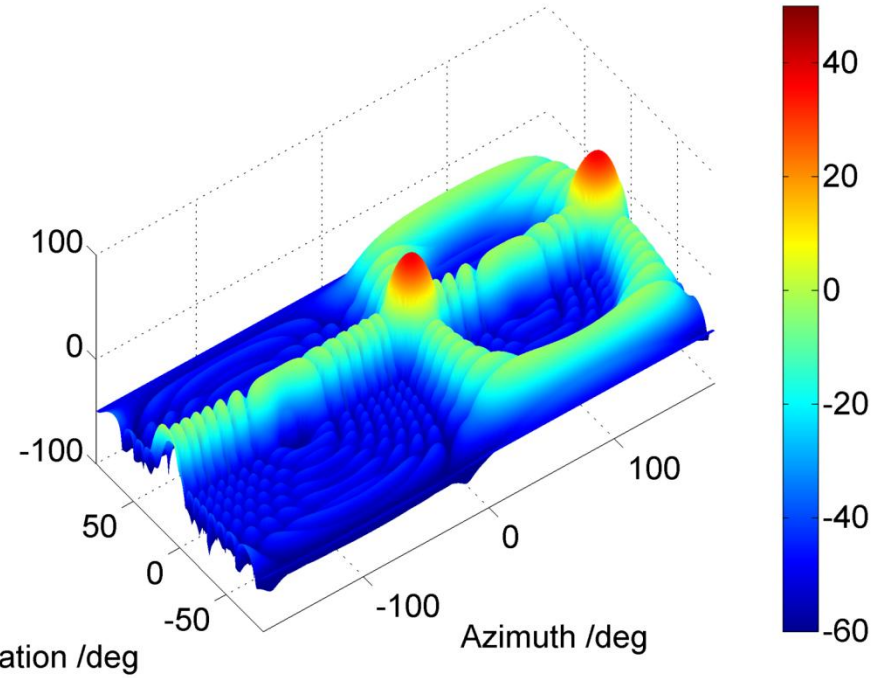
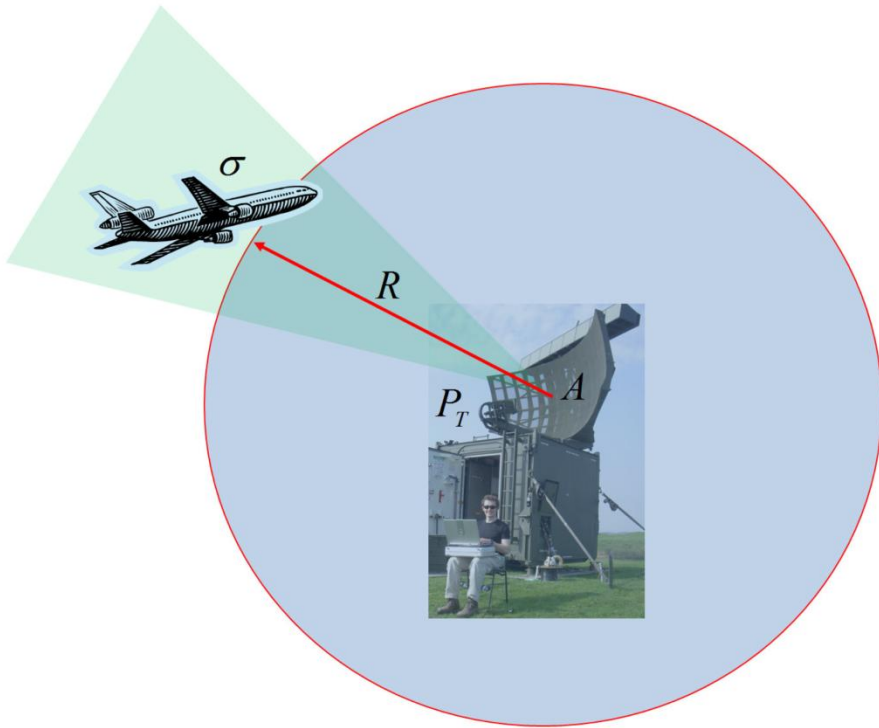
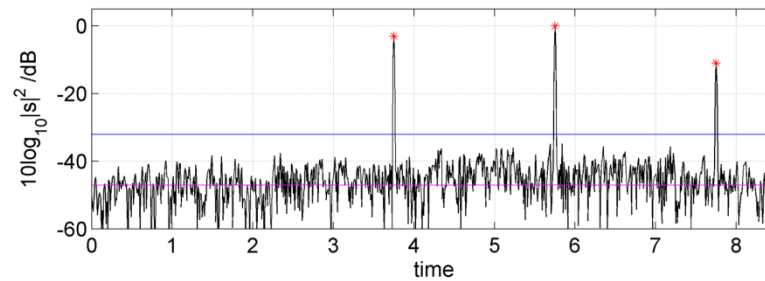


