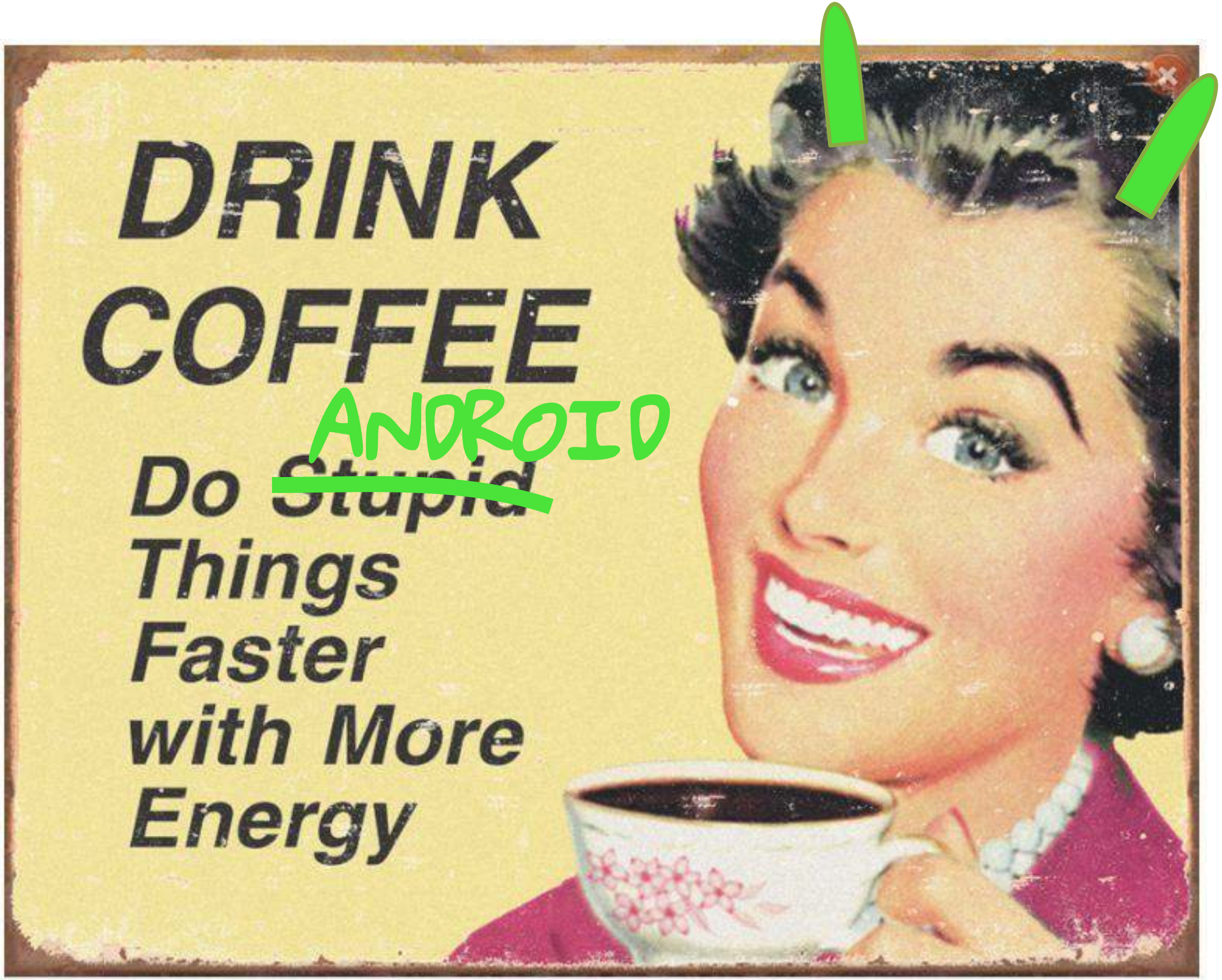


DRINK
COFFEE
ANDROID
Do ~~Stupid~~
Things
Faster
with More
Energy

Fin

Fine.

I’ll reveal my secrets.

Wait, wait... don’t tell me

This is a snapshot of my current setup.

You’ll probably spot lots of things I could improve...

…so please consider giving your own tips talk!

What’s in it for us?

65% Android Studio

18% Terminal

10% git + GitHub

3% Chrome

What’s in it for us?

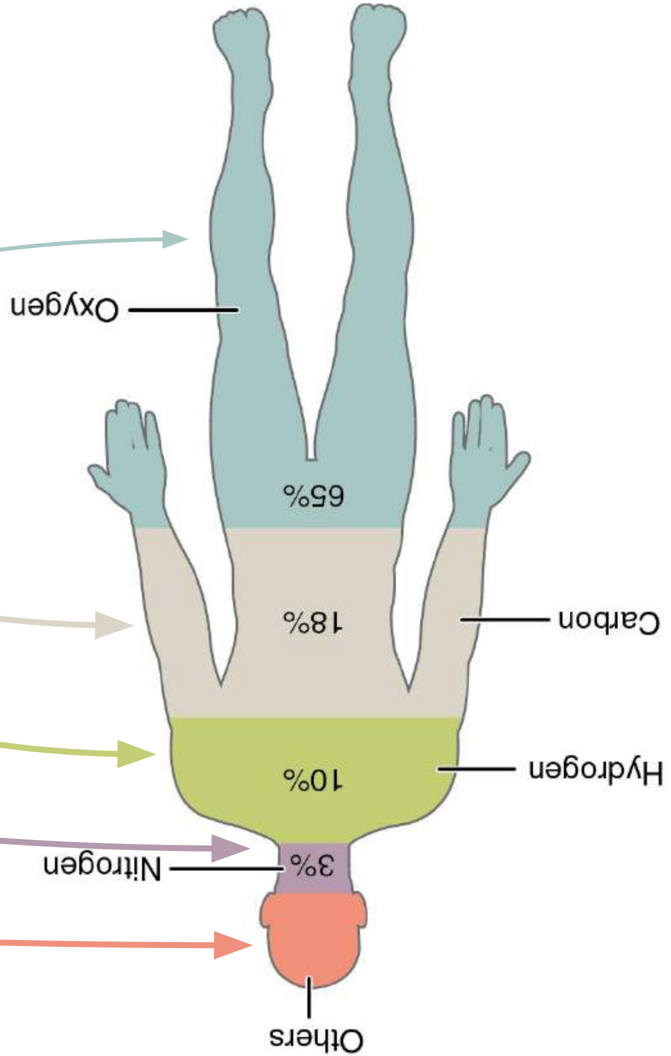
65% Android Studio

18% Terminal

10% git + GitHub

3% Chrome

(4% “Jokes”)



Android Studio topics

Shortcuts (& Productivity Guide)

Terminal

Plugins

Split Window

Shortcuts

Always use the **Mac OS X 10.5+** shortcuts:

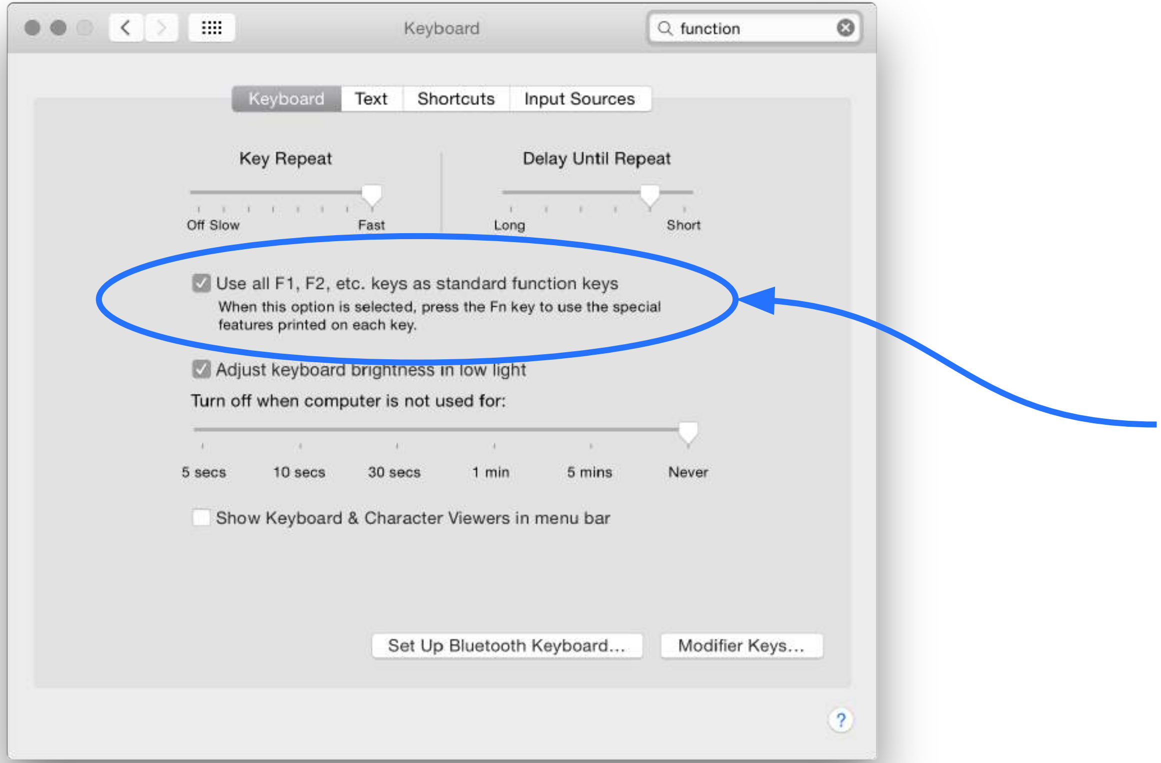
Preferences → Keymap

Sticking with defaults is preferred (pairing).

See *all* shortcuts (Android Studio v1.0.2):

Help → Default Keymap Reference

Shortcuts



☑ Use all F1, F2, etc. keys as standard function keys
When this option is selected, press the Fn key to use the special features printed on each key.

☑ Adjust keyboard brightness in low light

Turn off when computer is not used for:

□ Show Keyboard & Character Viewers in menu bar

Recommended
for sanity.

Shortcuts

My personal shortcut reference, quasi-ranked:

https://gist.github.com/stkent/349cdda974fdb9697be5

Sometimes, one child is just going to be way better than the others.

Shortcuts: navigation

Command-B

Go to declaration of the symbol at cursor location.

Great combined with: **Command-[** and **Command-]**

Skip back/forward through cursor position history.

Inline alternatives: **Command-Y** (pop-up symbol definition), **F1** (pop-up javadoc).

Shortcuts: navigation

Command-O

Search for and go to any **class** by name.

Command-Shift-O

Search for and go to any **file** by name.

