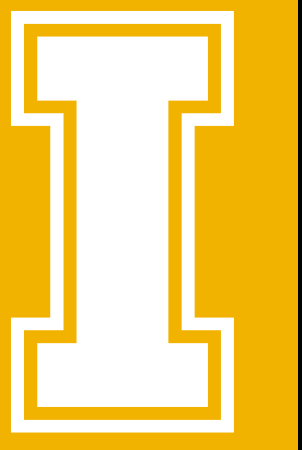


# REALISTIC NETWORK MODELING USING MINETEST



## OBJECTIVE & GOAL

Establish a basis for a realistic and accurate networks for research and instructional purposes through the game Minetest.

## REQUIREMENTS

- A computer
- The game “Minetest”
  - [www.minetest.net](http://www.minetest.net)
- Our modification for the game
  - [www.tinyurl.com/NetworkCraft](http://www.tinyurl.com/NetworkCraft)

## DESIGN

### Computer



Computers are the basic blocks on the network. They will attempt to send messages between one another.

### Switch



Multi-port network bridge that uses the media access control (MAC) addresses of computers to transfer data.

### Cable



Hold the messages and other identifying information while they are in transit through the network.

## FURTHER READING

- Our wiki page can be found at <https://tinyurl.com/NetworkCraftWiki>
- Minetest Modding Tutorials <https://tinyurl.com/MTModBook>

## FUTURE WORK

- Integrate 3D virtual reality technology
- Allow for mass amount of connections with many switches
- Implement checks for accurate MAC addresses

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In our final design, two computers are hooked up to the switch through two cables on each side. If we alter the MAC addresses by right-clicking on each computer, we will be able to see the messages within the corresponding computer if the addresses lined up correctly.

