

BIRDS-3 Antenna Radiation Pattern

1st March 2018

Simulation Software – CST Studio

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Content

1. Main Transceiver antenna (UHF 437MHz).
2. 433 MHz LoRa Receiver antenna.
3. 920 MHz LoRa Receiver antenna.

1) Main Transceiver antenna

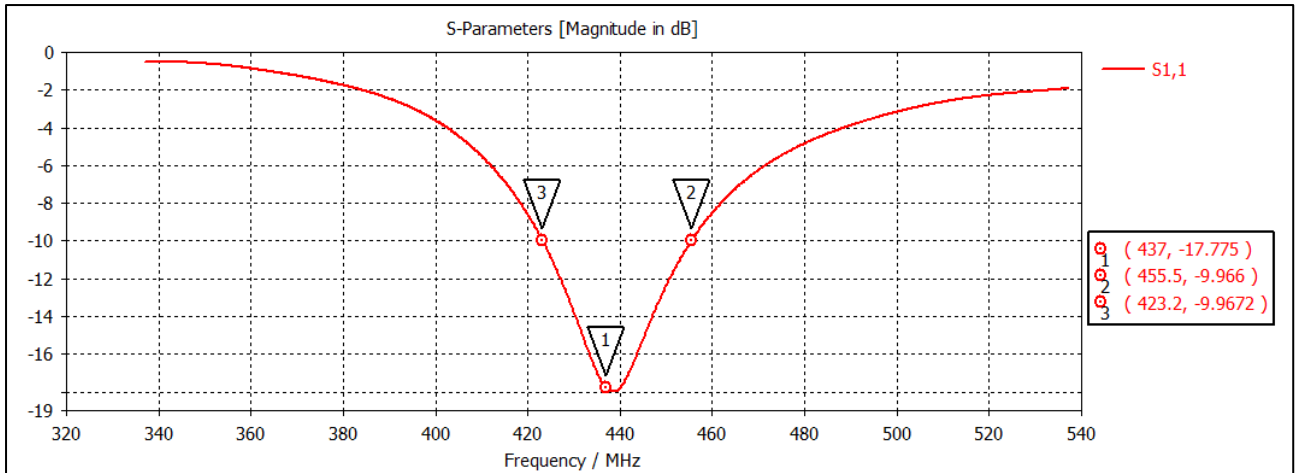


Figure 1.1: S11 variation with frequency

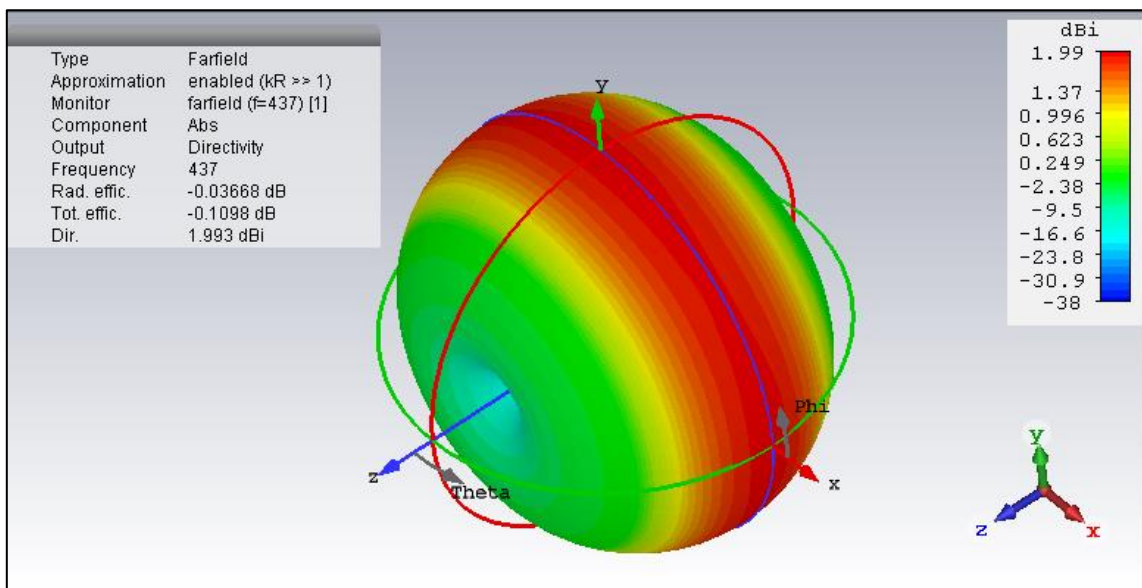


Figure 1.2: 3D radiation pattern (Directivity)

