



FROM VISION TO DECISION

SEMINAR FRIDAY 27.04.12

PLACE: Aud. 2, BBB

TIME : 12:00-13:00

TITLE:

Medical applications of mathematical image processing

SPEAKERS:

12:00-12:35. A survey on segmentation method: past and state of the art.
Xue-Cheng Tai, Mathematics Department

12:35-13:00: Practical image processing results for medical images
Erik Hanson, and Erlend Hodneland, Mathematics Department

ABSTRACT:

Medical images are difficult for automatic processing. Very often manual processing are carried out. In the past few years, tremendous progress with digital image processing has been made. A number of the tasks, which seems to be impossible a few years, can be handled by some new image processing techniques.

In the first part, we will concentrate on image segmentation. A review will be given to some traditionally used methods to some bert new methods developed in the past few years which has great success with speed and accuracy.

In the second part, we will talk about application of image processing methods for: 1) Registration and segmentation of DCE-MRI data of kidney. 2) Segmentation of fluorescently labeled cells, and 3) Tracking of DTI data, creating a connectivity map of the brain.

