Monday, May 6th, 2013
University of Bern
Swiss Computational Neuroscience Seminar

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16h15 – 17h45

Information retrieval in neural network models of long-term memory

The dominant theoretical framework for long-term memory is attractor neural networks (ANN) in which information is encoded by neuronal ensembles and stored by Hebbian synaptic modifications. In my presentation I will address the issues of memory recall in the absence memory-specific retrieval cues, such as in free recall experiments. I will develop an associative model of recall where each retrieved memory item is triggering the recall of the next item. This model can be cast in the language of random graph theory and universal laws of recall can be derived that broadly account for classical free recall experiments.

Hosted by:

Prof. Alexandre Pouget	Prof. Walter Senn	Prof. Wulfram Gerstner	Prof. Richard Hahnloser
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