Fading Channels & Mobile Communications IIT Kharagpur

Date: Apr/10/2024

302010

0

-5

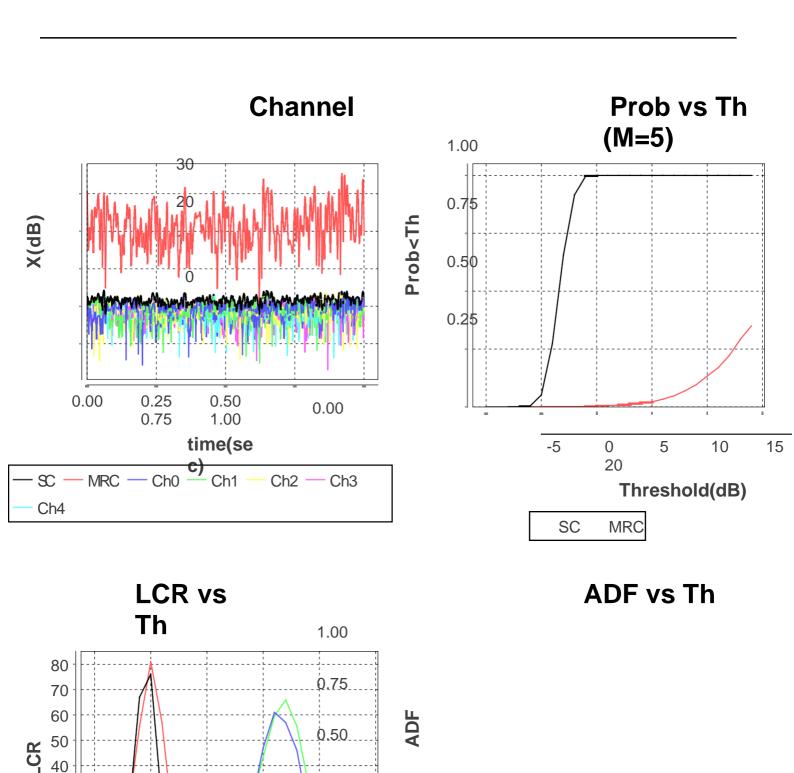
0

5

10

Exp7: Flat Fading

Name: BETC14 Samrudh Deshpande



0.25.

15

20

Threshold(dB)



SC_Exp SC_Theor MRC_Exp	SC_Exp SC_Theor MRC_Exp		
MRC_Theo	MRC_Theo		

Input Parameters							
No.of Multipaths		100					
No.Samples		1000					
Sampling Time(sec)		0.001					
fc(Hz)		9.0E8					
Velocity(mps)		20.0					
Threshold(dB)		0.0					
No.of Branches		5					
Avg SNR(dB)		5.0					
Results							
Туре	LCR(Exp)	LCR(Th)		ADF(Exp)	ADF(Th)		
SC(Actual)	76.0	81.0383		0.0076	0.0051		
SC(Entered)	75.0	73.0		0.0073	0.0036		
MRC(Actual)	0.0	0.0079		0.0	-		
MRC(Entered	0.0	0.007		0.0	-		

Discussion:

The entered and actual values for LCR and ADF are provided for both SC and MRC scenarios.

In SC, the entered LCR is slightly higher than the actual value, whereas the entered ADF is relatively close to the actual value. For MRC, the entered and actual values for LCR match, but there are no actual values provided for ADF.

(Signature of BETC14 SAMRUDH

DESHPANDE)

(Signature of Faculty)