

WordPress at CERN

A next-generation content management system

Web Team
Infrastructure Team

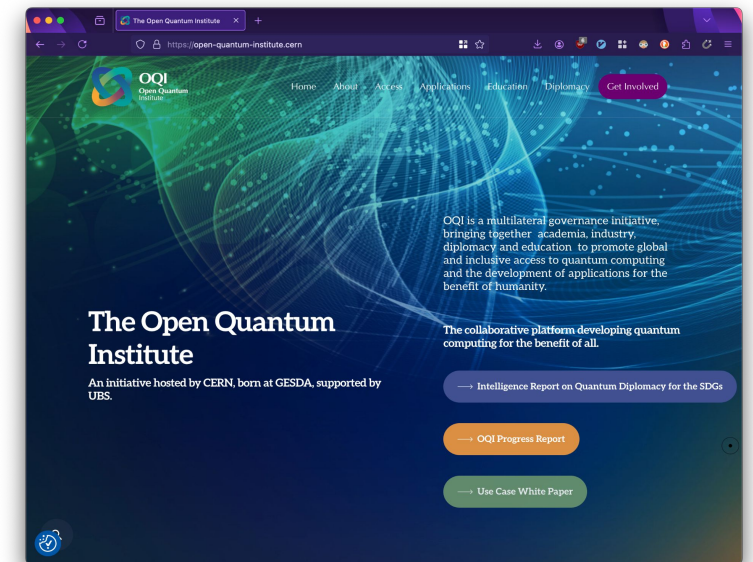
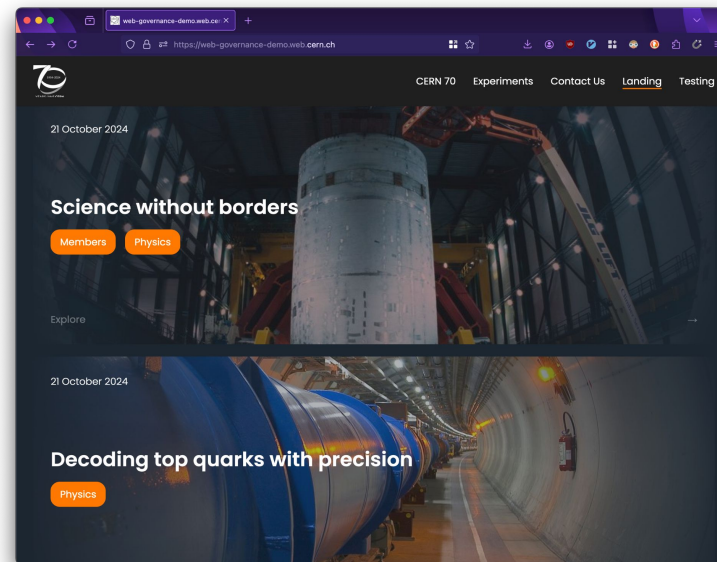
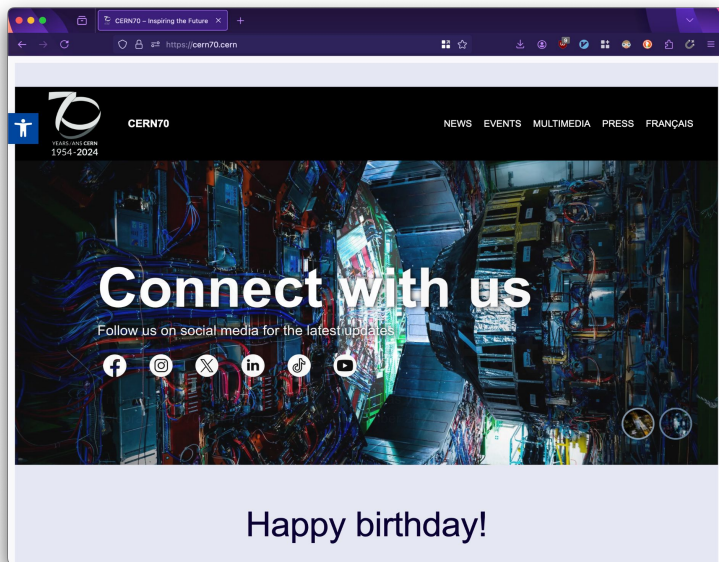
version 1.7
last revised 15-MAY-2025

Agenda

1. What is WordPress?
2. Why did we choose WordPress?
3. Where are we with development?
4. What is our roadmap?
5. What do I do today?
6. Demo
7. FAQ

What is WordPress?

