_____

Content Management System for Teaching of English

_____

Ishita Bose

Assistant Professor of English, Haldia Institute of Management, Haldia, West Bengal.

_____

Abstract

The intervention of technology in the process of teaching and learning literature dates back to late 1990s. Digital Humanities is an umbrella term to showcase the digital ways of research, study and teaching humanities. It requires skills in developing software, websites, datasets and other digital tools and formats. Literary works are not just poems, plays, novels or other genres, it succumbs criticism, translation, adaptations into movies, recreation, etc. It thus becomes very crucial for us to understand the vivid and varied nuances of developing, collaborating and visualizing literary works. This idea has travelled across European and American Universities for a couple of decades now. There are undergraduate and postgraduate programs in the same and are also developing institutional database, which is sometimes linked to the university`s digital repository. However, security and privacy threats are being attended with utmost care. Nevertheless, India is slowly opening its door to the digital environment but not many language departments are working on creation of digital platforms for the exchange of ideas. This paper aims at providing a succinct overview of the various nuances involved in integration of technology in Literary Studies. There is provision for inventions and innovations with restricted scope and limitations.

Keywords: Collaboration, Digital Humanity, Inventions, Asynchronous, Corpus Literature distribution.

Introduction

   Digital Humanities is a modern terminology for humanities computing. It is an umbrella term to showcase the digital ways of research, study and teaching humanities.[1] Language and literary studies have witnessed tremendous development with the advent of computers and internet. Literature, film, music, art, etc. have profoundly been impacted by the digital technologies. The study of its influence is a topic of interest in this paper. Many projects have been centered upon literary subjects, say The Victorian Web, The Whitman Archive, The Nines Project, etc. Initiatives like digital humanities archiving in The Michael Joyce archive at The Harry Ransom Center, University of Texas, is a new kind of conceptual digital archives.[2] Digital data and databases have become resources for literary studies in

_____

archival research as well as literary interpretations. Digital Humanities is a discursive mode of engagement in recent times.

Digital Humanities as such requires the skills in developing software, websites, datasets and other digital tools and formats, which requires little programming and visualization skills. A project under Digital Humanities is collaborative, and requires contribution and coordination of different individuals. There are many tools and open access software applications that can be compiled in the creation of web portals. Voyant is a popular visualization tool that is used to perform text analysis. It can analyze term frequency and its distribution within a corpus.

However, the neoliberal economic turn in the higher education and its impact on public universities has paved way for escalating educational fees. The competent and experienced permanent faculty is replaced by incompetent, inefficient and inexperienced contractual or young research scholars who work for nominal wages. This in turn affects quality of education. Digital Humanities collectively works towards improvising the deficiencies that the educational practice is witnessing. Different people skilled in different fields, work comprehensively to create digital platform for learning, teaching and developing new research insights. The convergence of electronic literature, i.e. in recent times there has been a shift from reading hardbound books to electronic reading on Kindle, iPad, etc. Text digitization like Project Gutenberg, Google Books, UPenn`s Online Books Page helped expansion of digital text and e-reading. However, with changing times, scholars and researchers felt the turmoil of restricted access to scholarly works. Digital Humanities makes a noise for open access to scholarly work and a pedagogy that is collaborative and can be accessed by anybody round the clock.[2]

Hence, the focus of this paper is to introduce a content management system exclusively for literature learning. The system comprises of multidisciplinary content, embedded videos, audio tapes, etc. It includes different genres like poems, novels, plays, short stories and also literary criticism, translation, analysis, details of movie adaptation or skit, and other recreations. It would be interesting to create a digital platform for the exchange of ideas, sharing of information and enhance the process of teaching and learning. CMS is a software application for documentation of classroom activities, workshops or seminars, training programs and other activities online. This helps in reducing the digital divide and quicker access to essential information.

The pedagogic transition in English literature teaching has allowed teachers, learners and others to invest and investigate on creation, interaction, collaboration and development of teaching and learning processes. The learning management system is designed to facilitate administrative tasks and interaction of teachers and learners through e-content. The accessories of learning are managed on digital platform so as to provide egalitarian approach to education. It is an effective infrastructural investment that helps reap lasting benefits.[3] Klonoski says "resource smart deployments require cost efficient collaboration of the conducive system". Most learning management system requires tremendously creative and

_____

_____

skilled workforce that is subsequently paid decent remuneration. A laboratory of multivariate resources, which however demands huge expenditure. In spite of exorbitant investment, the dividend is exemplary.

