



Editor Frobbing

Sunday, February 21, 2010

Customizing your editor and kinda what it means to be productive



Sunday, February 21, 2010

26, Web Developer @ HUGE
co-organizer of django-nyc.
My Editor Story

HUGE

[Services](#) [Process](#) [Our Work](#) [News](#) [Careers](#)



Takeoff.

JetBlue asked HUGE to redesign jetblue.com with the goal of introducing the airline's legendary friendliness and customer-oriented mindset onto its web site. [See More](#)



jetBlue
AIRWAYS
Visit Jetblue.com



NOTICED

HouseLogic.com Honored at the Interactive Media Awards

HouseLogic.com, a consumer-facing website developed and launched by HUGE for the National Association of REALTORS®, has won an 2009 Outstanding Achievement Award in the Lifestyle category [Read More...](#)

February 19, 2010

NOTICED

HUGE's Pepsi Momentum outlasts the Super Bowl

While many media analysts were biting their nails over Pepsi's historical decision to withdraw their \$20 million Superbowl budget, early results show Pepsi is well ahead of the game. [Read More...](#)

February 8, 2010

NOTICED

American University Wins Best Education Web Site Award

HUGE's new vision for American University was named "Best Web Site of Industry" in the education category by the Web Marketing Association. [Read More...](#)

February 3, 2010

NOTICED

Pepsi and HUGE invite the Public to do Good

Hollywood Helps Launch Refresh Everything Voting [Read More...](#)

February 1, 2010

ARCHIVED.

[SIGNED \(18\)](#)

[SHIPPED \(29\)](#)

[NOTICED \(39\)](#)

Sunday, February 21, 2010

Web developer at HUGE
Interactive Agency in Brooklyn

GNU Emacs Manual

Fifth Edition, Emacs Version 18

for Unix Users

October 1986

Richard Stallman



Happy Hacking
Richard Stallman

4 (multitasking)emacs

Sunday, February 21, 2010

My Editor Story

READY
COOL WARM HOT DOING

DOCUMENT LOCK-
DOWN PROCEDURE

DOCUMENT THE
FAILURE AND
HOW TO REPAIR
IT

IF OK? ③
CREATE STRUCTURE
FOR WORKING
THROUGH ALL
BROKEN PAGES

IF NOT OK? ③
STOP.
INVENT PLAN
B.

② DETERMINE CORRECTIONS

- Fix DISCUSSION PAGE
- Fix INTERNAL PAGE LINKS
- Fix ANCHORS AND FRAGMENT PERMALINKS
- OK TO PROCEED?

① ANNOUNCE

Let oic TC know what I am going to do before I do it.

DOCUMENT AS I GO ①

Leave notes in the description pages on SVN.

① LOCK DOWN THE WIKI

- Make a lock-down construction page
- Fix template to do it
- LOCK DOWN SPECANALYSIS
- RECORD IN -721

Sunday, February 21, 2010

Learning to be Productive
Emphasize this is the rest of the talk.
3 things: Notice inefficiency, Survey options, improve.



Sunday, February 21, 2010

Catching things that are inefficient.



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Key to noticing inefficiencies is noticing repetition.
Another is the feeling of “Ugh!” when asked to do something.
Like renaming a variable across an entire project w/o refactoring tools
or find/replace



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Key to improving your productivity is slowly growing your toolset.
Overall philosophy is type less.



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Learning to type is the first step
Without it, you're optimizing the wrong thing.



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Now don't waste all that typing. For Repetitive tasks, look at making a quick macro.



Sunday, February 21, 2010

A good editor will allow you to run a shell command on a region.
Good if you already know gnu tools like awk and sed, etc.



Sunday, February 21, 2010

The best way to “survey the landscape” is to ask friends (or pair programming)

Should really be driven by the things that bother you.

Beware of just surfing productivity tips

Here are a few features that you might want in your editor.


```

142     for level, consumer in self.consumers:
143         if consumer is sys.stdout:
144             return level
145     return self.FATAL
146
147     def level_matches(self, level, consumer_level):
148         """
149         >>> L = Logger()
150         >>> L.level_matches(3, 4)
151         False
152         >>> L.level_matches(3, 2)
153         True
154         >>> L.level_matches(slice(None, 3), 3)
155         False
156         >>> L.level_matches(slice(None, 3), 2)
157         True
158         >>> L.level_matches(slice(1, 3), 1)
159         True
160         >>> L.level_matches(slice(2, 3), 1)
161         False
162         """
163         if isinstance(level, slice):
164             start, stop = level.start, level.stop
165             if start is not None and start > consumer_level:
166                 return False
167             if stop is not None or stop <= consumer_level:
168                 return False
169             return True
170         else:
171             return level >= consumer_level
172
173     @classmethod
174     def level_for_integer(cls, level):
175         levels = cls.LEVELS
176         if level < 0:
177             return levels[0]
178         if level >= len(levels):

