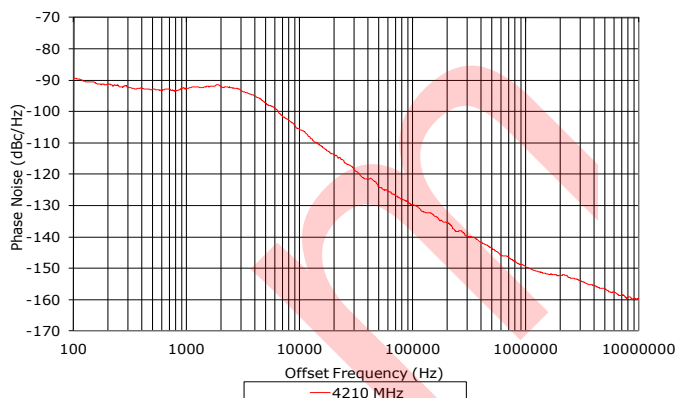
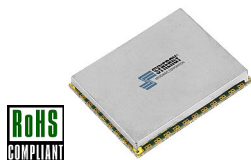


4210 MHz

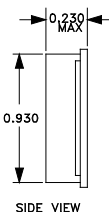
- ▶ Exceptionally Low Phase Noise
- ▶ No Programming Required
- ▶ Lead Free - RoHS Compliant
- ▶ Patented REL-PRO® Technology
- ▶ Small Size, Surface Mount
- ▶ Buffered Output



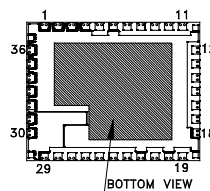
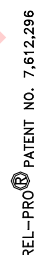
Frequency	4210 MHz												
Reference Input Frequency	10 MHz												
Reference Input Voltage	1.0 V p-p to 3.3 V p-p												
Bias Voltage	<table border="1"> <thead> <tr> <th>Vcc</th><th>V (Vdc)</th><th>I (mA Max.)</th></tr> </thead> <tbody> <tr> <td>Digital</td><td>+5</td><td>65</td></tr> <tr> <td>VCO</td><td>+8</td><td>35</td></tr> <tr> <td>VTune</td><td>+10</td><td>10</td></tr> </tbody> </table>	Vcc	V (Vdc)	I (mA Max.)	Digital	+5	65	VCO	+8	35	VTune	+10	10
Vcc	V (Vdc)	I (mA Max.)											
Digital	+5	65											
VCO	+8	35											
VTune	+10	10											
Output Power	+5 dBm (Min.)												
Spurious Suppression	80 dB (Typ.)												
Harmonic Suppression	20 dB (Typ.)												
Power-Up Time	90 mSec (Max.) ¹												
Output Impedance	50 Ohms (Nom.)												
Lock Detect Indicator	CMOS - 3.3 V												
Typical Phase Noise	<table border="1"> <thead> <tr> <th>Offset</th><th>Phase Noise</th></tr> </thead> <tbody> <tr> <td>@ 1 kHz</td><td>-90 dBc/Hz</td></tr> <tr> <td>@ 10 kHz</td><td>-105 dBc/Hz</td></tr> <tr> <td>@ 100 kHz</td><td>-125 dBc/Hz</td></tr> </tbody> </table>	Offset	Phase Noise	@ 1 kHz	-90 dBc/Hz	@ 10 kHz	-105 dBc/Hz	@ 100 kHz	-125 dBc/Hz				
Offset	Phase Noise												
@ 1 kHz	-90 dBc/Hz												
@ 10 kHz	-105 dBc/Hz												
@ 100 kHz	-125 dBc/Hz												
Operating Temperature Range	-30 to +70 °C												

¹ From stable power on to stable lock detect

Storage Temp. Range	-55 to +125 °C
Bias Voltage (Digital)	+5.25 V
Bias Voltage (Tune)	+12.0 V
Bias Voltage (VCO)	+8.5 V
DC Voltage Applied to RF Out	±25 V

