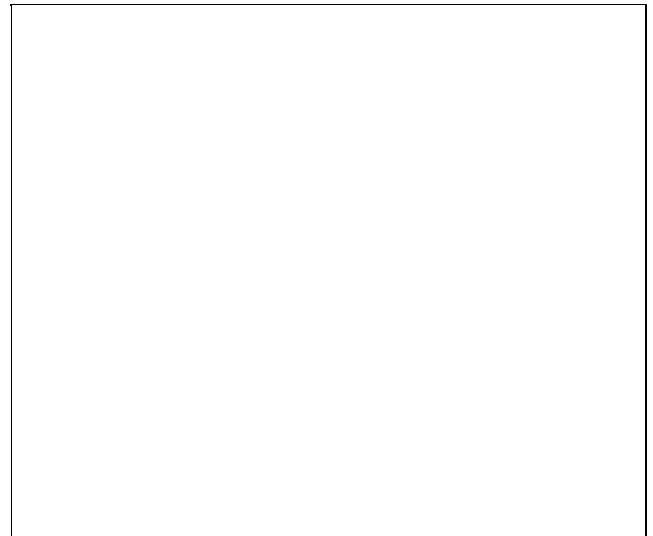


features

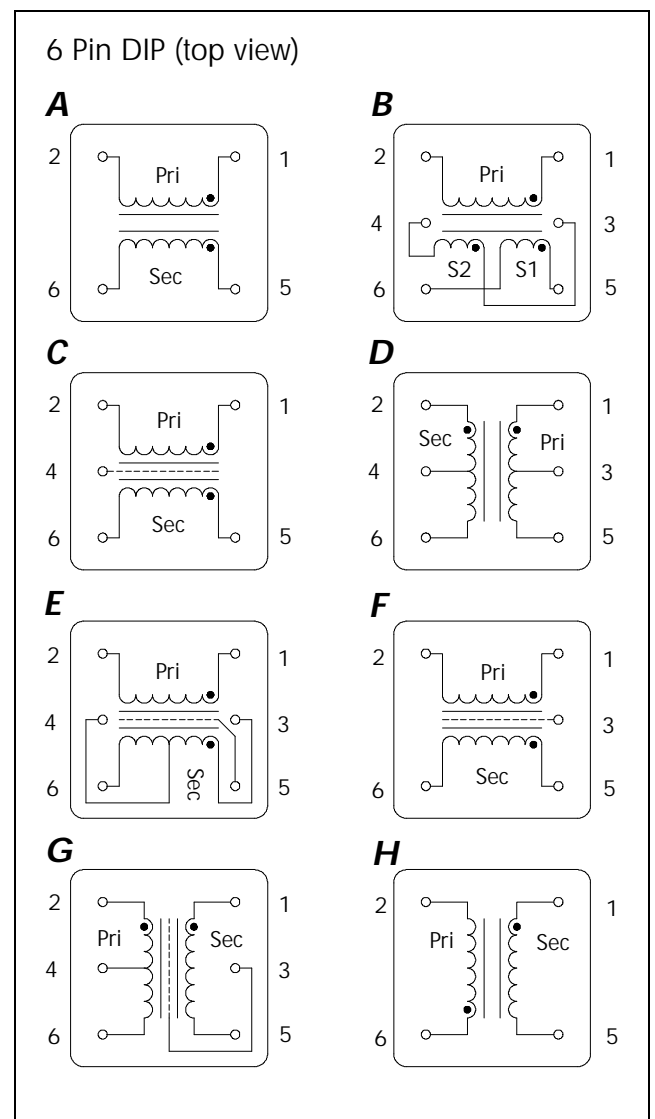
- 500Vrms Working
- UL 94V-0 Package Material
- Isolation to 4kVrms
- Screened Versions
- Inductance to 98mH
- Up to 1100 $V\mu S E_T$
- Compact Footprint
- PCB Mounting
- Custom Parts Available

description

The 1000 series are intended for wideband and pulse operations. They are also suitable for signal isolation and small isolated power supplies. The compact footprint makes them ideal for applications where space is at a premium.



