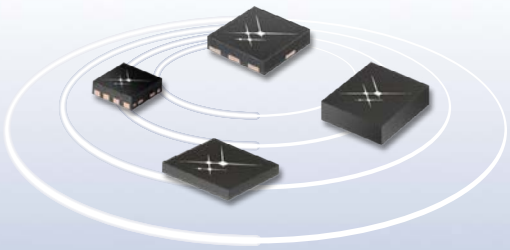
SKYWORKS®

BREAKTHROUGH SIMPLICITY



Smart Energy Solutions

Table of Contents

Smart Energy Solutions

Applications

- ZigBee® (IEEE 802.15.4)
- Industrial and Control Unlicensed Band Radios
- Plug-in Hybrid Electric Vehicles (PHEVs)
- 802.15.4g
- Home Security and Automation

Products

- Front-end Modules (FEMs)
- Power Amplifiers (PAs) and Drivers
- Low Noise Amplifiers (LNAs)
- Power Management
- Switches
- Synthesizers
- Voltage Control Oscillators (VCOs)
- Diodes

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Innovation to Go™
Select products and sample/designer kits available for purchase online. **www.skyworksinc.com**

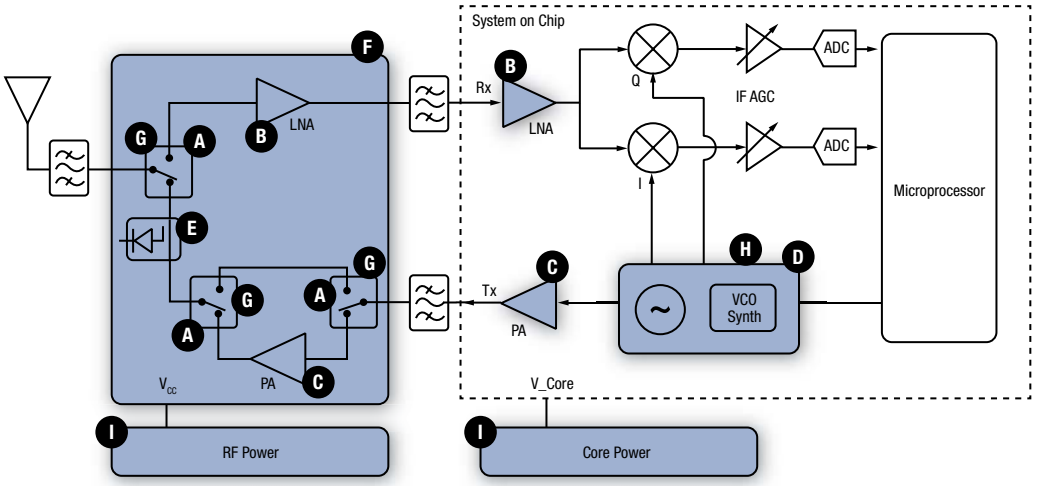
Skyworks lead (Pb)-free products are compliant to all applicable materials legislation. For additional information, please refer to *Skyworks Definition of Lead (Pb)-Free*, document number SQ04-0073. Tin/lead (SnPb) packaging is not recommended for new designs.

Skyworks Green™ products are compliant to all applicable materials legislation and are halogen-free. For additional information, please refer to *Skyworks Definition of Green™*, document number SQ04-0074.

Smart Energy Solutions

The Right Products for Your System Applications

Skyworks is committed to developing leading edge products for designs targeted at < 170, 410–470, 868–930, and 2400–2500 MHz radios. These solutions are ideal for wireless local area networks (WLAN), automated metering infrastructure (AMI), automated meter reading (AMR), professional mobile radio (PMR), and other ISM band applications. Figures 1 through 3 show short range radio, simplified smart communication module, and thermostat block diagrams.



Switches

A
AS179-92LF
AS193-73LF
SKY13270-92LF
SKY13299-321LF
SKY13309-370LF
SKY13318-321LF
SKY13348-374LF
SKY13370-374LF

PIN Diodes

G
SMP1302-040LF
SMP1302-079LF
SMP1320-040LF
SMP1320-079LF
SMP1340-040LF
SMP1340-079LF
SMP1345-518

LNAs

B
SKY65045-70LF
SKY65047-360LF
SKY67013-396LF

Power Drivers/Amplifiers

C
SE2425U-R
SE2433T-R
SKY65006-348LF
SKY65009-70LF
SKY65045-70LF
SKY65111-348LF
SKY65116
SKY65131
SKY65132
SKY65135
SKY65146
SKY65152
SKY65162-70LF