```

Sunday, February 21, 2010

Basic, but beyond necessary.
 Allows you to quickly visually parse code.
 if everything turns green, its a quote missing


```

-----Bookmarks-----
.. (up a dir)
/Users/jlilly/src/annarbor_4.0/
+communities/
+core/
+demographics/
+helpers/
+locations/
+mt/ -> /Users/jlilly/src/anna
~pages/
  +fixtures/
  +migrations/
  -__init__.py
  -admin.py
  -models.py
  -urls.py
  -views.py
+photos/
+ratings/
+realestate/
+restaurants/
+schedule/
+schools/
+search/

```

```

1 from django.db import models
2 from django.db.models import ImageWithThumbnailField
3
4 class Photo(models.Model):
5     """
6     This is a generic photo class. Its main purpose is to abstract the
7     handling of image uploads to a single place. Any methods which
8     ease the photo upload process can be added to this model.
9     """
10    name = models.CharField(max_length=150)
11    slug = models.SlugField(max_length=150, unique=True)
12    description = models.TextField(blank=True, null=True)
13    image = ImageWithThumbnailField(upload_to="uploaded/photos",
14                                   thumbnail={'size':(90,60)},
15                                   generate_on_save=True)
16
17    class Meta:
18        ordering = ('name',)
19
20    def __unicode__(self):
21        return "%s" % (self.name,)
22
23 class Gallery(models.Model):
24     name = models.CharField(max_length=150)

```

<<c/annarbor_4.0/www/django/advanced/apps/photos/models.py [TYPE=PYTHON unix] [1/28 (3%)]

```

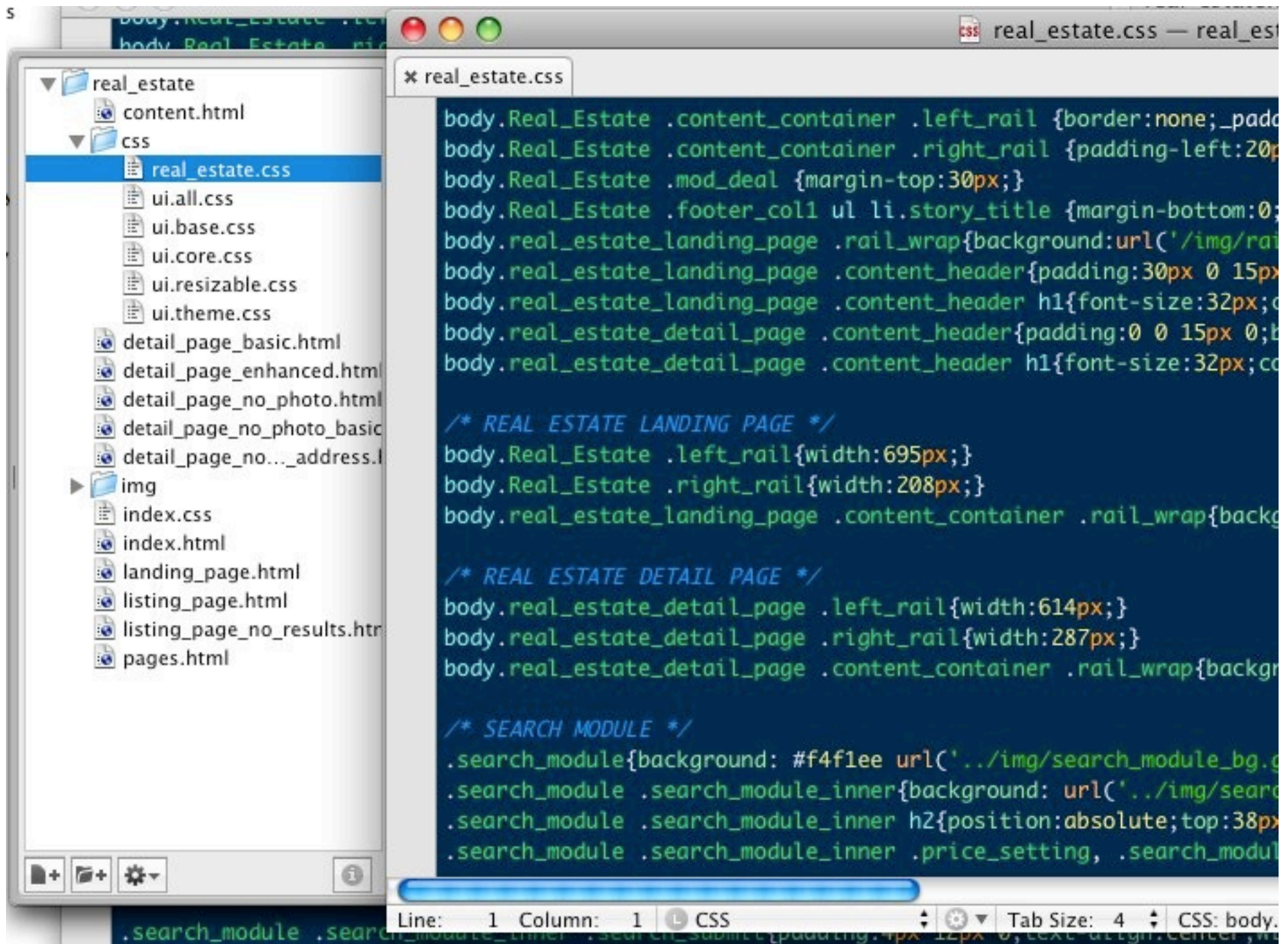
1 from django.db import models
2 from restaurants.models import Special
3
4 class Page(models.Model):
5     name = models.CharField(max_length=50)
6     ...
7
8 class Homepage(Page):
9     specials = models.ManyToManyField(Special, through='HomepageSpecial')
10
11
12 class HomepageSpecial(models.Model):
13     order = models.PositiveIntegerField(default=999)
14     ...
15     homepage = models.ForeignKey(Homepage)
16     special = models.OneToOneField(Special)
17     ...
18
19 class Meta:
20     ordering = ["-order"]

