



# Microsites

## An Option for Drupal Multisite Development

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# Check out the Hackpad!

▶ <https://drupalgovcon2016.hackpad.com>

▶ #drupalgovcon

# What's PNNL?

## ▶ Pacific Northwest National Laboratory

- Department of Energy Laboratory
- Located in Eastern Washington

## ▶ Research

- Biology and Biochemistry
- Chemistry
- Clinical Medicine
- Engineering
- Environment and Ecology
- Geosciences
- Materials Science
- Microbiology
- Pharmacology and Toxicology
- Physics



# What's PNNL?



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# How do we Drupal?

- ▶ Team of 15+
  - Developers / Site Builders / Themes
  - Testers
  - Project Managers
  
- ▶ 50+ Drupal 7 Projects in Production
  - All for government clients (including ourselves)
  
- ▶ Mostly External Work
  
- ▶ Agile: Large Scale Scrum Team
  - 3 Teams
  - 3-week Sprints
  - ~12 Projects



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# *What is a Microsite and why should you care?*

## Department of <something>

Program  
1

Program  
2

Program  
3

Program  
4



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*Really the question is:  
How do you share information  
between multiple websites?*



# Option 1: Separate Websites

▶ Case Study: Five separate doc roots + databases with no connectivity

▶ Pros:

- Can reuse base templates, Features, etc.
- Generally cheaper to develop (up front)
- Simple Information Architecture

▶ Cons:

- Content will diverge (and won't be kept in sync)
- Limited searchability



## Option 2: API Driven Websites

- ▶ Case Study: Five separate doc roots + databases with connectivity
  
- ▶ Pros:
  - Forced separation, clear roles and responsibilities
  - Can replicate content across sites
- ▶ Cons:
  - More complex to build
  - Content migration model is very complicated



## Option 3: Multisite

- ▶ Case Study: One doc root but separate databases and domains for each website.
  
- ▶ Pros:
  - Single, shared code base
  - Patching and updates are centralized for all sites
  
- ▶ Cons:
  - Separate databases
  - Separate domains
  - Bugs impact all sites
  - 1-off customizations are difficult



## Option 4: Microsite

▶ Case Study: One website with landing pages and separate areas for each “program” site

▶ Pros:

- Single code base
- Content is easily reusable
- Single copy of content throughout (easily searched, related)

▶ Cons:

- Information architecture
- More complicated to build
- One offs are harder



# Reusable Components

## ▶ **Content**

- ▶ Fields
- ▶ Search
- ▶ Taxonomy

## ▶ **Look / Feel**

- ▶ Menus
- ▶ Template
- ▶ Logos
- ▶ Views & Blocks

## ▶ **Users**

- ▶ Roles
- ▶ Permissions



# Microsites: Toolbox

- ▶ Common and robust Information Architecture with at least one commonly Referenced Entity
- ▶ Flexible / Well thought out design
- ▶ Context



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# Microsites: Fun stuff you can do

- ▶ Reusing content
- ▶ Reusing landing pages
- ▶ Cloning / reusing views



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*Here are some tools to help...*



# Microsites: The Solution

- ▶ Use Taxonomy to differentiate
  - ▶ Term reference field is unlimited cardinality
  - ▶ Landing pages use taxonomy-related blocks
  - ▶ We'll call it Organization taxonomy for ease
    - ▶ Could be team, department, program, or other division
    - ▶ On content, the Organization term-reference field is required



# Microsite: Path

- ▶ This is KEY
- ▶ Makes logo, block and breadcrumbs switching possible
- ▶ Mix of node URL assignment and PathAuto patterns



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# Microsite: Menus

- ▶ Individual menus per Organization
- ▶ Menu blocks placed by path



# Microsites: Logos

- ▶ Create logo block for each microsite in custom module
  - ▶ Use `hook_block_info()` to create block

```
/**
 * Implements hook_block_info().
 */

function mymodule_block_info() {
  $blocks['organization_logo'] = array(
    'info' => t('Organization Logo'),
  );
  $blocks['nat_security_logo'] = array(
    'info' => t('National Security Logo'),
  );
  $blocks['energy_envir_logo'] = array(
    'info' => t('Energy & Environment Logo'),
  );
  $blocks['alliance_partners_building_tunnel'] = array(

```



# Microsites: Logos - continued

- ▶ Use `hook_block_view()` to return rendered block

```
break;  
case 'organization_logo':  
$output = "<a href='$base_url'><img src='$base_url/sites/all/themes/images/logo.png' alt='PNNL Logo'></a>";  
$block['subject'] = null;  
$block['content'] = $output;  
break;
```