Command-Option-O

Search for and go to any **symbol** by name.

Shortcuts: navigation

Command-Shift-F

Search for text across **all** files (e.g. search for UI string).

Command-E

List recently-opened files.

Command-F12

Show class structure.

Shortcuts: refactor

Shift-F6

Rename **all** copies of the symbol at cursor location.

Control-T

View full refactor menu (rename/move/extract etc.)

Shortcuts: general

Command-N

Generate code (e.g. accessors/constructors) in class.

Command-P

Show allowed method parameters (must be inside parentheses).

Control-Space

List available methods/completions in pop-up.

Shortcuts: general

Option-Command-F7

List **all** usages of symbol at cursor.

Option-Enter

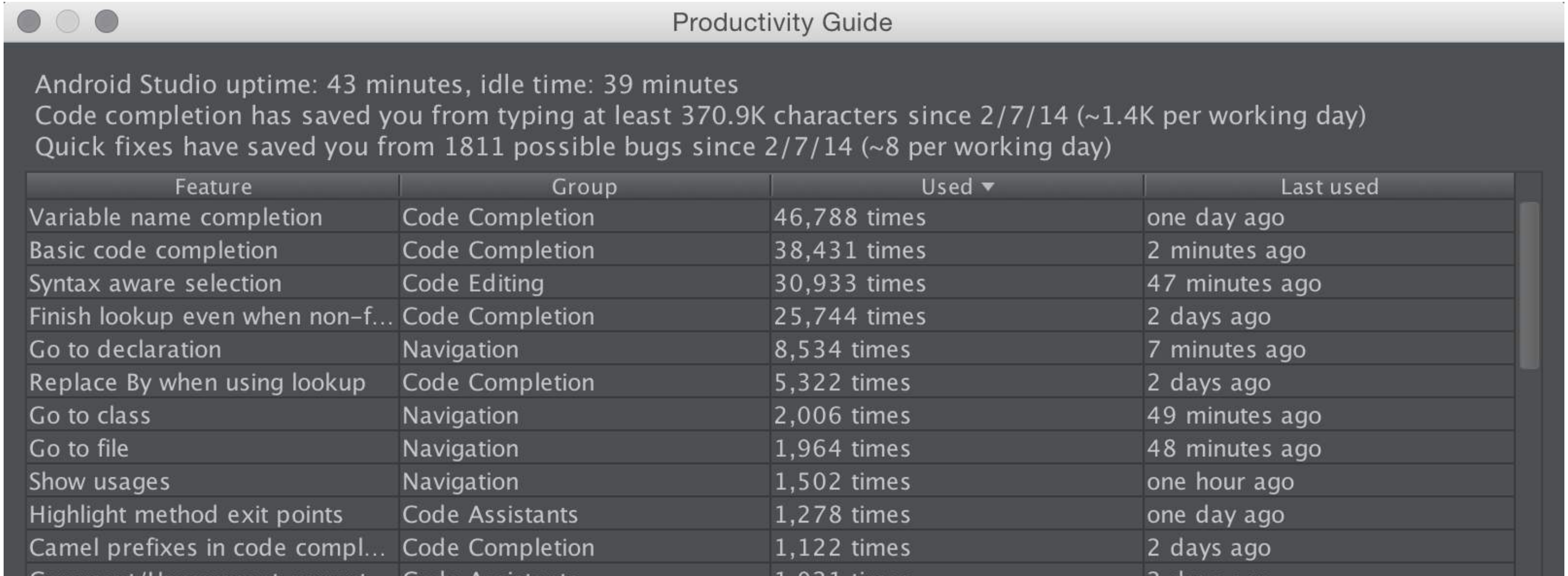
List available quick-fixes for code warning/error at cursor.

Great combined with: **F2**

Moves cursor to next warning/error in file.

Shortcuts: am I doing it right?

Help → Productivity Guide



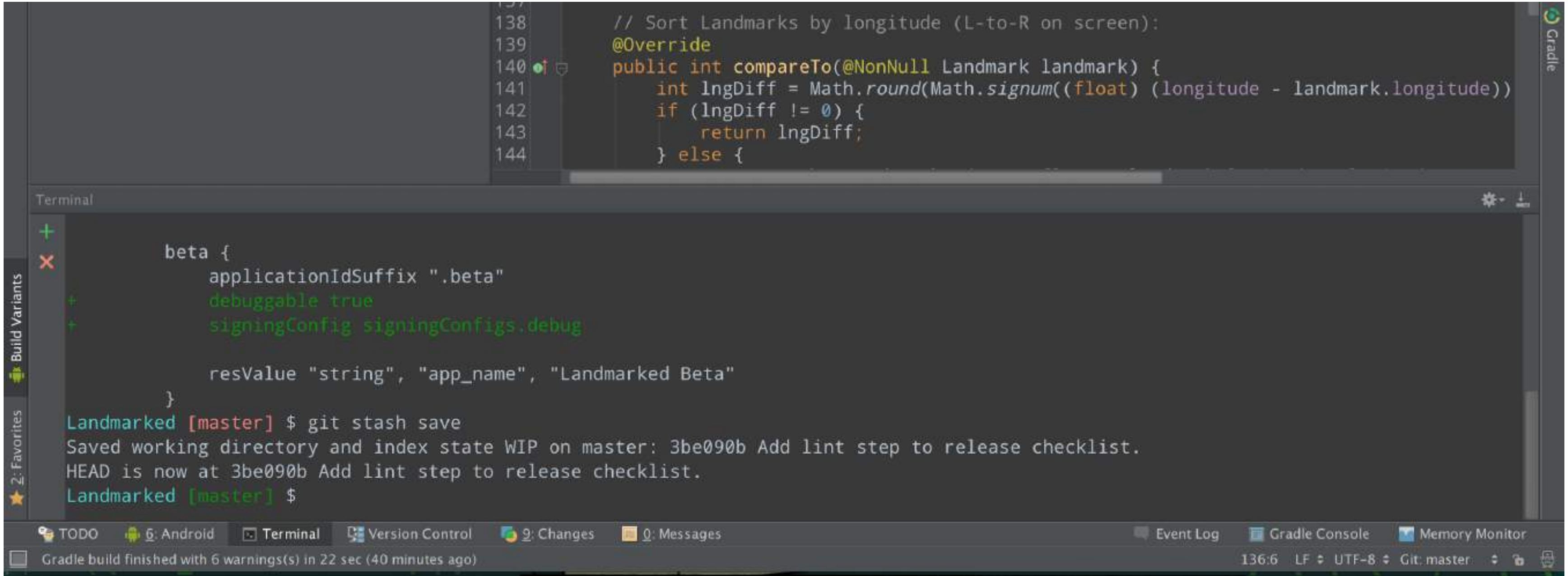
Productivity Guide

Android Studio uptime: 43 minutes, idle time: 39 minutes
Code completion has saved you from typing at least 370.9K characters since 2/7/14 (~1.4K per working day)
Quick fixes have saved you from 1811 possible bugs since 2/7/14 (~8 per working day)

Feature	Group	Used ▾	Last used
Variable name completion	Code Completion	46,788 times	one day ago
Basic code completion	Code Completion	38,431 times	2 minutes ago
Syntax aware selection	Code Editing	30,933 times	47 minutes ago
Finish lookup even when non-f...	Code Completion	25,744 times	2 days ago
Go to declaration	Navigation	8,534 times	7 minutes ago
Replace By when using lookup	Code Completion	5,322 times	2 days ago
Go to class	Navigation	2,006 times	49 minutes ago
Go to file	Navigation	1,964 times	48 minutes ago
Show usages	Navigation	1,502 times	one hour ago
Highlight method exit points	Code Assistants	1,278 times	one day ago
Camel prefixes in code compl...	Code Completion	1,122 times	2 days ago

Terminal

Option-F12 shows/hides the Android Studio terminal



```
    // Sort Landmarks by longitude (L-to-R on screen):
    @Override
    public int compareTo(@NonNull Landmark landmark) {
        int lngDiff = Math.round(Math.signum((float) (longitude - landmark.longitude))
        if (lngDiff != 0) {
            return lngDiff;
        } else {
```

```
        beta {
            applicationIdSuffix ".beta"
+           debuggable true
+           signingConfig signingConfigs.debug

            resValue "string", "app_name", "Landmarked Beta"
        }
Landmarked [master] $ git stash save
Saved working directory and index state WIP on master: 3be090b Add lint step to release checklist.
HEAD is now at 3be090b Add lint step to release checklist.
Landmarked [master] $
```

Gradle build finished with 6 warnings(s) in 22 sec (40 minutes ago)

