

Innovative Communication Solutions

2208HUDF

2000 Quad-Band Ku-Band PLL LNB

(0.8 dB)

Frequency: D: 10.95 - 11.70 GHz | 11.70 - 12.25 GHz | 12.25 - 12.75 GHz | 10.70 - 11.70 GHz L.O. Stability: +/- 25 kHz Output Connector: F: 75 Ohm





KEY SPECIFICATIONS

Band	Ku-Band
Input Frequency Band 1	10.95 - 11.70 GHz
Input Frequency Band 2	11.70 - 12.25 GHz
Input Frequency Band 3	12.25 - 12.75 GHz
nput Frequency Band 4	10.70 - 11.70 GHz
LO Frequency 1	10.00 GHz
LO Frequency 2	10.75 GHz
LO Frequency 3	11.30 GHz
LO Frequency 4	9.75 GHz
_O Stability	±25 kHz
LO Туре	PLL
Noise Figure Max	0.9 dB
Noise Figure Typ	0.8 dB
Number Of Onboard Los	Quad-Band
Output Frequency Band 1	950 - 1700 MHz
Output Frequency Band 2	950 - 1500 MHz
Output Frequency Band 3	950 - 1450 MHz
Output Frequency Band 4	950 - 1950 MHz
Tone Frequency	22 kHz ± 4 kHz

KF SPECIFICATIONS

Control Signal 1	13V / No Tone
Control Signal 2	13V / 22kHz Tone





International Inc.

/ No Tone / 22kHz Tone IB IB IB IB IB IB IB IB IB IB
IB IB IB IB IB IB IB IB IB IB
IB IB dB p-p : 1 max. dBm min. : 1 max. dBc/Hz mA max to +24V DC
IB dB p-p : 1 max. dBm min. : 1 max. dBc/Hz mA max to +24V DC
dB p-p : 1 max. dBm min. : 1 max. dBc/Hz mA max to +24V DC
: 1 max. dBm min. : 1 max. dBc/Hz mA max to +24V DC
dBm min. : 1 max. dBc/Hz mA max to +24V DC
: 1 max. dBc/Hz mA max to +24V DC
dBc/Hz mA max to +24V DC
mA max to +24V DC
to +24V DC
to +24V DC
onnector
75 waveguide grooved
95%
6
C to +70°C
to +80°C
) in
) in
55 kg
2 in
ECCN Number Unit Package
anada EAR99 135 x 68 x 48 mm 0.335 kg
ò ;;

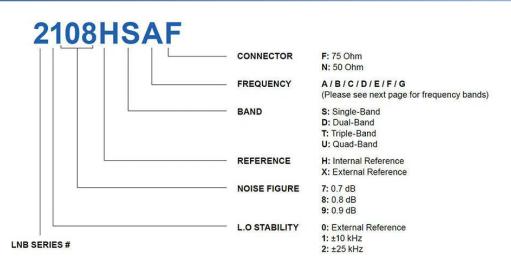
HOW TO ORDER



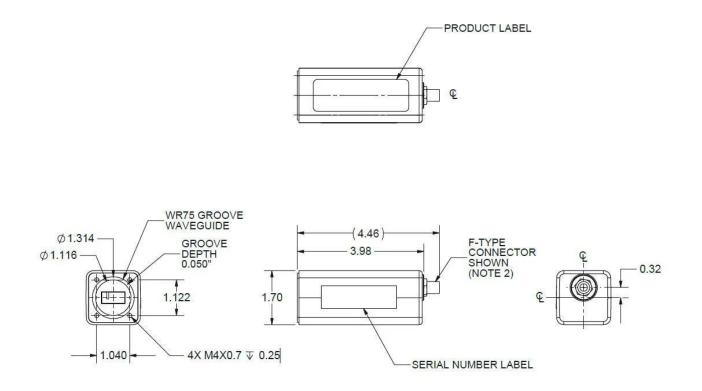
Norsat International Inc.



Innovative Communication Solutions



MECHANICAL DIAGRAMS







Norsat International Inc.