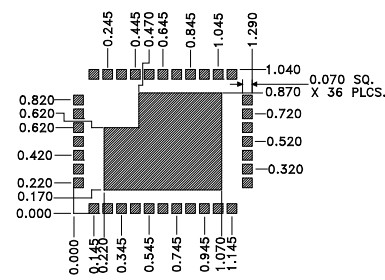


RECOMMENDED PCB LAYOUT



OPTIONAL SOLDER AREA
FOR HIGH VIBRATION ENVIRONMENT

PACKAGE MOUNTING: SEE APPLICATION NOTES AN7200 & AN7300



TOLERANCES ON THREE
DECIMAL PLACES= ± 0.015

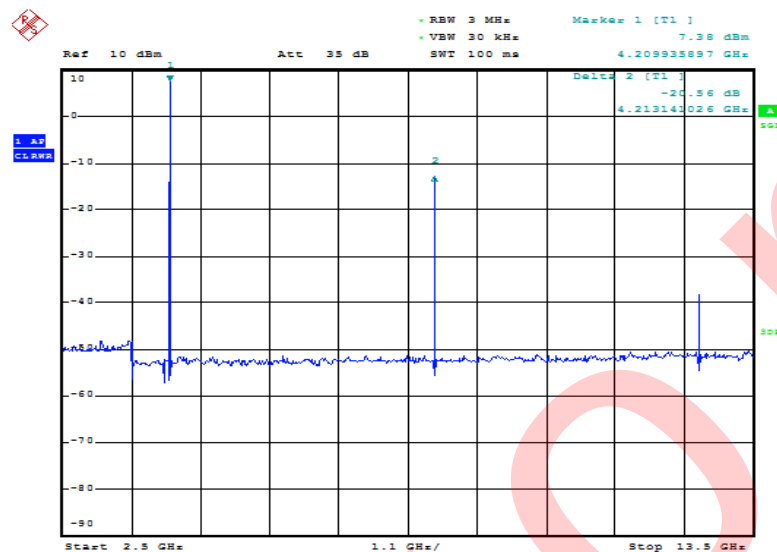
Pin 5 - RF Out	Pin 25 - Vcc (VCO)	All Others - Ground
Pin 7 - Lock Detect	Pin 27 - Vcc (VTune)	NC - No Connection
Pin 21 - Ref. In	Pin 8 to 19, 24, 26, 28 - NC	
Pin 23 - Vcc (Digital)		

FIXED FREQUENCY SYNTHESIZER

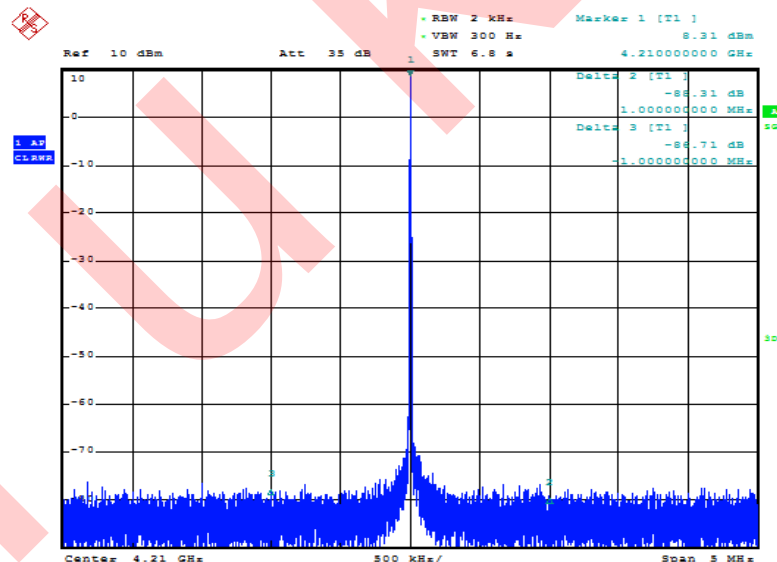
SURFACE MOUNT MODEL: FCPH4210-10

4210 MHz

HARMONIC SUPPRESSION



REFERENCE SIDEBAND SUPPRESSION



PERFORMANCE PLOTS

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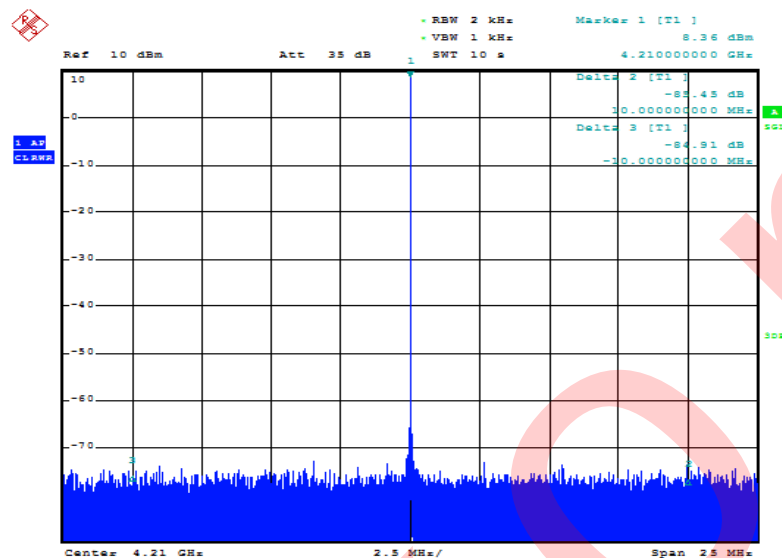
E-Mail: sales@synergymw.com • Website: <http://www.synergymw.com>

FIXED FREQUENCY SYNTHESIZER

SURFACE MOUNT MODEL: FCPH4210-10

4210 MHz

REFERENCE SIDEBAND SUPPRESSION



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