pin connections



1000 SERIES

Pulse Transformers

absolute maximum ratings over operating free air temperature range

Operating free air temperature range 0°C to 70°C

Storage temperature range -60°C to 125°C

Lead Temperature 1.5mm from case for 10 seconds 300°C

electrical specifications over operating free air temperature range

Parameter	Part Number						Units
	1001	1002	1003	1004	1006S	1007	
Turns Ratio $\pm 2\%$	1:1	1:1:1	2:1:1	1:1	1:1 + Screen	1:1:1	
Primary Inductance (min.)	3.0	3.0	12	98	3.0	7.4	mH
Primary E_T Constant (min.)	200	200	400	1100	200	310	V μ s
Leakage Inductance (max.)	22	9	35	3	32	20	μ H
Interwinding Capacitance (max.)	23	28	30	70	15	55	pF
DC Resistance (max.) Primary Winding	1.2	1.4	4.0	28	1.3	2.9	Ω
DC Resistance (max.) Secondary 1 Winding	1.0	1.3	1.8	28	1.0	2.5	
DC Resistance (max.) Secondary 2 Winding	—	1.7	2.4	—	—	3.4	
Isolation Voltage	2000	2000	2000	500VDC	2000	2000	Vrms
Pin Connection Style	A	B	B	A	C	B	
Package Style	2	1		2	4	1	

Note : All data taken at $T_A = 25^\circ\text{C}$.

electrical specifications over operating free air temperature range

Parameter	Part Number						Units
	1008	1009	1011	1012S	1013	1015	
Turns Ratio $\pm 2\%$	1:1:1	1:1:1	1CT:1CT	1:1CT + Screen	1:1:1	4:4:1	
Primary Inductance (min.)	3.0	22	3.0	12	3.0	20	mH
Primary E _T Constant (min.)	200	550	200	400	200	500	V μ s
Leakage Inductance (max.)	9.0	85	22	100	2.5	100	μ H
Interwinding Capacitance (max.)	28	18	23	11	280	30	pF
DC Resistance (max.) Primary Winding	1.4	10.6	1.0	3.8	1.3	2.0	Ω
DC Resistance (max.) Secondary 1 Winding	1.3	8.9	1.2	5.3	1.3	10	
DC Resistance (max.) Secondary 2 Winding	1.7	12.2	—	—	1.3	0.6	
Isolation Voltage	3500	2000	2000	2000	500VDC	2500	Vrms
Pin Connection Style	B	B	D	E	B	B	
Package Style	1						

Note : All data taken at T_A = 25°C.

1000 SERIES

Pulse Transformers

electrical specifications over operating free air temperature range

Parameter	Part Number						Units
	1016	1017	1019	1020S	1021S	1024	
Turns Ratio $\pm 2\%$	1:1	1:1	1: $\sqrt{2}$: $\sqrt{2}$	1:2 + Screen	1:2CT + Screen	1.2CT:1CT	
Primary Inductance (min.)	3.0	0.8	0.95	1.5	1.5	8.8	mH
Primary E _T Constant (min.)	200	130	110	140	140	340	V μ s
Leakage Inductance (max.)	22	4.0	8.0	15	12	60	μ H
Interwinding Capacitance (max.)	23	20	22	15	12	25	pF
DC Resistance (max.) Primary Winding	1.2	0.4	0.6	1.2	1.0	2.5	Ω
DC Resistance (max.) Secondary 1 Winding	1.0	0.3	1.0	2.6	2.4	2.5	
DC Resistance (max.) Secondary 2 Winding	—	—	1.0	—	—	—	
Isolation Voltage	3500	4000	2000	2000	750	2000	V _{rms}
Pin Connection Style	A	A	B	F	G	D	
Package Style	2		1	3	1		

Note : All data taken at T_A = 25°C.

