

1 GNSS_S14

1.1 OVERVIEW

GNSS_S14 is 1-to-4 active splitter with L1, L2, L3 and L5 subbands RF preselection. It is intended to be used with NT1065 demo boards NT1065_EVK, NT1065_FMC, NT1065_USB3 if passive or low gain antennas (cable losses included) should be plugged in. Paired solution provides less than 1dB of total noise figure and more than 35dB of outband RF rejection. Every channel can be assembled to pass through any of available GNSS bands independently, however, it is recommended to verify with application restrictions of NT1065 "Nomada".

1.2 KEY FEATURES

- IO ports:
 - 1 RF inputs with active antenna supply capabilities 3V/5V
 - 4 RF outputs
 - 5V power supply connector
- Total gain 25dB per channel typ.
- Noise figure 0.8dB typ.

1.3 STRUCTURE

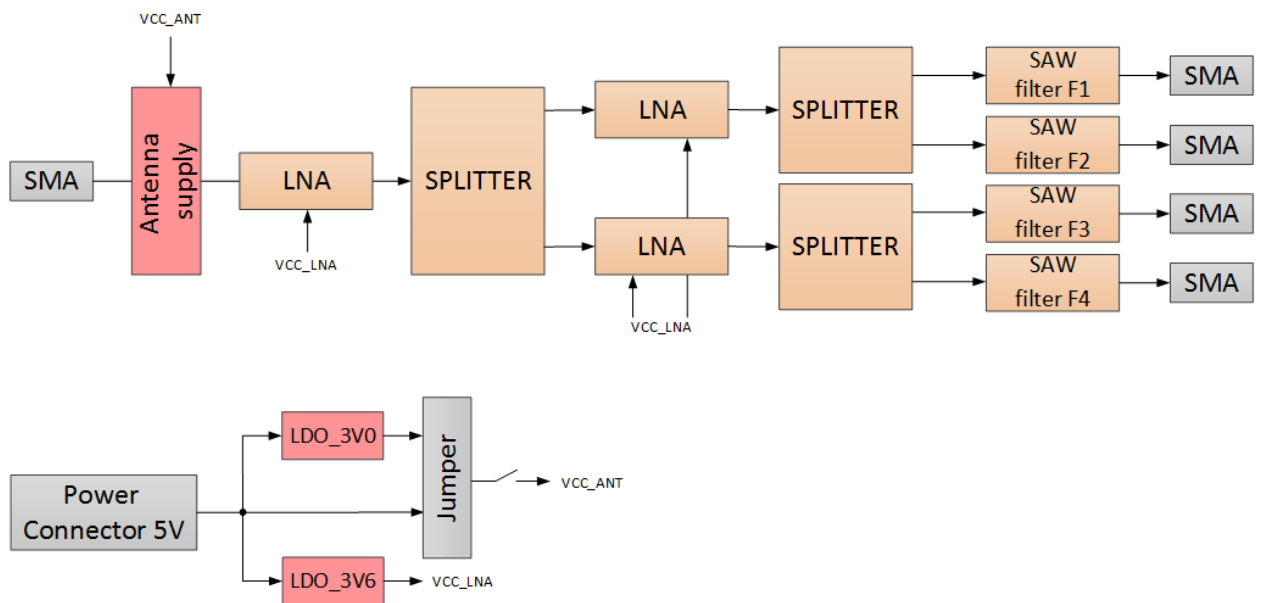


Figure 1.1 GNSS_S14 block diagram

1.4 ASSEMBLY OPTIONS:

BS14 –

X	X	X	X
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		SAW filters	F1	F2	F3	F4
1	-	GLONASS L1:	1587 – 1617 MHz			
2	-	GPS L1 and Galileo E1:	1559 – 1587 MHz			
3	-	BeiDou B1:	1556 – 1601 MHz			
4	-	BeiDou B3:	1250 – 1287 MHz			
5	-	GLONASS L2:	1231 -1261 MHz			
6	-	GPS L2:	1217 – 1237 MHz			
7	-	BeiDou B2, Galileo E5b and GLONASS L3:	1187 – 1223 MHz			
8	-	GPS L5 and Galileo E5a:	1161 – 1192 MHz			

