Linux and ROS Cheat Sheet

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Variable Declaration $VARIABLE stands for a variable whose name is VARIABLE. For example, $FILE means a file named FILE.
sudo sudo means super user do, elevated right granted

System Info

env	print environment variables
date	print system date and time
cal	print current month calendar
uptime	print system uptime
w	print online users
whoami	print current user
finger $USER	print information about $USER
uname -a	print kernel information
cat /proc/cpuinfo	print cpu information
cat /proc/meminfo	print memory information
man $COMMAND	print user manual of $COMMAND
df	print disk usage
du	print directory space usage
free	print memory and swap usage
whereis $APP	print locations of $APP
which $APP	print print executable file of $APP

Compression

tar cf $FILE.tar $FILES	convert $FILES into $FILE.tar
tar xf $FILE.tar	extract files from $FILE.tar
tar czf $FILE.tar.gz $FILES	compress $FILES into $FILE.tar.gz using Gzip
tar xfz $FILE.tar.gz	extract files from $FILE.tar.gz using Gzip
gzip $FILE	compress $FILE and rename it as $FILE.gz
gzip -d $FILE.gz	decompress $FILE.gz back to $FILE

TODO

difference between ls -a and ls -al
code box for commands
ubuntu mono font for commands
display ip address
sudo apt install
sudo apt update
tar explanation
sudo apt upgrade

File Commands

ls	list contents of files and directories
ls -a	list hidden files and directories
cd $DIR	change working directory to $DIR
cd	change working directory to home
mkdir $DIR	create a directory named $DIR
pwd	print working directory
rm $FILE	remove $FILE
rm -r $DIR	remove $DIR
rm -f $FILE	force remove $FILE
rm -rf $DIR	force remove $DIR
cp $FILE1 $FILE2	copy $FILE1 to $FILE2
cp -r $DIR1 $DIR2	copy $DIR1 to $DIR2
mv $FILE1 $FILE2	move $FILE1 to $FILE2
ln -s $FILE $LINK	create symbolic link $LINK to $FILE
touch $FILE	create $FILE
cat $FILE	view content of $FILE
cat > $FILE	write input into $FILE
more $FILE	print contents of $FILE
head $FILE	print the first 10 lines of $FILE
tail $FILE	print the last 10 lines of $FILE