- WordPress is a content management system (CMS), just like Drupal
- User-friendly, intuitive, and requires no development experience
- It is open-source, which means anyone can use and modify it
- Strong ecosystem, widely used across all types of websites



Why did we choose WordPress? (1/5)

- 13 years ago, CERN officially adopted Drupal
- Back then, it was a good choice, but today we must ask: is it still the right choice?

Why did we choose WordPress? (2/5)

- 13 years ago, CERN officially adopted Drupal
- Back then, it was a good choice, but today we must ask: is it still the right choice?

Today:

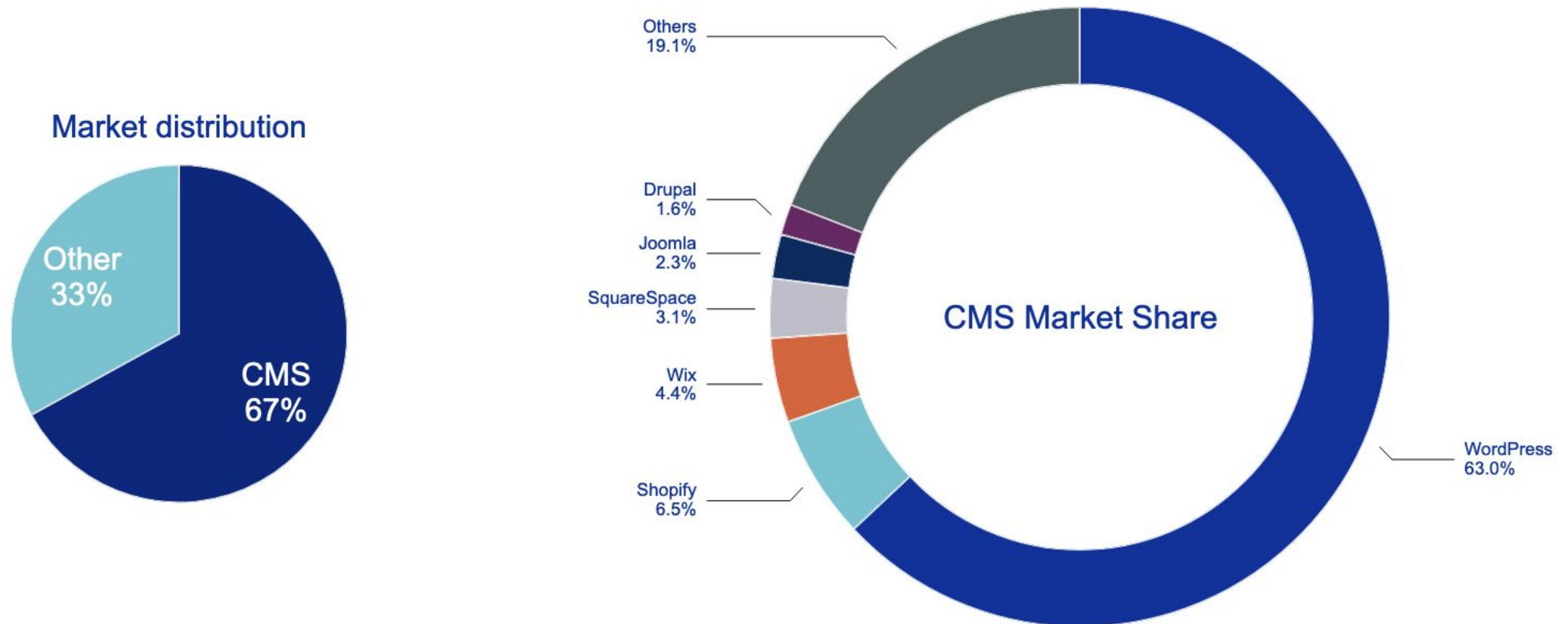
- Steep learning curve, difficult and time-consuming to do simple things
- Substantial work involved in maintaining status-quo (>8.4 FTEs in Drupal 8 to 9 migration)
- Dwindling ecosystem, increased stress on support, maintenance, and security work
- Websites have poor responsiveness and little-to-none accessibility
- We are plagued by issues beyond our control

Why did we choose WordPress? (3/5)

Requirement	State					
	pre-Drupal	Drupal	WordPress	Wix	Squarespace	Joomla
clear URLs and structure						
avoid data duplication						
web accessibility			with plugin	partial	partial	
navigation (find correct resource)		partial	partial	partial	partial	partial
search (find correct resource faster)						
enforceable design guidelines		partial		restricted*	restricted*	partial
enforceable governance		partial	†	partial	partial	partial
easy content management system	N/A	partial				
easy to edit content by end-users		partial				partial
reduce maintenance work				managed	managed	
transparency of content and files	direct	invisible	partial	partial	partial	invisible
reasonable learning curve	shallow	steep	shallow	shallow	shallow	steep
integrate with SSO, CDS, Indico, ...				limited*	limited*	
healthy ecosystem	N/A	deterioating	healthy	healthy	healthy	deterioating

