### GSOC Ideas 2008

Please read Google Summer of Code 2008 GSOC for more background information on TikiWiki CMS/Groupware and the community. For information on mentors, see GSOC Mentors Bio 2008.

The GSoC list of mentoring organizations has been released and unfortunately TikiWiki is not on it. Nonetheless, the list of ideas put together is valuable documentation in its own right, and some of the projects will continue to happen (or are ongoing) anyhow. So thanks to all who contributed to the list.

The TikiWiki Google Summer of code committee is composed of:

- Dave Thacker
- Nelson Ko
- Marc Laporte
- Patrice Weber

To reach the committee, please email gsoc@tiki.org

The committee will oversee the program and analyze student applications.

A very important aspect:

"In our case, the GSOC project will be an integral part of TikiWiki code (not an optional 3rd party add-on) and thus, the whole community will be potentially involved in setting the requirements, testing, bugfixing, documentation and translation."

Priority goes to developers who not only provide useful functionality for TikiWiki but also that have a real project which will live on after GSoC. Eating our own  $Dogfood \ \ \ \$  has proven beneficial for TikiWiki evolution and we think it will be good for you too  $\ \ \ \ \$ 

Please add project proposals to this page, Be as complete and concise as possible.

66

"2) Do the projects on your ideas list look feasible for student developers? Is your ideas list thorough and well-organized? Your ideas list is the first place that student participants are going to look to get information on participating in GSoC, so putting a lot of effort into this list is a good thing(tm). One thing we noticed and really appreciated this year was how some organizations classified their ideas by easy, medium and difficult, and specifically listed the skills and background required to complete a given task. It might also be cool to expand on each idea with some places to get started research-wise (pointers to documentation or specific bugs), as well as the impact finishing a given idea will have for the organization."

Source: notes on organization selection criteria

### Please also see:

- Major Features Missing In Tiki
- Use Cases for weak or missing ones

# Skills

- PHP
- Smarty
- AdoDB (Database abstraction layer to use MySQL, Postgresql, etc)
- Communication and community coding

#### GSOC Ideas 2008

# Cross Lingual Wiki Engine project

The Cross Lingual Wiki Engine project aims at designing, developing and testing lightweight wiki tools to support communities that collaboratively create and maintain content in multiple languages. Such tools are needed for example, by the Mozilla Support community (our lead user organization) that produce multilingual user documentation.

Although the project is based on a TikiWiki platform (an Open Source project), our aim is to come up with a blueprint and reference implementation that other wiki engines can easily emulate.

The project was started in November 2007, and thus far, we have implemented basic features which could be used by a community of motivated and technically sophisticated users, to collaboratively produce multilingual content in simple scenarios.

We are applying for Google Summer of Code funding in order to bring the system to a next level, by improving its ease of use, and allowing it to deal with more complex scenarios.

#### Mentors:

- Alain Désilets
- Seb Paquet
- Xavier de Pedro

See www.wiki-translation.com rate for details.

# Level of difficulty: Medium.

### Social Networking

• Implement easily customizable user profiles and inter-user interactions, thus enabling social networking with Tiki. Allow users to give feedback or references to each other, creating a trust network. Theses functionalities should be well integrated with the translation management system to offer multiple language user profiles and references.

leyan : I am eligible to GSOC and willing to work on this project.

### Potential mentors:

- Seb Paquet
- Morgan Tocker
- Nelson Ko

#### Related links

http://www.phpbeer.com/ 년

### Theme/layout generator

#### Please see:

http://themes.tiki.org/TikiThemeGenerator ♂

#### Potential mentors:

- Gary Cunningham-Lee
- luci aka luciash d' being
- Marc Laporte

Tiki has enough features? Grant 100 wishes in a 100 days.

This could also be described as a Low-hanging fruit & sprint

In TikiWiki, all bugs and features requests are added to a "wishlist". It doesn't matter how many features there already are, new ideas always are suggested.

But you want to help make it rock solid everywhere? Help squash bugs and improve existing features. All bugs

All feature requests

At the end of the summer, you will know TikiWiki inside out and have worked with all active members of the community. And everyone will love you  $\square$ 

The community will vote on bugs and feature requests and this, along with the experience of the mentors, will determine the priorities.

The focus will be on low hanging fruit. We want to pick a lot of fruit!

It could also be, for example, to focus on all bugs of 5 major features (forums, bug tracker, wiki, blogs and newsletter).

Difficulty level and expectations:

- Up to you (this is the most open ended project in this list of ideas)
- Must enjoy working with open source communities
- People oriented coder preferred
- Interest in learning more about software bug/issue management in an open source environment

### Potential mentors:

- Xavier de Pedro
- Marc Laporte

### Admin & Edit UI Revamp

AdminUIRevamp Edit User Interface Revamp

### Potential mentors:

- Rick Sapir
- Gary Cunningham-Lee
- luci aka luciash d' being
- Marc Laporte

## Required skills/interests

- Strong background in Usability.
- Interest in TikiWiki as a whole as the whole application will need to be gone through and making the UI nicer and more consistant.

