

Description of Additional Supplementary Files

File Name: Supplementary Movie 1

Description: Closed-loop forecast of the moving bump. Left: ground-truth frames. Second from left: closed-loop forecast for the network with optimal recurrence. Second from right: network activity for the network with optimal recurrence. Right: closed-loop forecast for the network with no recurrence.

File Name: Supplementary Movie 2

Description: Closed-loop forecast of the natural movie. Left: ground-truth frames. Second from left: closed-loop forecast for the network with optimal recurrence. Second from right: network activity for the network with optimal recurrence. Right: closed-loop forecast for the network with no recurrence.

File Name: Supplementary Movie 3

Description: Closed-loop forecasts of topographic network model (top row) versus topographically shuffled network model (bottom row) in which the recurrent weights and time delays were shuffled.

File Name: Supplementary Movie 4

Description: Forecasts of the movie-switching example. Left: ground-truth frames. Right: forecasts.