Abstract

In a 16 Channel, 10 Gbps WDM System with Linearized SOA using feed forward linearization technique the effect of reduced channel spacing has been investigated. The basic mechanism of crosstalk is completely independent of the amplifier but it depends on the spectral overlap of adjacent channel. However in this paper it has been validated that using linearized SOA the system can be extended to 120 Km length with channel spacing as small as 50 GHz. The achieved Q-Factor was 11 at 100km and 4.2 at 120Km.

References

- M. Wirth, A. Singh, J. Scharer, and J. Booske


**Index Terms**

Computer Science  
Applied Electronics

**Keywords**

Feedforward Linearization Technique  
Soa  
Channel Spacing  
Wdm System