```

0 items	Description

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Allows you to see different contexts at once.
 Good for looking at related code



Sunday, February 21, 2010

project view allows you to quickly navigate project structure
becomes less useful when you have a large project


```

REAL ESTATE DETAIL PAGE
dy.real_estate_detail_page .left_rail{width:614px;}
dy.real_estate_detail_page .right_rail{width:287px;}
dy.real_estate_detail_page .content_container .rail_wrap{background:url('/img/rest

SEARCH MODULE */
earch_module{background: #f4f1ee url('../img/search_module_bg.gif') repeat-x top l
earch_module .search_module_inner{background: url('../img/search_module_icon.gif')}
earch_module .search_module_inner h2{position:absolute;top:38px;left:59px;z-index:
earch_module .search_module_inner .price_setting, .search_module .search_module_in

earch_module .search_module_inner .price_setting{border-right:1px solid #b2b2b2;pa
earch_module .search_module_inner .price_setting input{border-top:1px solid #85858
earch_module .search_module_inner .price_setting label{font-weight:bold;}
earch_module .search_module_inner .price_setting span{padding:0 4px;}

earch_module .search_module_inner .price_setting input.valueError {border:1px soli

earch_module .search_module_inner .option_settings{padding:5px 20px 0 20px;border-
earch_module .search_module_inner .option_settings select{margin:0 16px 0 0;}
earch_module .search_module_inner .option_settings select.small{width:80px;}
earch_module .search_module_inner .option_settings select.medium{width:130px;}
earch_module .search_module_inner .option_settings select.large{width:190px;}
earch_module .search_module_inner .option_settings select.no_margin{margin:0;}
earch_module .search_module_inner .option_settings li{margin: 0 0 10px;}

earch_module .search_module_inner .search_submit{padding:4px 12px 0;text-align:cen
earch_module .search_module_inner .search_submit a{font-size:10px;display:block;u

