

Josh Becker and Stefan Rudvin Team Project

A look into our genome application shows a step into the genetics field. Our project takes online data and website information to give a user a look into genes and their attributes. The world of genetics is a swiftly growing field with many avenues of discovery, here we have defined a path and have created a more accessible source for searching for genetic information. The world of genetics truly is growing but it is held back by the lack of software to test, parse, and search the many long lists of genome data.

Our project focuses on RSIDs as a source of information. Each living thing has a set of DNA that is extremely long. The RSIDs in our files are subsets of that immense amount strings that show distinguishable traits instead of the “Junk DNA” or the DNA that creates parts of people, animals, or plants that are the same among all things. The RSIDs in the Human Genome Project refer to groups of SNPs in different test subjects. These are particularly useful in distinguishing people and species.

“The Genome Buddy” As our front page, brings a user into a site of exploration. Here, a user can sign up or directly search for RSID information. The search must be a 7 digit number denoting the RSID you would like to know about. The results are run below and various useful information bits are shown such as genome, allele, Type, and more. The benefit of signing up and signing in as a user is that past searches are saved to that model.

Our “About” page illustrates live data in that it displays recent news from *Medical News Today — Genetics*. This updates on website activation. Here you can watch and be inspired by up and coming technology, advancements, and pursuits. Additionally we have a “Help” page to tell the users how to go about using our site and how to work the search option.

The Genome Buddy project uses information and data from the Human Genome Project as well as the National Center for Biological Information to display and use our information. The tests we made can be viewed by running — \$ rails t — and show a large group of tests testing the site pages and their attributes.

This project compiles a host of gene information from separate reaches of the internet and truly, the beauty of this application is in the back end. We spent the bulk of our time creating workable code that can parse, read, and deliver an application with usability.

Ruby on Rails Tutorial sample application

Getting started

To get started with the app, clone the repo and then install the needed gems:

\$ bundle install --without production

Next, migrate the database:

\$ rails db:migrate

Finally, run the test suite to verify that everything is working correctly:

\$ rails test

If the test suite passes, you'll be ready to run the app in a local server:

\$ rails server

Heroku

Ask Josh or Stefan to become a collaborator

heroku git:clone -a tranquil-everglades-55062

Heroku url:

<https://tranquil-everglades-55062.herokuapp.com/>

<https://bitbucket.org/BiscuitsAndBeans/project1>

Git log

commit bf1e8a189decbe297a96a3cf3cf18c91c3a85131
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Mon Oct 24 14:54:37 2016 +0000

Cleaned up code and comments, final commit

commit 4694e9e05b29846dea1f92af70b08f6c6e30c3e4
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Mon Oct 24 14:28:47 2016 +0000

Final commit, everything works!

commit 59b7eca3bace24ed5fdda70b2be49df0c30c5b76
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Mon Oct 24 12:55:54 2016 +0000

Almost done html parsing live data

commit c516c90e01512d1e44b91da5d0591ace3bb4ad1c
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Mon Oct 24 09:14:15 2016 +0000

started liveData in About

commit fb1c5cffcdd33f4872379e04b05706e3037bf424
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Sun Oct 23 22:51:09 2016 +0000

Fixed tests and button

commit a6c8fb2d2fda584ba6c09d1f318c05cf020382dc
Merge: 15c0141 4f59ef8
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Sun Oct 23 19:16:11 2016 +0000

Merge branch 'fileUpload'
Add code

commit 4f59ef82225d1e4cabcf519b34526f944dd4c11e
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Sun Oct 23 19:15:38 2016 +0000

static_pages

commit 15c0141fa8301bc4d9fee92873cd79c98d11dfab
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Sun Oct 23 19:12:45 2016 +0000

User page shows old searches, incomplete

commit fb7639437d409d7e6fc6ecc08cd6a0d7ef0e44e2
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Sun Oct 23 17:57:04 2016 +0000

Deleted search model etc

commit 6dbc007e11fa1b58364b046432bf09afec0b19eb
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Sun Oct 23 00:03:18 2016 +0000