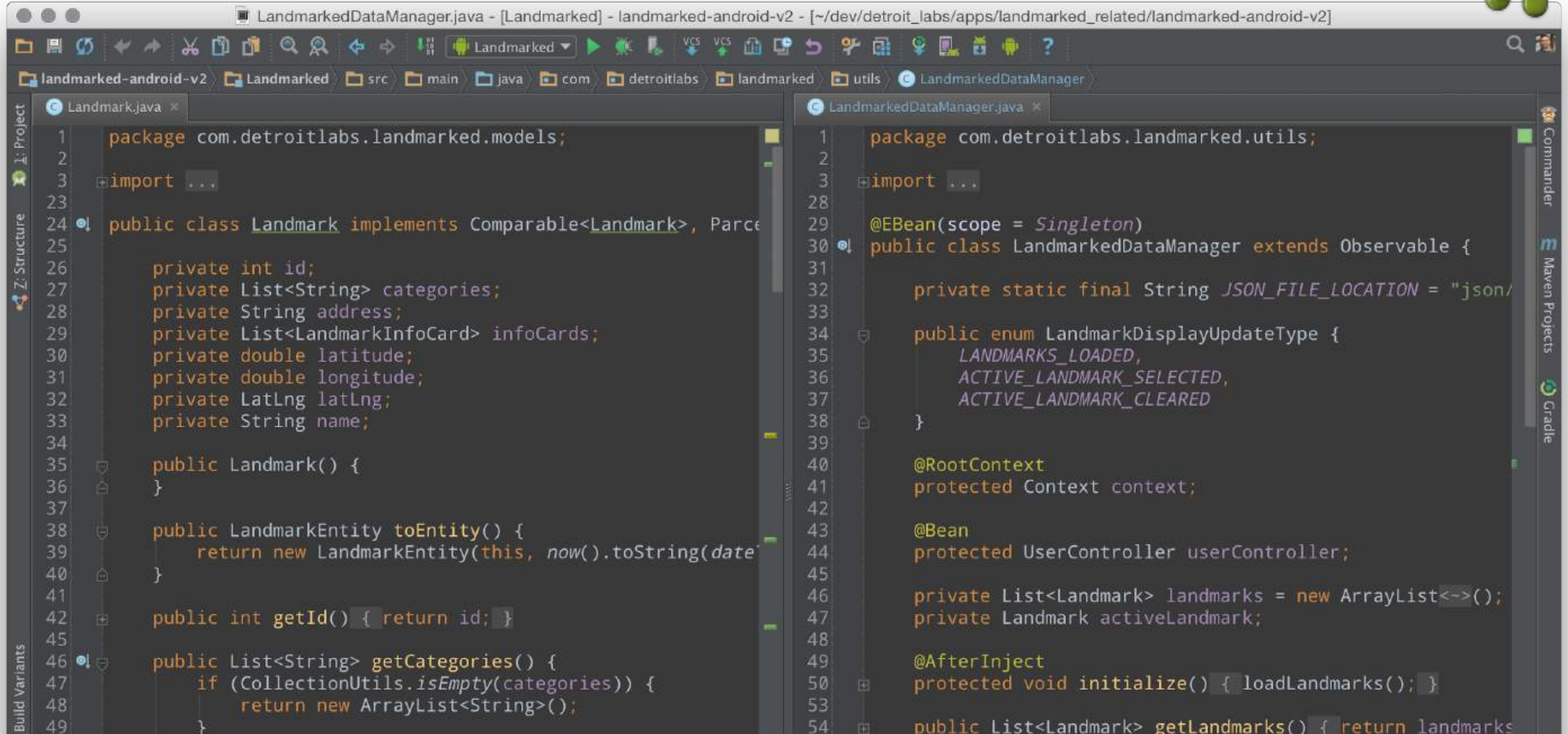
Plugins

Favorites

- Parcelable generator: auto-implement Parcelable
- Java decompiler: view decompiled source code

Others of interest: Bash Support, Hungry Backspace… do some searching!

Split Window



LandmarkedDataManager.java - [Landmarked] - landmarked-android-v2 - [~/dev/detroit_labs/apps/landmarked_related/landmarked-android-v2]

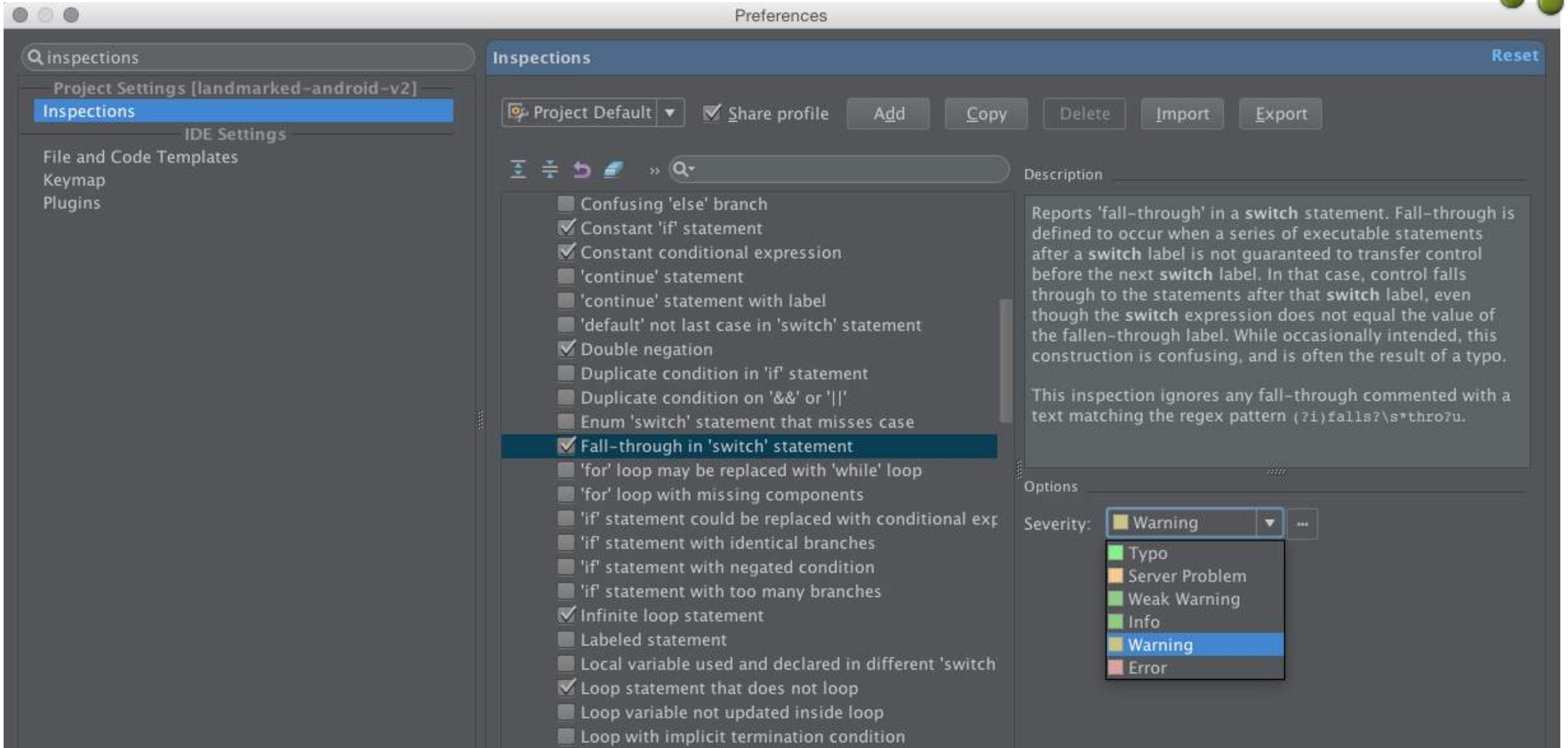
Landmark.java

```
package com.detroitlabs.landmarked.models;

import ...

public class Landmark implements Comparable<Landmark>, Parce

    private int id;
    private List<String> categories;
    private String address;
    private List<LandmarkInfoCard> infoCards;
    private double latitude;
    private double longitude;
    private LatLng latLng;
    private String name;

    public Landmark() {
    }

    public LandmarkEntity toEntity() {
        return new LandmarkEntity(this, now().toString(date
    }

    public int getId() { return id; }

    public List<String> getCategories() {
        if (CollectionUtils.isEmpty(categories)) {
            return new ArrayList<String>();
        }
```

LandmarkedDataManager.java

```
package com.detroitlabs.landmarked.utils;

import ...

@EBean(scope = Singleton)
public class LandmarkedDataManager extends Observable {

    private static final String JSON_FILE_LOCATION = "json/

    public enum LandmarkDisplayUpdateType {
        LANDMARKS_LOADED,
        ACTIVE_LANDMARK_SELECTED,
        ACTIVE_LANDMARK_CLEARED
    }

    @RootContext
    protected Context context;

    @Bean
    protected UserController userController;

    private List<Landmark> landmarks = new ArrayList<~>();
    private Landmark activeLandmark;

    @AfterInject
    protected void initialize() { loadLandmarks(); }

    public List<Landmark> getLandmarks() { return landmarks
```

Custom Inspections



☑ Share profile

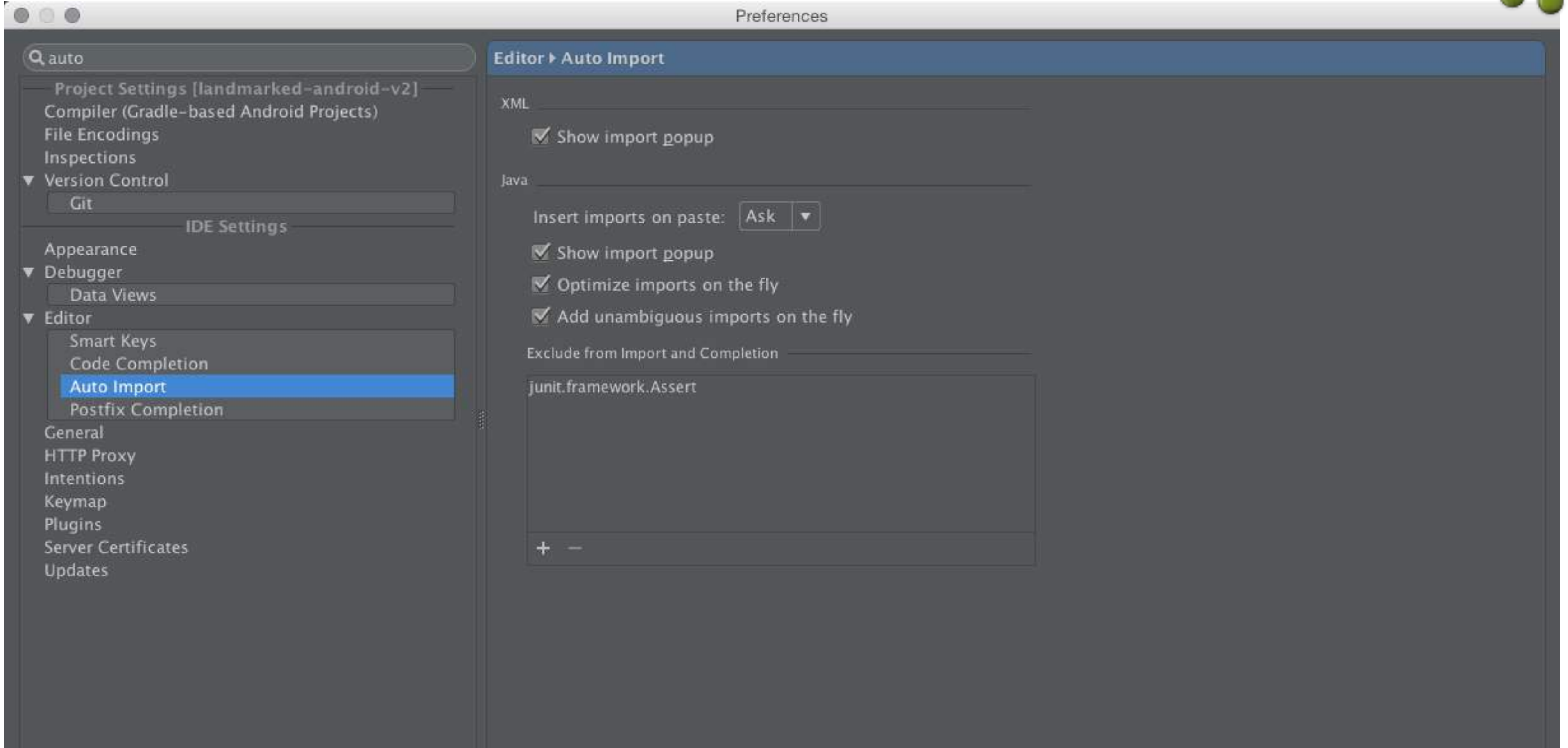
- □ Confusing 'else' branch
- ☑ Constant 'if' statement
- ☑ Constant conditional expression
- □ 'continue' statement
- □ 'continue' statement with label
- □ 'default' not last case in 'switch' statement
- ☑ Double negation
- □ Duplicate condition in 'if' statement
- □ Duplicate condition on '&&' or '||'
- □ Enum 'switch' statement that misses case
- ☑ Fall-through in 'switch' statement
- □ 'for' loop may be replaced with 'while' loop
- □ 'for' loop with missing components
- □ 'if' statement could be replaced with conditional exp
- □ 'if' statement with identical branches
- □ 'if' statement with negated condition
- □ 'if' statement with too many branches
- ☑ Infinite loop statement
- □ Labeled statement
- □ Local variable used and declared in different 'switch
- ☑ Loop statement that does not loop
- □ Loop variable not updated inside loop
- □ Loop with implicit termination condition

Reports 'fall-through' in a **switch** statement. Fall-through is defined to occur when a series of executable statements after a **switch** label is not guaranteed to transfer control before the next **switch** label. In that case, control falls through to the statements after that **switch** label, even though the **switch** expression does not equal the value of the fallen-through label. While occasionally intended, this construction is confusing, and is often the result of a typo.