Why did we choose WordPress? (4/5)

Adopting the most used CMS allows us to provide a better level of service and support; it means faster updates and fixes due to taking advantage of a bigger and more active community



Why did we choose WordPress? (5/5)

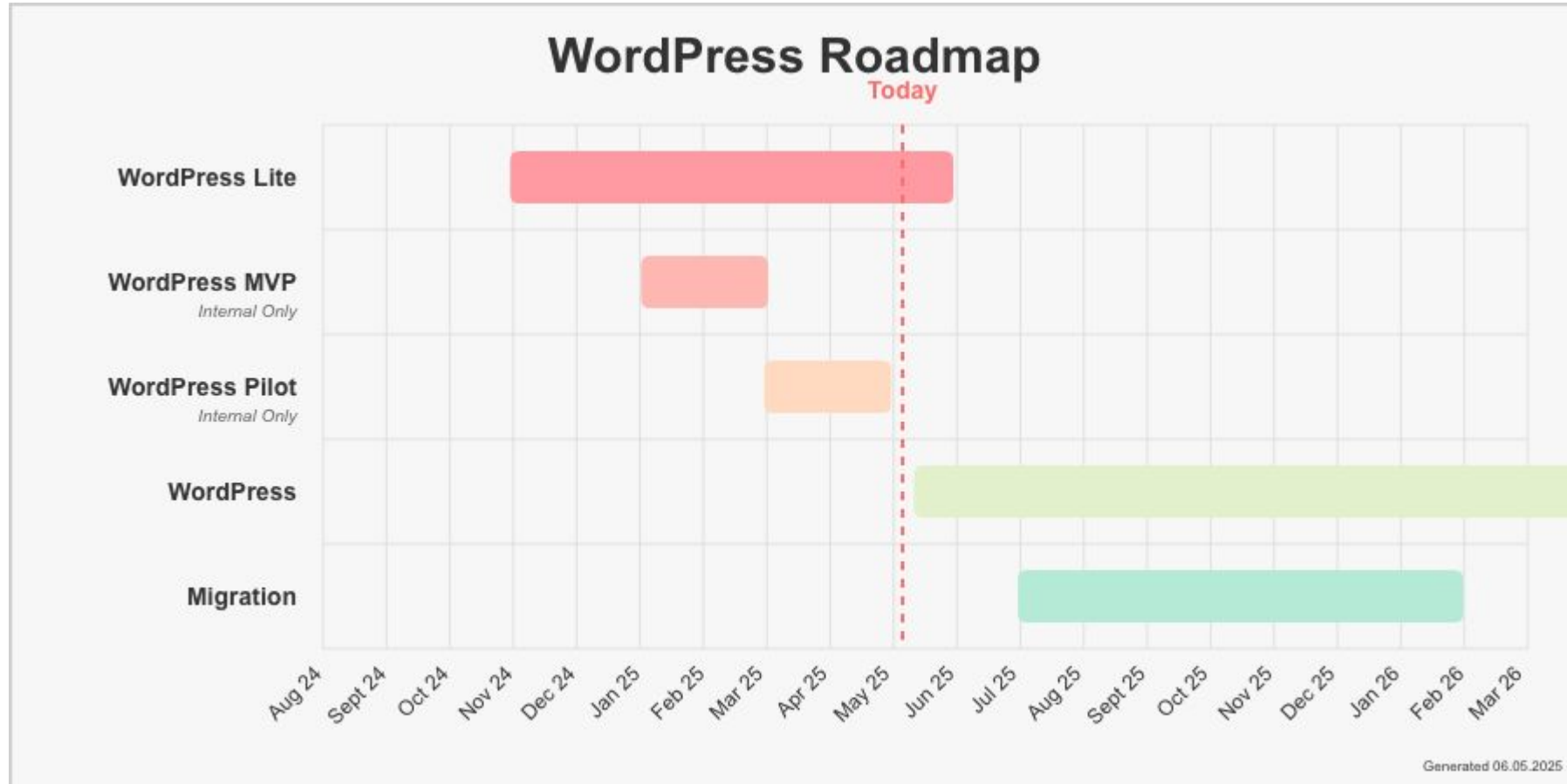
WordPress shifts website owners from being web developers to content creators

— allowing you to focus on what matters: your content!