Fixed rsID

commit fd24e61d069e79c1b470e4c97fa2b3d7e7c2b2ad
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Sat Oct 22 15:43:06 2016 +0000

Resolved conflicts

commit 34989dd8eaabf271b4892b7b037e0f7c8c4e795c
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Sat Oct 22 10:58:37 2016 +0000

Adjusting views

commit e4027f794d7a097dcfc0ddfef8ce1f4812e46c37
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Sat Oct 22 00:47:39 2016 +0000

Fixed deleted lines

commit d63d74bec03a028b4c30cc951fe511eaac58c5c2
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Sat Oct 22 00:45:09 2016 +0000

Merged local and remote

commit 53ef68d69fb4432bb770db30fcc0084df81034e3
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Fri Oct 21 17:09:38 2016 +0000

file upload

commit dddc015d6f9b0325a60b11de4666d0760bfc85df
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Fri Oct 21 14:08:16 2016 +0000

comment blocks

commit a6a81a57421f101231b8eb1c586820c0898e8104
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Fri Oct 21 12:03:59 2016 +0000

More work on parsing

commit d49ec0ebea2ede577a7d00b4bd7b0cf578ee9783
Author: Stefan Rudvin <Stefan.rudvin@hotmail.com>
Date: Wed Oct 19 14:46:50 2016 +0000

Added HTML parsing, still needs work

commit 2bee47d9f870610de455ce1e5fd90db18fb4d9e9
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Wed Oct 19 12:49:34 2016 +0000

Search

commit 21700493145bd85d234d829ed1f7926439d7164c
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Wed Oct 19 11:29:00 2016 +0000

New views

commit 76f7f88c2a0985cda5f62bbb564eb3d66a9ffbf4
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Tue Oct 18 16:08:25 2016 +0000

Finish user edit, update, index, and destroy actions

commit 1b81c41d6a06944fe1509f4898b1e749b041c0b0
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Tue Oct 18 16:01:11 2016 +0000

Finish user edit, update, index, and destroy actions

commit 1c9c3e38377db3d770eea7369cd48bd4edde36d7
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Mon Oct 17 13:02:55 2016 +0000

Implement advanced login

commit c08a514d15683a8188f28c9efea6263724476c04

Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Wed Oct 12 16:24:34 2016 +0000

Implement basic login

commit fea19ca5f7a73840bb51f474f332229a80633ce7
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Wed Oct 12 08:43:29 2016 +0000

Use SSL and the Puma webserver in production

commit 72414f6fe162ff52c576d7658fe1bc7e59b48e04
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Wed Oct 12 08:36:49 2016 +0000

Finish user signup

commit 4e33bf78fa2ff4cca4d34609d08f3f4962116142
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Tue Oct 4 15:53:24 2016 +0000

Make a basic User model (including secure passwords)

commit 73cbf1356801bd17d55eef13cea74a3a22d22770
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Tue Sep 27 15:28:42 2016 +0000

Finish layout and routes

commit 606a5b48fc3ef0914f2bb11d75a303168683653d
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Fri Sep 23 09:56:01 2016 +0000

Add a full_title helper

commit e43c09d85629b73b8a8aa6fc4c61f741ea359113
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Wed Sep 21 09:14:24 2016 +0000

Finish Static Pages

commit c0cb53ab0f0bd904a2c5af6cd311aa1b3b773e70
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>
Date: Tue Sep 20 15:30:50 2016 +0000

Add a Static Pages Controller

commit 9b59229be9859bc8e21f86840f855638896efd9c
Author: Josh Becker <j.becker.16@aberdeen.ac.uk>

Date: Tue Sep 20 15:21:31 2016 +0000

Add Hello

commit 2d8bfe37642b3170ea01bd2b7747d8b9baa9be82

Author: Josh Becker <j.becker.16@aberdeen.ac.uk>

Date: Tue Sep 20 15:19:15 2016 +0000

Improved README

commit 3312384a8bfc2861efebb33c9bc9ba48387fadf1

Author: Josh Becker <j.becker.16@aberdeen.ac.uk>

Date: Tue Sep 20 15:17:12 2016 +0000

Initialize repository