# Infrastructure Revamp

Infrastructure Revamp

#### Mentors:

• Patrice Weber

#### Potential mentors:

Nelson Ko

## Difficulty level and expectations:

- Low
- Strong sysadmin skills. (Shell scripting, etc.)
- Some SQL / MySQL experience needed

This project could be merged with "Performance optimization" as there is significant overlap. The focus here, though, is mainly around improving the installation process, configuration of scripts, making profile templates more usable, and other tasks of relatively lower difficulty level.

## Performance optimization

TikiWiki is feature-full. Some parts are fast but some are not.

#### Needed:

- Benchmark Tiki
- Get load stats from high-traffic sites like http://support.mozilla.com
- Optimize
- Document how developers should

# Difficulty level and expectations:

- Low to moderate (student will be part of a larger team and can contribute at whatever level)
- Must be really familiar around unix environment
- Must know SQL, especially MySQL
- Some familiarity with memcached an asset

Testing & optimization are topics of the next code FEST PhpQuÃ@bec 2.1, which will be held in MontrÃ@al, Canada, May 16th to 18th, 2008

http://www.codefest.ws/ 대

## Mentors:

- Morgan Tocker
- Nelson Ko
- Patrice Weber

This project could be merged with "Infrastructure Revamp" although the focus is a little different.

# **Project Management**

project management www.projectmanagementwiki.org ♂

#### Potential mentors:

- Marc Laporte
- Jean Georgiadis MBA, ing, PMP 🗷
- Régis Barondeau

## Required skills/interests

- Good overall understanding of project management.
- Experience with existing Project management applications an asset.

# Image manipulation

TikiWiki is great at managing text. Now, it must become great at managing images. (crop, resize, annotation, links, add arrows/circles, etc)

- Integrating fotonotes or wikigraphe or DOM Image Annotation to the Image gallery See all comments of this tracker item for related links
- SVG?

## Difficulty level and expectations:

- Moderate
- Coursework knowledge of graphics manipulation necessary, e.g. bitmap vs. vector graphics
- Familiarity with existing graphics editors (whether open source or not)

### Potential mentors:

- Nelson Ko
- Marc Laporte

## Ecommerce

TikiWiki can already do a good a decent job at managing product lists & descriptions. But what about transactions?

Please see: Shopping Cart

### Potential mentors:

- Marc Laporte
- Tom Aratyn

# Workspaces / Learning Management

Improve usability of Workspaces feature in Tiki in order to:

- allow large amount of workspaces in a single Tikiwiki installation,
- allow easiness for students to roll in and out of workspaces,
- management of pre-assigned modules to workspaces at creation time,
- integration with "Theme control", and "Layout per section".

Moreover, improve the assignment and gradebook feature in AulaWiki Mod so that it becomes more functional in high volume installations.

http://edu.tiki.org 🗷 http://tiki.org/LearningManagementSystemDev 🗷

#### Potential mentors:

- Xavier de Pedro
- Marc Laporte

# AJAX Enhancements

• Improve TikiWiki UI by using AJAX (either with libraries already used in TikiWiki, or with third party libraries LGPL-compatible that could be used in TikiWiki) on TW major features (wiki, trackers, file galleries, calendar, ...).

### Examples:

- Wiki page auto-save
- Drag & Drop files in file
- Add, move, modify events in calendar with mouse

# Mentors:

• Patrice Weber

## Required skills/interests

• Good knowledge of JavaScript and how AJAX works

### Feature Interaction

• Increase Interaction between major features of TikiWiki

### Example:

• Dynamic generation of wiki pages based on data from one or more trackers and a wiki page "template" that uses special wiki syntax to display data from trackers (text, images, ...)

### Mentors:

• Patrice Weber

# **Documents Storage and Management**

• Add DMS (Document Management System) features to TikiWiki File Galleries

# Examples:

- File Management WebDAV support (in full PHP without using a php extension)
- "Download Ticket" feature, to allow one user to send a special link that gives a limited read/download access to a document (file, wiki page, ...) to another user who is either not registered or has no permission to do this unless he use this special link ("ticket").

#### Mentors:

• Patrice Weber

### Enhanced search

- Integrated tag, category and full-text search
- Support for tag and keyword synonyms, and configuration of this
- Advanced caching of search queries and results
- Results of project will be used in the Firefox Support & site

## Difficulty level and expectations:

- High
- Looking for student with coursework & experience in search related technologies
- Graduate student preferred

#### Mentors:

- Nelson Ko
- Sylvie Greverend?

### Phase 2 of Kaltura - Tikiwiki integration

- Kaltura 🗗 is a platform for collaborative video editing wiki-style
- Phase 1 is already being done by Nelson as part of a Carleton University project in the spring
- Phase 2 in the summer will involve enhancing the system for usability, and to add additional integrations (e.g. user account/access control) welcomes a GSOC student.

Difficulty level and expectations:

- Moderate
- Must enjoy editing video, putting up videos on video sites, understand web user interface issues, and be able to implement in PHP/Smarty

# Mentors:

• Nelson Ko

# Alias

GSOCIdeas 2008