

Using grep



Andrew Mallett

@theurbanpenguin | www.theurbanpenguin.com

grep

Global **R**egular **E**xpression and **P**rint, or what we like to call grep, is a text search utility used from the Linux command line to globally search file or STDIN for a given regular expression. It will then print matching lines to STDOUT.

Requirement for grep Within DIY 'r' Us



- Search configuration files for settings
- Hardware is mainly undocumented so Danny wants to document the CPU cores in each server
- Process catalog data stored in CSV files

```
$ ifconfig eth0 | grep RX  
$ grep pam_nologin /etc/pam.d/*  
$ grep -c name /proc/cpuinfo
```

Fundamentally grep allows you to search output or files

- 1) Display transmission data from ifconfig
- 2) Show PAM configurations that include a specific module
- 3) Count the number of CPU cores in a host



Demo Time: *Make a Spectacle* from `grep`

Parse CSV File

```
#!/bin/bash
OLDIFS=$IFS; IFS=","
while read product price quantity
do
    echo -e "\e[1;33m$product =====\e[0m\n\
    Price : \t $price \n\
    Quantity : \t $quantity \n"
done < $1
IFS=$OLDIFS
```

```
$ ./parsecsv.sh tools | grep -A2 hammer
```

Use grep to display individual catalog entries

We need three lines for each catalog entry. The entry itself and the following 2 lines

-A specifies how many lines after the match to we want to include



Demo Time: Danny Creates the Catalog Application

Danny has progressed to the next level at DIY 'r' Us; we need to review how he got there...

Summary



Used grep to list hardware detail

Searched PAM configurations for specific settings

Implemented the catalog application

Fasten your seat belts now as
next up we have regular
expressions