electrical specifications over operating free air temperature range

Parameter	Part Number						Units
	1025	1026	1028	1029	1080	1082	
Turns Ratio $\pm 2\%$	2:1:1	1:1:1	2:1:1	1:1	13:1	100:1	
Primary Inductance (min.)	24	6.0	12	95 μ H	29	6.1	mH
Primary E_T Constant (min.)	570	285	400		1000	280	V μ s
Leakage Inductance (max.)	70	30	35	1.5	7.0	—	μ H
Interwinding Capacitance (max.)	20	30	30	400	30	6.0	pF
DC Resistance (max.) Primary Winding	7.5	4.0	4.0	1.0	11.6	0.7	Ω
DC Resistance (max.) Secondary 1 Winding	3.5	4.0	1.8	1.0	1.3	0.1	
DC Resistance (max.) Secondary 2 Winding	4.5	4.0	2.4	—	—	—	
Isolation Voltage	2000	2000	3500	2000	2000	2000	Vrms
Pin Connection Style	B	B	B	A	H	A	
Package Style	1			2			

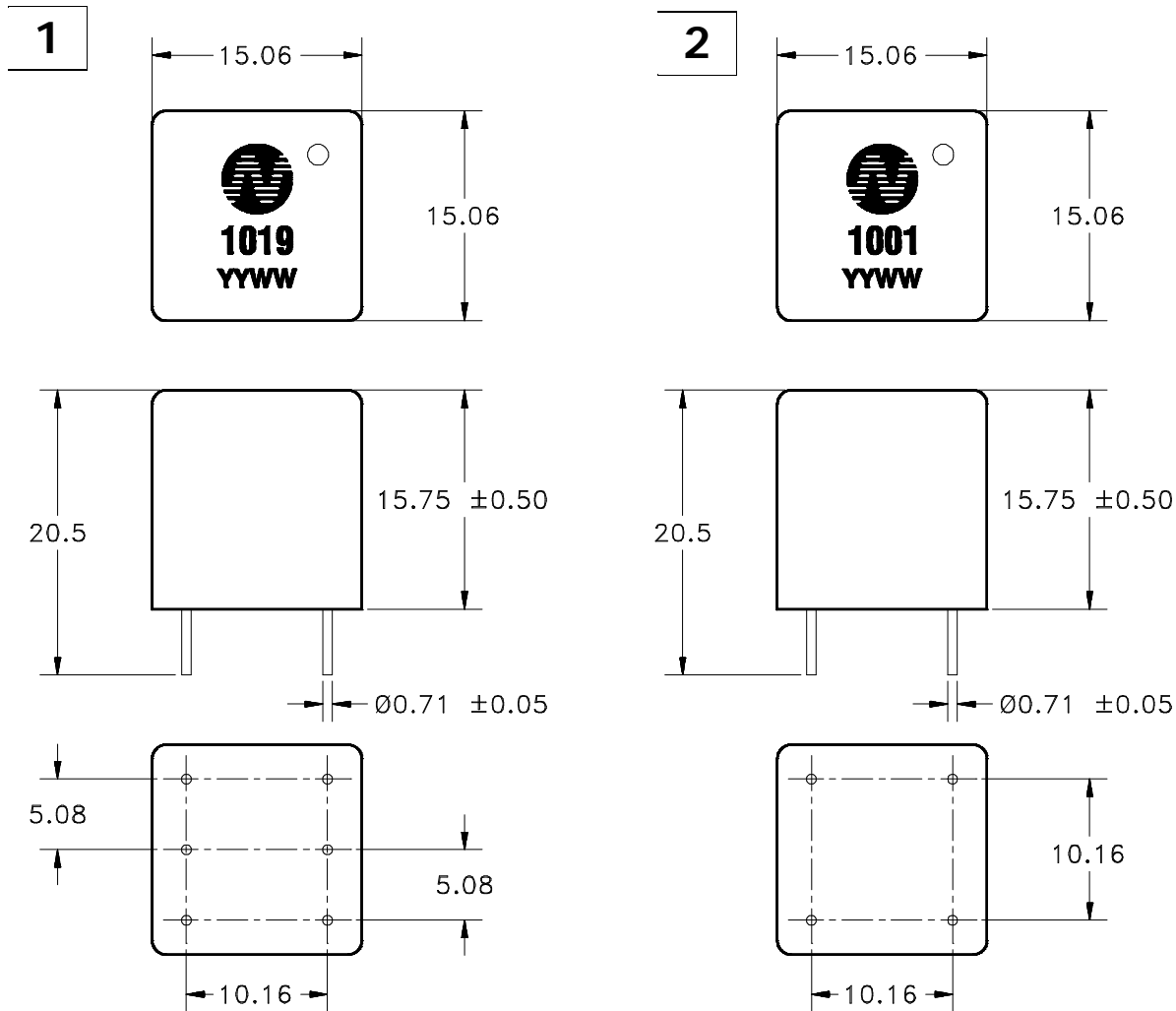
Note : All data taken at $T_A = 25^\circ\text{C}$.

