Review on "Really Simple Syndication (RSS) Technology Tools"

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Abstract— A user always requires up-to date content from online sources. The content is not always satisfactory for the user as it does not provide the specific information required by user. It is tedious task for common user to get the desirable information from vast Internet. To overcome this type of problem, the user needed RSS technology for ease of access. RSS gives the updated online information to the user. This paper represents review study of Really Simple Syndication (RSS) technology. Here we discuss about many Tools and useful areas where RSS is used and also define many issues due to improper RSS feed. For this research work article from last one decade (2003-2013) has been selected.

Keywords— Really Simple Syndication (RSS), RSS Feeds, RSS Tools.

I. INTRODUCTION

A tool used in industry and users for gathering worthy information from the Internet is RSS. It also used in the education environment to enhance research methods for students. Students can use this tool to gather existing information from online journals, web logs, publications, and other sources. It is not required to visit the sites every daily. RSS and web files together connect students and avail them to share researches over Internet [3].

By Fekade Getahun et al. [7], RSS means Really Simple Syndication, Rich Site Summary and RDF (Resource Description Framework) Site Summary. In reality, all the above techniques indicate the same syndication techniques. Now RSS is being ferociously used in online news channels, wiki and blog. Using the RSS export of the website user can subscribe to the news and not equal to quickly obtain information. It is a fascinating work to collect and classify information which is provided by RSS.

Example, categorize blogs using RSS they provide to find out the similar writing styles or themes and dig out the similar opinions. For e-commerce users, specifically Businessmen, websites recognize potential and promising competitors, through clustering and analyzing the RSS of various similar websites [7].

RSS is helpful for saving or retaining updated data on websites that user commonly visit or websites that are favorite. XML code is used by RSS that detect new information and update itself by feeding the information to the subscribers [18].

RSS is also used to circulate the updated information. However, this technology does not confirm surely of the incoming information [18].

The growth of digital information is predominately efficient methods of manage and filter unwanted data through RSS feeds [17].

RSS feeds means user always gets updated and meaning full substance plethora of useless information. It avoids user to select/reject the substance according to their need. User can select/reject the updates before it is being sent to them. This helps to fill the unwanted updates at the initial level itself. RSS gives advantages to both users and web publishers:

- RSS keep posted the latest information. Latest information which, is related to the new music, weather, local news, software upgrade.
- RSS provide subscription to individual user.
- RSS save the surfing time.
- RSS summaries the related article.
- RSS does not use email address to send updates. It makes it spam free and maintain user privacy.
- Easy subscription and unsubscription. To unsubscribe the RSS feed, simply fill up the reason and click on unsubscribe.
- RSS can be used as good marketing /advertising tool. The latest news is sending to subscribed users [19].

The drawbacks of RSS are:

- Some user prefers email updates than RSS feed.
- RSS feed do not contain photos for ease of publication. While reporting update it restricts the photos from original sites.
- To minimize the confusion RSS feeds hides the URL or website name.
- Publishers are not aware of the: (a) number of users subscribed (b) users visit frequency (c) reason of unsubsription. The above three are important for the improvement advertise.
- RSS generate high demands and heavy traffic on server.

So, RSS introduce as a new technology, but a problem arise that many sites still does not support RSS [19].

II. RELATED WORK

By Dan Ma [1], the content is actively pushed to the user using RSS Feed and mechanism called as RSS_PUSH. This is predicated by most websites and hereby, takes away the passive and unreceptive approach from user end. The model adopts a profit building framework for website and diverse

978-1-4799-6023-1/15 $31.00 © 2015 IEEE
DOI 10.1109/CICT.2015.109

users. Online content accessibility make user suffer multiple costs. They choose either to visit the website in the conventional way (PULL model) or, if it is supported by the website, to use RSS (PUSH model). Interestingly, although RSS technology always helps a website to attract more users, it may also reduce the website's profit. Main cause of this is non-profit new users raising the maintenance cost with decrease in advertising revenue. This shows RSS adaption could result in first move disadvantage than being advantageous. A successful RSS advertising can only be achieved through balancing of consistently valuable content & occasional related advertisement. Also derive the maximum volume of advertisements that can be added in the RSS feeds [1].

By Just van den Broecke [2], Pushlet pushes data directly from server side. Java Object to Dynamic HTML pages of client browser without using JAVA plug-in or applets through servlet based mechanism. It permits intermittent update of the web page by server. The mechanism applies threading facilities, the javax.servlet APIs, the servlet server's connection management, the javax.servlet APIs and standard Java features like produce/consume using Object wait( ) & notify( ). Hence it could be considered as lightweight in sense. In principle, the framework is compatible with all servlet-supported servers at the back side of the firewalls.