Where are we?

- WordPress is in **active development** — joint effort between **IR and IT**
- WordPress Lite, a lightweight version, was made available in **October '24**
 - Included a CERN WordPress theme and core functionality such as
 - headings, paragraphs, quotes, lists, tables, videos, images, galleries
 - interactive elements such as action buttons, sliders, CDS and Indico
 - post filtering by tag and/or category, social media integration
 - countdown widgets, and more...
 - WordPress Lite was our way to engage interested users and experiment!
- **All feedback from WordPress Lite has been implemented – thank you!**

What is our roadmap? (1/3)



What is our roadmap? (2/3)

Overarching goals:

- Users will be content creators, not developers
- Updates, security patches, and tweaks all managed centrally: no action on users

We rely on you to help us shape WordPress at CERN!

Web Representatives are doing tremendous work, but everyone is encouraged to share their thoughts: wordpress-feedback@cern.ch

(or via [Mattermost](#))

What is our roadmap? (3/3)

Overarching goals:

- Streamline and modernise CERN's web presence
- Customisations allowed only for well-justified cases
 - requires explicit approval from the Web Governance Board
 - requires commitment of human power to maintain customisations indefinitely
 - requires commitment to coordinate and ensure timely updates and upgrades
 - to be managed centrally: more transparency, better security

What you can do with WordPress?
Let's look at the demo in video together!



Example: Managing Content in Drupal

The screenshot shows the 'Add content type' page in a Drupal 7 administration interface. The top navigation bar includes links for 'Back to site', 'Manage', 'Shortcuts', 'pkatyaya', and 'Dashboards'. Below this is a secondary menu with 'Content', 'Structure' (active), 'Appearance', 'Extend', 'Configuration', 'People', 'Reports', and 'Help'. The main header displays 'CERN Accelerating science' and 'Signed in as'. The page title is 'Add content type' with a star icon. The breadcrumb trail is 'Home » admin » structure » types » add'. A message states: 'Individual content types can have different fields, behaviors, and permissions assigned to them.' The 'Name' field is labeled with a red asterisk and contains the text 'PDF'. To its right, the 'Machine name' is 'pdf' with an '[Edit]' link. A description of the name field is provided: 'The human-readable name for this content type, displayed on the Content types page.' Below this is a large text area for the 'Description'. A note indicates it 'Displays on the Content types page.' On the left, a sidebar contains several expandable settings sections: 'Submission form settings' (with a 'Title' field), 'Publishing options' (with 'Published, Promoted to front page, Create new revision'), 'Language settings' (with 'Site's default language (English)'), 'Display settings' (with 'Display author and date information'), 'Menu settings', and 'Scheduler'. The main content area has a 'Title field label' field containing 'Title'. Below it are 'Preview before submitting' options: 'Disabled', 'Optional' (selected with a radio button), and 'Required'. The 'Explanation or submission guidelines' section has a large text area with a note: 'This text will be displayed at the top of the page when creating or editing content of this type.' At the bottom, there are two buttons: 'Save and manage fields' (highlighted in blue) and 'Save'.

Back to site Manage Shortcuts pkatyaya Dashboards

Content Structure Appearance Extend Configuration People Reports Help

CERN Accelerating science Signed in as

Add content type ☆

Home » admin » structure » types » add

Individual content types can have different fields, behaviors, and permissions assigned to them.

Name *

PDF Machine name: pdf [Edit]

The human-readable name for this content type, displayed on the Content types page.

Description

Displays on the Content types page.

Submission form settings

Title

Title field label *

Title

Preview before submitting

☐ Disabled

☒ Optional

☐ Required

Explanation or submission guidelines

This text will be displayed at the top of the page when creating or editing content of this type.

Publishing options

Published, Promoted to front page, Create new revision

Language settings

Site's default language (English)

