

ABSTRACT

Low Noise Amplifier is one of most important device in the system receiver. This device called Low Noise Amplifier because this amplifier strengthening high power but has a low noise.

In this Final Project, It is designed and realized a LNA which operated at frequency 800 MHz. This LNA was designed using two levels of BFR 96 TS transistor organized cascade. As for matching impedance using passive components L and C are composed of three elements using the topology T.

Testing Performance Low Noise Amplifier is done by comparing the results obtained from test results with design specifications. From the results of measurements, the LNA can work at a frequency of 796 MHz with Gain 25.84 dB and the noise figure 17.75 dB. These results differ from the design specification of 800 MHz frequency, Gain 10-18 dB and 2.5-3 dB noise figure. This amplifier can work in the frequency range 776 MHz-821 MHz with 45 MHz bandwidth.