Review Article

Review & Critical Study of Content Management System Software

Rama Babeley
Mandsaur University Library & Information Science Department

Abstract: The field of content management system has seen particularly strong growth in open source solutions, but in direct way response to the very high prices that commercial content management system have historically demanded. The increasing complexity of services and systems supporting has made it necessary to formulate a theoretical and practical corpus capable of combining classical information management techniques within organizations with the particular features of the digital environment. One can choose any of them for their website depending on their particular needs or organizational requirements. This article also highlights the different types, benefits, database type, platforms etc. It also includes all of the additional problems involved in converting to and from digital content, to and from the traditional media of those problem domains

Keywords: content management software, web content management system, site core, component of CMS, Syndication CMS, Use of CMS.

Introduction:
A content management system (CMS) is a software application or set of related programs that are used to create and manage digital content. CMS are typically used for business enterprise content management (ECM) and web content management. An ECM facilitates collaboration in the workplace by integrating document management, digital asset management and records retention functionalities, and providing end users with role-based access to the organization's digital assets.

Definition:
A content management system (CMS) is a software application or set of related programs that are used to create and manage digital content. CMS are typically used for enterprise content management (ECM) and web content management (WCM). A WCM facilitates collaborative authoring for websites. A content management system is software that keeps track of every piece of content on your website, much like your local public library keeps track of books and stores them. Content can be simple text, photos, music, video, documents, or just about anything you can think of. A major advantage of using a CMS is that it requires almost no technical skill or knowledge to manage. Since the CMS manages all your content, you don't have to.

Types of Content Management Systems:

Types of CMS:
There are different types of CMS for different types of content. The nature of the content or ‘digital record’ e.g. video, text, graphics, blog etc dictates the type of CMS which means that there are numerous options to choose from. These are categorized as follows:

- Web CMS
- Enterprise CMS
- Mobile CMS
- Component CMS

Due to the vast array and variety of content out there it follows that there is a type of CMS to deal with it. Whatever the nature of the content it can be managed via a series of workflows; and these can be accessed by a variety of users. There are types of CMS which are designed for a specific purpose, for example web content management systems and then there are systems which cater to the needs of
an organization. Then there are also systems which cater to the needs of the mobile technology industry and those which manage content at the micro level, for example graphic image rather than as a series of documents.

**WCMS:**
A web content management system (WCMS) enables a user to create or amend a web page without the need for the requisite technical skills. This system is based upon a series of templates which form the structure of a website and are used for content creation. The content author/editor inserts content into these templates which are then published onto the site. This is applied to internet websites, intranets and extranets.

**ECMS:**
These systems or ‘enterprise content management systems’ (ECMS) handle the content, assets, records and other information which defines the structure and hierarchy of an organization. This is a formal system which employs a range of processes, tools and strategies to do so. It includes scanning, tracking, indexing and collaboration with the aim of streamlining the management of company information.

**MCMS:**
The rapid growth in the mobile technology industry has led to an increasing demand for systems which can manage content for smart phones, PDA’s, mobile phones and other handheld devices. Mobile content management systems (MCMS) were originally designed for the business to customer (B2C) market but have expanded to include business to business (B2B) and business to employee (B2E).

**CCMS:**
Component content management systems (CCMS) are a specialist type of system which manages content at a deeper or ‘granular’ level. This refers to a single piece of content such as a paragraph of text, a photograph or a graphic rather than a complete document, which is stored within this system. It is reused within a document or a series of documents which ensures a consistent approach. Each individual piece of content has its own workflow and is tracked either as a single entity or as part of a larger system. There are numerous options available when it comes to CMS which all appear to do the same thing but with a few subtle differences. This is why it is important to know about the type of content you are dealing with and the manner in which it needs to be managed.

**Commercial CMS:**
- Commercial CMS
- SiteCore
- EpiServe
- Ektron
- Alterian
- Amaxus
- Sitefinity

**List of open source content management system:**
- Drupal
- zoomla
- Wordpress
- Expression Engine
- Text pattern
- Radient CMS
- Cushy CMS
- Silver Stripe
- Alfresco
- TYPO light

**Features Of Content Management System:**
Features can vary amongst the various CMS offerings, but the core functions are often considered to be indexing, search and retrieval, format management, revision control and publishing.