Content Management Systems (CMS) for Literature learning:

CMS extends the classroom activities online. Content is a unit of digital information. It can be text, image, graphics, video, sound, documents, records, etc. It can be stored and managed in an electronic format. Management refers to the process of storing content with a set of rules and that which has workflows.4 In other words, it is a collection of tools, techniques and processes that support the collection of content to be managed and published in an electronic medium. Hence, a system is a software tool that facilitates the efficient and effective management of the content so to create a digital repository. With the help of CMS one can store, create, edit, manage, publish and archive a variety of digital content (or information resources) to the intended audience which adheres to a set of rules, procedures and workflows to ensure coherence, validity and efficient management of the content thus produced. Access Control is a feature in CMS that defines who can access the published content. With changes in version, say, the content was stored in hypertext markup language (.html) format and the current version is extensive markup language (.xml), the system will return to previously saved version.5 Learning management system provides opportunities that help in digitizing the learning process. The traditional classrooms repose into digital space with exhaustive learning material and evaluation schema.

Students with locomotive disability, chronic ailments, with other diseases, who cannot physically be present in a classroom, can use this platform for their education. The content stored is useful for lifetime learning. Most universities are upgrading their libraries to virtual libraries. The role of library is no longer restricted to mere borrowing of books, it is essential to document various activities conducted in the institution. The development of Digital Humanities has encouraged the integrated pedagogic approach.

Why does literature require Content Management System?

The need for content management system is to reduce the burden on the teaching professionals who have to lecture, provide notes and also evaluate assignments. Teachers can amplify their reach to students. On having a CMS portal teaching and learning pedagogic strategy can be achieved quickly. A CMS will allow its users to fetch the content from different sources. It helps users to take right decisions with accurate and timely information. It provides the following facilities as well;

•Distributed Authorships – Different authors can contribute and the content goes live after an approval from the editorial board or editor. This enhances the quality of resources.

•Page appearance is controlled from a collection of templates.

•Timing can be set to the content or display duration can be specified, after which content will be erased or hidden.

•A CMS can supply own blogging software and can also interoperate with popular blogging software.

_____

_____

•CMS has centralized and automated administration that can assemble and deliver content rapidly.[6]

•The personalized content enables knowledge reusability.

Say for example, the teacher wishes to teach a sonnet by Shakespeare. The students can immediately share video links of the sonnet, access the summary or notes, paraphrases, and other details with regard to the sonnet. The instructor on the other hand, can give assignments, evaluate it, and assess the performance. The assessed data can visualize and analyzed using statistical aids like a bar diagram or pie chart. One can also utilize technology in the classroom to reach special students and passive learners. A repository of learning material can be developed, and can be accessed through internet at any hour of need.

How to develop a bank of learning materials?

The first step would be to design a template, later the content is added to the database as plain text or HTML. This in turn, gets placed in the template for display to the end user. A template is a design stage where the colour, layout and navigation is decided. The lifecycle of a content management system can be broken down to content creation, content management, publishing and presentation.

Drupal, Word Press, Joomla, TYPO3, etc. are open source for CMS. Knowledge of PHP and MySQL is essential. To initiate a content management system, we require certain metadata standards. We require metadata because;

1.Users will often want to search a keyword say author, title, etc

2.To determine when and where content in the CMS gets distributed or shared.

3.For security and archiving purposes.[7]

Dublin Core metadata standard has 15 elements and is widely used for its simplicity. These 15 elements are divided into content, instance and intellectual property. The content is divided into Title, Subject, Description, Language, Relation, Coverage and instance covers Date, Type, Format, and Identifier. Intellectual Property includes Creator, Publisher, Contributor and Rights. Using these elements one can describe literary works easily. This metadata standard is embedded in the backend and gets displayed when the search matches any one of the 15 elements. Apart from Dublin Core, Text Encoding Initiative (TEI) is most widely used in documenting literature. Text Encoding Initiative is a one of the popular metadata standards for archiving. It also includes searchable options, interlinked with images and calendar. It requires login, permission and is secured. It follows a workflow, when a text is added or updated, the editor reviews and then displays in multiple venues.[8]

Text Encoding Initiative (TEI) Metadata standards for literature in Digital Humanities

TEI is a standard for the representation of texts in digital form. It specifies encoding methods for machine readable texts, mostly in the field of humanities, social sciences and linguistics. It is used in libraries, museums, individual scholars and publishers to present texts for online research, teaching and preservation. It can encode manuscripts, research papers, historical archives, books, anthologies, cultural material, etc. it uses markup language for the structural nuances of the text because it uses XML schema for documentation. "The mission

_____

_____

of Text Encoding Initiative is to develop and maintain a set of high quality guidelines for the encoding of humanities texts, and to support their use by a wide community of projects, institutions and individuals." [9]

Consider the example, George Orwell`s fictional work Animal Farm.

```
<?xml version="1.0" encoding="UTF-8"?>

<book>

  <title>Animal Farm</title>

  <author>George Orwell</author>
```

Elements in TEI

Abbr. for abbreviation Bibl for bibliography

TEI plays an important role in encouraging researchers, academicians and other contributors to work on projects. The projects will go live after editor`s approval. The website can be visited at https://tei-c.org.

