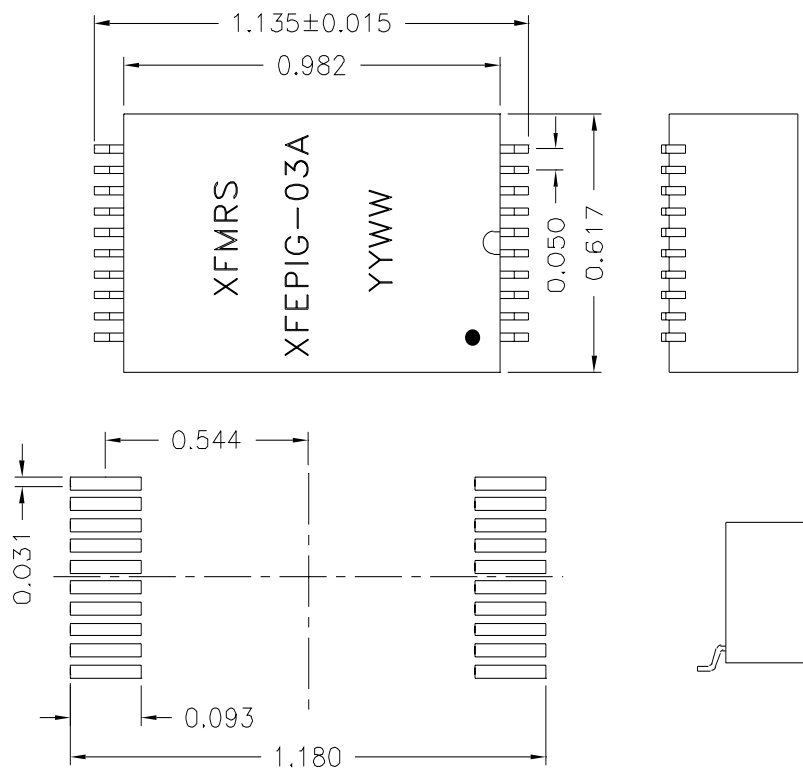


# Home Phone Networking Magnetics Module

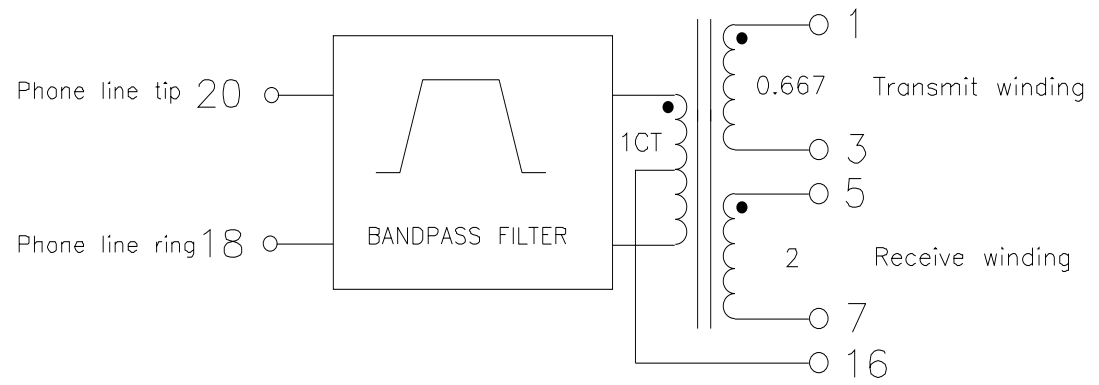
- Designed for use with Broadcom BCM4210 HomeLAN chip
- UL1950 Approval Pending
- Surface Mount package for Pick and Place & IR/VP processes
- Temperature Range  $-40$  to  $+85^{\circ}\text{C}$
- 1500Vac Isolation

## 1. Dimensions:



RECOMMENDED PCB LAYOUT

## 2. Schematic:



DOC. REV. A/1

XFMRS Inc	Title: HOME LAN FILTER		
	UNLESS OTHERWISE SPECIFIED TOLERANCES: .xxx ±0.010 Dimensions in Inch		SCALE 1.5:1 SHT 1 OF 2
P/N: XFEPIG-03A	REV. A		
DWN.	李清儿	Apr-12-00	
CHK.	孙小松	Apr-12-00	
APP.	Joe Huff	Apr-12-00	

### 3. Electrical Specifications: @25°C

Passband (Typical): @3.5–11.5MHz

Passband (Max/Min): @4.25–9.75MHz

Turns Ratio: 20–18:1–3 1:0.667

Turns Ratio: 20–18:5–7 1:2

Insertion Loss: 1.0dB Min; 1.5dB Typ; 2.2dB Max

Return Loss: 12dB Min 6–9MHz match to 100 ohm line Z

Attenuation @1.1MHz 60dB Min

@22MHz 35dB Min

@54MHz 50dB Min

CMRR (common mode to diff.): 40dB Min 0.2 to 22MHz

line withstand voltage: FCC part 68 metallic and

Longitudinal Voltage Surge external

Teccor P3100SC Sidactor across tip and ring

Input Impedance: 44.2 ohm between pin1 and 3  
per the adjacent table across  
the bandwidth.

Frequency Range (KHz)	Min Impedance (Ohms)
0<f<=0.285	1M
0.285<f<=2.85	100K
2.85<f<=28.5	10K
28.5<f<=95	4.0K
95<f<=190	2.0K
190<f<=285	1.4K
285<f<=380	1.0K
380<f<=475	850
475<f<=570	700
570<f<=665	600
665<f<=760	525
760<f<=855	450
855<f<=950	400
950<f<=1000	350
1000<f<=1400	175
1400<f<=2300	100
2300<f<=2850	50
2850<f<=3085	25
3085<f<=3725	10
3725<f<=3935	25
3935<f<=4000	50
10000<f<=10450	40
10450<f<=10925	25
10925<f<=13125	10
13125<f<=14175	25
14175<f<=16800	50
16800<f<=21000	100
21000<f<=30000	50

<b>XFMRs Inc</b>  UNLESS OTHERWISE SPECIFIED TOLERANCES: .xxx ±0.010 Dimensions in Inch	Title: HOME LAN FILTER		
	P/N: XFEPIG-03A		REV. A
	DWN.	李清儿	Apr-12-00
	CHK.	孙悦	Apr-12-00
SCALE 1.5:1 SHT 2 OF 2	APP.	Joe Huff	Apr-12-00

DOC. REV. A/1