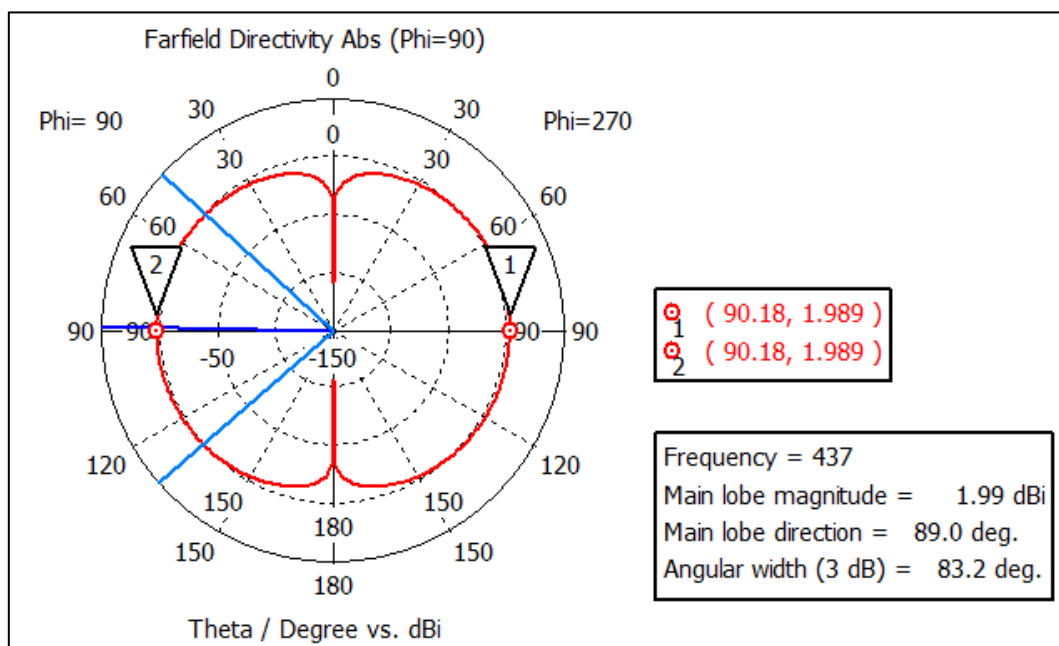


Figure 1.3: 2D radiation pattern (Directivity)