By Isabel de la Torre-Diez et al [3], RSS_PROYECT is web-based tool in joomla. It ensures the simple interface for management or administers. The objective of this paper is, development, implementation and spot assessment of innovative tool is called RSS_PROYECT and centred to RSS technology for content syndication. A generic filter and a selective filter are used for content extraction. Both are operated by admin module installed in Joomla. Generic filter performs the searching operation and bring out the result & as list of all source list containing the word at search. Selective filter fetches filter out by only words existing in the search word list and omitting the rest.

By Lijing Zhang [4], Evolution of web based real time monitoring system today is due to incapability of real performance in real time monitoring system. It use SVG (Scalable Vector Graphics), a chart drawing tool for designing towards Browser. Comet is the key technology for system communication and data transmission, where JSON primarily act as data transmission carrier. Hence, the system is good and highly presentable.Web-based real-time monitoring is derived from Browser/Server architecture that aids flexibility and directness and ease the maintenance, expansion & management of the system.

By Manfred Hauswirth et al. [5], Pull Model and Push Model is the two models existing today. Both models are shown in Fig 1. Most distributed information system and worldwide web (www) browser uses request-reply model for communication. Request- Reply Model for distributed information system—here client pull the information from the server.

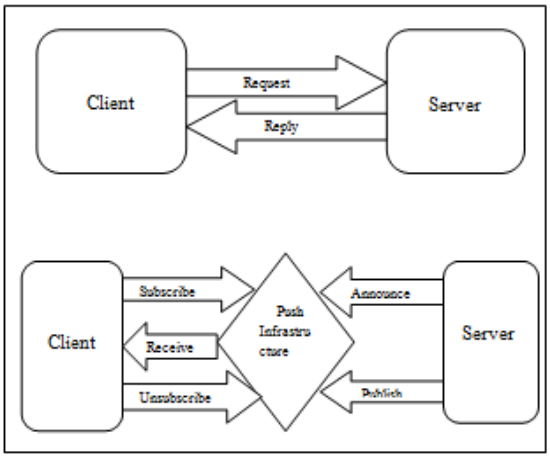

Fig. 1 Pull vs. Push [5]

The Push Model announces the information generator with certain type of information & its availability. The concerned user subscribes the information and simultaneously information is pushed by the producer at regular intervals to the user. An information source is feed the information into a broadcaster together with the rules on how and where to distribute the data. The broadcaster may apply data filters to disseminate the data through channels according to the consumer's subscription for data content [5].

By Fekade Getahun Taddesse et al [6], it benefits end-users in various scenarios when RSS news are merged from sources and providers. This paper takes the problem and can be stretched of the relatedness measure between RSS element and compute exclusive relations between any two elements and provide several predefined merging operators & adapted according to the human needs. Mobile web browsing problem has attracted attends within research community and the industry alike. So the solution of this problem is the proxy server. In which develop a tool, which produces a RSS Feeds (an XML-like notation) of websites. This approach syndicates RSS feeds with simple content adaption [15].

By Fekade Getahun et al [7], RSS query algebra improved in the direction of better news administration. Existing XML query algebras are misappropriated due to the following reasons: (1) RSS document is text leaded and content dependency on wording & authentication of author thus there is a need of operators named semantic-aware. (2) Dynamic & time retrieval of new items. (3) Overlapping of new & existing news through relationship identification. So the aim is to decipher the concerns/problem by delivering a dedicated RSS algebra based on semantic-aware operators which are capable of considering RSS characteristics. The application specific domain is provided by operators and could be varied depending on the preferences of the consumers. Facilitate the revision of set of queries and

equivalence rules for over simplification & optimization. User could develop RSS query by using operator help of the EasyRSS-Manager [7].

By Wang Lei et al [8], a new distributed algorithm of data compression from using hierarchical cluster model for sensor networks is proposed, the elementary ideas being, (a)Sensor network mapped into hierarchical cluster model. (b)Used of various wavelet transform models for data compression in inner and super clusters. (c)The comparative irregularity of sensor nodes set up & installed in super cluster.

By Peilin Shi [9], rough variable has behavior to group the gained fuzzy web access patterns. This characteristic of rough variable is used by rough k-means clustering algorithm. According the paper, measure the user interest by their visited web pages and time spend on each. This time is termed as fuzzy linguistic variables and web access pattern from web logs is changed to as fuzzy web access pattern. Fuzzy web access pattern is a fuzzy vector containing fuzzy linguistic variables or 0. Server service topic feed (right) as easily as normal RSS newsfeeds (left) [16].