```

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Situational, but amazing when you need it.
 shines in ADDING test, rather than replacing text.
 Faster than a macro or weird regexp find/replace


```
# callable returning a namespace hint
if namespace:
    raise ImproperlyConfigured('Cannot override the namespace for a dynamic module that pr
urlconf_module, app_name, namespace = arg
else:
    # No namespace hint - use manually provided namespace
    urlconf_module = arg
return (urlconf_module, app_name, namespace)

def patterns(prefix, *args):
    pattern_list = []
    for t in args:
        if isinstance(t, (list, tuple)):
            t = url(prefix=prefix, *t)
        elif isinstance(t, RegexURLPattern):
            t.add_prefix(prefix)
        pattern_list.append(t)
    return pattern_list

def url(regex, view, kwargs=None, name=None, prefix=''):
    if isinstance(view, (list, tuple)):
        # For include(...) processing.
        urlconf_module, app_name, namespace = view
        return RegexURLResolver(regex, urlconf_module, kwargs, app_name=app_name, namespace=namesp
    else:
        if isinstance(view, basestring):
            if not view:
                try:
                    timeout
                except (ValueError, TimeoutError):
                    timeout = self.default_timeout
            def add(self, key, value):
                """
                Set a value.
                timeout is given in seconds.
                the default is None.
                Returns True if the key exists.
                """
                raise NotImplementedError
            def get(self, key, default=None):
                """
                Fetch a given value.
                default, which is used if the key does not exist.
                """
                raise NotImplementedError
            def set(self, key, value):
                """
                Set a value.
                used for the key.
                """
                raise NotImplementedError
            def delete(self, key):
                """
                Delete a key.
                """
                raise NotImplementedError
            def get_many(self, key):
                """
                Fetch a bundle of values.
                pgsql) this is a list of values.
                Returns a dict of values.
                key is missing.
                """
                d = {}
                for k in key:
                    val = self.get(k)
                    if val is not None:
                        d[k] = val
```

Sunday, February 21, 2010

Integration with the shell
Provides an “all-in-one” solution



Sunday, February 21, 2010

Don't need to change contexts as often.
Don't see the random email, or IM or w/e


```
managers.py
models.py
retscient.py
signals.py
tests.py
urls.py
utils.py
views.py
widgets.py
aurants
edule
ools
rch
'
js

ites
_.py
c.py
.data.json
ie.py
'

20
21
22
23
24
25
26
27
28 os. |
29
30 url
31
32
33
34
35
36
37
38
39
40
41
42
43
44
45
46
47

'core.views.admin_autocomplete',
name="admin-autocomplete"),

(r'^events/admin/',
include(admin.site.urls)),

)

close(fd)
confstr(name)
confstr_names
ctermid()
curdir
defpath
devnull
dup(fd)
dup2(old_fd, new_fd)
environ
error

ies.urls')),

(r'^realestate/',
include('realestate.urls')),

(r'^login/',
```

Sunday, February 21, 2010

Autocompletion is great for learning
Also good if you have really long method names
traditionally what an IDE was for, but vim / emacs can do similar.


```

7
8 class BaseCache(object):
9     def __init__(self, params):
10         timeout = params.get('timeout', 300)
11         try:
12             timeout = int(timeout)
13         except (ValueError, TypeError):
14             timeout = 300
15         self.default_timeout = timeout
16
17     def add(self, key, value, timeout=None):
18
19
20
21
22
23
24
25
26
27     def get(self, key, default=None):
28
29
30
31
32
33
34     def set(self, key, value, timeout=None):
35
36
37
38
39
40
41     def delete(self, key):
42
43
44
45
46
47     def get_many(self, keys):
48         """
49         Fetch a bunch of keys from the cache. For certain backends (memcached,
50         postgresql) this can be *much* faster when fetching multiple values.
51
52         Returns a dict mapping each key in keys to its value. If the given
53         key is missing, it will be missing from the response dict.
54         """
55         d = {}
56         for k in keys:
57             val = self.get(k)
58             if val is not None:
59                 d[k] = val
60         return d
61
62     def has_key(self, key):
63         """

```

Sunday, February 21, 2010


Code folding -- hides stuff you don't care about right now.
Aids concentration. Makes the file easier to navigate around.


```
Base Cache class.
and all the manually /usr/local/bin/ctags: unrecognized option '--for
from django.core.exceptions import ImproperlyConfigured
class InvalidCacheBackendError(ImproperlyConfigured):
    pass
class BaseCache(object):
    def __init__(self, params):
        timeout = params.get('timeout', 300)
        try:
            timeout = int(timeout)
        except (ValueError, TypeError):
            timeout = 300
        self.default_timeout = timeout
    def add(self, key, value, timeout=None):
        """
        Set a value in the cache if the key does not already exist. If
        timeout is given, that timeout will be used for the key; otherwise
        the default cache timeout will be used.
        Returns True if the value was stored, False otherwise.
        """
        raise NotImplementedError
class BaseCache(object):
    InvalidCacheBackendError
    BaseCache
    member
    __init__ [BaseCache]
    add [BaseCache]
    get [BaseCache]
    set [BaseCache]
    delete [BaseCache]
    get_many [BaseCache]
    has_key [BaseCache]
    incr [BaseCache]
    decr [BaseCache]
    __contains__ [BaseCache]
    set_many [BaseCache]
    delete_many [BaseCache]
    clear [BaseCache]
```



