# **Using Fabric**

Inland Empire Python User Group June 17th, 2014

Cameron Goodale
@sigep311

#### What is Fabric?

Command Line Interface to Python Functions

Task Execution Runner

It also works via SSH

Python 2.5 - 2.7

http://fabfile.org/

http://docs.fabfile.org/en/latest/

#### How does it work?

Gives you a 'fab' command

Parses fabfile.py in current working dir

Makes functions available

```
Use Case 1:
```

- \$ ssh server1
- \$ command<sub>1</sub>, command<sub>2</sub>, ... command<sub>n</sub>
- \$ exit
- \$ repeat...

Use Case 1 Solution:

\$ fab restart\_services

Use Case 2 (Local Commands):

Monday

\$ command<sub>1</sub>, command<sub>2</sub>, ... command<sub>n</sub>

Tuesday

\$ command<sub>1</sub>, command<sub>2</sub>, ... command<sub>n</sub>

Wednesday

\$ repeat

Use Case 2 Solution (Local Commands):

Monday

\$ fab clean\_and\_build

Tuesday

\$ fab clean\_and\_build

Wednesday

\$ repeat

#### **Demo Code - Setup**

- \$ git clone <a href="https://github.com/cgoodale/IEPUG\_Fabric.git">https://github.com/cgoodale/IEPUG\_Fabric.git</a>
- \$ cd IEPUG\_Fabric
- \$ virtualenv env
- \$ source env/bin/activate
- \$ pip install fabric

#### Demo Code - Using 'fab'

```
$ fab --help
$ fab --list # Useful to see available tasks
$ fab hostname # Runs the hostname() function
$ fab hello # Simple Print (but it can take a kwarg)
$ fab hello:name="Your Name"
$ fab hello:"Your Name"
```

## **Demo Code - Multiple Commands**

```
$ fab clone demo
   mkdir to clone code into
   run git clone
   do an 'ls' on the cloned code
$ fab check demo
   word count the fabfile.py from github
   open the file with vi
   run `git status`
```

#### **Demo Code - Wait for User Input**

\$ fab clean\_demo
Prompt user before rm -rf
do it if user confirms it