Display settings

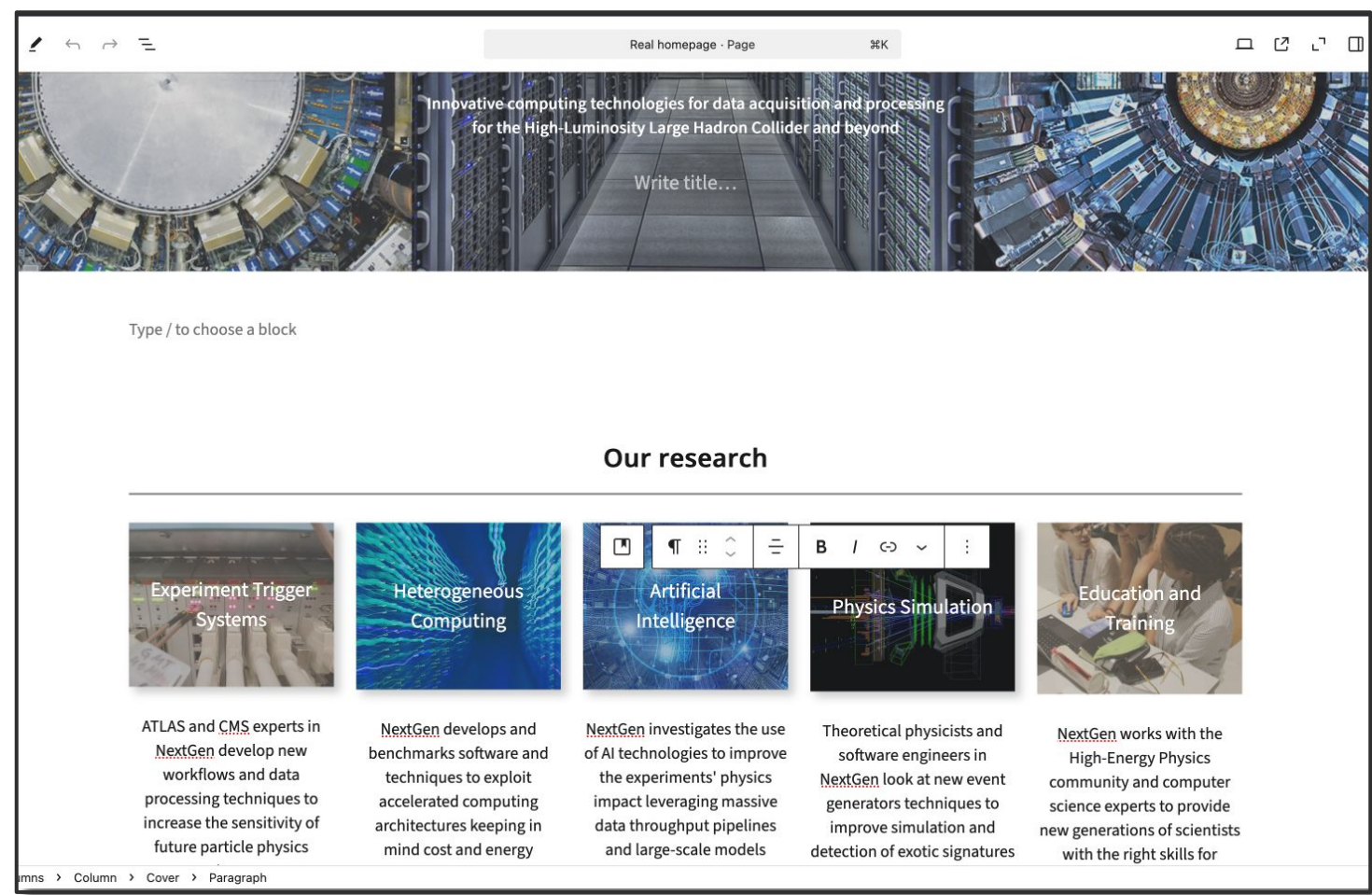
Display author and date information

Menu settings

Scheduler

Save and manage fields Save

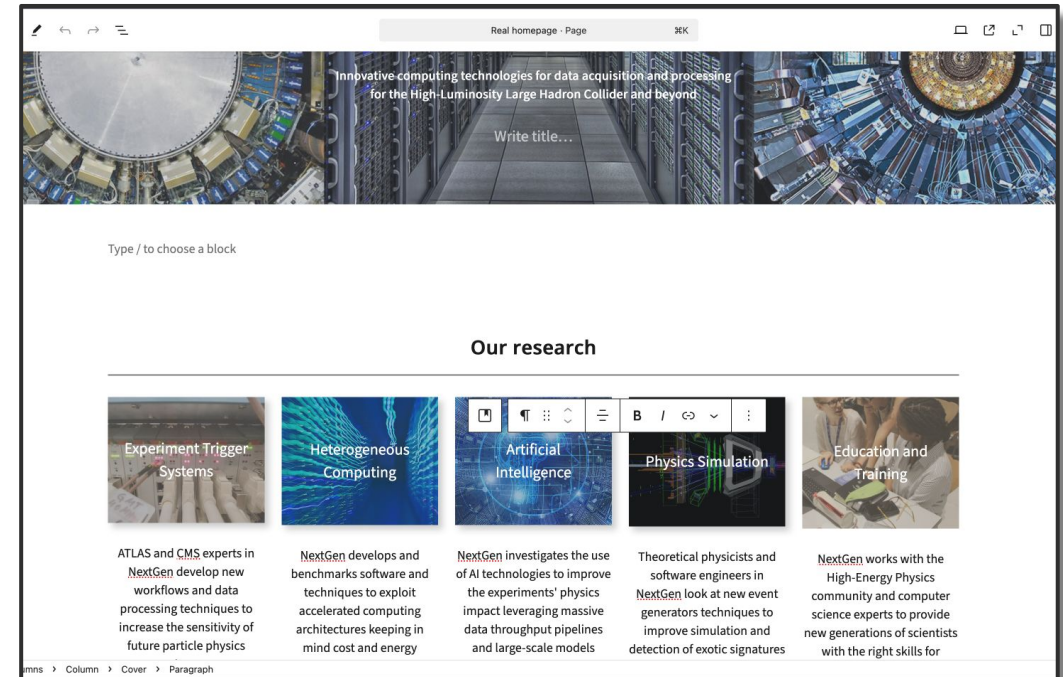
Example: Managing Content in WordPress



Drupal

The screenshot shows the Drupal administration interface for a site named 'CERN Accelerating science'. The user is logged in as 'pkatyaya'. The breadcrumb trail is 'Home » admin » structure » types » add'. The page title is 'Add content type'. Below the title, there is a text field for 'Name' with the value 'PDF' and a machine name 'pdf [Edit]'. A description field is also present. On the left, there are several settings tabs: 'Submission form settings', 'Publishing options', 'Language settings', 'Display settings', 'Menu settings', and 'Scheduler'. The 'Submission form settings' tab is active, showing options for 'Title field label' (set to 'Title'), 'Preview before submitting' (set to 'Optional'), and 'Explanation or submission guidelines'. At the bottom, there are buttons for 'Save and manage fields' and 'Save'.

WordPress



What has been done in WordPress Lite already?

- [International Particle Physics Outreach Group](#) -
- [Knowledge Transfer 2024 report](#) - *Annual report site of the KT department.*
- [Openlab](#) - *CERN Openlab Official site.*
- [EN Mechanical Measurement Laboratory](#) - *EN-MME mechanical laboratory site.*

WordPress Lite

Collaborations summary

Website	Owner	External company involved	Status
CERN openlab	IT-FTI		Completed ✓
NextGenTriggers	IT-FTI	-	Completed ✓
ATS News	ATS-DO	-	Completed ✓
KT Annual Report	IPT-KT	Eversis	Completed ✓
Staff Association	IR-ECO	-	On going ⌚
International Particle Physics Outreach	EP-UAT	-	Completed ✓
Mechlab	EN-MME	-	Completed ✓



What does NOT come with WordPress

1. Custom plugins

Explain to us your use case:
if it is useful to the CERN Community,
we will implement and support it

2. Custom roles

More than **8000** unique roles in Drupal

- Maintenance (and security!) mess