Synthesizers/PLLs/VCOs

D
SKY72300-21
SKY72300-362
SKY72301-22
SKY72310-362
SKY73120

Varactor Diodes

H
SMV1142-011LF
SMV1233-011LF
SMV1235-040LF
SMV1235-079LF
SMV1236-004LF
SMV1247-011LF
SMV1247-040LF
SMV1249-040LF
SMV1249-079LF
SMV1251-001LF
SMV1253-079LF
SMV1255-011LF
SMV1405-040LF
SMV1405-079LF
SMV1408-001LF
SMV1413-079LF
SMV1763-040LF
SMV1763-079LF

Schottky Diodes

E
SMS3926-023LF
SMS3927-023LF
SMS3928-023LF
SMS7621-040LF
SMS7621-060
SMS7621-079LF
SMS7630-040LF
SMS7630-061
SMS7630-079LF

Tx/Rx Front-end Modules

F
SE2431L-R
SE2432L-R
SE2435L-R
SE2436L-R
SE2438T-R
SE2442L-R
SKY66101-11
SKY66108
SKY66109 -11
SKY65313-21
SKY65342-11
SKY65346-21
SKY65364-11
SKY65366-21
SKY65367-11
SKY66100-11

Battery Chargers

I
Linear Chargers
AAT3663
AAT3681

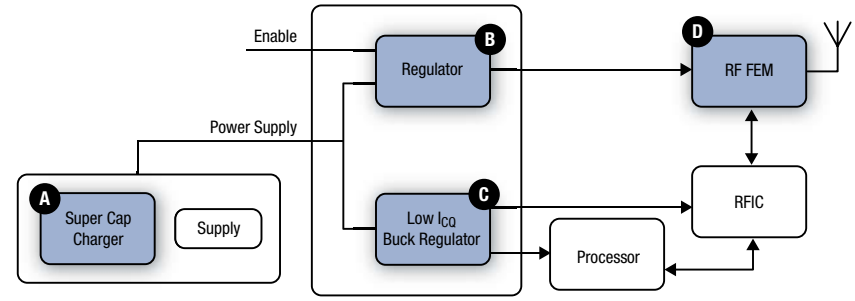
Switching Charger
AAT3620

Super Capacitor Chargers
AAT4621
AAT4712

DC/DC Converters
Step-Down Converters
AAT2114A
SKY87201

Figure 1. Short Range Radio Block Diagram

The Right Products for Your System Applications (Continued)



Supercap Chargers
A AAT4712

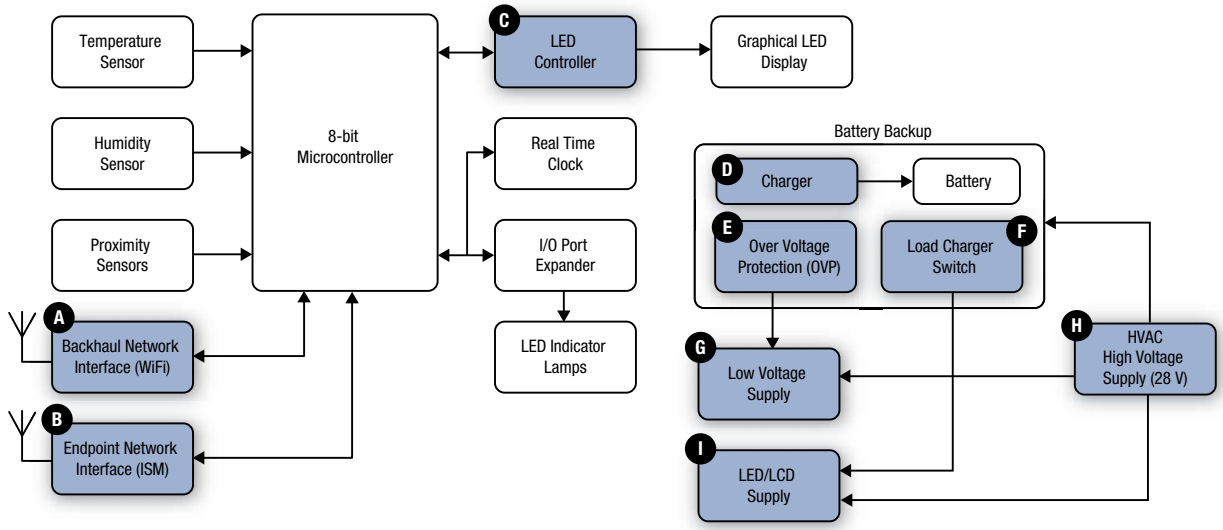
Current Limited Load Switches
AAT4621

DC/DC Converters (Switching Regulators)
Step Down Converters
B AAT1232
AAT2138
SKY87201

