

Content Alert system using Short Message Service (SMS): A Testimony of two collaborative projects in Africa and Asia



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Mobile Telephone Growth



Mobile phone users in 2009 - 4 billion which represented more than 50% of the global population.

2012 - This number has grown to 6 billion which is around 87% of the world population.

End of 2013 prediction - The number of worldwide mobile subscribers will reach 6.9 billion.



SMS world's most intensively used data communication technology.

Text messaging is the most widely used mobile data service today.

The SMS sent in the year 2010 seemed to be 6.1 trillion, or 192, 000 per second! (that was more than triple the number sent in 2007).

The telecoms industry is benefitting tremendously with the earnings of \$114.6 billion a year; is the result of the SMS obsession of the world.

<http://www.textually.org/textually/archives/2012/02/030321.htm>

Libraries and Mobile Applications



- Hong Kong Institute of Education
- University of Illinois - Text message for Referencing
- Southeastern Louisiana University - SMS Text Referencing
- AltaRama's Reference by SMS
(www.altarama.com)
- Mosio's Text a Librarian (www.mosio.com)

Project objectives



- To experiment whether mobile technology can be effectively used to market library services especially the electronic databases
- having done this how to operate a service similar to that of an SDI service which can have a standing impression on users
- Monitor the usage of the databases to establish the success and failure of the projects

The Projects – Phase 1

2009 - University of Swaziland.
(March – April 2009).

Collaboration with Emerald Publishers

Created a Web enabled SMS platform to send SMS messages

Gathered a group of selected students

Compiled SMS messages

Transmitted the messages

Monitored the usage of our electronic resources.



The Projects – Phase 2

2011 – India

Tested the prototype with additional parameters

Created an SDI simulated content alerts

Created a Web enabled SMS platform

Gathered a group of selected users

Solicited their Research subjects

Enrolled email based content alerts from publishers

On receipt, crosschecked them with the users' research subjects

Transmitted the messages to relevant users

Monitored the usage of electronic resources.



Methodology Adopted



- Creation of a web enabled SMS platform to send SMS messages
- Creation of users profiles for receiving SMS messages
- Assimilation of alerts for transmission
- Transmission of the assembled messages through the web enabled SMS platform.

Web enabled SMS Platform



- The backbone of these projects creation of web enabled SMS Platforms. -- interface which allows to send SMS from a computer.
- Most of the SMS service providers offer web enabled SMS platform as an add-on service.
- For creating custom made web SMS platform there are a number of free and open source software and a few proprietary software
- In these two projects two separate web enabled SMS platforms were experimented. In the first case Emerald's Intouch portal which makes use of Elgg, an open source software was used and in the second phase a commercial SMS vendor was used which provided the web based SMS gateway.

Profile Owner

UNISWA Library Portal
 Tags | Resources

UNISWA Library Communications Portal

Send Message

Profile

Community Blog

Files

Publications

Publications List

UNISWA Library Portal

Profile photo



Brief description

UNISWA Library Communications Portal

Extended profile

[Click here to view extended profile](#)

Blog :: UNISWA Library Portal



UNISWA Library portal and Emerald group Publishing.
 This InTouch community has been specially adapted for use by UNISWA librarians, to raise awareness and usage of their library services.

The portal may be used to inform visitors about the services of the library and point to other resources that might of interest.

In a joint investigation Emerald and UNISWA have enabled this portal to act as an SMS gateway, allowing the librarians to reach out to UNISWA students and inform them by SMS when new content arrives or when service requests have

Introduction

This is the UNISWA Library portal. It is designed for use by the UNISWA library staff so that they may promote the library and it's services to UNISWA students.

Click 'Send Message' to send an SMS message to students signed up to received SMS alerts.



ELGG open source

Message Delivery Status

Message Count: 40

Message Number	Received Time	Sent Time	SenderId	Message	Service	Status	Amount
9172620462	11:26:23 AM	11:26:00 AM	9081	DETAILS: Find the link for Interactive Technology and Smart Education http://www.emeraldinsight.com/journals.htm?articleid=11501586 PTM_4@journalis.wa	Compass	In Delivered	1.1
9166402174	11:21:27 AM	11:21:00 AM	9081	DETAILS: Find the link for Interactive Technology and Smart Education http://www.emeraldinsight.com/journals.htm?articleid=11501586 PTM_4@journalis.wa	Compass	Delivered	1.1
9172620447	11:21:11 AM	11:21:00 AM	9081	DETAILS: Find the link for Interactive Technology http://www.emeraldinsight.com/journals.htm?articleid=11501586 PTM_4@journalis.wa	Compass	In Delivered	1.1
9166402174	11:21:11 AM	11:21:00 AM	9081	DETAILS: Find the link for Interactive Technology http://www.emeraldinsight.com/journals.htm?articleid=11501586 PTM_4@journalis.wa	Compass	Delivered	1.1
9172620447	11:21:07 AM	11:21:00 AM	9081	DETAILS: Find the link for Online Information Services http://www.emeraldinsight.com/journals.htm?articleid=11501586	Compass	In Delivered	1.1

