



Cornell DrupalCamp 2017

October 19-20, 2017

Cornell University Ithaca, NY

camp.drupal.cornell.edu



For Starters: Creating CU Bear, a Drupal 8 Starter Kit

Alison McCauley

Anthony Adinolfi

Nazrin Tingstrom

CIT/Custom Development Team, Cornell University

Background / Goals / Needs

- Why bother with any of this?
- What did we hope to achieve?



Background / Goals / Needs

- Why bother with any of this?
 - What did we hope to achieve?
- ★ Save resources!
- Lower our price tag
 - Build more Cool Stuff



Background / Goals / Needs

- Why bother with any of this?
- What did we hope to achieve?

- ★ Save resources!
 - Lower our price tag
 - Build more Cool Stuff
- ★ Maintenance!



Fun with Drupal 8

If you're building a Thing from which other Drupal 8 sites will be created...



Fun with Drupal 8

If you're building a Thing from which other Drupal 8 sites will be created...

- ★ Option 1: A codebase that you create an instance of and maintain a connection with -- it is your upstream -- you get your core updates AND config updates from there.



Fun with Drupal 8

If you're building a Thing from which other Drupal 8 sites will be created...

- ★ Option 1: A codebase that you create an instance of and maintain a connection with -- it is your upstream -- you get your core updates AND config updates from there.
- ★ Option 2: A snapshot starter-kit that you use to spin up a site, but then diverge from / customize / you're no longer dependent on / etc.



Fun with Drupal 8

- ★ Related terminology:
 - Drupal 7 “distributions and install profiles”



Fun with Drupal 8

- ★ Related terminology:
 - Drupal 7 “distributions and install profiles”
 - Drupal 8 distributions -- like Panopoly, Open Atrium, Lightning
 - Drupal 8 install profile (like our starter-kit)



Fun with Drupal 8

- ★ Related terminology:
 - Drupal 7 “distributions and install profiles”
 - Drupal 8 distributions -- like Panopoly, Open Atrium, Lightning
 - Drupal 8 install profile (like our starter-kit)
 - Drupal 8 “profile type” of **composer** package (behaves like distro)



Fun with Drupal 8

If you're building a Thing from which other Drupal 8 sites will be created...

- ★ Option 1: A codebase that you create an instance of and maintain a connection with -- it is your upstream -- you get your core updates AND config updates from there.
- ★ Option 2: A snapshot starter-kit that you use to spin up a site, but then diverge from / customize / you're no longer dependent on / etc.



Fun with Drupal 8

If you're building a Thing from which other Drupal 8 sites will be created...

- ★ Option 1: A codebase that you create an instance of and maintain a connection with -- it is your upstream -- you get your core updates AND config updates from there.
- ★ Option 2: A snapshot starter-kit that you use to spin up a site, but then diverge from / customize / you're no longer dependent on / etc.

Our considerations:

- We wanted a **composer**-managed codebase (docroot concern, among other things)
 - Pantheon hosted / **composer** limitation (also mention Pantheon "custom upstreams")



Fun with Drupal 8

If you're building a Thing from which other Drupal 8 sites will be created...

- ★ Option 1: A codebase that you create an instance of and maintain a connection with -- it is your upstream -- you get your core updates AND config updates from there.
- ★ Option 2: A snapshot starter-kit that you use to spin up a site, but then diverge from / customize / you're no longer dependent on / etc.

Our considerations:

- We build custom sites / none of our sites are identical.
 - Sites **will** diverge from the base.
- We hand over ownership of sites to customers, we don't "lock down" config.
 - Sites **will** diverge from the base.



Fun with Drupal 8

If you're building a Thing from which other Drupal 8 sites will be created...

- ★ Option 1: A codebase that you create an instance of and maintain a connection with -- it is your upstream -- you get your core updates AND config updates from there.
- ★ Option 2: A snapshot starter-kit that you use to spin up a site, but then diverge from / customize / you're no longer dependent on / etc.



What's inside!

- Config management, for initial site setup, via config_installer.
- Content types:
 - Basic page
 - Event
 - Gallery (images or videos)
 - News
 - Slideshow (i.e. "campaign slider")
 - Spotlight
 - Also: Entity browser ctype: two browser entities: files, nodes
- Paragraphs
- Taxonomy (vocabs):
 - Categories
 - Tags



What's inside!

- Basic Views (news, events, spotlights)
- Drupal search
- Localist (CU Calendar) integration for Events
- Roles: anonymous, authenticated, administrator
- Authentication and authorization via SSO (CUWebAuth/simpleSAMLphp) and AD groups. (Disabled by default.)
- Misc:
 - LinkIt
 - Basic URL alias patterns
 - Chosen + Chosen library
 - Coffee



Don't tell me-

Show me!