Step-Down Converter
C SKY87201

Front-end Modules
D SE2435L-R
SE2438T
SE2442L-R
SKY65313-21
SKY65364-11
SKY65367
SKY65378
SKY66100
SKY66101
SKY66108
SKY66109-11

Figure 2. Smart Meter Communication Module (Simplified) Block Diagram



2.5 GHz Front-End Modules for WiFi Connectivity
A SKY85302-11
SKY85303-11

LED Controller
C AAT1401

Over Voltage Protection
E AAT4684
AAT4686
AAT4687

Low Voltage Supply
G AAT2114
AAT3221
SKY87201

LED/LCD Supply
I AAT1403
SKY87201

Front-End Modules for ISM / Smart Energy
B SE2431L
SE2432L
SE2436L
SE2438T
SKY65378-11

Switching Charger
D AAT3620

Load Charger Switch Slew-Rate Controlled Load Switches
F AAT4250
AAT4280
AAT4282A

High Voltage Supply
H SKY87608

Figure 3. Thermostat Block Diagram

Custom Front-end Modules (FEMs)

Skyworks' custom FEMs allow for significant size and cost reduction. In addition, many of Skyworks' FEMs are designed to allow for "plug and play" functionality, thus drastically reducing the design time for new products. Customized FEMs can be created depending on transceiver implementation requirements. Various modules are being targeted at < 170, 410–470, 868–930, and 2400–2500 MHz frequency bands. Figure 4 shows a custom FEM block diagram.

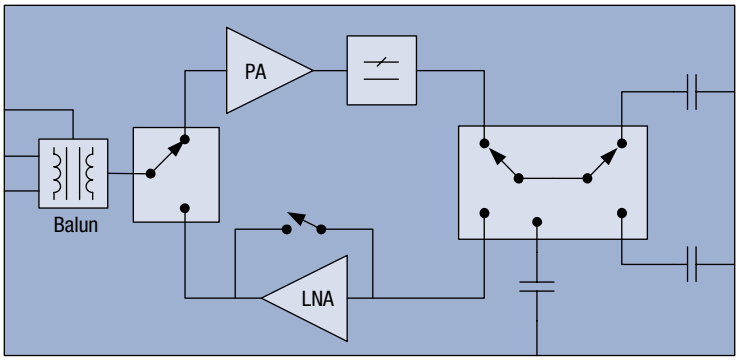


Figure 4. Custom Front-end Module (FEM)

Possibilities for Integration Include:

- T/R Switches
- Power Amplifiers
- Low Noise Amplifiers (LNAs)
- Mixers
- Harmonic Filters

Product Specifications

Specification tables for all of our latest Smart Energy products are provided on the following pages.

FRONT-END MODULES

Table 1. Front-end Modules

Part Number	Function	P_{OUT} (dBm)	Tx Gain (dB)	Rx Gain (dB)	I_{CC} Tx (mA)	Package (mm)	Frequency Band (MHz) < 170	410–470	868–930	2400–2500
SKY66100-11	Tx / Rx Front-end Module with Rx / Tx Bypass	20–27	30	-0.5	110–300	MCM 4 x 4	•			
SKY65367-11	High Power Tx / Rx Front-end Module with Rx / Tx Bypass	30	35	-0.5	600	MCM 4 x 4	•			
SKY65342-11	High Power Tx / Rx Front-end Module with Rx Bypass	27–30	34	-0.6	650	MCM 8 x 8		•		
SKY65366-21	High Performance Tx / Rx Front-end Module	30.5	22	22	728	MCM 6 x 6		•		
SKY65378-11	Low Power Front-end Module with Tx Bypass and LNA	–	–	14–17	3–7 (1)	QFN 4 x 4			•	
SKY65346-21	Tx / Rx Front-end Module with LNA	26	35	13.7	200	MCM 5 x 5			•	
SE2435L-R	High Power Tx / Rx Front-end Module with LNA	30	28	16	550	QFN 4 x 4			•	
SE2442L-R	High Power Tx / Rx Front-end Module with Rx Bypass	30	28	-0.7	550	QFN 4 x 4			•	
SKY65313-21	Tx / Rx Front-end Module with LNA	30.5	28	16.6	695	MCM 6 x 6			•	
SKY65364-11	High Power Tx / Rx Front-end Module with LNA, PA, Tx / Rx Bypass, HD Filter	30.5	30	15	730	MCM 6 x 6			•	
SKY66101-11	High Performance, Highly Integrated Front-end Module	31	25	16	670	MCM 6 x 6			•	
SE2438T-R	Low Power Tx / Rx Front-end Module with LNA	10–14	16	12.3	20–33	QFN 3 x 3				•
SKY66108	Low Power Tx / Rx Front-end Module with LNA	10–14	16	12.3	20–33	QFN 3 x 3				•

