A Website for

E. Baton Rouge Council on Aging

Problem

Jeremy, the public relations director of EBRCoA, began working on a site. Unfortunately, managing all of a site's content and functionality through Dreamweaver can be tedious.

Requirements

- Provide an easy way to mange simple pages (stored as html)
    - Used for Home Page, Resources, etc.
- Online registration form for the Senior Olympics.
    - Calculate cost and accept Paypal or Check for payment
    - Notify Jeremy or appropriate person of the registration.
    - Groups registrants by age in increments of 5 and output in a table.
- Calendar Management
    - Events with a title, start date, optional end date, and description may be inserted.
    - Output events in a list or in a table.
- Help documents

Solution

For our Web Application Framework, we chose Drupal.

Drupal is a system for building and customizing a website, proven in its stability and ease of use. Its modular design encourages extensibility, allowing non-technical users to update website content and add features with relative ease.

For EBRCOA, Drupal is a win-win option:
- developers can focus their efforts on main features.
- customization tools come built-in to each module (but still need to be configured.)

At the end of the semester, we know EBRCOA will have a website that is stable and easy to update.

Drupal Hook System

Drupal's module system is based on the concept of "hooks".

A hook is a PHP function. Let's say there is a hook named foo_bar()
- "foo" is the name of the module. In this case its file name is foo.module
- "bar" is the name of the hook. Each hook has a defined set of parameters and a specified result type.

To extend Drupal, a module simply needs implement a hook. When Drupal wishes to allow intervention from modules, it determines which modules implement a hook and call that hook in all enabled modules that implement it.

Drupal Form API

In Drupal, forms are represented abstractly as arrays which provides for interoperability. Drupal generates the form HTML using a theme.

```
$form['foo'] = array(
  '#type' => 'textfield',
  '#title' => t('bar'),
  '#default_value' => $object['foo'],
  '#size' => 60,
  '#maxlength' => 64,
  '#description' => t('baz'),
);
```

FAPI Workflow 5.x and 6.x

drupal_get_form()

drupal_execute()

drupal_retrieve_form()

hook_form()

drupal_process_form()

drupal_prepare_form()

hook_form_alter()

drupal_form_builder()

hook_value()

#process callback

form_set_value()

#afterbuild callback

#1

#1

Posted?   no   yes

drupal_render_form()

X   #pre_render callback

#theme callback

Display

#validate callback

X   hook_nodeapi() op = validate

Valid?   no   yes

#submit callback

hook_nodeapi() op = submit

Save

Legend

X   Gone in Drupal 6.x

Opportunities for intervention