Commercial vendor

<http://bulksms.tornadoweb.com/Reports.aspx>

User Profile



- creation and maintenance of the user profile
- A prototype of a user profile for mobile based SDI service:
 - user identification number
 - contact number
 - information needs (keywords or subject)
 - frequency of information

Assimilation of content alerts



- Table of contents
- Subject keyword searches
- Email content alerts for different subjects

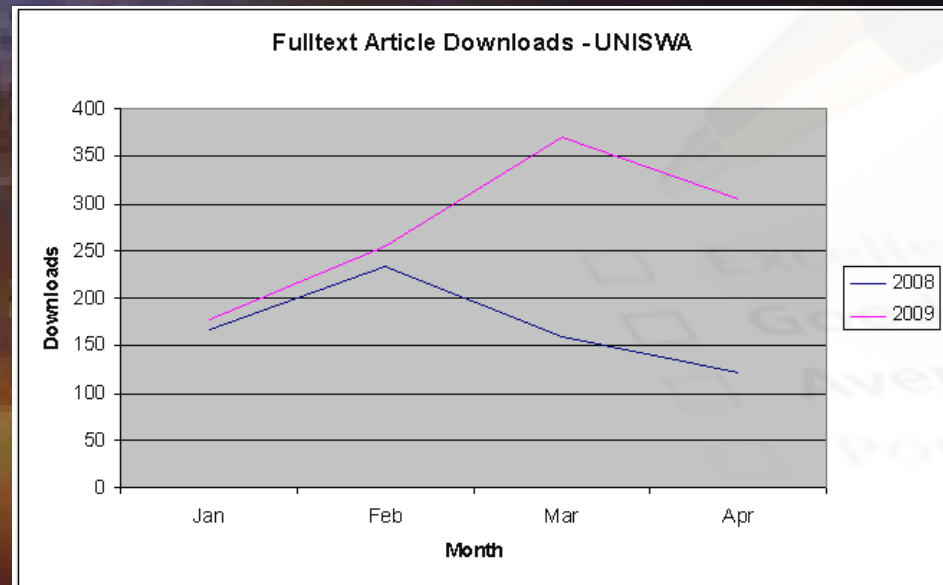
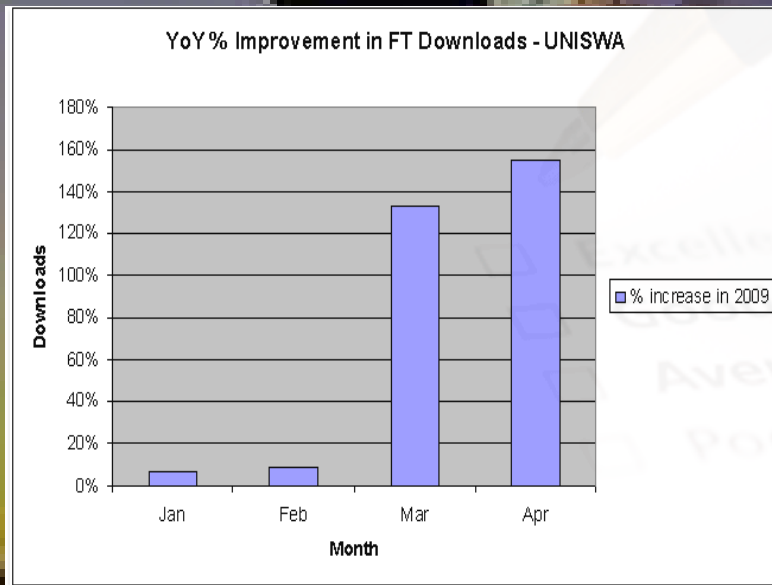
Transmission of the content



- Transmit the contents as SMS messages
- Use of SMS Gateway
- Semi automated
- Automated process

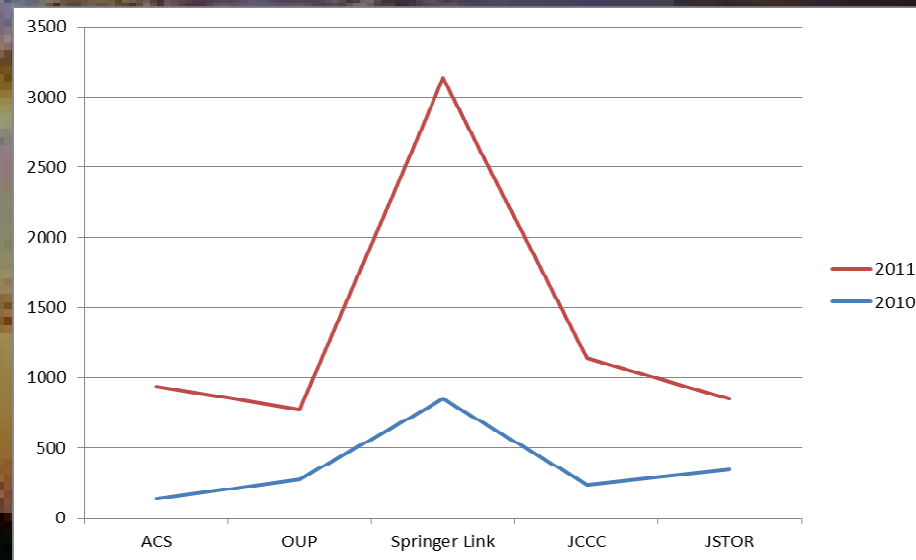
FINDINGS...

