



# RECTANGULAR WAVEGUIDE TRANSITIONS 30 SERIES

**DATA  
SHEET  
No. T37C**

- **LOWEST VSWR**
- **SHORT LENGTH**

## DESCRIPTION

MEC precision fabricated 30 Series Transitions have been designed to connect different size waveguide components in a minimum of space while maintaining a VSWR of 1.04 or less in those cases where the frequency bands overlap. Standard units are furnished in aluminum with cover or contact flanges. Finish is chromate conversion per MIL-C5541, Class 3, painted with gray epoxy enamel on external non-mating surfaces.



## ORDERING INFORMATION

FREQUENCY BAND	FREQUENCY RANGE (GHz)	WAVEGUIDE SIZE	EQUIVALENT FLANGE
L	1.12 - 1.70	WR-650	UG-4188/U
LM	1.45 - 2.20	WR-510	UG-1717/U
LA	1.70 - 2.60	WR-430	UG-4378/U
LS	2.20 - 3.30	WR-340	UG-554A/U
S	2.60 - 3.95	WR-284	UG-584/U
B	3.30 - 4.90	WR-229	CMR-229
G	3.95 - 5.85	WR-187	UG-407/U
D	4.90 - 7.05	WR-159	CMR-159
J	5.85 - 8.20	WR-137	UG-441 /U

FREQUENCY BAND	FREQUENCY RANGE (GH:)	WAVEGUIDE SIZE	EQUIVALENT FLANGE
H	7.05-10.0	WR-112	UG-138/U
W	7.0-11.0	WR-102	UG-1493/U*
X	8.2 - 12.4	WR-90	UG-135/U
M	10.0-15.0	WR-75	WR-75
P	12.4-18.0	WR-62	UG-1665/U
N	15.0-22.0	WR-51	WR-51
K	18.0 - 26.5	WR-42	UG-597/U
Y	22.0 - 33.0	WR-34	UG-1530/U*
A	26.5 - 40.0	WR-28	UG-599/U*

\*Aluminum

1) To formulate model number, select desired lower frequency band from above table and add as prefix to series No. "30". Then select higher frequency band and add as suffix to designate the two waveguide sizes to be interconnected by the transition. Also specify actual frequency range and VSWR desired.

EXAMPLES: X30-M specifies a WR-90 to WR-75 transition.

W30-P specifies a WR-102 to WR-62 transition.

2) Special sizes, configurations, and combinations are available on request, as well as other flanges (e.g. UG choke, CPR, CMR).

3) Custom designed step transitions available on special request.

4) Transitions to circular waveguide also available.

