RE java and snpEff

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## First of all:

I am exceedingly proud of you! You totally rocked this email! You gave me like 99% of what I needed to think about this problem effectively without me having to ask a single question! I hope that you notice your improved computer literacy and allow yourself to feel some pride as well. You deserve it.

## So on to the snpEff stuff:

when i run “which java” i get:

mariangelabonizzoni@dhcp-v106-224 17:31:49 ~:  
which java  
/usr/bin/java

when i call java, i get the help menu.

When i call java -version, i get the java version as:

mariangelabonizzoni@dhcp-v106-224 17:31:53 ~:  
java -version  
java version "1.8.0\_25"  
Java(TM) SE Runtime Environment (build 1.8.0\_25-b17)  
Java HotSpot(TM) 64-Bit Server VM (build 25.25-b02, mixed mode)

When i call which snpEff, i get:

which snpEff  
/usr/local/bin/snpEff

snpEff is supposely a java program to be run through java -jar snpEff.jar, but when i do it, i always get the message:

mariangelabonizzoni@dhcp-v106-224 17:33:18 ~:  
java -jar snpEff.jar  
Error: Unable to access jarfile snpEff.jar

I tried to run this command with many different variants, like going into /user/local/bin or from /user/bin or using instead of sniper.jar the whole path to the program, but i always get the same message.

interestingly, when i simply type snpEff, i get the help menu. As follows

snpEff  
Error: Missing command  
  
snpEff version SnpEff 3.6c (build 2014-05-20), by Pablo Cingolani  
Usage: snpEff [command] [options] [files]  
  
Run 'java -jar snpEff.jar command' for help on each specific command  
  
Available commands:  
 [eff] : Calculate effect of variants. Default: eff  
(no command or 'eff').  
 build : Build a SnpEff database.  
 XXXXXXXXXXX  
 -ud , -upDownStreamLen <int> : Set upstream downstream interval length  
(in bases)

### My reply:

Yes.

I am fairly certain that the correct way to call snpEff is to omit the java -jar call and simply call snpEff directly. The reason for this is that it has been installed in /usr/local/bin which is almost always in the user’s $PATH variable by default. The way that it is installed the java -jar portion is implied and the computer takes care of it behind the scenes.

The help text is an unfortunate confusion: for **for sure**. But again, I am quite proud that you basically figured this out without my help at all. Very nice work, Dr!

## The genome data files:

the big problem that i have is that i have to build a genomic database because the organism that i want to study is not supported (it is an asian mosquito). i downloaded the required genome sequences and annotation file in GTF from vectorbase and i followed (i thik i did) the instruction in the “create database” from the snpEff menu page. but i keep getting the same message as: genome not found. see below. i tried i do not how amny different options to change the name of the files, to run the comand from different folders, to change the configuration file for snapped, i alwasy get the same message. like the genome file is not seen. it is driving me creasy!!!! any idea? I wrote to the snpEff developers, but thye have not had the curtesy to reply yet. any suggestion would be great!!! thanks

snpEff build -gtf22 /Volumes/Seagate\_Exp\_1/snpEff/data/AsinC2.1  
java.lang.RuntimeException: Property:  
'/Volumes/Seagate\_Exp\_1/snpEff/data/AsinC2.1.genome' not found  
 at ca.mcgill.mcb.pcingola.interval.Genome.<init>(Genome.java:92)  
 at ca.mcgill.mcb.pcingola.snpEffect.Config.readGenomeConfig(Config.java:513)  
 at ca.mcgill.mcb.pcingola.snpEffect.Config.readConfig(Config.java:476)  
 at ca.mcgill.mcb.pcingola.snpEffect.Config.init(Config.java:377)  
 at ca.mcgill.mcb.pcingola.snpEffect.Config.<init>(Config.java:99)  
 at  
ca.mcgill.mcb.pcingola.snpEffect.commandLine.SnpEff.loadConfig(SnpEff.java:236)  
 at  
ca.mcgill.mcb.pcingola.snpEffect.commandLine.SnpEffCmdBuild.run(SnpEffCmdBuild.java:256)  
 at ca.mcgill.mcb.pcingola.snpEffect.commandLine.SnpEff.run(SnpEff.java:685)  
 at ca.mcgill.mcb.pcingola.snpEffect.commandLine.SnpEff.main(SnpEff.java:118)

### My reply:

Ok. This is a bit more complicated. I am going to have to try looking through the snpEff.config file that they mention. It looks like this file is how you set up all the locations of things that you will need to organize to let snpEff know how to build its databases. Did you configure this file yet? If so, would you send me the file so I have a place to start?

Gus