Meeting: 01-Dec-2017

We discussed about possible applications and ideas of the k-hopping concept. These included

i. Find out whether the k-hopping concept is similar to Edge reversal as in the reference work by Pearl

ii. Is k-hopping the idea behind skip lists? If not, what similarities or differences exist between them.

iii. Is there a probabilistic version of k-hopping on graphs?

iv. Representation of graphs in a compressed manner, that is, is there a method of uniquely representing a graph in a compressed way such that on retrieval, the whole graph can be re gained?

We also discussed progress through out the week which entailed

i. Progress on the technical report write-up

ii. Diffusion in directed networks and how different it is from that of undirected networks

iii. Robust measure known as natural connectivity whose computation is based on the communicability of nodes with in the network. This measure accounts for robustness by considering the possible number of alternative routes that exist between any pair of nodes with in the network. The idea is to compare this measure with that based on laplacian energy drop. Which of the two is a more "sensitive" measure of robustness?