This inspection ignores any fall-through commented with a text matching the regex pattern `(?i)falls?\s*thro?u`.

Severity: Warning

Auto Imports



Preferences

auto

Project Settings [landmarked-android-v2]
Compiler (Gradle-based Android Projects)
File Encodings
Inspections
▼ Version Control
Git
IDE Settings
Appearance
▼ Debugger
Data Views
▼ Editor
Smart Keys
Code Completion
Auto Import
Postfix Completion
General
HTTP Proxy
Intentions
Keymap
Plugins
Server Certificates
Updates

Editor ▸ Auto Import

XML

☑ Show import popup

Java

Insert imports on paste: Ask ▾

☑ Show import popup

☑ Optimize imports on the fly

☑ Add unambiguous imports on the fly

Exclude from Import and Completion

junit.framework.Assert

Terminal topics

iTerm 2

bash-related customization

Aliasing git commands

Handy Android functions

iTerm 2

Consider using in place of stock OS X Terminal app…

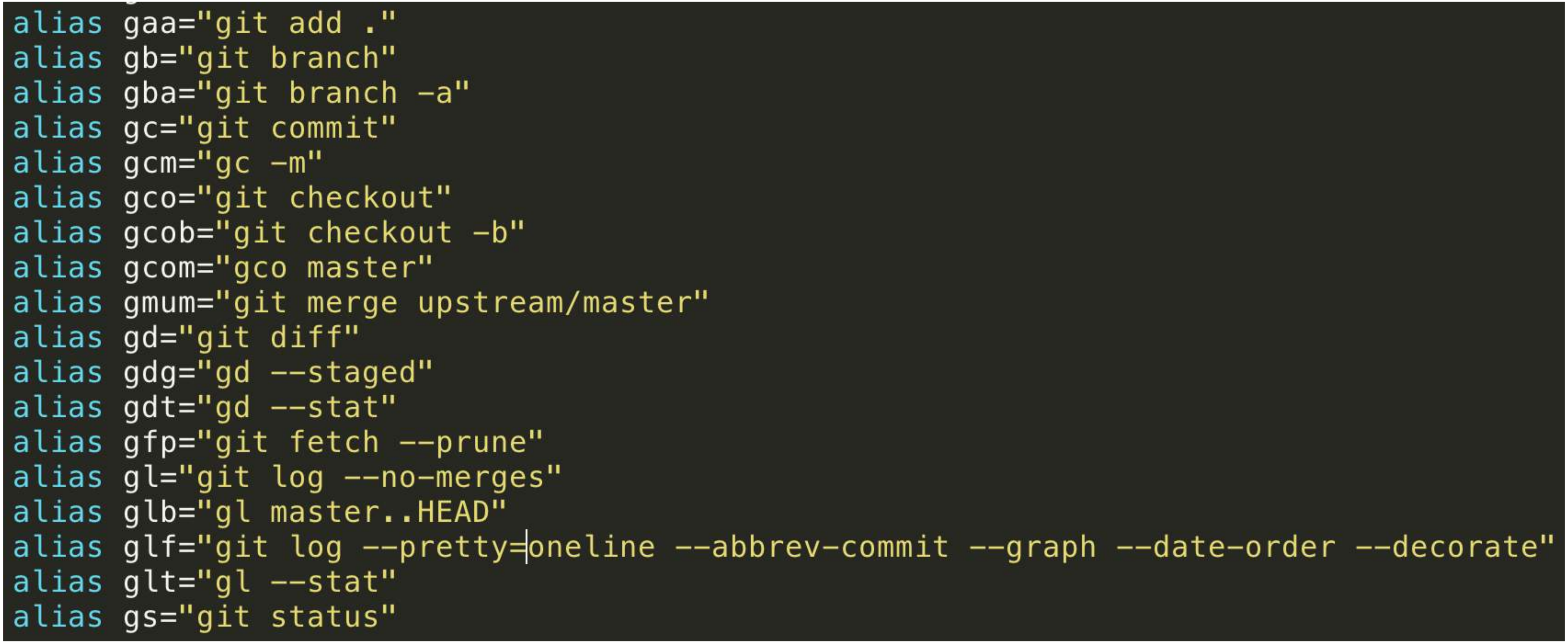
…or consider using zsh + oh-my-zsh?

(I’m not really a terminal/shell guru)

bash-related configuration

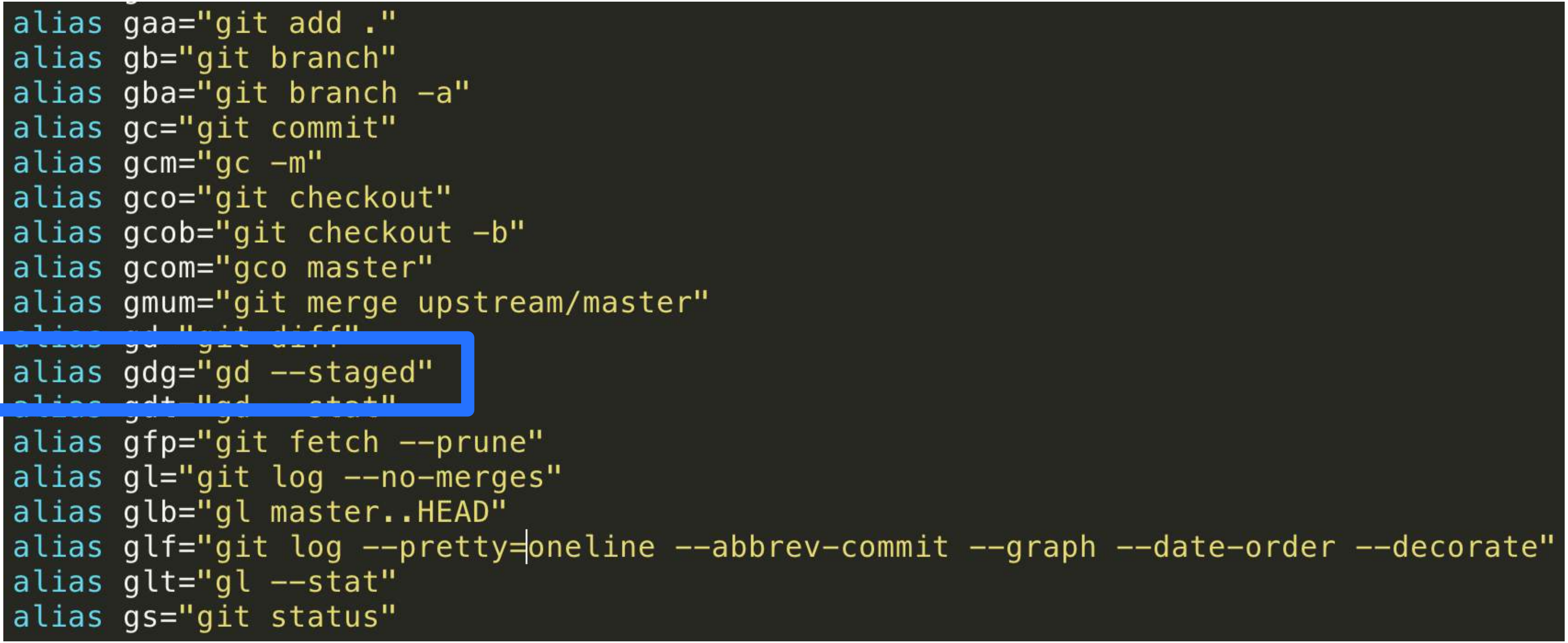
- `cd ~`
- `touch .bash_profile` (if it doesn’t already exist).
- Open `.bash_profile` using your favorite editor.
- Customize!