Sunday, February 21, 2010

- Heirarchical view of code.
- Allows you to quickly get where you want
- Suffers from the same problem as the Project View. Can be hard to navigate if its too long.
- You should be refactoring before that becomes a problem though.


```
52 INFO = logging.INFO
53 NOTIFY = (logging.INFO+logging.WARN)/2
54 WARN = WARNING = logging.WARN
55 ERROR = logging.ERROR
56 FATAL = logging.FATAL
57
58 LEVELS = [DEBUG, INFO, NOTIFY, WARN, ERROR, FATAL
59
60 def __init__(self, consumers):
61     self.consumers = consumers
```

Problems  Progress

1 error, 0 warnings, 0 others

Description	Resource	Path
▼  Errors (1 item)		
 Expected:]	annarbor-bootstrap.	/Annarbor 4.0/ww

Sunday, February 21, 2010

Linting -- Quickly identifies code mistakes.

Can sometimes offer false positives (especially w/ tricky metaclasses) but is a good tool overall.

The image shows a screenshot of a Django development environment. The top part of the window displays a debugger interface with a call stack on the left and a variables pane on the right. The call stack shows the execution path from `finish_request` to `realstate_home`. The variables pane shows the state of the `request` object, including `COOKIES` and `FILES`.

The middle section is a code editor showing the `realstate_home` function in `views.py`. The function is currently paused at line 21, where `form = filtered_listings.form` is being executed. The code includes database queries for featured listings, homebuyer services, and neighborhoods.

The bottom section is a console window showing the output of the Django development server. It includes a warning about the `psyco` speedups, a message that the debugger is starting, and the Django version and server URL.

```
17
18 @render_to("realstate/Landing_page.html")
19 def realstate_home(request):
20     filtered_listings = ListingFilter(request.GET, queryset=Listing.live.all())
21     form = filtered_listings.form
22     featured_listings = Sponsorship.live.get_featured_listings()
23     homebuyer_services = Deal.objects.live().filter(categories__basename__icontains='home_buyer_services')
24     more_in_realstate = News.objects.live().filter(entrytag__object_datasource='entry',
25                                                    entrytag__tag__name='Real Estate')
26     a2_neighborhoods = NeighborhoodPage.objects.filter(neighborhood__in_annarbor=1)
27     surrounding_neighborhoods = NeighborhoodPage.objects.filter(neighborhood__in_annarbor=0)
28     # used for the quicklink nav, need to not hardcode the link to greater washtenaw
29     greater_washtenaw = Neighborhood.objects.get(name__icontains='greater washtenaw')
```

```
manage.py
pydev debugger: warning: psyco not available for speedups (the debugger will still work correctly, but a bit slower)
pydev debugger: starting
Validating models...
0 errors found

Django version 1.1.1, using settings 'advanced.settings'
Development server is running at http://127.0.0.1:8484/
Quit the server with CONTROL-C.
```

Sunday, February 21, 2010

Stack, variables, watching, etc.

Actually pretty cool, but you can get a solid 60% w/ pdb.

Settling on an Editor

Emacs	Textmate
Vim	Eclipse

Sunday, February 21, 2010

Really boils down to what matters to you.
I chose these 4 editors b/c they represent most classes of editors. IDE,
Quick Notepad-y editor, and emacs and vim.
+1, +0, -0, -1 syntax.

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Ready to go?

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Vim	Eclipse

Sunday, February 21, 2010

Does it just work? In order of “workingness”: TM, Eclipse. Vim needs a fair amount of work, but you could get by for a bit. Emacs isn’t even in the running.

This is, for some people, the most important feature.