Innovative Communication Solutions

FREQUENCY BANDS

Band A B C D	1	freq (GHz) 1.7 - 12.20	L.O freq (GHz)	-			Dual Band						
BC		17-1220		Output freq		Band	RF freq (GHz)		L.O freq (GHz)	Output freq	Voltage/Tone		
С	12		10.75		- 1450 MHz	-	Band 1	10.95 - 11.70	10	950 - 1700 MHz	13 V		
	10	.25 - 12.75	11.3 10		- 1450 MHz - 1700 MHz	A							
		0.70-11.80	9.75	950 - 2050 MHz			Band 2	11.70 - 12.75	10.75	950 - 2000 MHz	18 V		
			Triple Band	· ·			Band 1	10.70 - 11.70	9.75	950 - 1950 MHz	13 V		
Band	RF	freq (GHz)	L.O freq (GHz)	Output freq	Voltage/Tone	в	Dana 1	10.10 11.10	0.10	000 1000 1112			
Ba	Band 1	10.95 - 11.70	10	950 - 1700 MHz	13 V		Band 2	11.70 - 12.75	10.75	950 - 2000 MHz	18 V		
A	Band 2	11.70 - 12.20	10.75	950 - 1450 MHz	13 V / 22 kHz	- c	Band 1	10.95 - 11.70	10	950 - 1700 MHz	13 V		
	Band 3	12.20 - 12.75	11.25	950 - 1500 MHz	18 V		Band 2	12.25 - 12.75	11.3	950 - 1450 MHz	18 V		
Band 1 B Band 2 Band 3	Band 1	10.95 - 11.70	10	950 - 1700 MHz	13 V	D	Band 1	10.70 - 11.70	9.75	950 - 1950 MHz	13 V		
	Band 2	11.70 - 12.25	10.75	950 - 1500 MHz	13 V / 22 kHz								
	Band 3	12.25 - 12.75	11.3	950 - 1450 MHz	18 V		Band 2	11.70 - 12.75	10.6	1100 - 2150 MHz	18 V		
						-			Quad Band				
-	Band 1	10.70 - 11.70	9.75	950 - 1950 MHz	13 V	Band	RF	freq (GHz)	L.O freq (GHz)	Output freq	Voltage/Tone		
	Band 2	11.70 - 12.20	10.75	950 - 1450 MHz	13 V / 22 kHz	A	Band 1	10.70 - 11.20	9.75	950 - 1450 MHz	13 V		
	Band 3	12.20 - 12.75	11.25	950 - 1500 MHz	18 V		Band 2	11.20 - 11.70	10.25	950 - 1450 MHz	13 V / 22 kHz		
D Band 2	Band 1	10.70 - 11.70	9.75	950 - 1950 MHz	13 V		Band 3	11.70 - 12.25	10.75	950 - 1500 MHz	18 V		
	Band 2	11.70 - 12.25	10.75	950-1500 MHz	13 V / 22 kHz		Band 4	12.25 - 12.75	11.3	950 - 1450 MHz	18 V / 22kHz		
	Daniel 2	42.25 42.75	44.2	050 4450 141-	18 V	В	Band 1	10.70 - 10.95	9.75	950 - 1200 MHz	13 V		
		12.25 - 12.75	11.3	950-1450 MHz			Band 2	10.95 - 11.70	10	950 - 1700 MHz	13 V / 22 kHz		
	Band 1	10.95 - 11.70	10	950 - 1700 MHz	13 V		Band 3	11.70 - 12.25	10.75	950 - 1500 MHz	18 V		
	Band 2	11.55 - 12.25	10.6	950 - 1650 MHz	13 V / 22 kHz		Band 4	12.25 - 12.75	11.3	950 - 1450 MHz	18 V / 22kHz		
	Band 3	12.20 - 12.70	11.25	950 - 1450 MHz	18 V	c	Band 1	10.70 - 11.20	9.75	950 - 1450 MHz	13 V		
F Band 2	Band 1	10.70 - 11.80	<mark>9</mark> .75	950 - 2050 MHz	13 V		Band 2	11.20 - 11.70	10.25	950 - 1450 MHz	13 V / 22 kHz		
	Band 2	10.95 - 12.10	10	950 - 2100 MHz	13 V / 22 kHz		Band 3	11.70 - 12.20	10.75	950 - 1450 MHz	18 V		
	Band 3	11.70 - 12.75	10.75	950 - 2000 MHz	18 V		Band 4	12.20 - 12.75	11.25	950 - 1500 MHz	18 V / 22kHz		
G Band	Band 1	10.70 - 11.70	9.75	950 - 1950 MHz	13 V	D	Band 1 Band 2	10.95 - 11.45 11.45 - 11.95	10 10.5	950 - 1450 MHz 950 - 1450 MHz	13 V 13 V / 22 kHz		
	Band 2	11.70 - 12.70	10.75	950 - 1950 MHz	13 V / 22 kHz		Band 2 Band 3	11.45 - 11.95	10.5	950 - 1450 MHz 950 - 1450 MHz	13 V / 22 KHZ		
	Band 3	12.25 - 12.75	11.3	950 - 1450 MHz	18 V		Band 4	12.20 - 12.75	11.25	950 - 1500 MHz	18 V / 22kHz		



Esatcom Inc Norsat authorized distributor www.esatcom.com Tel 718.799.0084

Email sales@esatcom.com