

# SSHHOP

It is no secret I am a great fan of ssh, and how we can use it to do all sorts of things securely. So when I find something that I think makes it even a little better, I am always glad. I do a lot of work through gateway servers and servers in different sites, and it can sometimes get a little bothersome always re-entering each command as you bounce from server to server. Thats where sshhop comes in. This is a patch to normal ssh put out by some MIT chaps (thanks guys) which really helps with the one narrow but bothersome problem.

Head to the site ([here](#)) to get it, and once you have it do the normal dance - *configure*, *make*. One gotcha though, on my system the *make* failed and it seems this could be a common problem. But no worries, edit the *sshhop.c* file, look for this section..

```
/* External variables used for command line option parsing in getopt. */
extern int optind;
extern int optreset;
```

And make it look like this..

```
/* External variables used for command line option parsing in getopt. */
extern int optind;
extern int optreset;
extern char *optarg;
```

That should solve the make problem. Now sharp-eyed readers will note that there was no *make install* step. You see after the *make* command you have the *sshhop\_test* binary. You need to copy that into your relevant directory - I just put it in the same folder as my other ssh binaries. Now for the fun part.

To use this is actually simple. This is just a modified normal ssh binary with a new option - the *-H* option. Each *-H* option you specify is a hop through a ssh server. For example, I am at point A and need to get to point C. To get to point C I need to login to point B and then from here login to point C. Now I could always manually do this, or..

```
# sshhop -H bob@192.168.6.106 -H root@192.168.4.105
[21799]
[21799] login for bob@192.168.6.106
[21799] bob@192.168.6.106's password:
[21801]
[21801] login for root@192.168.4.105
[21801] root@192.168.4.105's password:
Last login: from 192.168.6.106
[root@localhost ~]#
```

I think that is very cool. And it even tidies up nicely when you finish up. When you are finished and you close the terminal..

```
[root@localhost ~]# logout

Connection to localhost closed.
process 21801 exited (host 192.168.2.104)
process 21799 exited (host 192.168.2.108)
```

It closes down each hop, until you are back where you started. Linux is full of useful commands that do one thing and do it well. I think this little tool fits that mentality quite well. Give it a whirl and see what you think. Have fun and learn.