1. SKY65378: I_{CC} Rx gain value shown.

New products indicated in **blue, bold** are continually being introduced at Skyworks. For the latest information, please visit the new products section of our Web site at www.skyworksinc.com.

FRONT-END MODULES (CONTINUED)

Table 1. Front-end Modules (Continued)

Part Number	Function	P_{OUT} (dBm)	Tx Gain (dB)	Rx Gain (dB)	I_{CC} Tx (mA)	Package (mm)	Frequency Band (MHz) < 170	410–470	868–930	2400–2500
SKY85302-11	2.4 GHz, 256 QAM WLAN/Bluetooth® Front-end Module	19	26	14	–	QFN 2.5 x 2.5				•
SKY85303-11	2.4 GHz, 256 QAM WLAN/Bluetooth® Front-end Module	19	26	14	–	QFN 2.5 x 2.5				•
SE2431L-R	Tx / Rx Front-end Module with LNA	20	23	12	110	QFN 3 x 4				•
SE2432L-R	Tx / Rx Front-end Module with LNA	20	22	11.5	110	QFN 3 x 4				•
SE2436L-R	High Power Tx / Rx Front-end Module with LNA	27	28	11.5	400	QFN 4 x 4				•
SKY66109-11	High Performance, Highly Integrated Front-end Module	20–24	22	12	105	MCM 3 x 4				•

AMPLIFIERS

Table 2. Power Amplifiers

Part Number	Function	P_{OUT} (dBm)	Gain (dB)	$P_{1\ dB}$ (dBm)	I_{CQ} (mA)	Package (mm)	Frequency Band (MHz) 450	915	2400
SE2433T-R	2-Stage Power Amplifier	24	22	24	–	QFN 2.5 x 2			•
SKY65116	2-Stage Power Amplifier	–	33	33	320	MCM 8 x 8	•		
SKY65111-348LF	3-Stage Power Amplifier	–	39.5	29.5	250	QFN 3 x 3		•	
SKY65006-348LF	3-Stage Power Amplifier	–	27.5	23.4	50	QFN 3 x 3			•
SKY65131	2-Stage Power Amplifier	–	26	28	150	MCM 4 x 4			•
SKY65132	3-Stage Power Amplifier	–	33	30	330	MCM 6 x 6			•
SKY65009-70LF	Single Stage Driver	–	17	25	110	SOT-89 4.5 x 2.4	•	•	•
SKY65045-70LF	Single Stage Driver	–	14 dB @ 900 MHz	25	60	SOT-89 4.5 x 2.4	•	•	
SKY65162-70LF	Single Stage Driver	–	20	29	185	SOT-89 4.5 x 2.4	•	•	•
SKY65152-11	3-Stage Power Amplifier	–	32	33	490	MCM 6 x 6			•
SKY67130-396LF	Single Stage Driver	–	13	16	22	DFN 2 x 2	•	•	•

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AMPLIFIERS (CONTINUED)

