Instructor: Tedley Meralus

Grade: FAU college students **Subject:** Linux Fundamentals **Duration:** 03/12/17-04-04-17 **Location:**FAU Computer lab

Learning Objective: Students will understand how to operate and navigate Linux for file manipulation, basic bash scripting, navigating through a linux server.

Goals:

- By the end of the course students should be able to perform basic computer function using the Linux operating system and be able to apply that knowledge to practical use
- Students should be able to determine and be able to configure linux software
- Students will use basic linux command to modify and manipulate files

What is Linux? Linux is a collaboratively built open-source operating system modelled on UNIX used across 850,000 phones, 700,000 tv's, 8 out of 10 financial trades, and social media. Linux skills are high in demand and can be used on mobile devices, in Enterprise business systems, web infrastructure, data centers, super computing, and more.

Why Linux?

- Its wide range of applications that run on linux with no charge.
- Linux is more secure than any other server.
- It has a wide compatibility to several hardware.
- Easy to Operate.
- It comes inclusive of drivers.
- Smooth and easy Updating Process.
- Linux is speedy.
- Linux has a community support.
- Linux offers you a chance to utilize a lot of free tools for managing and monitoring networks.

Agenda:

Session 1: Introduction to linux

- commands and use of linux
- navigating through a linux server

Session 2: Linux from a shell point of view

- Bash Scripting
- Understanding the Shell

Session 3: Practical Networking

- Networking commands
- Monitoring Tools and solutions

Session 4: Wrap

- Students use of linux
- Wrap up assignments
- Github lab

Key vocabulary:

- 1. bash
- 2. mv
- 3 ls
- 4. rm
- 5. rmdir
- 6 Touch
- 7. find
- 8. pwd
- 9. man
- 10. uname
- 11. env
- 12. History
- 13. grep
- 14. egrep
- 15. fgrep
- 16. sed

Materials:

- computers in lab
- Projector
- Digital Ocean lab server

Assessment:

Students will demonstrate how to navigate a linux system and file server

Summary:

• Students will confidently apply the lessons they have learned here to pursue a career in the Linux field or explain the fundamentals of linux and its purpose in the IT ecosystem.