Rectangular array N=16, phi=15, elev=15, s=0.5, dxy=0, R=100

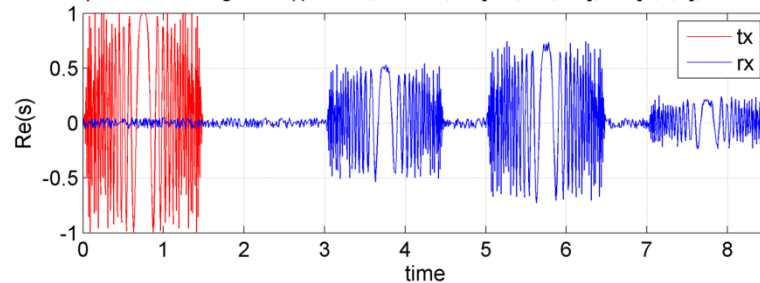


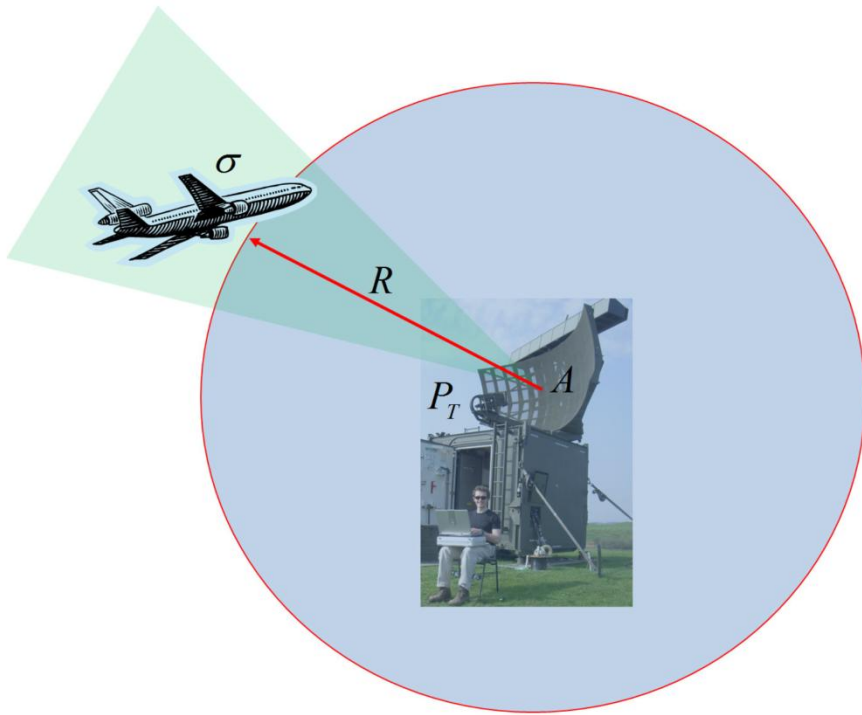
# RADIO Detection And Ranging

Matched filter output: Peak SNR=[44.1,47.1,36.2] dB

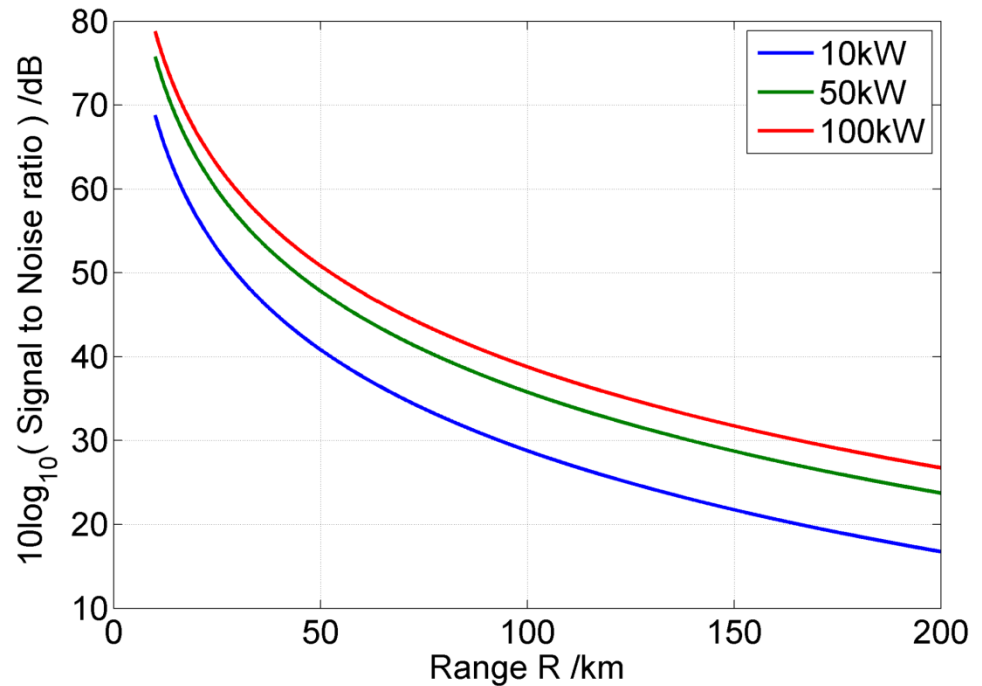


Chirp Tx and Rx signals  $s(t)$ :  $\tau=1.5$ ,  $B=100$ ,  $a=[0.5, 0.7, 0.2]$ ,  $\Delta t=[3, 5, 7]$ , Noise=0.1