1000 SERIES

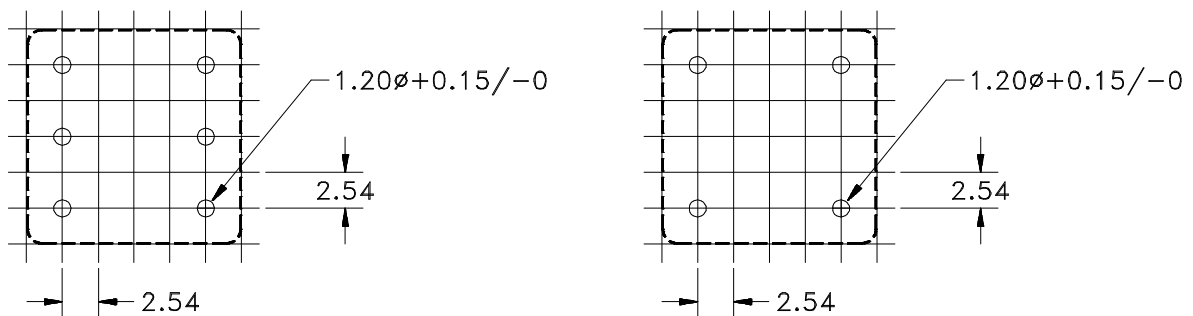
Pulse Transformers

outline dimensions

6 Pin DIP package styles



recommended footprint details



Dot denotes pin 1

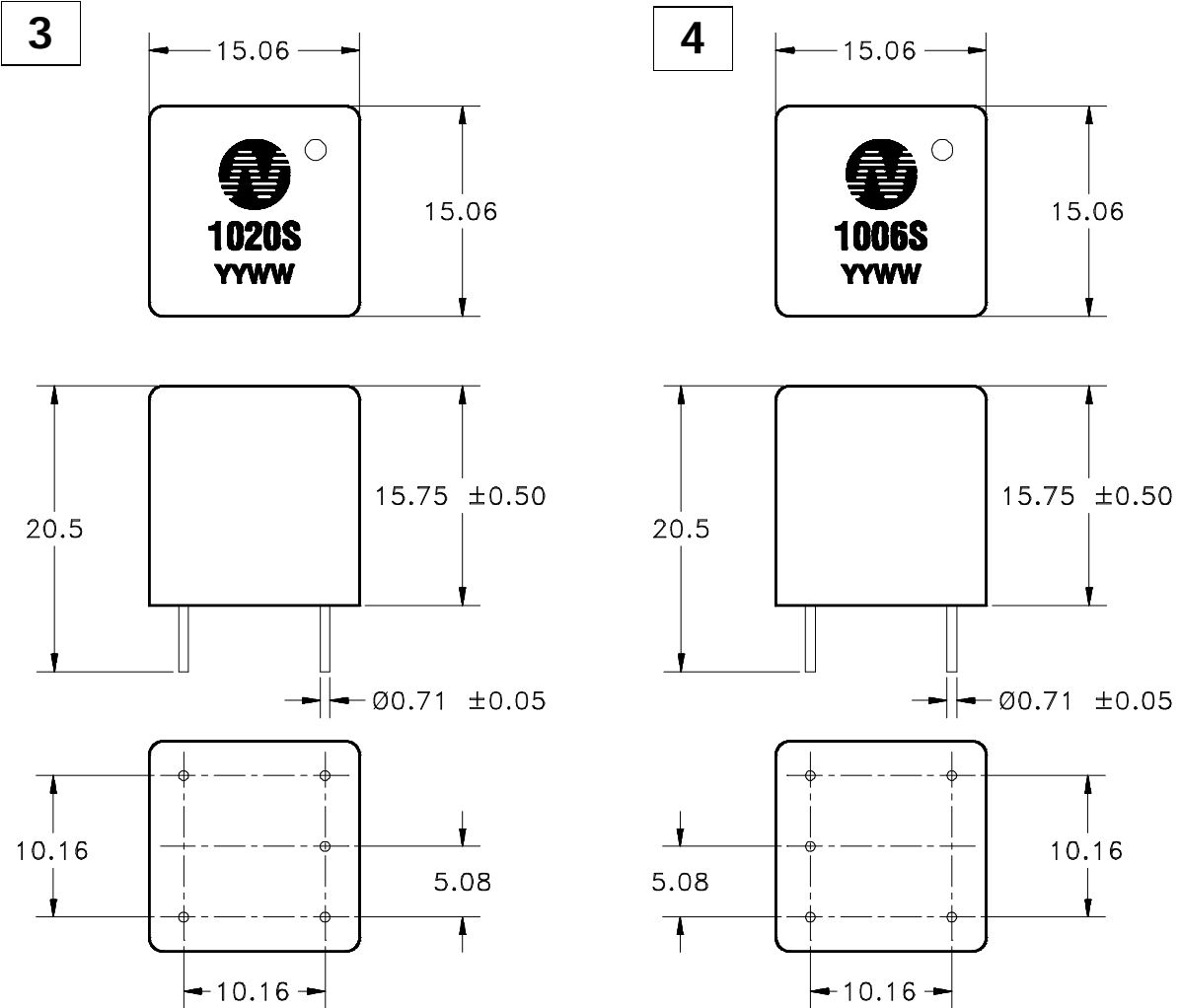
All pins on a 2.54mm pitch.

All dimensions in mm XX.X ± 0.50, XX.XX ± 0.25