Table 3. Low Noise Amplifiers

Part Number	Function	Gain (dB)	NF (dB)	I_{CC} (mA)	$IP_{1\,dB}$ (dBm)	Package (mm)	Frequency Band (MHz) 450	915	2400
SKY65050-372LF	LNA, Discrete (250–6000 MHz)	16 dB @ 900 MHz	0.6	10	-9	SC-70 2.2 x 1.35	•	•	•
SKY65047-360LF	LNA with Shutdown Mode	16.5 dB @ 915 MHz	0.85	7.8	-7	QFN 2 x 2	•	•	•
SKY65405-21	LNA with Shutdown Mode	14	1	12	-3	QFN 1.5 x 1.5			•
SKY67012-396LF	LNA, Discrete (300–600 MHz)	16	0.9	15	-1	DFN 2 x 2	•		
SKY67013-396LF	LNA, Discrete (600–1500 MHz)	14.5	0.85	15	2.5	DFN 2 x 2		•	
SKY67014-396LF	LNA, Discrete (1500–3000 MHz)	12	0.95	5	5	DFN 2 x 2			•
SKY67110-396LF	LNA, High Linearity	21	0.65	77	2	DFN 2 x 2	•		
SKY67101-396LF	LNA, High Linearity	17.9	0.5	56	2.6	DFN 2 x 2		•	
SKY67102-396LF	LNA, High Linearity	17.2	0.8	50	-1	QFN 2 x 2			•

POWER MANAGEMENT

Battery Chargers

Table 4. Linear Chargers

Part Number	Function	Max. Charge Current (mA)	V_{IN} (V)	Package (mm)
AAT3663	Linear Li-Ion Battery Charger for Single and Dual Cell Applications	1000	4.0–13.2	TDFN 14L 3 x 3
AAT3681	USB Port or AC Adapter Lithium-Ion/Polymer Battery Charger	300	4.0–6.5	SC70JW 8L 2.0 x 2.1

Table 5. Switching Charger

Part Number	Function	Switching Frequency (kHz)	V_{IN} (V)	Package (mm)
AAT3620	Cell Li+ Switch Mode Battery Charger	1500	4.3–6.0	TDFN 14L 3 x 3

Table 6. Supercapacitor Chargers

Part Number	Function	Fault Flag	V_{IN} (V)	Package (mm)
AAT4712	Supercapacitor Charger with Input Current Limit	POK; RDY	2.5–5.5	TDFN34 16L 3 x 4
AAT4621	PC Card Current Limit Interface and Capacitor Charger	Yes	3.0–3.5	TDFN 14L 3 x 3

POWER MANAGEMENT (CONTINUED)

Voltage Regulation–DC/DC Converters (Switching Regulators)

Table 7. Step Up Converter

Part Number	Function	V_{OUT} (V)	Typ. I_Q (µA)	I_{OUT} (mA)	Package (mm)
AAT1219	Step Up Converter	2.4 to V_{OUT} +0.25	58	1200	TDFN33 12L 3 x 3

Table 8. Step Down Converter

Part Number	Min. V_{IN} (V)	Max. V_{IN} (V)	Min. V_{OUT} (V)	Max. V_{OUT} (V)	I_{OUT} (mA)	f_{OSC} (kHz)	Typ. I_Q (µA)	Package (mm)
AAT2114A	2.7	5.5	1	V_{IN}	2500	3000	70	QFN 16L 3 x 3
AAT2138	2.7	5.5	3	V_{IN}	2500	2800	90	TDFN 14L 3 x 3 x 0.75
SKY87201-11	2.7	5.5	0.6	V_{IN}	600	2000	37	SC70JW 8L 2 x 2.1
SKY87608	4.5	28	0.9	0.8*V_{IN}	3000	450	1600	SOP-8L 5 x 6 x 1.55

Low Drop-Out (LDO) Linear Regulator

Table 9. Low Drop-Out (LDO) Linear Regulator

Part Number	Function	V_{IN} (V)	Typ. I_Q (µA)	Max. I_{OUT} (mA)	Package (mm)
AAT3221	Ultra Low IQ LDO	V_{OUT} –5.5	1.1	150	SOT-23 5L 2.85 x 2.8 SC70JW 8L 2.2 x 2.0

Display and Lighting

White LED Driver

Table 10. Serial Boost White LED Backlight Driver

Part Number	Number of LEDs	LED Channels	LED(s) per/Ch	Min. V_{IN} (V)	Max. V_{IN} (V)	Interface	Typ. I_Q (µA)	Peak Efficiency	Current Accuracy (%)	Current Matching (%)	Max. I_{OUT} per/Ch (mA)	Package (mm)
AAT1401	6	1	6	2.7	5.5	S2Cwire™, Filtered PWM	0.43	85%	±10%	N/A	31	WLCSP 10L 1.545 x 1.145 x 0.62
AAT1403	10	1	10	2.7	5.5	S2Cwire™, Filtered PWM	0.43	81%	±10%	N/A	31	WLCSP 10L 1.545 x 1.145 x 0.62

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POWER MANAGEMENT (CONTINUED)