- Intuitive indexing, search and retrieval features index all data for easy access through search functions and allow users to search by attributes such as publication dates, keywords or author.
- Format management facilitates turn scanned paper documents and legacy electronic documents into HTML or PDF documents.
- Revision features allow content to be updated and edited after initial publication. Revision control also tracks any changes made to files by individuals.
- Publishing functionality allows individuals to use a template or a set of templates approved by the organization, as well as wizards and other tools to create or modify content.
By Rama Babeley

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Best Of Content Management System:
Advantages of Using a CMS to Run You’re your site:

Using a content management system (CMS) to power your site could be one of the best investments you make in your website – and your business. And you do need to invest – your website is one of your main tools for communicating with your customers and you want to make sure they love it. But that doesn’t mean you want to get bogged down in technical details. A CMS marries power with simplicity so you still have time to concentrate on improving your business. Here are seven key benefits of using a CMS to run your business website.

1. It’s easy for the non-technically minded.
Not all users have the same comfort level with technology, but the basic CMS functions of writing and publishing content, and slightly more advanced ones of adding media are usually easy for everyone to grasp. In fact, anyone who can use word-processing software can use a CMS for the basic functions – so you don’t even have to spend much time on training.

2. It allows multiple users.
In a business, there are many people who can have input into your website, from those who add product pages to those who produce blog posts for your content marketing efforts. A CMS makes it easy to manage roles and publishing permissions for all these users so that only those you allow can publish content and content only goes live when you’re ready.

3. It streamlines scheduling.
Related to that, any decent CMS will give you an at a glance view of the status of all content, whether it’s live, being reviewed or a draft. That doesn’t just apply to blog posts but to product pages and other website pages. It allows you to assign tasks and check that they have been done. And it’s easy to integrate planned content with your marketing plan so that everyone knows what’s happening when.

4. It improves site maintenance.
To change something on your site? Without a CMS that can mean having to trawl through hundreds of pages, making changes on each one. With a CMS, the underlying architecture is the same so you can make maintenance changes, update the CMS software and add functionality without breaking the site. In fact, with the right CMS, it may keep itself up to date automatically.

5. Design changes are simple.
Speaking of making changes, let’s talk about the look of the site. If you want to change the site design, a CMS makes the process easy. That’s because the content and design are in separate virtual boxes, so you can make design changes while keeping the site functional. Another advantage is the ability to make a change in your administrative dashboard and have it automatically propagate to the entire site. This gives your site a consistent appearance and is great for branding. It also makes it easy to add a mobile interface to your site.

6. It helps you manage content.
This may seem obvious, but for some businesses, content management is not just about publishing content but about being able to remove it when it’s out of date. If you are running a Thanksgiving or Christmas promotion, then even before the season ends, you will want to remove and change it. With a CMS this is as simple as un-publishing the content – all menus and links update automatically, so that your customers continue to have a good experience of the site. And if you want to include customized content such as countdown calendars and lists, the CMS can be configured to allow this. And a good CMS includes SEO too, making sure your content ranks well in the search engines.

7. You’re in control.
All of this adds up to the biggest advantage of a CMS. Instead of being...
reliant on an external vendor, with a CMS you are in control, with the ability to assign tasks and roles and to check progress at any time. That puts you in the driving seat when it comes to this important business tool.

8. Syndicating CMS Knowledge Services In A Wide Variety Of Formats

We will export our CMS data in unstructured HTML pages, as well as structured XML, RDF, OPML, XFML, and possibly XTM Topic Maps. We will do this to demonstrate the kinds of publishing possible with a CMS today, and to feed structures that will be maximally useful to those who want to post-process them into a more useful display format for their own needs. If web services are to succeed, we should demonstrate their success as an industry analytic tool.

Uses of Content Management System:

• **Quick and easy page management** – Any approved user can quickly and easily publish online without complicated software or programming.

• **Consistent brand and navigation** – Design templates provide a consistent brand and standard navigation across all KU websites.

• **Workflow management** – An integrated workflow process facilitates better content management.

