Lab 5, DIP1

In this lab we'll do morphological image processing. We'll count the number of connected components in a black/white image.

Exercise 1

Implement a MatLab program that counts the number of grain of rice in the image 'rice.tif'. You must count the number of grains using the morphological method described in GW pp. 645-646 (use 4-connectivity and 8-connectivity). You can give the different connected components different colours, using the command *colormap('lines').*

Exercise 2

Implement a MatLab program that counts the number particles in the image "dots.bmp" thats:

1. on the boundary of the image
2. overlapping
3. not overlapping

(Note: all particles are of the same size).