2) 433 MHz LoRa Receiver antenna

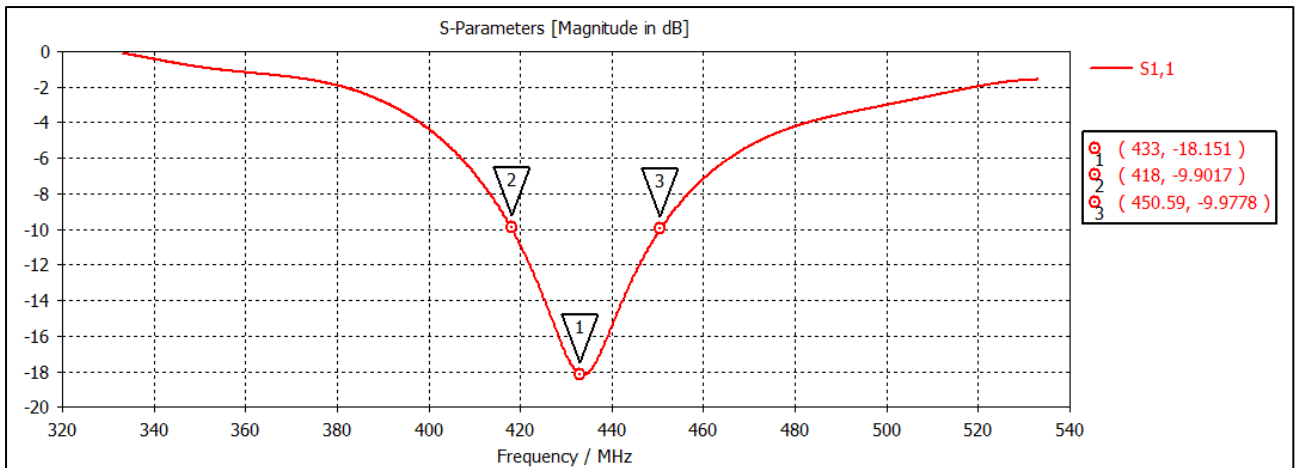


Figure 2.1: S11 variation with frequency

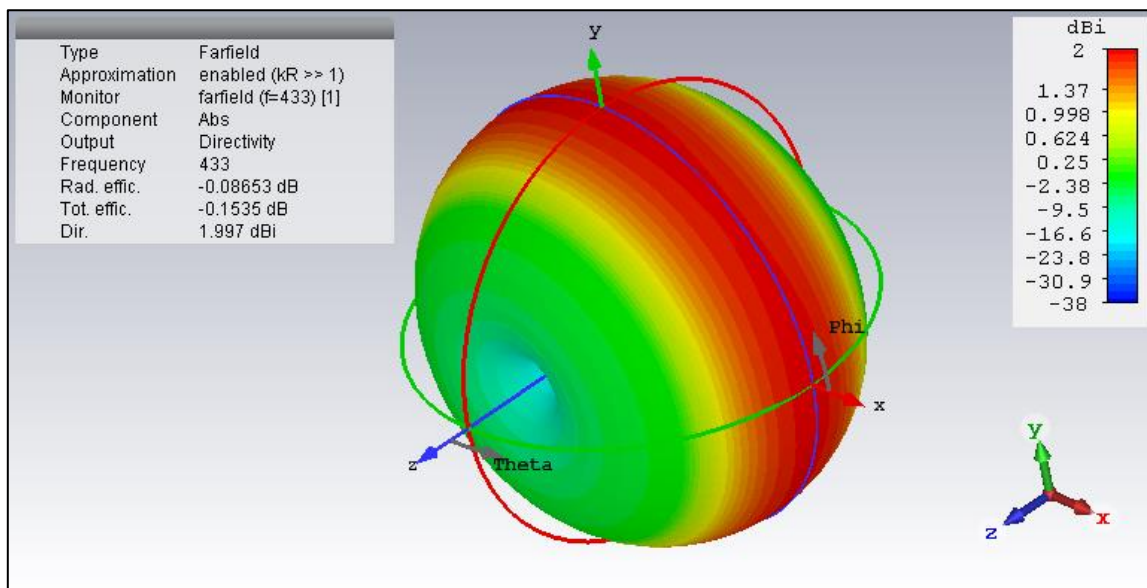


Figure 2.2: 3D radiation pattern (Directivity)

