

Answers to homework on coding and error control

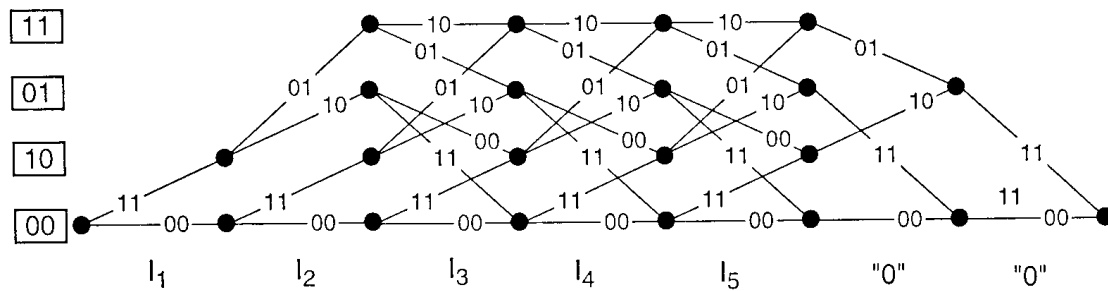
1. Are these Hamming code words (12,8) correctly detected?

a) 1010 1100 0101

b) 1111 1111 1111

Ans: a) No and b) No.

2. Five data bits (information bits) are to be transmitted with convolution coding. Use the Trellis diagram below to calculate the transmitted bits, if the five data bits are:
1 0 1 0 1



Ans: 1/**11** 0/**10** 1/**00** 0/**10** 1/**00** 0/**10** 0/**11** (the bits in bold are sent).