2 GNSS_S24

2.1 OVERVIEW

GNSS_S24 is 2-to-4 active splitter with L1, L2, L3 and L5 subbands RF preselection. It is intended to be used with NT1065 demo boards NT1065_EVK, NT1065_FMC, NT1065_USB3 if passive or low gain antennas (cable losses included) should be plugged in. Paired solution provides less than 1dB of total noise figure and more than 35dB of outband RF rejection. Every channel can be assembled to pass through any of available GNSS bands independently, however, it is recommended to verify with application restrictions of NT1065 "Nomada".

2.2 KEY FEATURES

- IO ports:
 - 2 RF inputs with active antenna supply capabilities 3V/5V
 - 4 RF outputs
 - 5V power supply connector
- Total gain 13dB typ.
- Noise figure 0.8dB typ.

2.3 STRUCTURE

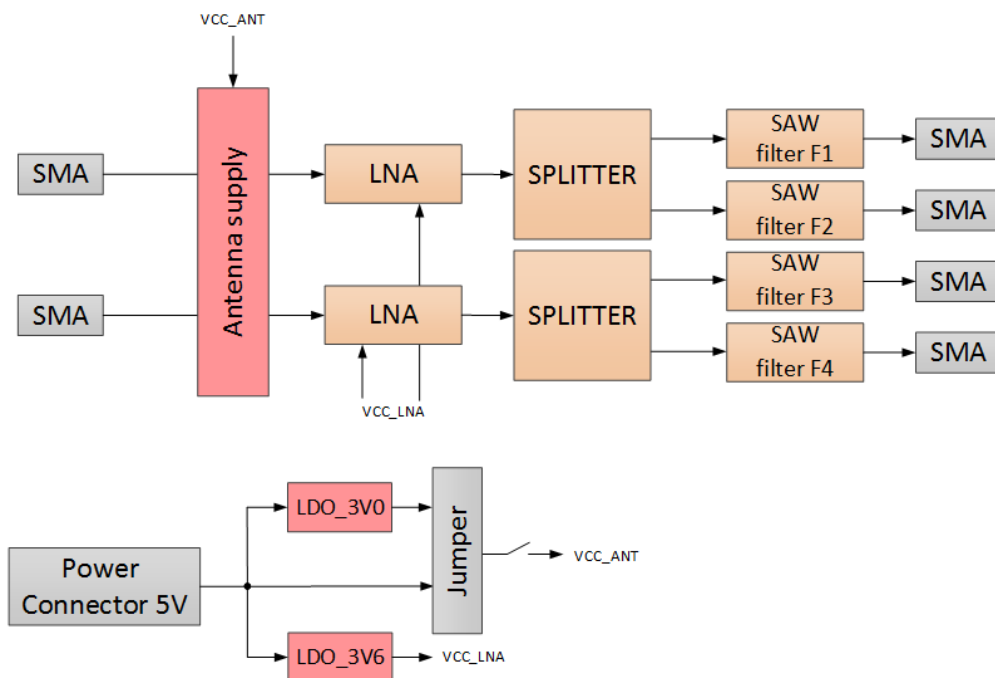


Figure 2.1 GNSS_S24 block diagram

2.4 ASSEMBLY OPTIONS:

BS24 –

X	X	X	X
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SAW filters

F1	F2	F3	F4
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- | | | |
|---|---|--|
| 1 | - | GLONASS L1: 1587 – 1617 MHz |
| 2 | - | GPS L1 and Galileo E1: 1559 – 1587 MHz |
| 3 | - | BeiDou B1: 1556 – 1601 MHz |
| 4 | - | BeiDou B3: 1250 – 1287 MHz |
| 5 | - | GLONASS L2: 1231 -1261 MHz |
| 6 | - | GPS L2: 1217 – 1237 MHz |
| 7 | - | BeiDou B2, Galileo E5b and GLONASS L3: 1187 – 1223 MHz |
| 8 | - | GPS L5 and Galileo E5a:1161 – 1192 MHz |