Phase 1 - The Full Text downloads increased by almost 150% compared to the previous 2 months and year to year...

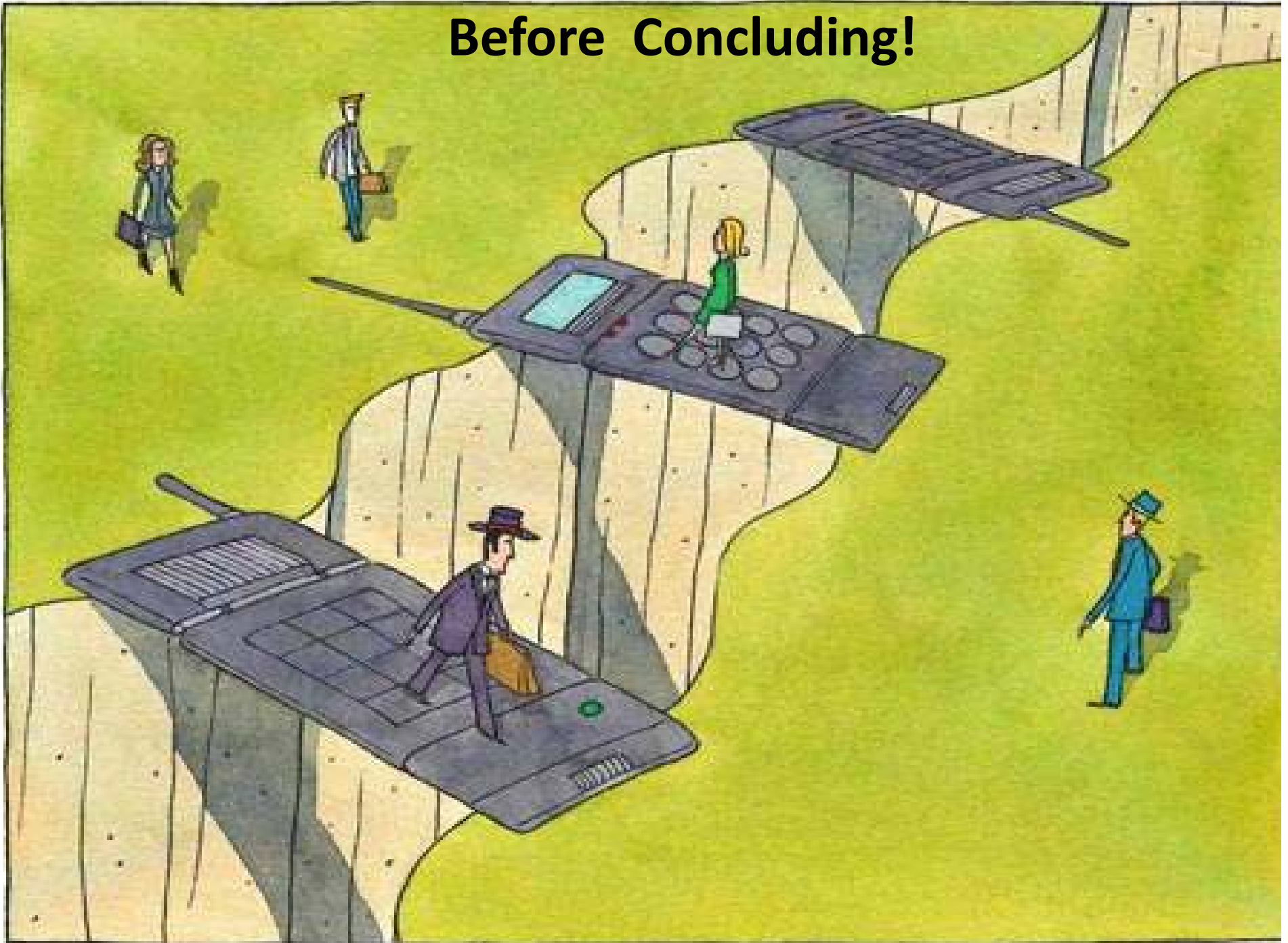


FINDINGS...

Phase 2 - A comparison of year to year downloads for five main databases showed massive increase. One database showed increase of close to 5 times



Before Concluding!





Marketing

Scalability

Collaboration

Consistent Results

Use of current Technology

Cost effectiveness

Conclusion



- link – users, technology and information in the context which is comfortable to the user (current, novel and easily accessible)
- Confidence to design an automated SMS platform for providing SDI based information services;
- Continue this service in future as well due to its popularity and to obtain desired results;
- Increase awareness of SMS technology based services amongst the users; FT downloads, usage of databases and attract more number of users;

Thank
you