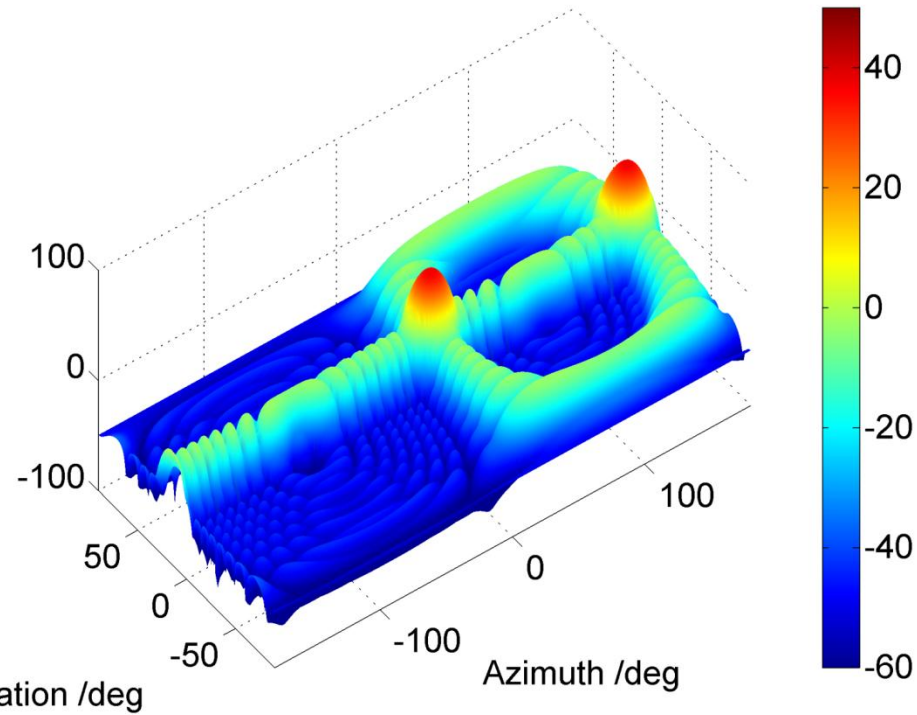




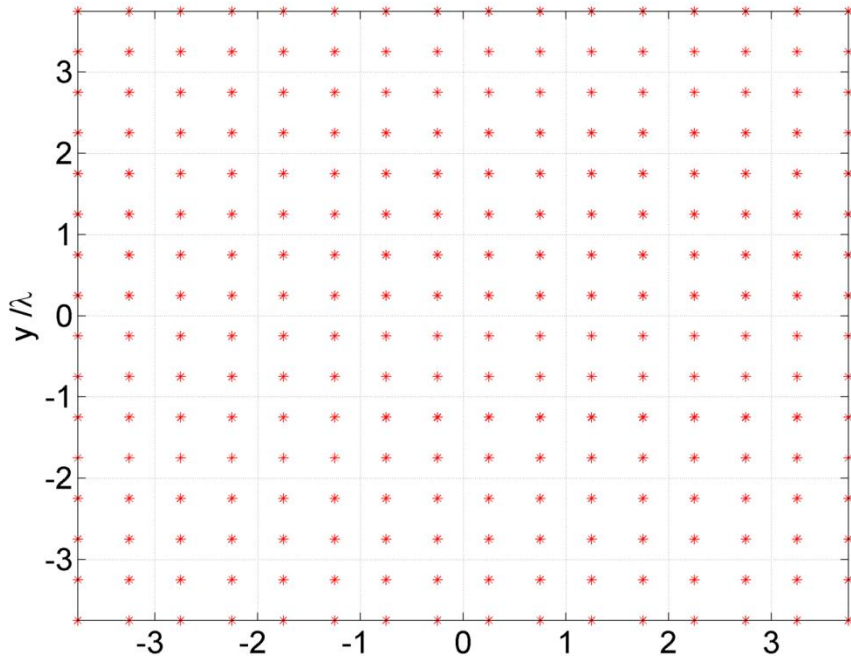
Radar Equation:  $P_t = [10, 50, 100] \text{ kW}$ ,  $\sigma = 20 \text{ m}^2$ ,  $f_c = 3 \text{ GHz}$ ,  $A = 4 \text{ m}^2$   
 $\eta = 0.5$ ,  $E_i = 1$ ,  $n = 8$ ,  $\tau = 25.6 \mu\text{s}$ ,  $T_0 N_f = 500 \text{ K}$ ,  $L = 10 \text{ dB}$ .