Aliasing git commands



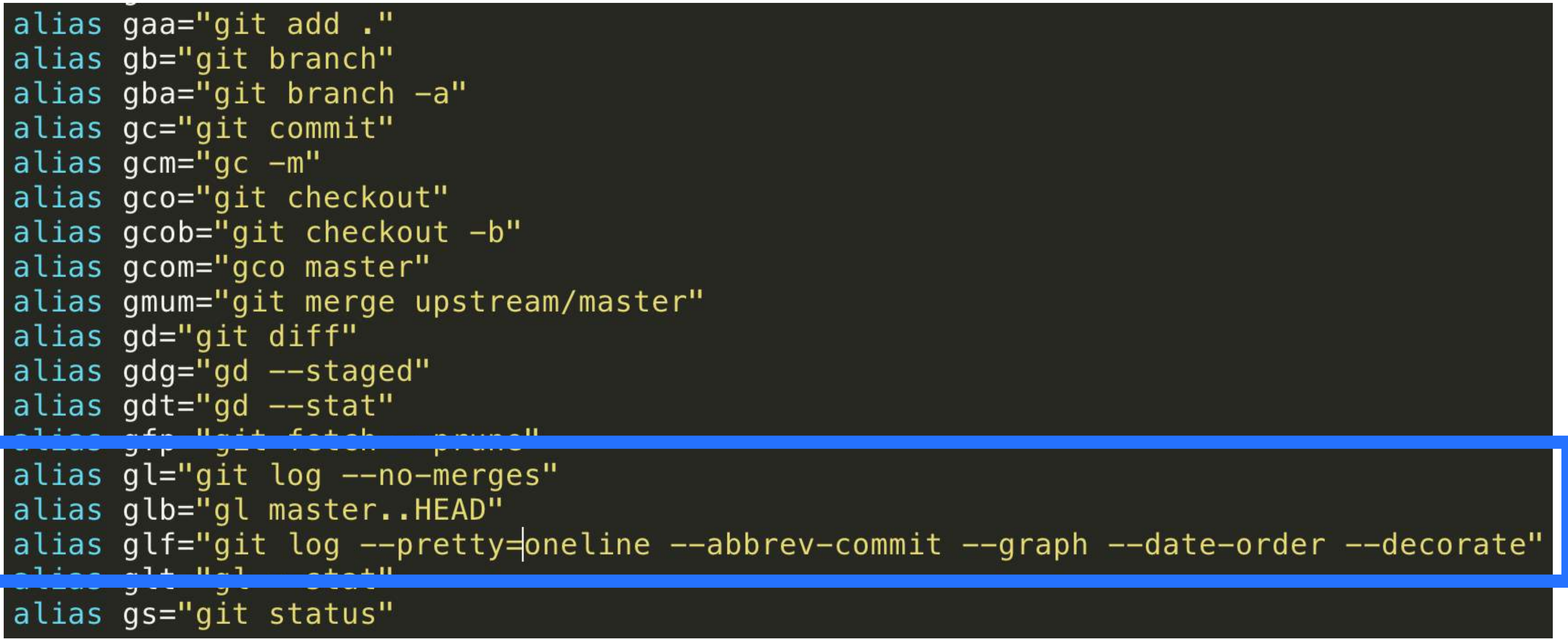
```
alias gaa="git add ."
alias gb="git branch"
alias gba="git branch -a"
alias gc="git commit"
alias gcm="gc -m"
alias gco="git checkout"
alias gcob="git checkout -b"
alias gcom="gco master"
alias gmum="git merge upstream/master"
alias gd="git diff"
alias gdg="gd --staged"
alias gdt="gd --stat"
alias gfp="git fetch --prune"
alias gl="git log --no-merges"
alias glb="gl master..HEAD"
alias glf="git log --pretty=oneline --abbrev-commit --graph --date-order --decorate"
alias glt="gl --stat"
alias gs="git status"
```

Aliasing git commands



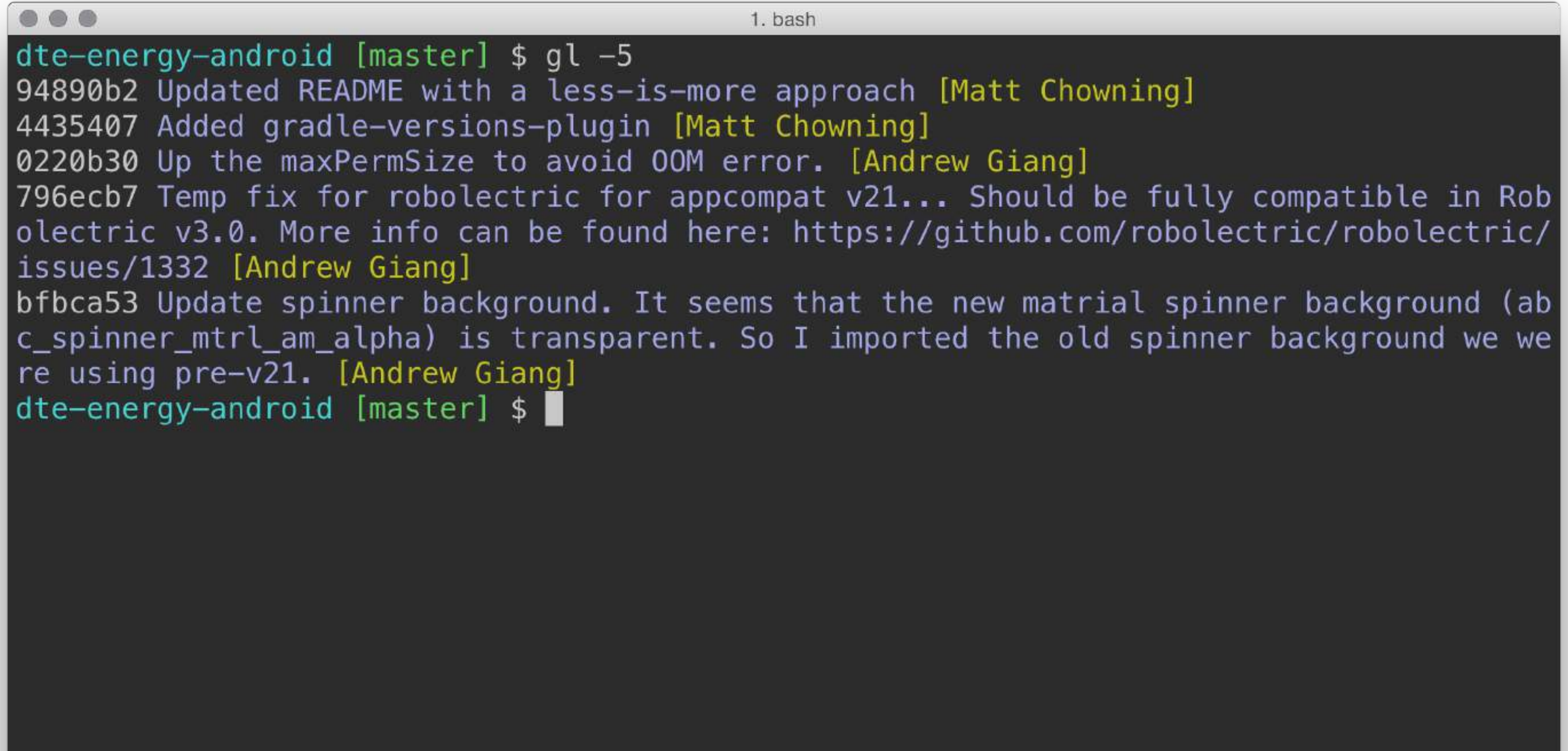
```
alias gaa="git add ."
alias gb="git branch"
alias gba="git branch -a"
alias gc="git commit"
alias gcm="gc -m"
alias gco="git checkout"
alias gcob="git checkout -b"
alias gcom="gco master"
alias gmum="git merge upstream/master"
alias gd="git diff"
alias gdg="gd --staged"
alias gdt="gd --stat"
alias gfp="git fetch --prune"
alias gl="git log --no-merges"
alias glb="gl master..HEAD"
alias glf="git log --pretty=oneline --abbrev-commit --graph --date-order --decorate"
alias glt="gl --stat"
alias gs="git status"
```

Aliasing git commands



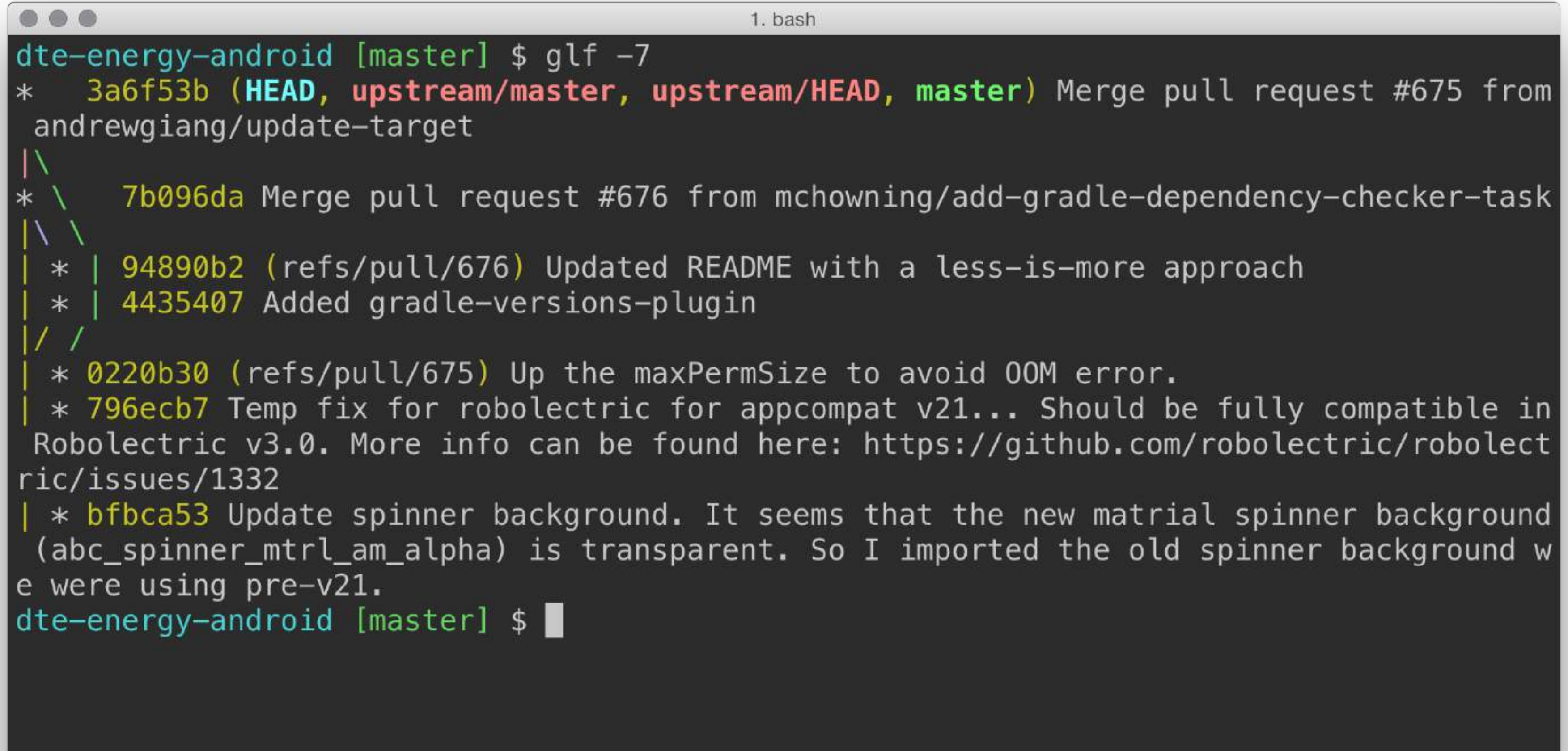
```
alias gaa="git add ."
alias gb="git branch"
alias gba="git branch -a"
alias gc="git commit"
alias gcm="gc -m"
alias gco="git checkout"
alias gcob="git checkout -b"
alias gcom="gco master"
alias gmum="git merge upstream/master"
alias gd="git diff"
alias gdg="gd --staged"
alias gdt="gd --stat"
alias gfp="git fetch --prune"
alias gl="git log --no-merges"
alias glb="gl master..HEAD"
alias glf="git log --pretty=oneline --abbrev-commit --graph --date-order --decorate"
alias glt="gl --stat"
alias gs="git status"
```