Display and Lighting (Continued)

Table 11. Over Voltage Protection

Part Number	Number of Channels	Enable	Fault Flag	I_{LIM}	Typ. $R_{DS(ON)}$ (mΩ)	V_{IN} (V)	Typ. I_Q (µA)	Package (mm)
AAT4684	1	Yes	Yes	1.8 A	100	3.0–14.0	30	TSOPJW 12L 3.0 x 2.85 x 1.02
AAT4686	1	Yes	Yes	N/A	N/A	3.0–14.0	30	SC70JW 8L 2.0 x 2.1 x 1.05
AAT4687	1	Yes	Yes	N/A	130	3.0–14.0	30	SC70JW 10L 2.0 x 2.0 x 1.1

Port Protection and Power Distribution

Table 12. Slew Rate Controlled

Part Number	Number of Channels	Enable	Turn On Rise Time (T_R)	Typ. $R_{DS(ON)}$ (mΩ)	V_{IN} (V)	Typ. I_Q (µA)	Package (mm)
AAT4250	1	Yes	1.5 ms	120	1.8–5.5	2	SOT-23 5L, (SOT25) 2.85 x 2.80 x 1.20 SC70JW 8L 2.0 x 2.1 x 1.05
AAT4280	1	Yes	0.5 µs 0.1 ms 1.0 ms	80	1.8–5.5	2	SOT-23 6L 2.85 x 2.80 x 1.20 SC70JW8L 2.2 x 2.0 x 1.05
AAT4282A	2	Yes	0.5 µs 0.1 ms 1.0 ms	60	1.5–6.5	1	FTDFN22-8 2.0 x 2.0 x 0.75 SC70JW 8L 2.2 x 2.0 x 1.05
AAT4282B	2	Yes	0.065 ms 0.75 ms	67	1.5–6.5	0.04	TDFN22-8 2.0 x 2.0 x 0.75

SWITCHES

Table 13. SPDT (SP2T), SP3T, and DPDT RF Switches

Part Number	Function	Insertion Loss (dB)	Isolation (dB)	$P_{1\,dB}$ (dBm)	Input IP3 (dBm)	Package (mm)	Frequency Band (MHz) 450	915	2400
SKY13268-344LF	SPDT Switch, Low Loss	0.3	25	30	50	SOT-666 1.5 x 1.2	•	•	•
SKY13309-370LF	SP3T Switch, Low Loss	0.5	25	29	–	QFN 2 x 2	•	•	•
AS179-92LF	SPDT Switch, Low Loss	0.3	25	30	48	SC-88 2.2 x 2	•	•	•
SKY13270-92LF	SPDT Switch, Low Loss	0.35	24	>37	56	SC-88 2.1 x 2.0	•	•	•
AS193-73LF	SPDT Switch, Low Loss	0.35	24	37	55	SOT-6 2.8 x 2.9	•	•	•
SKY13348-374LF	SPDT Switch	0.6	27	37	52	DFN 1.5 x 1.5	•	•	•
SKY13370-374LF	SPDT Switch	0.7	31	39	55	DFN 1.5 x 1.5	•	•	•
SKY13299-321LF	SPDT Switch	0.3–0.75	30–22	39	57	QFN 3 x 3	•	•	•
SKY13318-321LF	DPDT Switch	0.95–1.15	22–15	34	57	QFN 3 x 3	•	•	•

SYNTHESIZERS

Table 14. Dual and Single Fractional-N Synthesizers

Part Number	Function	Phase Noise (dBc/Hz)	Direct Modulation	I_{DD} (mA)	Package (mm)	Frequency Band (MHz) 450	915	2400
SKY72300-21	Dual Frac-N Synthesizer	-91	FSK, FM, GMSK	12.5	TSSOP 9.7 x 6.4	•	•	
SKY72300-362	Dual Frac-N Synthesizer	-91	FSK, FM, GMSK	12.5	QFN 4 x 4	•	•	
SKY72301-22	Dual Frac-N Synthesizer	-96	FSK, FM, GMSK	11	TSSOP 9.7 x 6.4	•	•	
SKY72310-362LF	Single Frac-N Synthesizer	-91	FSK, FM, GMSK	12.5	QFN 4 x 4	•	•	

VOLTAGE CONTROLLED OSCILLATORS (VCOs)

Table 15. Voltage Controlled Oscillators (VCOs)