3 GNSS_S44

3.1 OVERVIEW

GNSS_S44 is a 4-channel RF preselector for L1, L2, L3 and L5 subbands. It is intended to be used with NT1065 demo boards NT1065_EVK, NT1065_FMC, NT1065_USB3 if passive or low gain (cable losses included) antennas should be plugged in. Paired solution provides less than 1dB of total noise figure and more than 35dB of outband RF rejection. Every channel can be assembled to pass through any of available GNSS bands independently, however, it is recommended to verify with application restrictions of NT1065 "Nomada".

3.2 KEY FEATURES

- IO ports:
 - 4 RF inputs with active antenna supply capabilities 3V/5V
 - 4 RF outputs
 - 5V power supply connector
- Total gain 17dB typ.
- Noise figure 0.6dB typ.

3.3 STRUCTURE

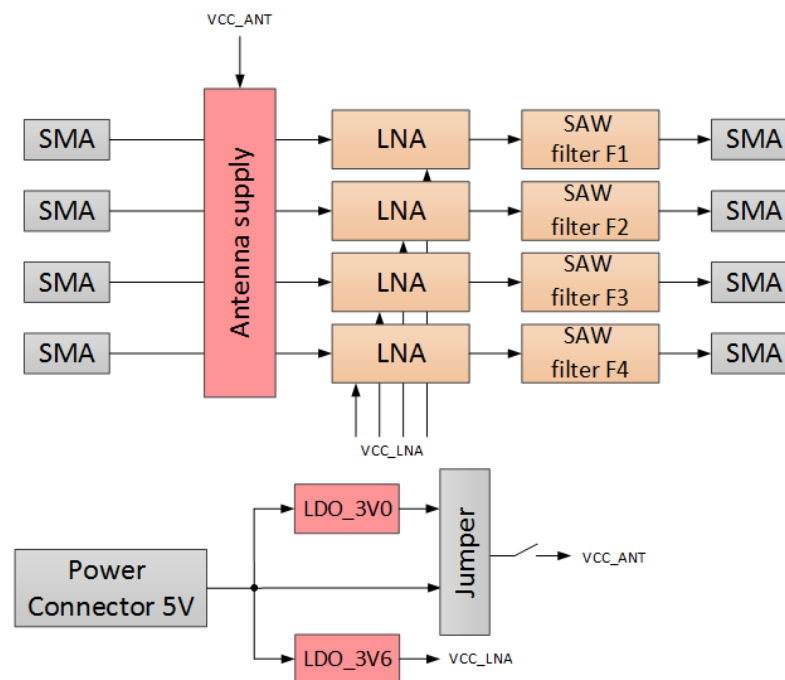


Figure 3.1 GNSS_S44 block diagram

3.4 ASSEMBLY OPTIONS:

BPS4 –

X	X	X	X
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SAW filters

F1	F2	F3	F4
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- | | | |
|---|---|--|
| 1 | - | GLONASS L1: 1587 – 1617 MHz |
| 2 | - | GPS L1 and Galileo E1: 1559 – 1587 MHz |
| 3 | - | BeiDou B1: 1556 – 1601 MHz |
| 4 | - | BeiDou B3: 1250 – 1287 MHz |
| 5 | - | GLONASS L2: 1231 -1261 MHz |
| 6 | - | GPS L2: 1217 – 1237 MHz |
| 7 | - | BeiDou B2, Galileo E5b and GLONASS L3: 1187 – 1223 MHz |
| 8 | - | GPS L5 and Galileo E5a:1161 – 1192 MHz |