- Redundant set of permissions
- Null Naming conventions

BY DEFAULT

- Accessibility
- Responsiveness
- Security
- Maintenance
- Best practices

OBJECTIVE

**allowing you to
focus on what
matters: your
content!**

I have a Drupal website



1. Prepare your website

- * check your inbox (we reached out!)
- * remove any customisation
- * check and verify existing content

2. Wait for automated migration

- * done centrally, no action on you

3. Validate preview of WordPress

- * choose when to make the switch and retire Drupal

I need a new website



If you know Drupal and need it now

- * proceed with Drupal normally

If you know Drupal but can wait

- * await general WordPress release

If you do not know Drupal

- * await general WordPress release
- * *if static website, use Gitlab Pages*
- * *consider Confluence, MKDocs, etc.*

Drupal will continue to be maintained through 2025

and will be decommissioned in early 2026

Migration to WordPress (1/2)

In general, we deal with two types of websites

1. Websites without customisation: no action necessary
 - Migrated in batches throughout 2025, starting from July
 - We programmatically verify that all content has been migrated
2. Websites which have been customised: action necessary!
 - All website owners contacted with information about customisation
 - Removing customisation qualifies you for automated migration
 - Contact us if you have any questions or need assistance

Migration to WordPress (2/2)

The following flow applies to all migrations:

1. Content is automatically migrated onto WordPress
 - a. It is possible to migrate selectively if desired; contact us!
 - b. It is also possible to opt to start from scratch on WordPress; contact us!
2. Website owner(s) review and verify the WordPress website
3. Once verified and confirmed, promote to production

Your Drupal website will continue to be supported throughout 2025

Only once approved will WordPress become public

FAQ (Drupal to WordPress)

Q1: What happens to my Drupal website?