Part Number	Function	Phase Noise (dBc/Hz)	Direct Modulation	I_{DD} (mA)	Package (mm)	Frequency Band (MHz) 450	915	2400
SKY73120	CMOS VCO	-110 @ 25 kHz Offset	0	26	MCM 6 x 6		•	

DIODES

Table 16. Varactor Diodes for Tuning Applications

Part Number	Function	Capacitance (C_T)	Capacitance Ratio (C_R)	Series Resistance (R_S)/ Quality Factor	Package (mm)	Frequency Band (MHz) 450	915	2400
SMV1405-079LF	VCO Tuning	1.8 pF @ 1 V	C_{T0}/C_{T30} = 4.1	Q @ 4 V 50 MHz = 3200	SC-79 1.6 x 0.8	•	•	•
SMV1405-040LF	VCO Tuning	1.8 pF @ 1 V	C_{T0}/C_{T30} = 4.1	Q @ 4 V 50 MHz = 3200	0402 1.0 x 0.6	•	•	•
SMV1413-079LF	VCO Tuning	6.4 pF @ 1 V	C_{T0}/C_{T30} = 4.2	Q @ 4 V 50 MHz = 2400	SC-79 1.6 x 0.8	•	•	•
SMV1408-001LF	VCO Tuning	2.9 pF @ 1 V	C_{T0}/C_{T30} = 4.1	Q @ 4 V 50 MHz = 2900	SOT-23 2.9 x 2.35	•	•	•
SMV1247-011LF	VCO Tuning	7 pF @ 0.3 V	$C_{T0.3}/C_{T4.7}$ = 10	Q @ 3 V 50 MHz = 1500	SOD-323 2.5 x 1.25	•	•	•
SMV1247-040LF	VCO Tuning	7 pF @ 0.3 V	$C_{T0.3}/C_{T4.7}$ = 10	Q @ 3 V 50 MHz = 1500	0402 1.0 x 0.6	•	•	•
SMV1249-040LF	VCO Tuning	31 pF @ 0.3 V	$C_{T0.3}/C_{T4.7}$ = 12.1	R_S @ 3 V 500 MHz = 1.2 Ω	0402 1.0 x 0.6	•	•	•
SMV1249-079LF	VCO Tuning	31 pF @ 0.3 V	$C_{T0.3}/C_{T4.7}$ = 12.1	R_S @ 3 V 500 MHz = 2.2 Ω	SC-79 1.6 x 0.8	•	•	•
SMV1251-001LF	VCO Tuning	42 pF @ 0.3 V	$C_{T0.3}/C_{T4.7}$ = 12.2	R_S @ 3 V 500 MHz = 1.6 Ω	SOT-23 2.9 x 2.35	•	•	•
SMV1253-079LF	VCO Tuning	53 pF @ 0.3 V	$C_{T0.3}/C_{T4.7}$ = 12.3	R_S @ 3 V 500 MHz = 1.4 Ω	SC-79 1.6 x 0.8	•	•	•
SMV1255-011LF	VCO Tuning	64 pF @ 0.3 V	$C_{T0.3}/C_{T4.7}$ = 12.3	R_S @ 3 V 500 MHz = 1.3 Ω	SOD-323 2.5 x 1.25	•	•	•
SMV1233-011LF	VCO Tuning	3.3 pF @ 1 V	C_{T1}/C_{T3} = 1.5	R_S @ 3 V 500 MHz = 1.2 Ω	SOD-323 2.5 x 1.25	•	•	•
SMV1236-004LF	VCO Tuning	17 pF @ 1 V	C_{T1}/C_{T3} = 1.6	R_S @ 3 V 500 MHz = 0.5 Ω	SOT-23 2.9 x 2.35	•	•	•
SMV1763-040LF	VCO Tuning	5.2 pF @ 1 V	$C_{T0.5}/C_{T2.5}$ = 2.3	R_S @ 1 V 900 MHz = 0.7 Ω	0402 1.0 x 0.6	•	•	•
SMV1763-079LF	VCO Tuning	5.2 pF @ 1 V	$C_{T0.5}/C_{T2.5}$ = 2.5	R_S @ 1 V 500 MHz = 0.7 Ω	SC-79 1.6 x 0.8	•	•	•
SMV1142-011LF	VCO Tuning	8.2 pF @ 1 V	C_{T1}/C_{T3} = 1.5	R_S @ 3 V 500 MHz = 0.7 Ω	SOD-323 2.5 x 1.25	•	•	•
SMV1235-079LF	VCO Tuning	11.5 pF @ 1 V	C_{T1}/C_{T3} = 1.8	R_S @ 3 V 500 MHz = 0.6 Ω	SC-79 1.6 x 0.8	•	•	•
SMV1235-040LF	VCO Tuning	11.5 pF @ 1 V	C_{T1}/C_{T3} = 1.8	R_S @ 3 V 500 MHz = 0.6 Ω	0402 1.0 x 0.6	•	•	•