• **Flexibility for developers** – Because the CMS enables non-technical users to easily publish content, this frees up technical developers to focus on functionality and enhanced features.

• **Design is separate from content** – You can manipulate content without fear of accidentally changing the design.

• **Database-driven** – You only need to change data once for it to be updated throughout your site.

• **Shared resources** – Website managers will have access to shared resources, such as modules, images, audio and video files, etc.

• **Approval systems** – You can give different levels of access to different users, and the CMS has mechanisms to ensure content is approved before going live.

• **Mobile ready** – The CMS automatically scales your site to fit tablets, mobile devices and smaller browser windows.

• **Archive capabilities** – You can track who has made changes to your page and archive previous versions of your page.

• **Remote access** – You can access and update your site from anywhere with an Internet connection.

• **Security** – Security is automatic.

• **Search engine-friendly** – The CMS helps to optimize your website so that search engine users can easily find your information.

• **Updates** – The CMS allows alerts to be set to notify the editor when content needs to be reviewed, updated or removed. This will help prevent old data from being presented and misinforming users.

Challenges of Content Management System:

Control and Management:

Management of financial data underwent a revolution from the 1980's onwards, from hand-written ledgers, to rudimentary spreadsheets, to more manipulative tabular forms, to advanced financial software. Such a revolution, argues Trotter, has never taken place for other forms of content. Word, for instance, is little more than a 'paper-simulator', offering linear storage capabilities and little connectivity. CMS can be considered as an effort to move content creation out of the 'paper simulation' phase, and into the far more powerful database stage.

Migration:

Migration of content from old, sterile formats into more useful ones can be daunting. Particularly in a mature organization which could have years of content that needs converting. The Import functions of different Content Management Systems vary greatly, and if there is a lot of archive material which needs to be converted to, say, an XML-based format, migration capabilities will be of huge importance to users. Migration is always a messy job: Trotter cites examples of documents which might have been written by an employee who, instead of hitting [Return] at the end of a sentence, instead jams down the space-bar until they come down to the next line. This kind of
botched formatting plays havoc with automated content migration and importing to object-based forms. CMS vendors, says Trotter, tend to gloss over this issue, sometimes shrugging their shoulders and suggesting that the client creates the content anew. (Or they offer to migrate content for up to US$ 15 per page.)

**Gaining Approval:**
Investment in a CMS is one of those things that can be difficult to justify to The Suits. The advantages are real but intangible. The process can be long and arduous. Explaining the issues involved can be difficult. Older, more traditional executives may not appreciate the true value of information management.

**The People Factor:**
People don't like change. If they are comfortable using MS Word, that's what they are going to use. Enabling code-based exports might entail load times a fraction of a second longer, more crashes and other issues. If people don't understand the benefits, they will see the implementation of advanced CMS as a needless complication. Many enterprise solutions embed their tools in familiar content-creation apps. But fundamentally CMS is a 'two-part sell': the company must be sold on the product, and the individual users too.

**Fear of Obsolescence:**
There might be hostility emanating from persons in the organization who feel like the new system is taking over parts of their old job. A simpler, more stable, streamlined content creation process will make the 'go-to' IT troubleshooter on the floor feel less valuable, for instance. Trotter recommends not indulging such persons: "often, people who perceive themselves as indispensable must be left behind for a system to take hold. Other times, it is possible to make the person 'indispensable' in another area." Life can be tough. But evolution is crucial.

**Document Ownership:**
Content creation when a CMS is introduced becomes a team sport. Employees who are used to working on a document from beginning to end may be irked by this. If Guy A thinks that Guy B in the next cubicle writes terrible technical documentation, there may be friction when you let him get his claws on Guy A's lovingly crafted material. But there are massive advantages in CMS to content-creators. People can work better off-site, they can specialize more in their niche and more easily collaborate on multiple documents.

**Conclusion:**
The context of content management system has seen particularly strong growth in open source solutions, perhaps in direct response to the very high prices that commercial content management system have historically demanded. The increasing complexity of services and systems supporting has made, user problems, technical problems it necessary to formulate a theoretical and practical corpus capable of combining classical information management so result all we can take benefits of content management software.

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