All Drupal websites which conform to the central distribution will automatically be migrated.

Q2: What about my customised Drupal website?

You can prepare your website for migration to WordPress by stripping away customisation. The Web Team is available to assist and give guidance. We encourage you to start sooner rather than later to ensure you have enough time. All websites owners contacted by e-mail.

Q3: What happens to Drupal at CERN?

Drupal will continue to be supported through 2025. We will decommission it in 2026.

FAQ (Drupal to WordPress)

Q4: When will the migration start?

The migration will commence in July. We will start with small batches before ramping up.

Q5: How much work is involved for me?

This is very much case-by-case, but for conformant websites, it will be equivalent to checking and verifying a major Drupal release (i.e. review each type of content on your website). Batches will be grouped in such a way that support will be available.

Q6: What if I would prefer to start from scratch in WordPress?

This is a popular choice; please contact us and we will arrange this for you.

Additional Resources

Drupal to WordPress Community Meeting (26/9): <https://indico.cern.ch/event/1457632/>

WordPress information: <https://wordpress.docs.cern.ch>

CERN Service Now: [WordPress request](#)

Web Team contact information: web-team@cern.ch

WordPress contact information: wordpress-feedback@cern.ch

We know this is a massive change, and we are working very hard to ensure that the transition will be as smooth as possible: we are here to support you and your team throughout the entire process!

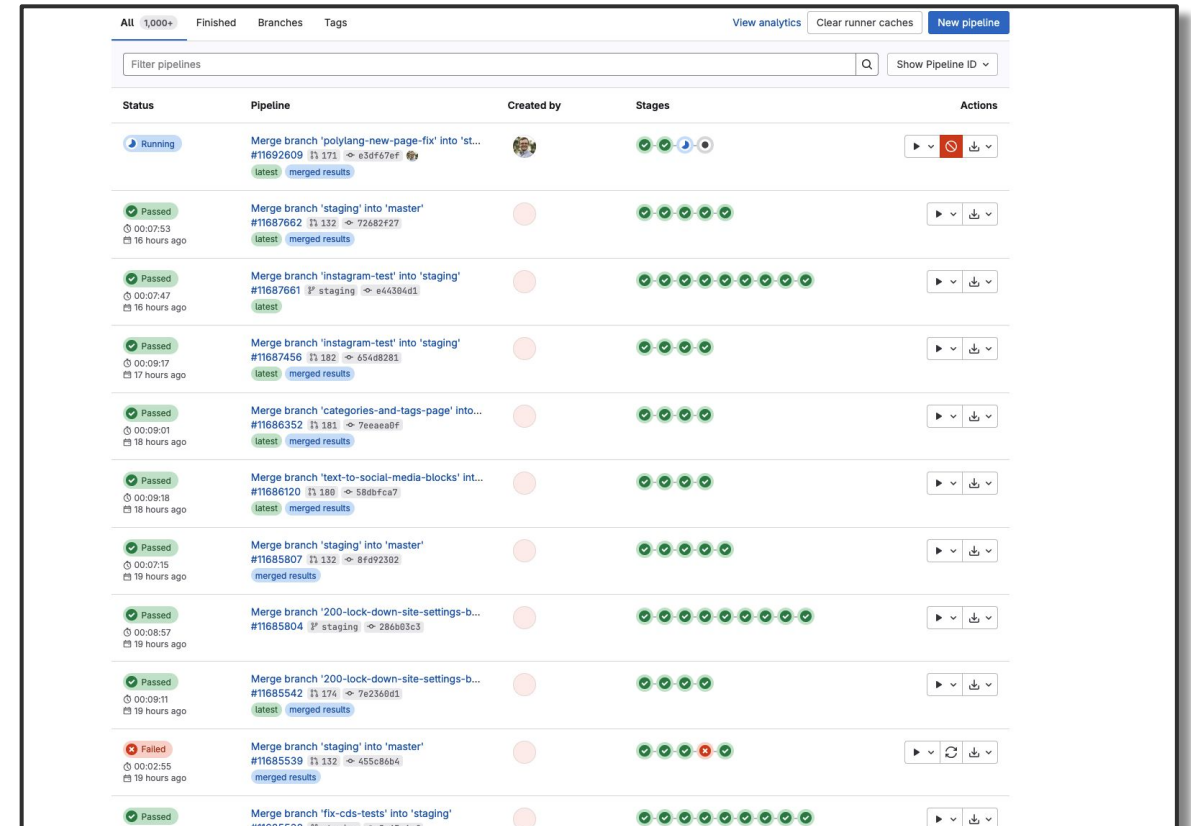


home.cern

Validation: CI Pipeline

- Multi-stage CI pipeline:
 - Code linting
 - Secret detection
 - Frontend testing
 - Functional testing
 - Screenshot testing
 - Release packaging

Far more advanced than Drupal ever had!