Aliasing git commands



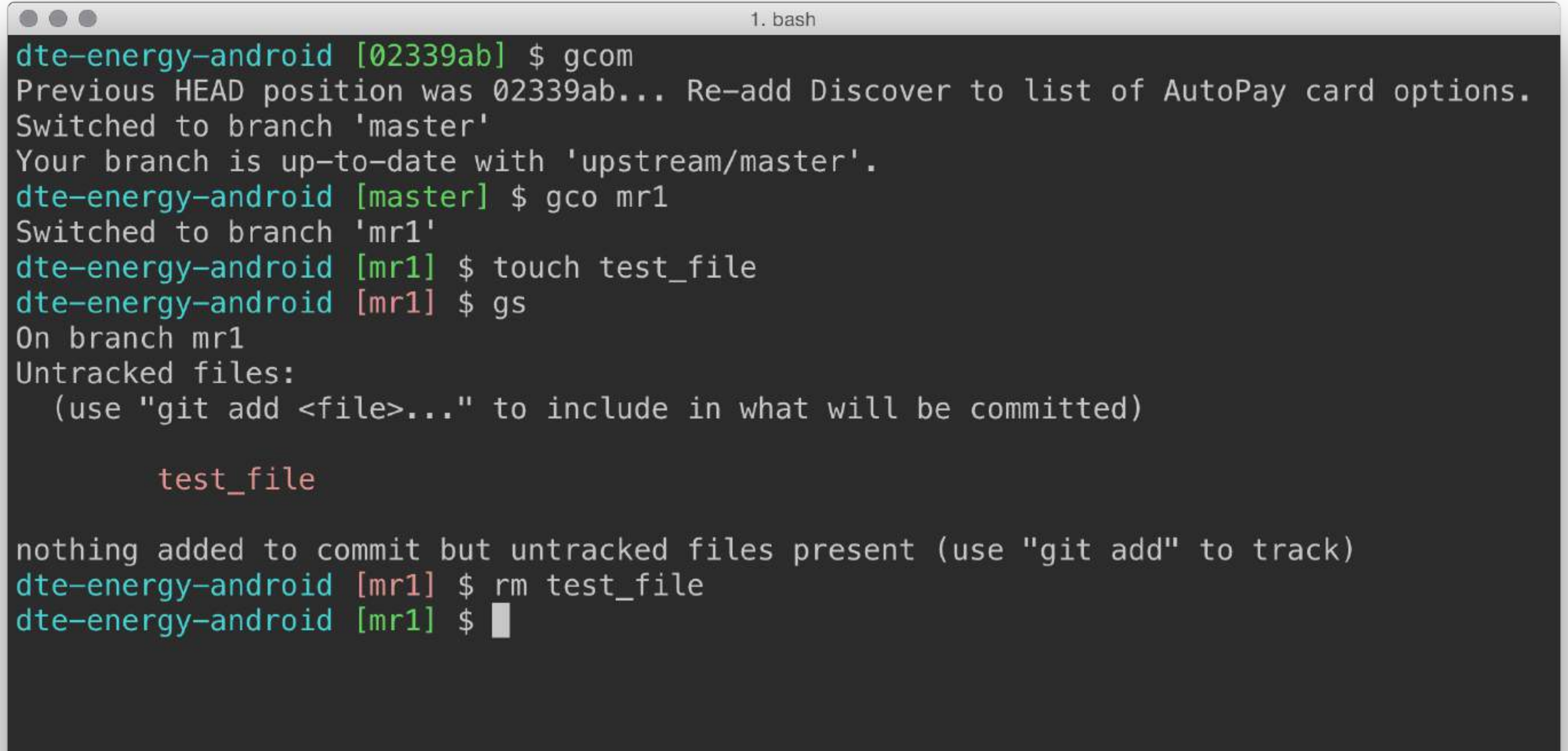
```
dte-energy-android [master] $ gl -5
94890b2 Updated README with a less-is-more approach [Matt Chowning]
4435407 Added gradle-versions-plugin [Matt Chowning]
0220b30 Up the maxPermSize to avoid OOM error. [Andrew Giang]
796ecb7 Temp fix for robolectric for appcompat v21... Should be fully compatible in Rob
olectric v3.0. More info can be found here: https://github.com/robolectric/robolectric/
issues/1332 [Andrew Giang]
bfbca53 Update spinner background. It seems that the new matrial spinner background (ab
c_spinner_mtrl_am_alpha) is transparent. So I imported the old spinner background we we
re using pre-v21. [Andrew Giang]
dte-energy-android [master] $
```

Aliasing git commands



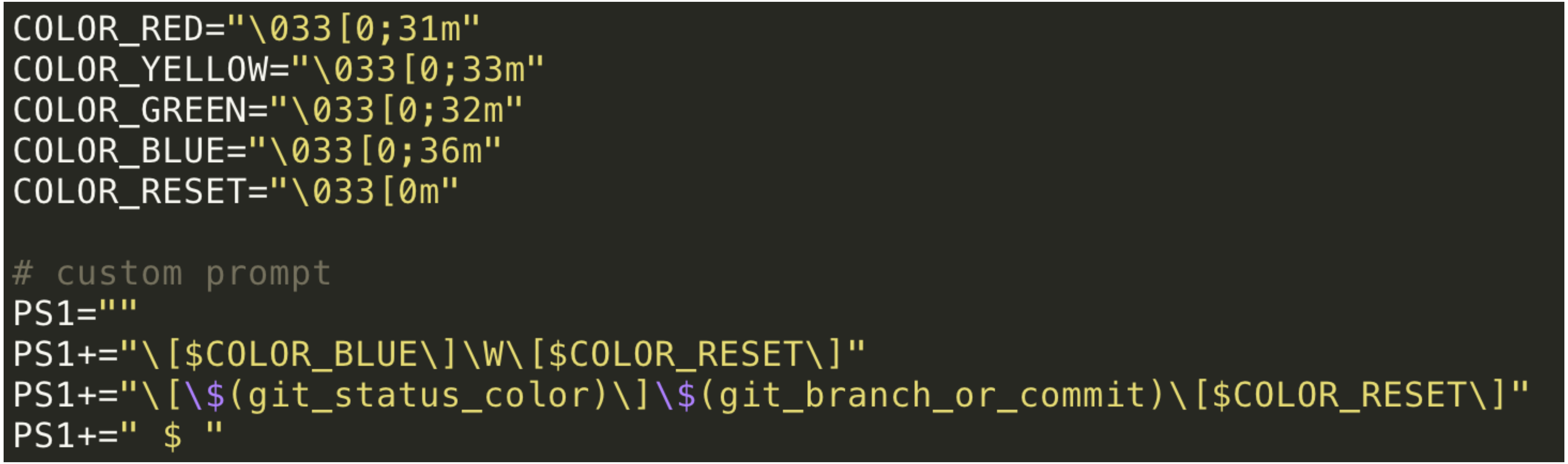
```
dte-energy-android [master] $ glf -7
*   3a6f53b (HEAD, upstream/master, upstream/HEAD, master) Merge pull request #675 from
 andrewgiang/update-target
|\
* \   7b096da Merge pull request #676 from mchowning/add-gradle-dependency-checker-task
|\ \
| * | 94890b2 (refs/pull/676) Updated README with a less-is-more approach
| * | 4435407 Added gradle-versions-plugin
|/ /
| * 0220b30 (refs/pull/675) Up the maxPermSize to avoid OOM error.
| * 796ecb7 Temp fix for robolectric for appcompat v21... Should be fully compatible in
 Robolectric v3.0. More info can be found here: https://github.com/robolectric/robolect
ric/issues/1332
| * bfbca53 Update spinner background. It seems that the new matrial spinner background
 (abc_spinner_mtrl_am_alpha) is transparent. So I imported the old spinner background w
e were using pre-v21.
dte-energy-android [master] $
```

Prompt customization



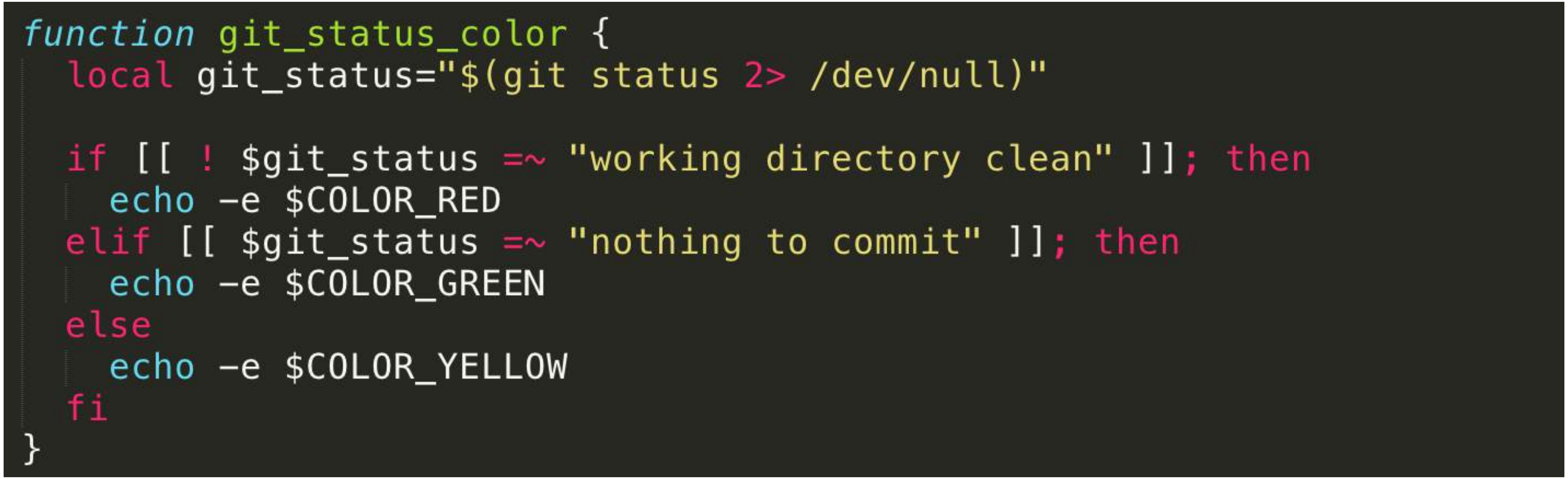
```
dte-energy-android [02339ab] $ gcom
Previous HEAD position was 02339ab... Re-add Discover to list of AutoPay card options.
Switched to branch 'master'
Your branch is up-to-date with 'upstream/master'.
dte-energy-android [master] $ gco mr1
Switched to branch 'mr1'
dte-energy-android [mr1] $ touch test_file
dte-energy-android [mr1] $ gs
On branch mr1
Untracked files:
  (use "git add <file>..." to include in what will be committed)

        test_file

nothing added to commit but untracked files present (use "git add" to track)
dte-energy-android [mr1] $ rm test_file
dte-energy-android [mr1] $ 
```

