A	V	14	37	31	40	5.0	25.0	1.0	235
TER 33-B	V	14	37	29	40	5.0	22.5	1.0	235
TER 34-A	V	14	36	29	40	5.0	22.3	1.0	240
TER 35-A	V	12	38	30	46	5.0	22.5	1.0	325
TER 35-B	V	14	37	30	44	5.0	22.5	1.0	325
TER 35-C	V	16	41	30	46	5.0	22.55	1.0	325

Part No.	Type	No. of Terminal pins	Dimensions(mm)						Max. output (VA)
			Max	Max	Max	± 0.3	± 0.5	± 0.1	
			A	B	C	D	E	F	
TER 35-D	H	16	41	45	29	5.0	35.0	1.0	325
TER 35-E	H	12	38	45	27	5.3	37.1	1.0	325
TER 35-F	H	12	45	37	30	5.4	37.1	1.0	325
TER 39-A	V	16	44	32	53	5.0	25.0	1.0	370
TER 39-B	V	14	40	32	54	5.0	25.2	1.0	370
TER 39-C	V	18	45	32	53	5.0	25.0	1.0	370
TER 39-D	H	16	43	45	35	5.0	30.6	1.0	370
TER 39-E	H	16	43	47	35	5.0	35.3	1.0	370
TER 40-A	V	16	42	33	51	5.0	25.2	1.0	421
TER 40-B	V	16	42	34	52	5.0	27.5	1.0	421
TER 40-C	V	12	42	33	48	5.0	25.0	1.0	421
TER 40-D	H	16	42	50	37	5.0	35.2	1.0	421
TER 42-A	V	18	47	33	47	5.0	27.4	1.0	433
TER 42-B	V	14	44	32	49	5.0	24.8	1.0	433
TER 42-C	V	18	47	39	52	5.0	30.2	1.0	509
TER 42-D	H	14	45	45	36	5.0	34.8	1.0	509
TER 49-A	V	22	55	37	62	5.0	27.5	1.0	680
TER 49-B	V	18	52	38	57	5.0	27.5	1.0	680
TER 49-C	V	20	55	41	60	5.0	32.5	1.0	680
TER 53-A	V	18	55	41	55	5.0	32.5	1.0	800
TER 54-B	V	18	60	42	60	5.0	32.0	1.0	850

Note: The output power is only for forward model and the frequency at 100kHz

PHYSICAL CHARACTERISTICS