Status	Pipeline	Created by	Stages	Actions
Running	Merge branch 'polylang-new-page-fix' into 'staging' #11692609 I1 171 -> e3df676f		✓ ✓ ✓ ✓	▶ ⏏ ⬇
Passed 00:07:53 16 hours ago	Merge branch 'staging' into 'master' #11687662 I1 132 -> 72682f27		✓ ✓ ✓ ✓ ✓ ✓	▶ ⬇
Passed 00:07:47 16 hours ago	Merge branch 'instagram-test' into 'staging' #11687661 I1 staging -> e44384d1		✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	▶ ⬇
Passed 00:09:17 17 hours ago	Merge branch 'instagram-test' into 'staging' #11687456 I1 182 -> 654d8281		✓ ✓ ✓ ✓	▶ ⬇
Passed 00:09:01 18 hours ago	Merge branch 'categories-and-tags-page' into 'staging' #11686352 I1 181 -> 7eeae0f		✓ ✓ ✓ ✓	▶ ⬇
Passed 00:09:18 18 hours ago	Merge branch 'text-to-social-media-blocks' into 'staging' #11686120 I1 180 -> 58b9fca7		✓ ✓ ✓ ✓	▶ ⬇
Passed 00:07:15 19 hours ago	Merge branch 'staging' into 'master' #11685807 I1 132 -> 8fd92302		✓ ✓ ✓ ✓ ✓ ✓	▶ ⬇
Passed 00:08:57 19 hours ago	Merge branch '200-lock-down-site-settings-b...' into 'staging' #11685804 I1 staging -> 286b83c3		✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	▶ ⬇
Passed 00:09:11 19 hours ago	Merge branch '200-lock-down-site-settings-b...' into 'staging' #11685542 I1 174 -> 7e2368d1		✓ ✓ ✓ ✓	▶ ⬇
Failed 00:02:55 19 hours ago	Merge branch 'staging' into 'master' #11685539 I1 132 -> 455c86b4		✓ ✓ ✓ ✓ ✗ ✓	▶ ↺ ⬇
Passed	Merge branch 'fix-cds-tests' into 'staging' #11685538 I1 staging -> 0e9e9e9		✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	▶ ⬇

Become a WP Lite Collaborator

In case you want to remake your site with WP Lite, join us and become a collaborator.



Feedback meetings

Regular feedback meetings to analyse how the development is going and what problems you may have encountered in the process.



Suggestions to features

Feedback collections:
Is useful for the cern community? If yes we will convert your suggestions to features and develop them.



Release of the new features

You will always have the latest version of WP Lite with new features and improvements.



Resources must be provided to actively rebuilding the site.

WordPress Lite Eligibility



WordPress Lite is in active development

1. Not designed for `.cern` and high load/traffic websites
2. Not allowed for personal websites
3. The migration will be automated - if no customisations are present
4. Web Representative approval needed (via Service-Now)

In general, allowed for justified use-cases who plan to actively develop their sites

WordPress Lite Request

1. Check if you match the eligibility criteria [here](#)
2. Open a ticket by following this [link](#) providing:
 - a. Website URL
 - b. Responsible e-group
 - c. Justification for need of a WordPress Lite website
3. **Your Web Representative will approve or reject the request**

FAQ (WordPress Lite)

Q1: Who can access WordPress Lite?

WordPress Lite is open for everyone after authorisation by your Web Representative. However, due to WordPress Lite being experimental, no high-traffic or .cern websites.

Q2: What happens once WordPress Lite closes?

All WordPress Lite websites will automatically be migrated to the official WordPress production environment. No action will be necessary and more information will follow.

Q3: Can I move my Drupal website to WordPress Lite?

You can, but it has to be done manually for now.

FAQ (WordPress Lite)

Q4: I want to hire an external company to design/develop my website, can I?

Please include the Web Team and the Infrastructure Team in the early phases.

- We will help with the technical requirements such as maintenance, integrations, deployments etc...
- Any customisation must be explicitly authorised by the Web Governance Board
- All development must commence directly on the CERN infrastructure