

## Plasma Panel Display Modules

### 80 Character Display with Drive Electronics Controller and Serial Interface



The APD-080M025-1 plasma display module consists of a multiplexed DC plasma display, drive circuitry and switching voltage converter mated with an intelligent, microprocessor-based controller board. The resulting assembly interfaces easily to microprocessor based systems and only requires readily available low voltages for power. Vishay Dale's patented open construction display technology assures a stable flicker free screen even at highest communication rates.

Interfacing is very simple (and requires no handshaking as a 20 byte FIFO buffer captures data when the display is busy) through a single 3 pin connector that has + 5 VDC, SERIAL (RS-232) DATA and GROUND connections.

An EPROM based character generator is factory programmed with 96 ASCII characters. Alternate character sets can be user or factory programmed.

Serial data protocol is 1 start bit, 8 data bits and no stop bit. Baud rate (300, 1200 or 9600) is selected with a control board jumper. A simplified command set allows quick and efficient code generation.

#### OPTICAL SPECIFICATIONS

**Viewing Area:** 4.03" [102.36mm] W x 1.46" [37.08mm] H.

**Number of Characters:** 80.

**Character Size:** 0.150" [3.81mm] W x 0.250" [6.35mm] H.

**Luminance:** 80 foot lamberts.

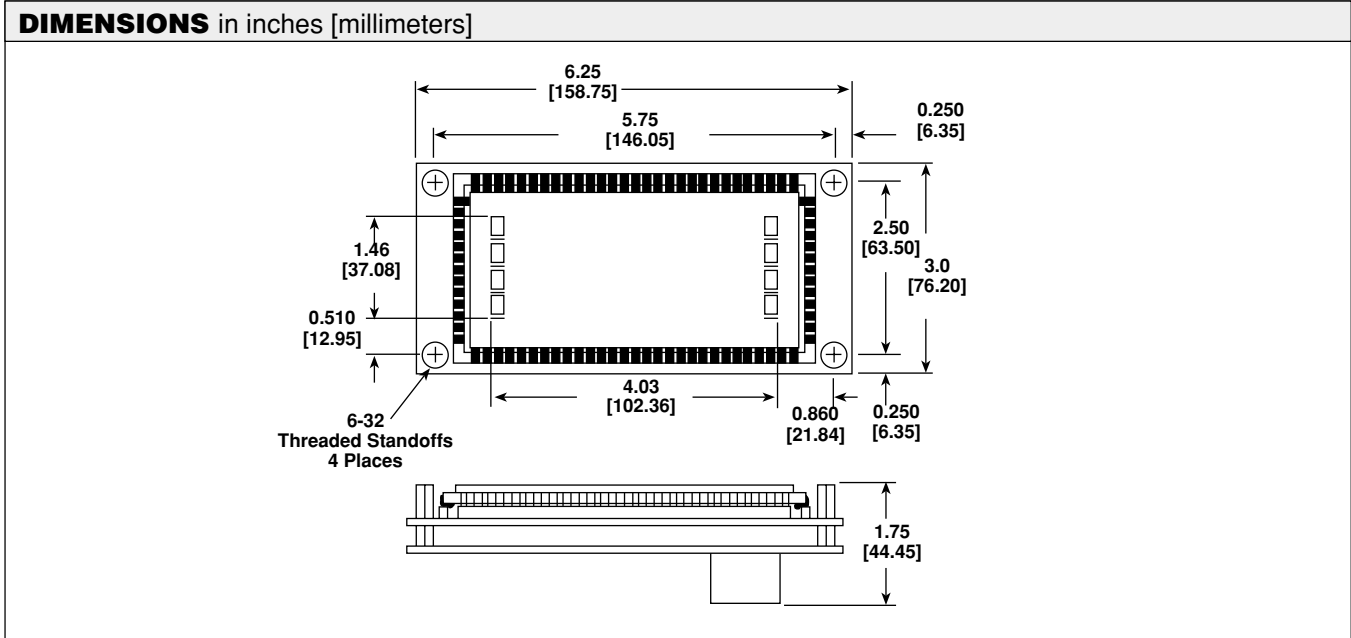
**Viewing Angle:** 150° cone.

#### FEATURES

- 80 (4 x 20) alphanumeric characters (5 x 7 dot matrix) plus underbar
- Only + 5 VDC required
- ASCII character set (optional character sets available)
- Efficient serial interface (RS-232)
- Wide viewing angle (150°)
- High brightness
- Rugged design/slim profile
- Flicker free refresh, high speed data input

STANDARD ELECTRICAL SPECIFICATIONS				
	MIN.	TYP.	MAX.	UNITS
Panel Supply Voltage	+ 4.75	+ 5.0	+ 5.25	V
Panel Supply Current	—	0.3	1.0	A

ASCII CHARACTER SET						
	32	48	64	80	96	112
0	SP	0	@	P	'	p
1	!	1	A	Q	a	q
2	"	2	B	R	b	r
3	#	3	C	S	c	s
4	\$	4	D	T	d	t
5	%	5	E	U	e	u
6	&	6	F	V	f	v
7	'	7	G	W	g	w
8	(	8	H	X	h	x
9	)	9	I	Y	i	y
10	*	:	J	Z	j	z
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<b>ORDERING INFORMATION</b>	
<b>DESCRIPTION</b>	<b>PART NUMBER</b>
Display, Drive Electronics and Controller .....	APD-080M025-1
Mating Connector Kit .....	280108-01
Non-Glare Filter (amber circular polarized) - other filters available - contact factory .....	280109-10



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