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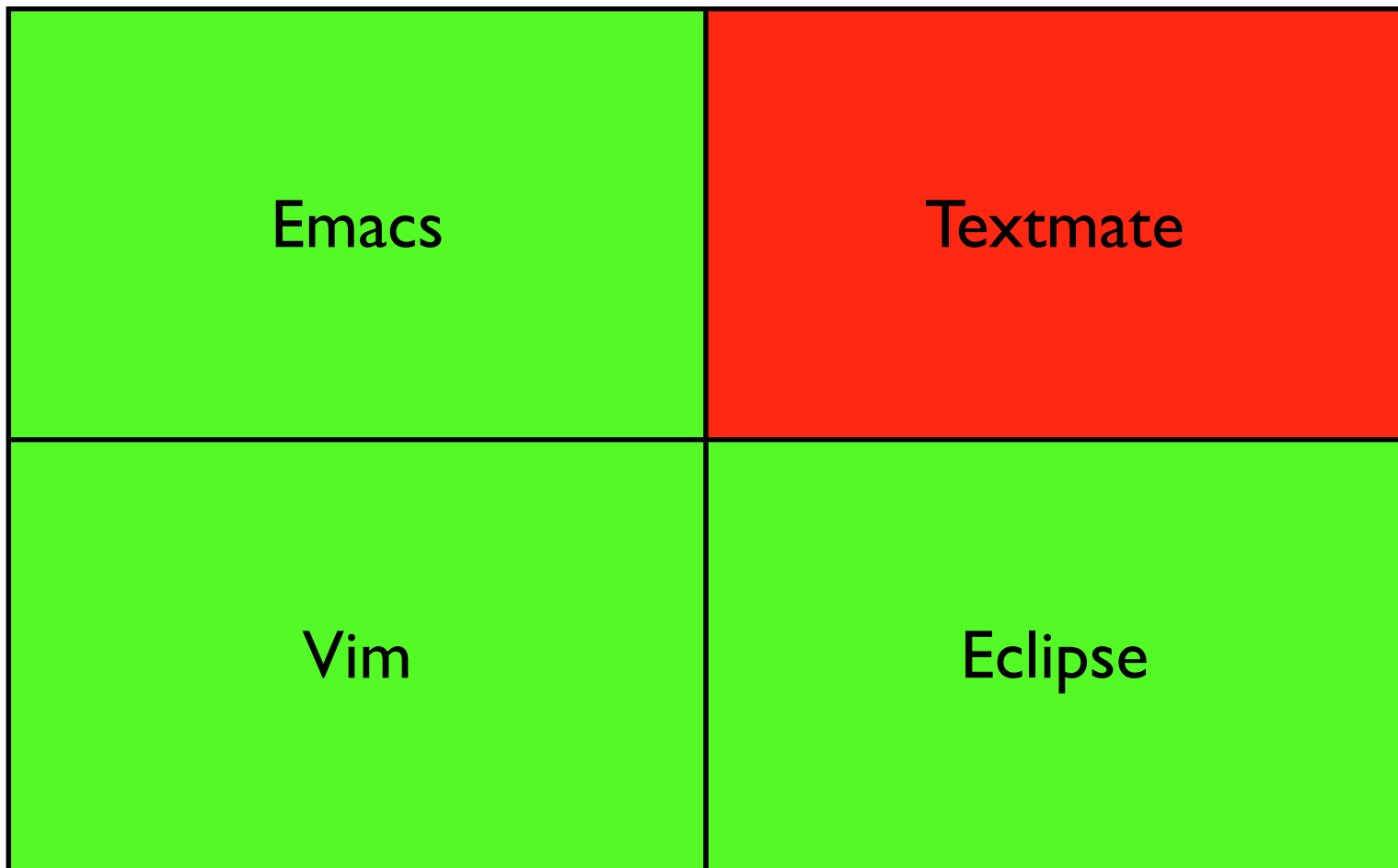
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Cross platform?



Sunday, February 21, 2010

The three green one's here are pretty close on this front. Textmate has a windows alternative, but your license doesn't apply, so you have to rebuy it.

<http://e-texteditor.com/>

Cross platform?

Emacs +	Textmate
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Keyboard Driven?

Emacs	Textmate
Vim	Eclipse

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For me, this is a big one. Removing your hands from the keyboard is a big waste of time. If you're a mouse user, you probably want to steer clear of vim and emacs. The inverse is true for power users. Could also be read as the inverse of "won't hurt your pinkies"

