

MICROSTRIP/STRIPLINE PIN DIODE SWITCH

DESCRIPTION:

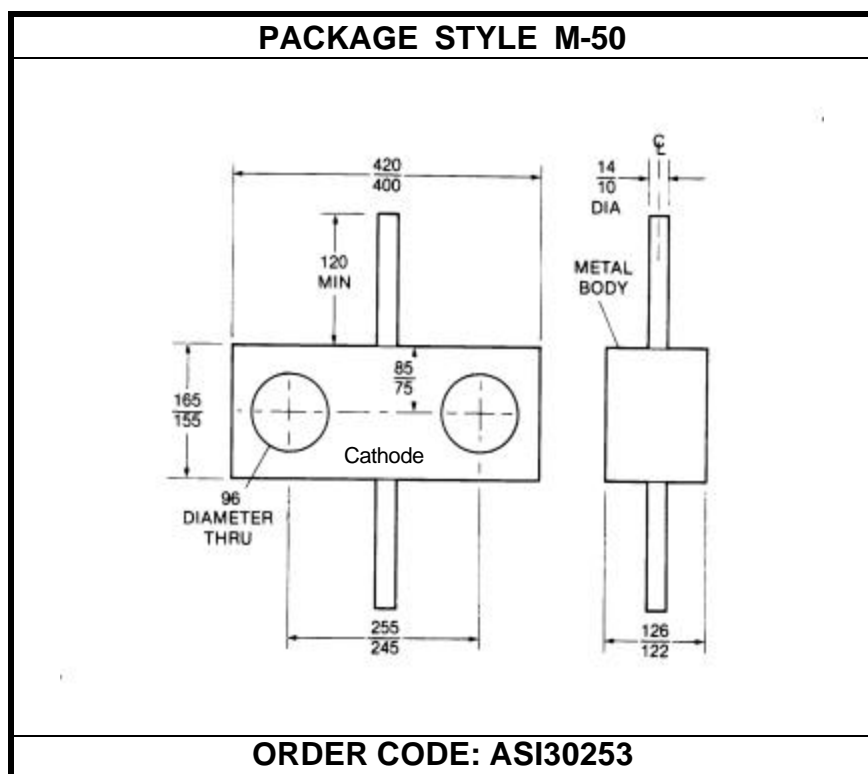
The **5082-3041** is a Silicon PIN Diode Module Designed for Reflective Attenuator and Switching Applications from 1 GHz to 18 GHz.

FEATURES INCLUDE:

- Direct Replacement for **HP 5082-3041**
- Isolation = 20 dB min. at 8 GHz
- Hermetic Package

MAXIMUM RATINGS

I_F	250 mA
V_R	70 V
P_{DISS}	1 W @ $T_C = 25^\circ\text{C}$
T_J	-65°C to $+125^\circ\text{C}$
T_{STG}	-65°C to $+125^\circ\text{C}$
q_{JC}	100°C/W



CHARACTERISTICS $T_C = 25^\circ\text{C}$

SYMBOL	TEST CONDITIONS			MINIMUM	TYPICAL	MAXIMUM	UNITS
V_{BR}	$I_R = 10 \mu\text{A}$			70			V
V_F	$I_F = 100 \text{ mA}$					1.0	V
t	$I_F = 10 \text{ mA}$	$I_R = 6 \text{ mA}$			35		mS
I_L	$I_F = 0 \text{ mA}$	$P_{IN} = 0 \text{ dBm}$	$F = 8 \text{ GHz}$			1.0	dB
I_L	$I_F = 20 \text{ mA}$	$P_{IN} = 0 \text{ dBm}$	$F = 8 \text{ GHz}$	20			dB
V_{SWR}	$I_F = 0 \text{ mA}$	$P_{IN} = 0 \text{ dBm}$	$F = 8 \text{ GHz}$			1.5:1	---

NOTE: The **ASI 5082-3041** was designed to be a single piece hermetic replacement for the **HP 5082-3041** diode. It features an internal low pass filter structure with a corner frequency of 20 GHz which yields insertion loss and isolation performance equivalent to the original HP device while maintaining mechanical compatible in most applications.