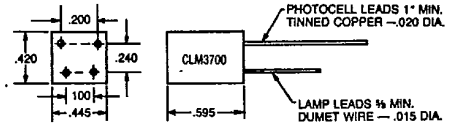
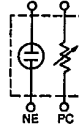


CLM3700

Neon Photoconductor Isolators



CLM3700 — Features a low voltage neon lamp with high input impedance ideal for telecommunications, ring signal detection (telephone lines) can also be operated at low current drives with minimum photo-cell resistance modulation.



TECHNICAL DATA

NEON LAMP	CHARACTERISTICS	TEST CONDITIONS	CLM 3700			UNITS
			Min.	Typ.	Max.	
I_L	Design Current			0.3		mA DC
V_i	Initial breakdown			60-80		volts DC
V_m	Initial Maintaining			52-62		volts DC
PHOTOCELL V_{MAX}	Cell voltage				250	volts DC or PAC
P	Power dissipation	25°C			100	milliwatts
PHOTOMOD R_{ON} (1)(2)	On resistance	I_L (lamp current) 0.3mA			.1000	ohms
R_{OFF}	Off resistance	10 sec. after $I_F \rightarrow 0$ 4 VDC on cell	1 Meg.			ohms
t_R	Rise time	time to 63% of final condition at $I_F = 0.3mA$		100		milliseconds
t_D	Decay time	Time to 100K		500		milliseconds
V_{BD}	Isolation		1600			volts DC or PAC
dRc/dt	Cell temperature coefficient	$I_F > 0.3mA$		0.6		%/°C

Absolute Maximum Ratings:

Temperature Storage — 40°C to 75°C

Operating — Derate power to 0 at 75°C

NOTES:

- (1) Measured after > 24 hrs. OFF + 1min. ON
- (2) External series resistor required.