DIODES (CONTINUED)

Table 17. PIN Diodes for Switching Applications

Part Number	Function	Voltage Breakdown (V_B)	Capacitance (C_T)	Series Resistance (R_S)	Package (mm)	Frequency Band (MHz) 450	915	2400
SMP1345-518	Antenna Switch	50 V @ 10 µA	0.18 pF @ 5 V	R_S @ 10 mA = 1.5 Ω	LGA 1.2 x 1.4	•	•	•
SMP1340-040LF	T/R Switch	50 V @ 10 uA	0.20 pF @ 5 V	R_S @ 10 mA = 0.9 Ω	0402 1.0 x 0.6	•	•	•
SMP1340-079LF	Antenna Switch	50 V @ 10 µA	0.20 pF @ 5 V	R_S @ 10 mA = 0.9 Ω	SC-79 1.6 x 0.8	•	•	•
SMP1320-040LF	T/R Switch	50 V @ 10 µA	0.25 pF @ 30 V	R_S @ 10 mA = 0.9 Ω	0402 1.0 x 0.6	•	•	•
SMP1320-079LF	T/R Switch	50 V @ 10 µA	0.30 pF @ 30 V	R_S @ 10 mA = 0.9 Ω	SC-79 1.6 x 0.8	•	•	•
SMP1302-079LF	Attenuator Switch	200 V @ 10 µA	0.30 pF @ 30 V	R_S @ 10 mA = 3.0 Ω	SC-79 1.6 x 0.8	•	•	•
SMP1302-040LF	T/R Switch	50 V @ 10 µA	0.30 pF @ 30 V	R_S @ 10 mA = 0.9 Ω	0402 1.0 x 0.6	•	•	•

Table 18. Schottky Diodes for Detector and Mixer Applications

Part Number	Function	Voltage Breakdown (V_B)	Capacitance (C_T)	Forward Voltage (V_F)	Package (mm)	Frequency Band (MHz) 450	915	2400
SMS7630-040LF	Detector	1 V @ 10 µA	0.30 pF @ 0.15 V	V_F @ 0.1 mA = 60–120 mV	SC-79 1.6 x 0.8	•	•	•
SMS7630-079LF	Detector	1 V @ 10 µA	0.30 pF @ 0.15 V	V_F @ 0.1 mA = 60–120 mV	0402 1.0 x 0.6	•	•	•
SMS7630-061	Detector	1 V @ 10 µA	0.30 pF @ 0.15 V	V_F @ 0.1 mA = 60–120 mV	0201 0.60 x 0.30	•	•	•
SMS7621-040LF	Detector/Mixer	2 V @ 10 µA	0.18 pF @ 0.15 V	V_F @ 1.0 mA = 260–320 mV	0402 1.0 x 0.6	•	•	•
SMS7621-079LF	Detector/Mixer	2 V @ 10 µA	0.18 pF @ 0.15 V	V_F @ 1.0 mA = 260–320 mV	SC-79 1.6 x 0.8	•	•	•
SMS7621-060	Detector/Mixer	2 V @ 10 µA	0.18 pF @ 0.15 V	V_F @ 1.0 mA = 260–320 mV	0201 0.60 x 0.30	•	•	•
SMS3926-023LF	Low Drive Mixer	2 V @ 10 µA	0.30 pF @ 0 V	V_F @ 1.0 mA = 200–270 mV	SOT-143 2.37 x 2.92	•	•	•
SMS3927-023LF	Medium Drive Mixer	2 V @ 10 µA	0.30 pF @ 0 V	V_F @ 1.0 mA = 310–370 mV	SOT-143 2.37 x 2.92	•	•	•
SMS3928-023LF	High Drive Mixer	4 V @ 10 µA	0.30 pF @ 0 V	V_F @ 1.0 mA = 520–580 mV	SOT-143 2.37 x 2.92	•	•	•

New products indicated in **blue, bold** are continually being introduced at Skyworks. For the latest information, please visit the new products section of our Web site at www.skyworksinc.com.

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