Prompt customization



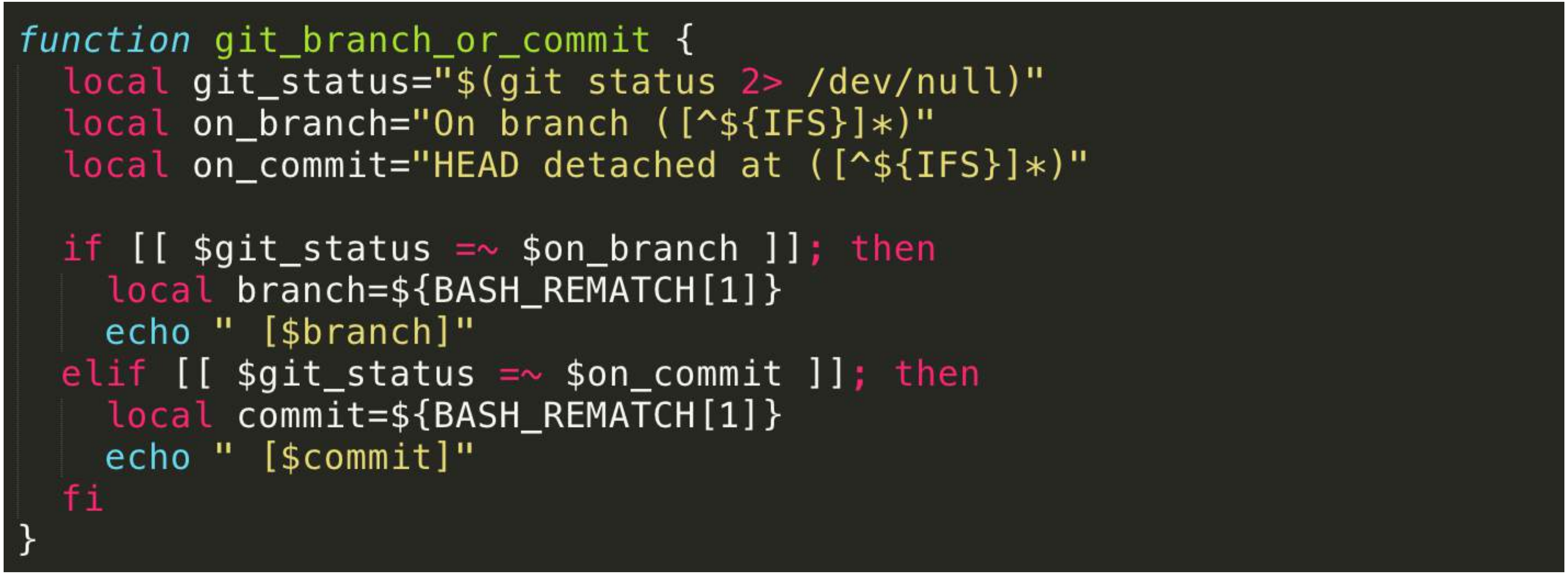
```
COLOR_RED="\033[0;31m"
COLOR_YELLOW="\033[0;33m"
COLOR_GREEN="\033[0;32m"
COLOR_BLUE="\033[0;36m"
COLOR_RESET="\033[0m"

# custom prompt
PS1=""
PS1+="\[$COLOR_BLUE\]\W\[$COLOR_RESET\]"
PS1+="\[\$(git_status_color)\]\$(git_branch_or_commit)\[$COLOR_RESET\]"
PS1+=" $ "
```

Prompt customization



```
function git_status_color {
  local git_status="$(git status 2> /dev/null)"

  if [[ ! $git_status =~ "working directory clean" ]]; then
    echo -e $COLOR_RED
  elif [[ $git_status =~ "nothing to commit" ]]; then
    echo -e $COLOR_GREEN
  else
    echo -e $COLOR_YELLOW
  fi
}
```

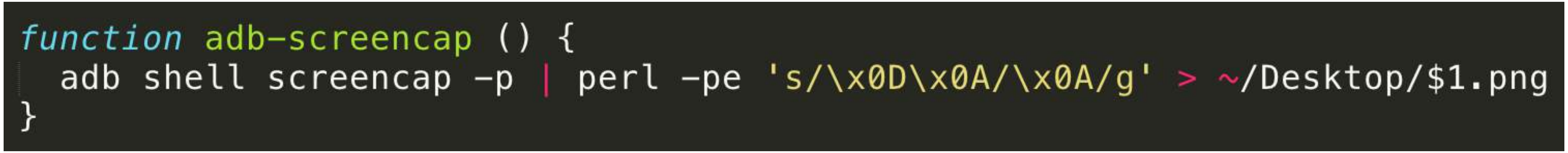
Prompt customization



```
function git_branch_or_commit {
  local git_status="$(git status 2> /dev/null)"
  local on_branch="On branch ([^${IFS}]*)"
  local on_commit="HEAD detached at ([^${IFS}]*)"

  if [[ $git_status =~ $on_branch ]]; then
    local branch=${BASH_REMATCH[1]}
    echo " [$branch]"
  elif [[ $git_status =~ $on_commit ]]; then
    local commit=${BASH_REMATCH[1]}
    echo " [$commit]"
  fi
}
```

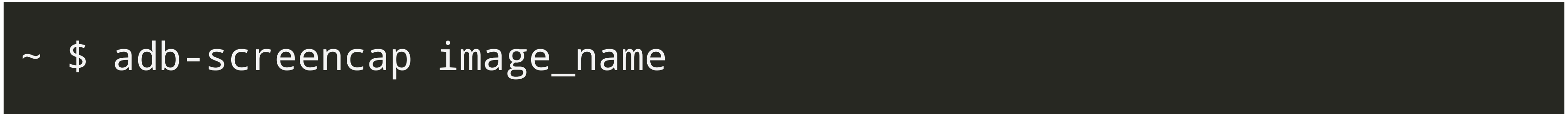
Handy Android functions

adb-screencap:



```
function adb-screencap () {
  adb shell screencap -p | perl -pe 's/\x0D\x0A/\x0A/g' > ~/Desktop/$1.png
}
```

Usage:



```
~ $ adb-screencap image_name
```

Result: saves screenshot image_name.png to desktop.

git/Github topics

Autocomplete

Checking out PRs locally

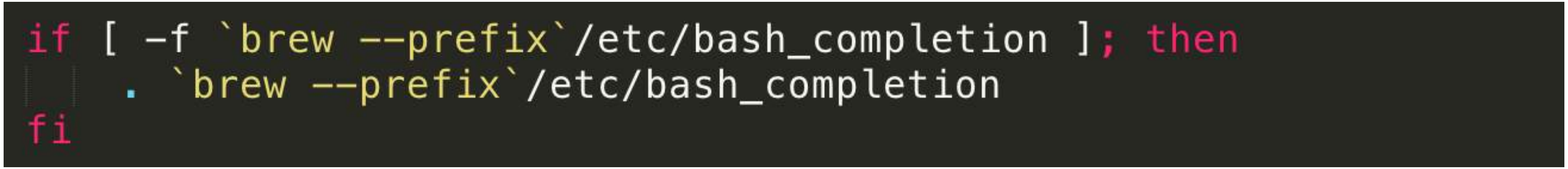
GitHub navigation

Autocomplete

Assuming you already have Homebrew (if not, get it):

```
~ $ brew install bash-completion
```

Then, in `~/.bash_profile`:



```
if [ -f `brew --prefix`/etc/bash_completion ]; then
    . `brew --prefix`/etc/bash_completion
fi
```

Checking out PRs locally

Standard remote configuration in .git/config:

```
[remote "upstream"]
    url = https://github.com/detroit-labs/dte-energy-android.git
    fetch = +refs/heads/*:refs/remotes/upstream/*
```

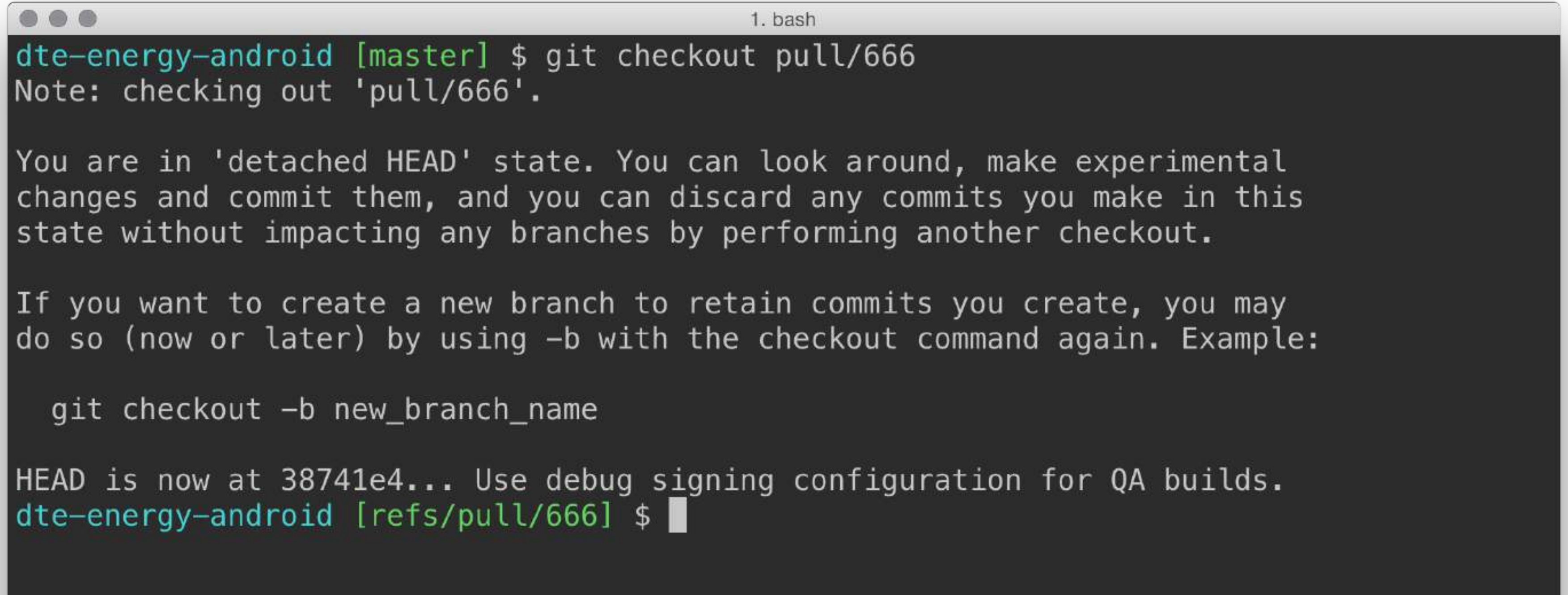
Checking out PRs locally

Manually add this extra line:

```
[remote "upstream"]
    url = https://github.com/detroit-labs/dte-energy-android.git
    fetch = +refs/heads/*:refs/remotes/upstream/*
    fetch = +refs/pull/*/head:refs/pull/*
```