There content requires cognitive capabilities for visualization. Most popular tool is Voyant, an open-source, web-based application for performing text analysis. It supports scholarly reading and interpretation of texts or corpus. JavaScript is used to visualize and process the data. It can import documents in various formats like plain text, HTML, XML, PDF, ODP, MS Word, etc. It can study term frequencies and distributions within a document or a corpus. It aids in close reading as well as distant reading. It has interactive features. One can analyze multifaceted data.

Hence, CMS for literature will be a reliable option. Say for example, one wishes to create a repository for the works of Kuvempu, renowned Kannada writer, poet, critic and Jnanpith Awardee. His original works, works on Kuvempu, research articles and critical reviews on his works and personality, his works adapted into movies and film appreciation of them, musical compositions of his poems, and many other things can be published on the web portal. This will benefit the literary enthusiasts and students of literature. Under one portal everything related to the persona can be accessed. To establish a database for Kuvempu, one must begin with a plan. The plan should understand the information needs of the portal, i.e. the objective and purpose of its creation. One must identify and capture only the required information. Storage plan for housing records with data privacy and confidentiality regulations. Preservation policy can archive a document or delete it.

Digital Humanities Projects in India

Bichitra: Online Tagore Variorum is the largest Digital Humanities project undertaken in India. The project is anchored by the School of Cultural Texts and Records, Jadavpur University, Kolkata. It is an integrated knowledge site devoted to Tagore and comprises of works by Tagore in Bengali and English.[11]

 Points to consider before getting started with Digital Humanities:

_____

_____

1. Understand the pedagogic goals that direct the project. Draft the scope and objectives.
2. Visit a few digital humanities platforms that are well established and are actively working towards providing quality resources.
3. Refer Blackwell`s Companion to the Digital Humanities and the Digital Humanities Quarterly.
4. Attend conferences, workshops and training sessions or PG Diploma programs in Digital Humanities.[12]

Challenges in developing a Digital platform

One of the biggest challenges in digital humanities is taming the big data that allows, creation and accumulation of large data, which in turn gets stored in cloud (cloud computing). The development of datasets requires knowledge of semantic web and knowledge graph. Pedagogy lacuna makes evaluation difficult. That is, this does not consist of standardized frameworks, models and infrastructures. Researchers and developers require knowledge of current technologies and methodologies such as text encoding, geographical information systems, physical computing and visualization. Teachers also require time to learn and adapt technologies.12 Their inhibitions of implementation unsuccessful lessons and mediocre presentation skills are major impediments in creating resources. Ethical issues with regard to creative contribution. The software and hardware are expensive. It also requires expertise in sustainable data modeling. Many a times diverse information need of users cannot be fulfilled. Legal issues with regard to copyright and other intellectual.

Conclusion

Literature in digital humanities serves as a laboratory for innovation. It provides a common platform for trading knowledge and research ideas. It acts as an educative think-tank for teaching and learning. Digital Humanities is a new scholarship in India and there are countable Universities pondering over the creation of a literary avenue. A variorum for a scholar like Kuvempu or Bendre. This mega project needs an association of many scholars, researchers, students, etc. A separate peer committee to review the contribution and technical committee to maintain, edit, publish, manage, delete and archive the content on the CMS. It is fast developing and its reach is expanding. Currently a large number of digital resources are being developed for scholars in the humanities. Developing digital tools is an avid research area for many scholars. It is an emerging field of enquiry and research study.

References:

Kirschenbaum, Matthew. (2018, March 9). Digital Humanities. Retrieved from https://en.m.wikipedia.org/wiki/Digital_humanities.

Chattopadhya, Kunal. (2017). Digital Humanities and New Literature: archiving and digitization. Vidya- mitra, ePg Pathashala. Retrieved from https://youtu.be/J3nw0YSSwBE

_____

_____

Sejzi, Abbas abdoli. Aris, Baharuddin. (2013). Learning Management system and learning content management system at virtual university. 2nd International seminar on quality and affordable education. 216-220.

Arnold, S.E. (2003). Content Management`s new realities. Information Hub. vol. 27 no.1. pp.36-40.

Borbone, M. (2003). Content sense content management: what organizations need to know. Managing Information. Vol.10 no.10.pp.36-8.

White, H.(2005). Content Management Handbook. Facet Publishing. Abingdon

Allen,T. (2011). The importance of metadata in content management.

Pruyne, R. (2005). Roll your own content management system.

Retrieved from https://tei-c.org

Pressman, Jessica. (2013). The Literary And/As the Digital Humanities. Digital Humanities quarterly. Vol.7 no.1.

The Bichitra Project, Available at http://bichitra.jdvu.ac.in/about_bichitra_project.php. Accessed on December 31, 2019.

Kalpan, Frederic. (2015). A Map for Big Data Research in Digital Humanities. Retrieved from https://doi.org/10.3389/fdigh.2015.00001.