2000 Paper 12 Question 4

Computer Graphics and Image Processing

Explain how a cathode ray tube (CRT) works, including details of how colour is achieved. [8 marks]

Describe a run-length encoding scheme for encoding images whose pixels have eight-bit intensity values. [8 marks]

Calculate the *best* possible compression ratio achievable with your scheme and describe the situation(s) in which this ratio would be achieved. [2 marks]

Calculate the *worst* possible compression ratio achievable with your scheme and describe the situation(s) in which this ratio would be achieved. [2 marks]