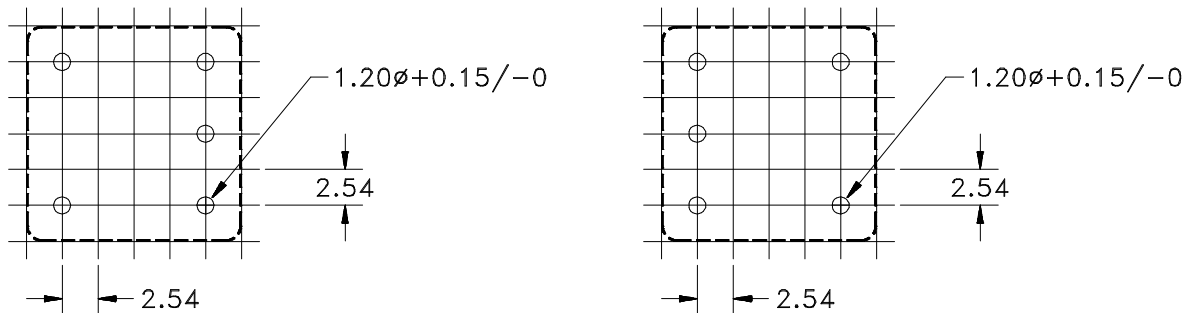


outline dimensions

6 Pin DIP package styles



recommended footprint details



Dot denotes pin 1

All pins on a 2.54mm pitch.

All dimensions in mm XX.X ±0.50, XX.XX ±0.25

This page intentionally left blank.