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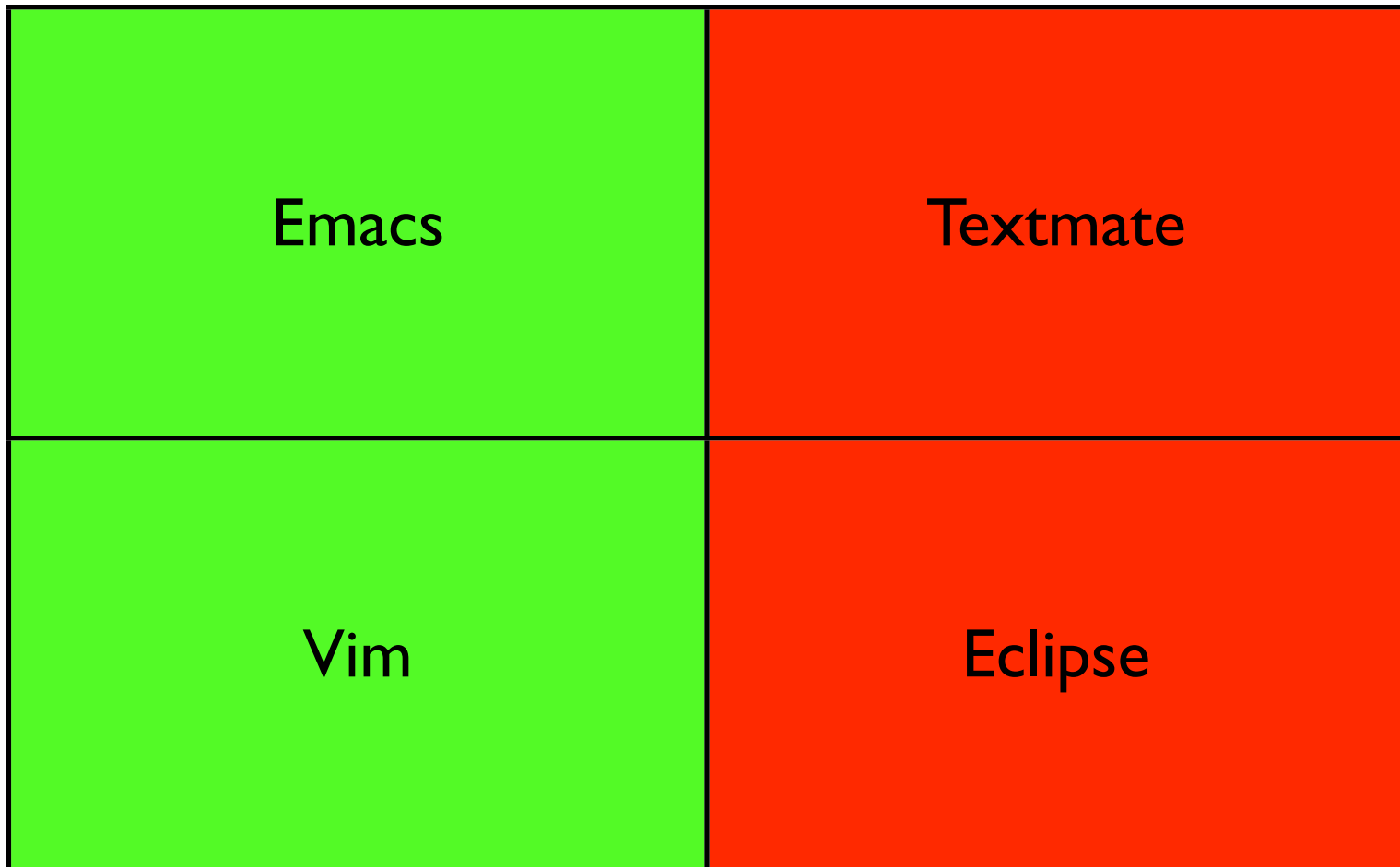
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Awesome Community?

