M1 MOSIG 2015-2016

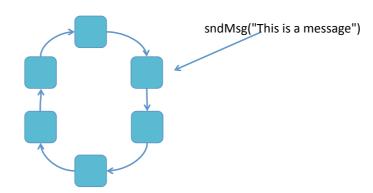
## **LAB 3: Coordination**

## 1) Ring with RabbitMQ

Construct a ring topology using RabbitMQ.

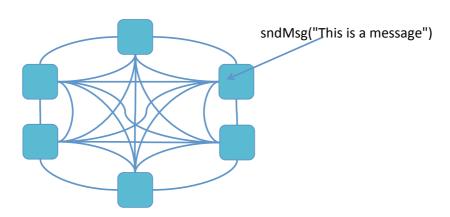
- The ring should be constructed automatically by a program taking the number of nodes as an input parameter.
- Communication between nodes is to be one-way.
- There should be a way to contact a node and ask it to send a message which is to go through all the nodes of the ring and stop at the emitter.

Ring with 6 nodes and 6 links for each pair of nodes



## 2) Fully connected ring with RabbitMQ

Now change the implementation to have a fully connected ring (clique, complete graph) where the a message from one node is multicast to all the other nodes.



## 3) Semaphores with MozartSpaces

- Implement semaphores with tuple spaces.
- Using the semaphores implement the producer/consumer problem.