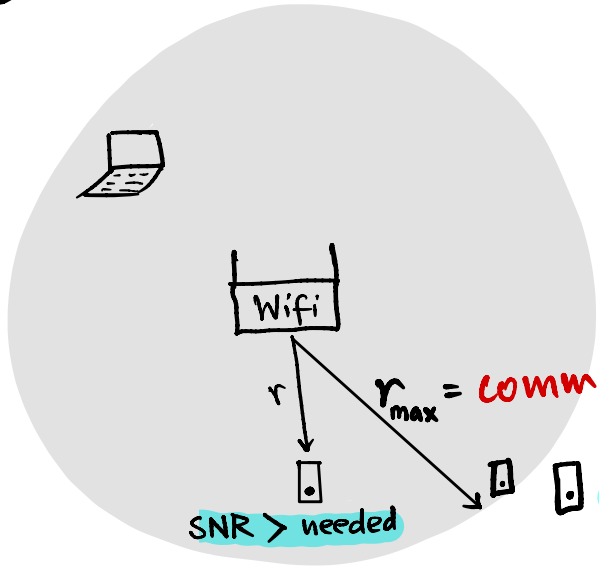


② Communication Range



■ Power attenuates $\frac{1}{r^2}$

■ Received power $S = \frac{\text{Transmit power}}{r^2}$

$P_t = \text{Transmitted power} = 100$
 $N = \text{Noise power} = 3$
 $I = \text{Interference} = 0$
 $\text{SNR needed} = 1.33$

What is the communication range of wifi in this case?