Markus M. Breunig et al. [10], proposed an intelligent compression technique and cluster compressed data record clustering. This compressed data records could be created by BIRCH algorithm. Ideally they include the sufficient statistics as (N, X, $X2$) where N is the number of points, X is the (vector-) sum, and $X2$ is the square sum of the points. To accelerate up the k-means type of clustering algorithm these could be used. These ways of use in hierarchical clustering algorithm is still unknown. Using a hierarchical clustering algorithm at the center of compressed sub clusters gives a famish ding result. The main reason behind this is, it being grounded on distance between data points and interpreted result depend strongly on graphical representation of these distances. Hence a method for determination of appropriate detail of data points and this graphical representation is pronounced which also utilizes the sufficient statistics (N, X, $X2$) of sub clusters in the hierarchical clustering method OPTICS. An evaluation of performance by using OPTICS combined with BIRCH is highly effective (acceleration factors ~1700) and generates result [10].

I-Ching Hsu [11], proposed Personalized Web Feeds Framework (PWFF) utilize to create an improved an Ontology-based Personalized Web Feed Platform (OPWFP). The fast developing social Web has is wired up in diverse Web 2.0 application, opened a gateway for Web feeds like Weblogs, news headlines, business products, real time information and Podcasts. Since there is huge Web feeds available on web, the major challenge is there easy and efficient access. The manual method used conventionally is time taking and it accuracy is also a question mark. It sought these problems by outlining PWFF as integration of ontology technology into Web feeds and user profiles. OPWFP is provides customized Web feeds for personnel needs.

By Petros Belimpasakis et al. [12], the existing content sharing paradigms along with some advanced sharing use cases that are not feasible with the presently available technologies. For satisfying these use cases, we introduce an improved new system that allows content sharing in a totally user-centric manner, meaning that users can select the people required to share their content with and just let the system handle all the lower level device, network bearer and content transfer technologies, in order to be adequate for sharing occasion. The system feasibility is proved in two dimensions, firstly by a technical prototype implementation in a laboratory environment, and secondly via usability studies with non-expert users, for gathering their input and feedback on the interface and preferred interaction with such a system.

By Wen hu et al. [13], hierarchical clustering method used for learned of data clustering and analyzing techniques. An unsymmetrical selected RSS list makes up matrix of words. By collecting data from this list a matrix is built. In the matrix, every row directs to an article and each column represents a word. The hierarchical clustering algorithm is designed depending on the matrix. This algorithm also uses Pearson correlation to calculate the distances among different contents. The hierarchical relationship of contents and words is described by dendrogram. Dendrogram is also represented in 2-D graph.

III. CONCLUSION

This paper indicates the study about the RSS and studied the different Tools where these are used. In this paper, some tools and technology left out for improving the updated online content by which user can easily get updated information from different websites. Hence, user easily gets updated information on a daily basis. RSS feeds generate high traffic and high demand on server. So, In future we can propose new tools or technology, which overcome this issue.

TABLE 1 SUMMARY OF RSS TOOLS [3]

S. No.	TOOLS	DESCRIPTION
1.	Google Reader	Google Reader is a tiny particle & RSS reader. It helps users to establish and quickly access, from a Web interface, to all the news of the pages that are supported.
2.	Omea reader	Omea reader tool is used for reading. It can do many tasks and simple to set up for Feeds. It also aids in searching and to save the Web sites.
3.	Netvibes	Netvibes is a Web service that performs like a virtual desktop same as personalized Google main page. Optically, it is structured in tabs, where each tab is typically act as an aggregate of different modules and the user defined scrollable widget.
4.	FeedDemon	FeedDemon is a program where user could provide selected site and see all the news of it. It provides various services to manage data sources RSS (feeds) like: • Classification and position in various categories • Identify the entry of new sites • Many user friendly view available for reading RSS feeds • Options are specific to each subscribed feed • Demonstrate the posts within the program • Inter-linking with sites of sending or posts voting.
5.	NewsGator	NewsGator is synchronized with the RSS reader. It is a Web application to manage RSS, only through Web Browser.
6.	RX RSS ticker module	It is used for only to subscribe a Feed source. Neither user is able to view the image, nor control the count of words seen, etc.
7.	Feed	Its main characteristics from the Back-End are: to allow seeing a description of the news, including its image. On contrary, any selective option to view only article image is not available. However, those of feeds, producing bad visualization, less attractive and professional in most of the cases.
8.	RSS Brownser 2.7	It adds another important characteristic: if user scrolls mouse over the news description, the new information increase related to the news, showing the items description.
9.	Slick RSS	Slick RSS is a comprehensive & most effective module among all the tools. This Tool has following main features: • Open in a fresh or existing page • Phase time aligment of the cache life • Follow no attributes • Enables Tooltip.

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