Theme Approach (1 of 2)

- Bootstrap 3 base framework to meet customer requests and help ease of sharing.
- Bootstrap contrib Drupal base theme plus a Cornell-branded subtheme.
- Subsequent projects will be a subtheme of the Cornell-branded base.
- Cornell branding options are implemented as Theme Settings plugins.
- The Cornell base also customizes and overrides Bootstrap CSS to suit our front-end development approach and our stance on accessibility.
- Modular markup and CSS for Drupal components (News, Events, Spotlight, etc...)
 - Not Bootstrap-specific for future portability.
 - Not Drupal-specific, Views-specific, or Content Type-specific.
 - Instead, standard field types and reusable patterns so it can grow easily as new content types are identified.



Theme Approach (2 of 2)

- Completely custom carousel and image gallery implementations.
 - Bootstrap Carousel does not meet our accessibility standards (even in v4).
 - Other popular carousels also fall short along with image gallery options.
 - No acceptable contrib solutions were found for Drupal 8.
 - Our solution's front-end: custom Javascript and CSS, responsive and accessible.
 - Back-end: "Slideshow" and "Gallery" Content Types with image fields, a Paragraph type for the carousel, and Twig templates to connect with the front-end scripts.
- *CKEditor customization still pending, but our D7 approach will help inform this.*



Demo



Backstage pass

Started with `drupal-composer/drupal-project` ...

- Upgraded Drupal core to 8.4.x (ps this was a nightmare; newer major version of symfony, broke drush integration, so much pain)
- Custom themes
 - Registered on packagist
 - Included in project via `composer`



Backstage pass

Started with `drupal-composer/drupal-project` ...

- Upgraded Drupal core to 8.4.x (ps this was a nightmare; newer major version of symfony, broke drush integration, so much pain)
- Custom themes
 - Registered on packagist
 - Included in project via composer



Backstage pass

Started with `drupal-composer/drupal-project` ...

- Upgraded Drupal core to 8.4.x (ps this was a nightmare; newer major version of symfony, broke drush integration, so much pain)
- Custom themes
 - Registered on packagist
 - Included in project via composer



Backstage pass

Started with `drupal-composer/drupal-project` ...

- Some `pantheon-systems/example-drops-8-composer` (for GH + CircleCI + Pantheon integration)
- Also, `drupal-composer/drupal-scaffold` is a thing -- something about composer + drupal core...
- Added config and modules and whatever from demo / dev site...
 - config_installer! https://www.drupal.org/project/config_installer

! SPEAKING OF WHICH !



Backstage pass

- A lot of the real work was figuring out what should be in the starter kit -- what ctypes, what media/file things, what views, what if any taxonomy things, what modules...
- We built a demo site, managing our dependencies with composer, and configuring All Of The Stuffs -- then exported the configuration into a `config_installer` install profile.



Shoulda-Woulda-Coulda

@todo

- Need automated testing of creating a project from the starter kit -- maybe using Lando to run tests "locally within circleCI."



@todo

- Need automated testing of creating a project from the starter kit -- maybe using Lando to run tests "locally within circleCI."
- Oh, and, automated tests overall :)
 - Our CircleCI integration is functional, the foundation is there for behat tests, buuuuut we don't have any actual tests...



@todo

- Need automated testing of creating a project from the starter kit -- maybe using Lando to run tests "locally within circleCI."
- Oh, and, automated tests overall :)
 - Our CircleCI integration is functional, the foundation is there for behat tests, buuuuut we don't have any actual tests...
- ...
 - Text formats & WYSIWYG config
 - Finish Localist integration (CU Events calendar)
 - Finish SSO (CUWebAuth) -- and set up a non-admin authenticated role
 - People directory
 - TWIG TWIG TWIG



The Last Slide (??)

Important thing to consider, but doesn't have to be decided up front-- **the relationship to be between source project and child projects.**

- ★ In D7 terms: Do you want a (D7) install profile scenario, where the project is used to spin up a thing, and that's it, **OR**, a (D7) distro scenario, where changes from the source project come down to the child repos?



The Last Slide (??)

Important thing to consider, but doesn't have to be decided up front-- **the relationship to be between source project and child projects.**

- ★ In D7 terms: Do you want a (D7) install profile scenario, where the project is used to spin up a thing, and that's it, **OR**, a (D7) distro scenario, where changes from the source project come down to the child repos?

Remember: The starter kit we have is the former.

Remember: drupal-profile **composer** package type

- ★ Drupal 7 distro behavior in the Brave New **composer**-managed Drupal 8 World



The end!

<https://github.com/CU-CommunityApps/gold-bear>

^^ links to “Gold Bear” dev site and CircleCI instance

<https://github.com/CU-CommunityApps/cubear-starter-kit>

^^ links to theme repos are in cubear-starter-kit README

@alisonjo2786 everywhere; alison@cornell.edu

nazrin.tingstrom@cornell.edu

ama39@cornell.edu