Checking out PRs locally

Now you can check out PR commits (after fetching):



```
dte-energy-android [master] $ git checkout pull/666
Note: checking out 'pull/666'.

You are in 'detached HEAD' state. You can look around, make experimental
changes and commit them, and you can discard any commits you make in this
state without impacting any branches by performing another checkout.

If you want to create a new branch to retain commits you create, you may
do so (now or later) by using -b with the checkout command again. Example:

  git checkout -b new_branch_name

HEAD is now at 38741e4... Use debug signing configuration for QA builds.
dte-energy-android [refs/pull/666] $ 
```

GitHub navigation

Shortcuts for navigating repositories:

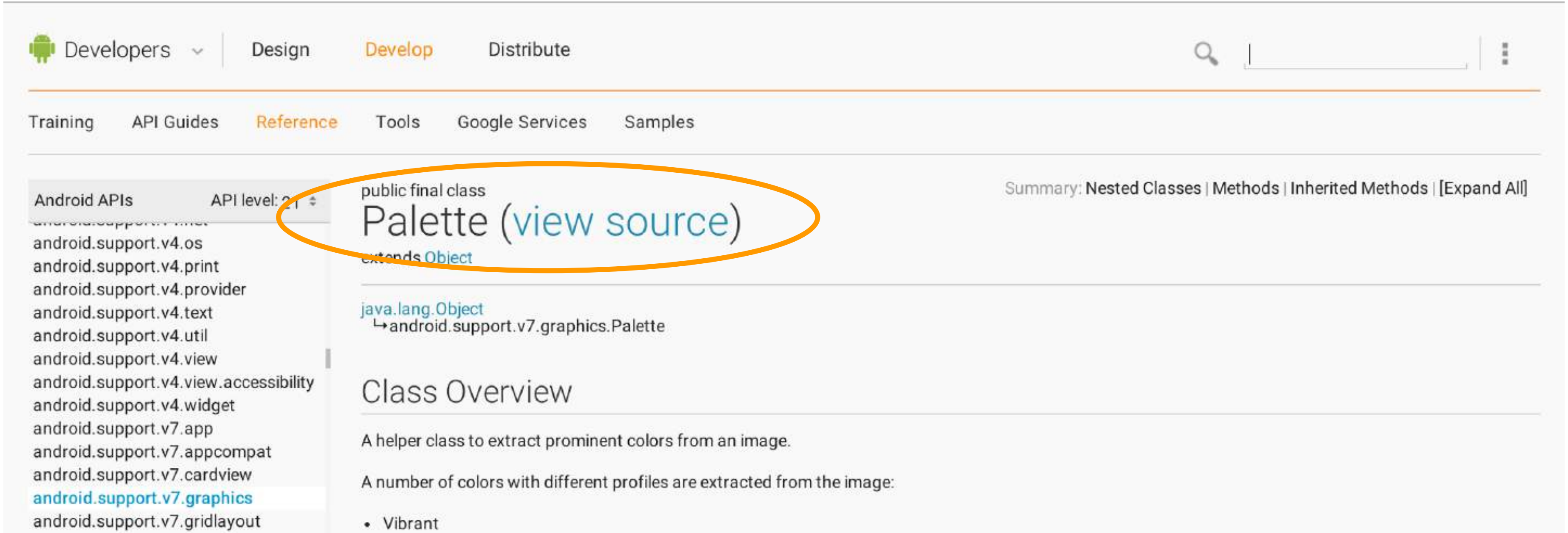
- `g c` → go to code
- `g i` → go to issues
- `g p` → go to pull requests
- `t` → search for file by name

Chrome topics

Android SDK Search plugin

Android SDK Search plugin

Maintained by Google guy Roman Nurik.



android.support.v4.net
android.support.v4.os
android.support.v4.print
android.support.v4.provider
android.support.v4.text
android.support.v4.util
android.support.v4.view
android.support.v4.view.accessibility
android.support.v4.widget
android.support.v7.app
android.support.v7.appcompat
android.support.v7.cardview
android.support.v7.graphics
android.support.v7.gridlayout

Summary: Nested Classes | Methods | Inherited Methods | [Expand All]

public final class
Palette (view source)
extends Object

java.lang.Object
↳android.support.v7.graphics.Palette

Class Overview

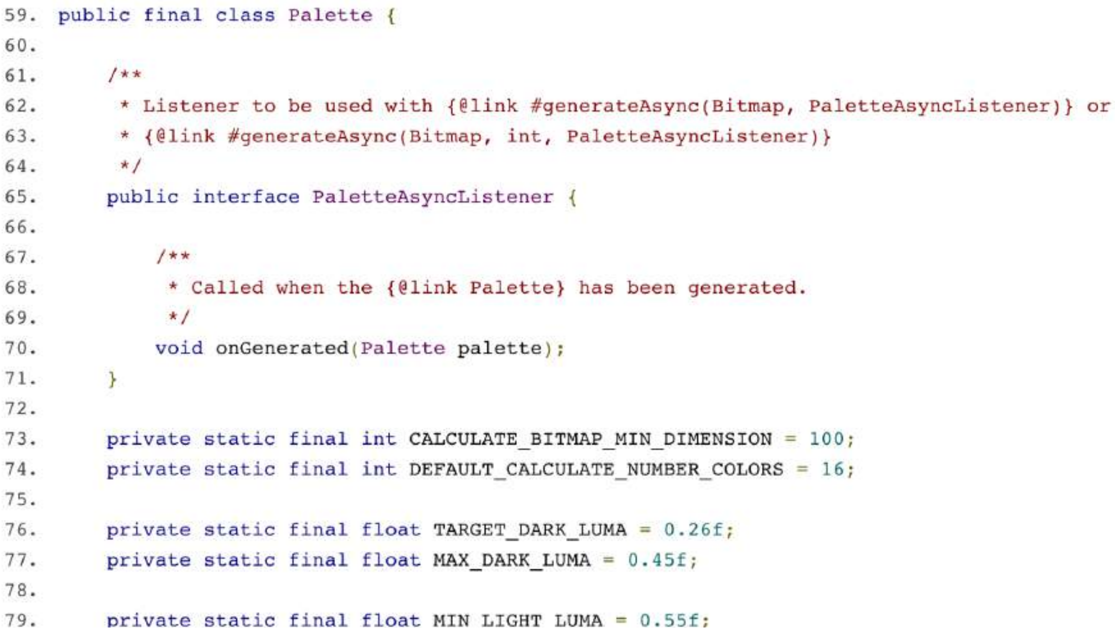
A helper class to extract prominent colors from an image.

A number of colors with different profiles are extracted from the image:

- Vibrant

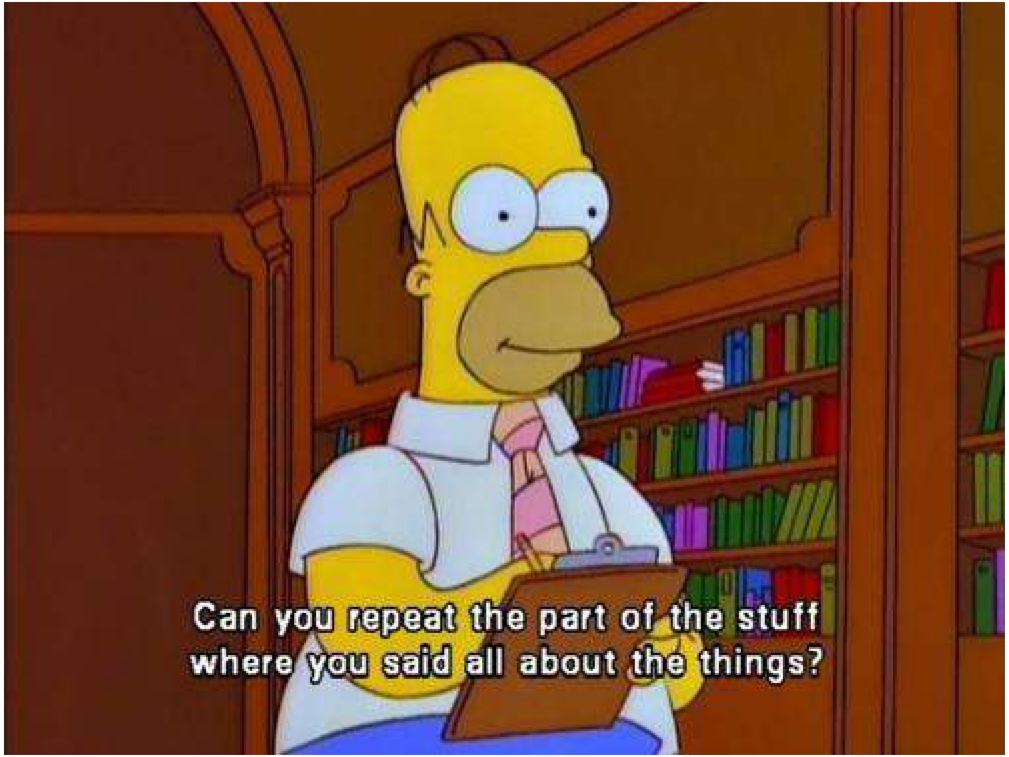
Android SDK Search plugin

Clicking ‘view source’ takes you directly to class code.



```
public final class Palette {

    /**
     * Listener to be used with {@link #generateAsync(Bitmap, PaletteAsyncListener)} or
     * {@link #generateAsync(Bitmap, int, PaletteAsyncListener)}
     */
    public interface PaletteAsyncListener {

        /**
         * Called when the {@link Palette} has been generated.
         */
        void onGenerated(Palette palette);
    }

    private static final int CALCULATE_BITMAP_MIN_DIMENSION = 100;
    private static final int DEFAULT_CALCULATE_NUMBER_COLORS = 16;

    private static final float TARGET_DARK_LUMA = 0.26f;
    private static final float MAX_DARK_LUMA = 0.45f;

    private static final float MIN_LIGHT_LUMA = 0.55f;
```

Fin… for real… for now…


Can you repeat the part of the stuff
where you said all about the things?