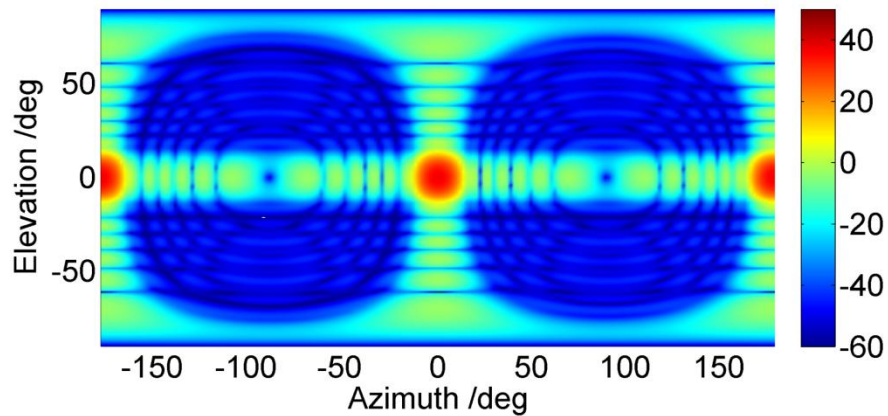
Rectangular array N=16, phi=15, elev=15, s=0.5, dxy=0, R=100



Rectangular array N=16, phi=0, s=0.5, dxy=0, R=100



Rectangular array N=16, phi=0, elev=0, s=0.5, dxy=0, R=100



Rectangular array N=16, phi=15, elev=15, s=0.5, dxy=0, R=100