- ▶ Add block in header region for all pages within the microsite's path



# Microsites: Homepages

- ▶ All fields added to general Landing Page content type
  - ▶ Simplicity added with Conditional fields
- ▶ Views display content based on taxonomy



# Microsites: Breadcrumbs

- ▶ Code in template.php to custom set breadcrumbs
  - ▶ Home (parent) > Organization (child program) > Title
  - ▶ Custom breadcrumbs



# Microsites: Add CSS Class

- ▶ Add microsite class to each node for styling
  - ▶ PHP
  - ▶ Field Formatter CSS Class module



# Microsites: Breadcrumbs

- ▶ Field Formatter CSS Class
  - ▶ Module to add a class to any page, node, entity, field, etc.
    - ▶ Uses field type of list, taxonomy, text or option field
    - ▶ Configure the entity to add class to on Manage Display tab
- ▶ Add class to your content based on Organization taxonomy

Home » Administration » Structure » Content types » Page

Page

EDIT MANAGE FIELDS MANAGE DISPLAY

Default Teaser

Show row weights

FIELD	LABEL	FORMAT
÷ Body	<Hidden>	Default
÷ Org Style	<Hidden>	CSS Class

Hidden

Add CSS classes to the **body**, skip 0 levels, class names will **not be transliterated**, display original content as <Hidden>



# Microsites: Going Further

- ▶ Use Organic Groups (OG) module
  - ▶ Break up content permissions based on Organization
  - ▶ For example, you have Content Manager, Author, and Editor for each organization assigned to content
    - ▶ Energy Author, Energy Editor, Energy Content Admin
    - ▶ Security Author, Security Editor, Security Content Admin
    - ▶ Once content is assigned within an org, only those content members can create, edit, administer content



# Microsites: Going Further

- ▶ Paragraphs module to enable flexible page design
- ▶ Field Format CSS Class module to offer content styling/placement options on the page
- ▶ Infinitely flexible in fields, design and architecture

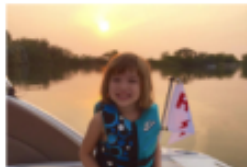


# Microsites: Same field, different layouts

## A Whopper of a Page

### Section Title

Bacon ipsum dolor amet fatback alcatra salami chuck, pork turducken kevin. Tenderloin bresaola biltong fatback, ribeye shoulder swine ham hock bacon brisket pig drumstick porchetta ham.



#### First Column

Bacon ipsum dolor amet fatback alcatra salami chuck, pork turducken kevin. Tenderloin bresaola biltong fatback, ribeye shoulder swine ham hock bacon brisket pig drumstick porchetta ham.

#### Second Column

Bacon ipsum dolor amet fatback alcatra salami chuck, pork turducken kevin. Tenderloin bresaola biltong fatback, ribeye shoulder swine ham hock bacon brisket pig drumstick porchetta ham.

#### Third Column

Bacon ipsum dolor amet fatback alcatra salami chuck, pork turducken kevin. Tenderloin bresaola biltong fatback, ribeye shoulder swine ham hock bacon brisket pig drumstick porchetta ham.

#### Open Accordion Item

I am above the fold content  
Bacon ipsum dolor amet fatback alcatra salami chuck, pork turducken kevin. Tenderloin bresaola biltong fatback, ribeye shoulder swine ham hock bacon brisket pig drumstick porchetta ham. Ball tip beef ham hock frankfurter, landjaeger drumstick tri-tip bresaola turducken alcatra t-bone.

- I'm Closed
- Some more Closed

Just a lonely button

## A Whopper of a Page

#### Open Accordion Item

I am above the fold content  
Bacon ipsum dolor amet fatback alcatra salami chuck, pork turducken kevin. Tenderloin bresaola biltong fatback, ribeye shoulder swine ham hock bacon brisket pig drumstick porchetta ham. Ball tip beef ham hock frankfurter, landjaeger drumstick tri-tip bresaola turducken alcatra t-bone.

- I'm Closed

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#### Fourth Column

Bacon ipsum dolor amet pork belly biltong pancetta spare ribs beef. Flank filet mignon prosciutto tri-tip porchetta chicken meatloaf, pork chop beef kevin pork. Pork loin leberkas biltong, salami beef rump doner brisket shoulder.

### Section Title

Bacon ipsum dolor amet fatback alcatra salami chuck, pork turducken kevin. Tenderloin bresaola biltong fatback, ribeye shoulder swine ham hock bacon brisket pig drumstick porchetta ham.

Just a lonely button



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# Microsites: Disclaimer

- ▶ You should NOT do this at all times. It's not a common approach, but quite useful when needed

# Questions?

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