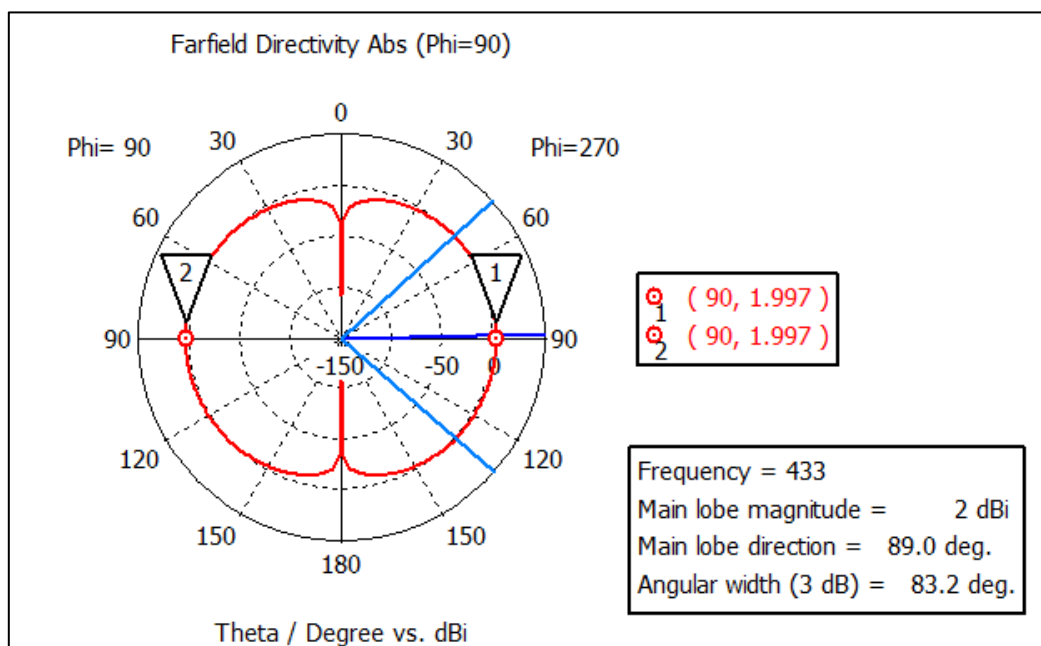


Figure 2.3: 2D radiation pattern (Directivity)

