



Correction to: Capacity analysis of maximal ratio combining over Beaulieu-Xie fading

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Equations 21, 22, and 23 were incorrectly captured in the original manuscript. The correct equations are presented below.

Case 1: Rayleigh fading ($m = 1, K = 0$).

The expression in (20) can be reduced to Rayleigh fading by substituting the value of fading parameters, $K = 0$ and $m = 1$ as follows:

$$C_{ORA} = B \times \log_2(e) \times \left(\frac{1}{\bar{\gamma}}\right)^L \times \exp\left(\frac{1}{\bar{\gamma}}\right) \times \sum_{t=0}^{\infty} g_t \times \sum_{h=1}^{t+L} \frac{\Gamma\left(-t-L+h, \frac{1}{\bar{\gamma}}\right)}{\left(\frac{1}{\bar{\gamma}}\right)^h} \quad (21)$$

Case 2: Rician fading ($m = 1, K > 0$).

The expression in (20) can be reduced to Rician fading by substituting the value of fading parameters, $K > 0$ and $m = 1$ as follows:

$$C_{ORA} = B \times \log_2(e) \times \left(\frac{K+1}{\bar{\gamma}}\right)^L \times \exp\left(-KL + \frac{K+1}{\bar{\gamma}}\right) \times \sum_{t=0}^{\infty} g_t \times \sum_{h=1}^{t+L} \frac{\Gamma\left(-t-L+h, \frac{K+1}{\bar{\gamma}}\right)}{\left(\frac{K+1}{\bar{\gamma}}\right)^h} \quad (22)$$

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Case 3: Nakagami- m fading ($m > 0.5$, $K = 0$).

The expression in (20) can be reduced to Nakagami- m fading by substituting the value of fading parameters, $K = 0$ and $m > 0.5$ as follows:

$$C_{ORA} = B \times \log_2(e) \times \left(\frac{m}{\bar{\gamma}}\right)^L \times \exp\left(\frac{m}{\bar{\gamma}}\right) \times \sum_{t=0}^{\infty} g_t \times \sum_{h=1}^{t+L} \frac{\Gamma\left(-t-L+h, \frac{m}{\bar{\gamma}}\right)}{\left(\frac{m}{\bar{\gamma}}\right)^h} \quad (23)$$

Similarly, the expressions derived for other adaptive transmission techniques can be deduced as special case of BX fading channel.

The Publisher regrets this error.

The original article has been corrected.