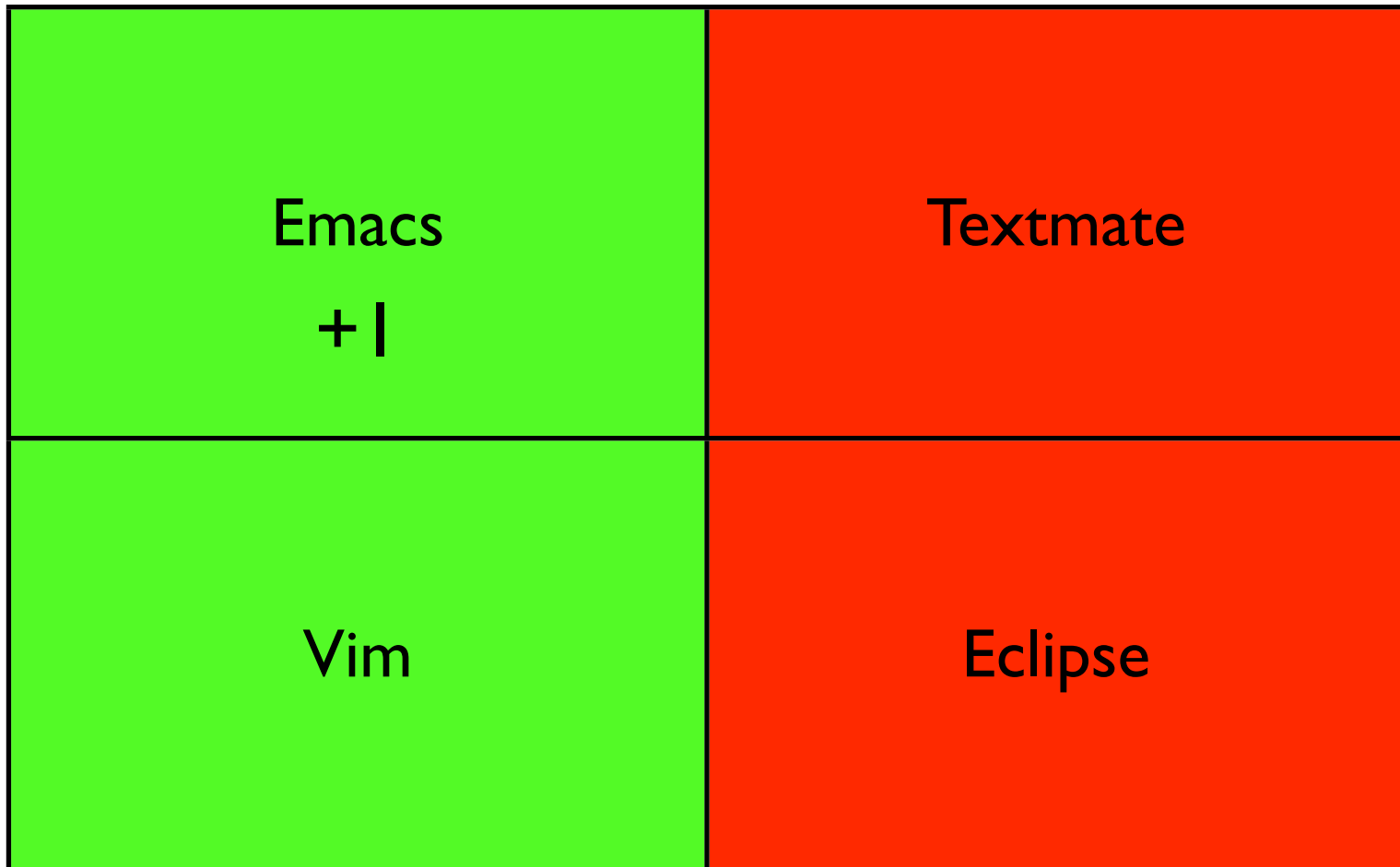


Sunday, February 21, 2010

Awesome \sim Hardcore.

I want X, and its likely already done.

Awesome Community?



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Vim +0	Eclipse -0

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Awesome \sim Hardcore.
I want X, and its likely already done.

Awesome Community?

Emacs +1	Textmate -1
Vim +0	Eclipse -0

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**TOUCHING WIRES CAUSES
INSTANT DEATH**



\$200 FINE



Newcastle Tramway Authority

Sunday, February 21, 2010

Beware! Spending too much time on this stuff will keep you from actual programming, which is the whole point.

If you get nothing out this talk, remember that the editor is only as good as what comes out of it.

Head Start?

- <http://github.com/justinlilly/emacs-starter-kit>
- http://github.com/justinlilly/vim_files

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2 repos. Should have decent starter VIM support. If there are issues, get with me afterwards.

Thank you, Flickr

- <http://www.flickr.com/photos/cumulus/1497982359/>
- http://www.flickr.com/photos/rudolf_schuba/153225000/
- <http://www.flickr.com/photos/orcmid/3879260111/>
- <http://www.flickr.com/photos/meanestindian/3323439406/>
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- <http://www.flickr.com/photos/jeckcrow/3097055142/>
- <http://www.flickr.com/photos/xmacex/2453454001/>
- <http://www.flickr.com/photos/mbollman/166871313/>

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Thank you flickr and the creative commons for these cool photos.

Questions?

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- [@justinlilly](#)

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I'll put the slides up on my website.

Also will have usable configs / howtos by pycon. (sorry)