2) 920 MHz LoRa Receiver antenna

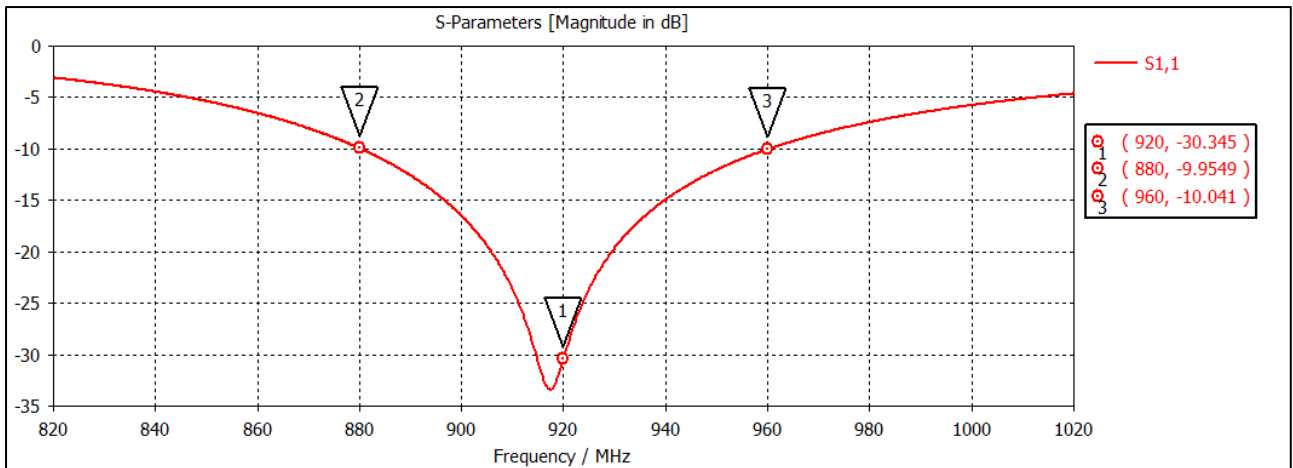


Figure 3.1: S₁₁ variation with frequency

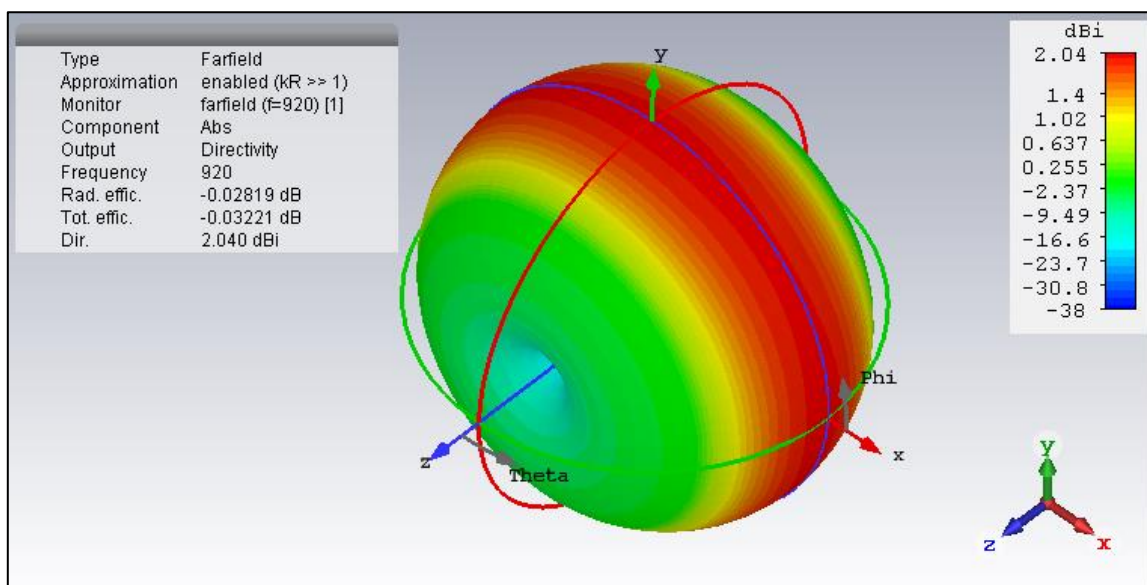


Figure 3.2: 3D radiation pattern (Directivity)

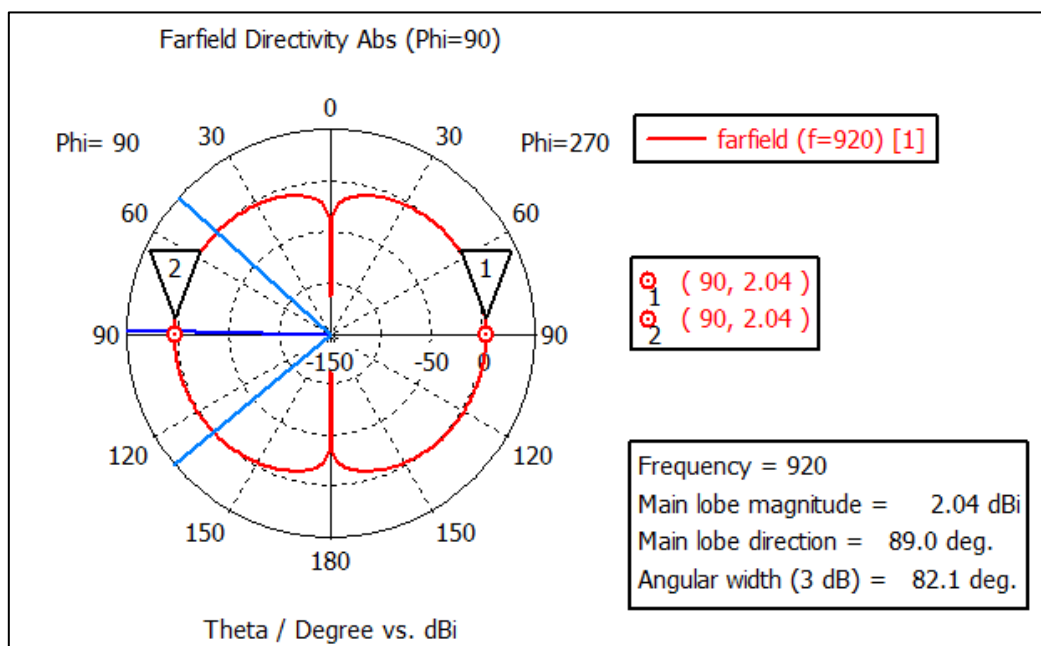


Figure 3.3: 2D radiation pattern (Directivity)