Online ISSN : 2249-4588
Print ISSN : 0975-5853

Global Journal

of Management and Business Research: E

Marketing

Highlights

Cellular Phone Users

Egyptian Consumers' Perception

Health Information Source

Product Placement in Hindi Movies

Discovering Thoughts, Inventing Future

VOLUME 15 ISSUE 7 VERSION 1.0

© 2001-2015 by Global Journal of Management and Business Research , USA

Global Journal of Management and Business Research: E
Marketing

Global Journal of Management and Business Research: E
Marketing

Volume 15 Issue 7 (Ver. 1.0)

Open Association of Research Society

© Global Journal of Management and Business Research. 2015.

All rights reserved.

This is a special issue published in version 1.0 of "Global Journal of Science Frontier Research." By Global Journals Inc.

All articles are open access articles distributed under "Global Journal of Science Frontier Research"

Reading License, which permits restricted use. Entire contents are copyright by of "Global Journal of Science Frontier Research" unless otherwise noted on specific articles.

No part of this publication may be reproduced or transmitted in any form or by any means, electronic or mechanical, including photocopy, recording, or any information storage and retrieval system, without written permission.

The opinions and statements made in this book are those of the authors concerned. Ultraculture has not verified and neither confirms nor denies any of the foregoing and no warranty or fitness is implied.

Engage with the contents herein at your own risk.

The use of this journal, and the terms and conditions for our providing information, is governed by our Disclaimer, Terms and Conditions and Privacy Policy given on our website http://globaljournals.us/terms-and-condition/menu-id-1463/

By referring / using / reading / any type of association / referencing this journal, this signifies and you acknowledge that you have read them and that you accept and will be bound by the terms thereof.

All information, journals, this journal, activities undertaken, materials, services and our website, terms and conditions, privacy policy, and this journal is subject to change anytime without any prior notice.

Incorporation No.: 0423089
License No.: 42125/022010/1186
Registration No.: 430374
Import-Export Code: 1109007027
Employer Identification Number (EIN):
USA Tax ID: 98-0673427

Global Journals Inc.

*(A Delaware USA Incorporation with "Good Standing"; **Reg. Number: 0423089**)*

Sponsors: Open Association of Research Society
Open Scientific Standards

Publisher's Headquarters office

Global Journals Headquarters
301st Edgewater Place Suite, 100 Edgewater Dr.-Pl,
Wakefield MASSACHUSETTS, Pin: 01880,
United States of America
USA Toll Free: +001-888-839-7392
USA Toll Free Fax: +001-888-839-7392

Offset Typesetting

Global Journals Incorporated
2nd, Lansdowne, Lansdowne Rd., Croydon-Surrey,
Pin: CR9 2ER, United Kingdom

Packaging & Continental Dispatching

Global Journals
E-3130 Sudama Nagar, Near Gopur Square,
Indore, M.P., Pin:452009, India

Find a correspondence nodal officer near you

To find nodal officer of your country, please email us at *local@globaljournals.org*

eContacts

Press Inquiries: *press@globaljournals.org*
Investor Inquiries: *investors@globaljournals.org*
Technical Support: *technology@globaljournals.org*
Media & Releases: *media@globaljournals.org*

Pricing (Including by Air Parcel Charges):

For Authors:
22 USD (B/W) & 50 USD (Color)
Yearly Subscription (Personal & Institutional):
200 USD (B/W) & 250 USD (Color)

Integrated Editorial Board
(Computer Science, Engineering, Medical, Management, Natural Science, Social Science)

John A. Hamilton,"Drew" Jr.,
Ph.D., Professor, Management
Computer Science and Software Engineering
Director, Information Assurance Laboratory
Auburn University

Dr. Henry Hexmoor
IEEE senior member since 2004
Ph.D. Computer Science, University at Buffalo
Department of Computer Science
Southern Illinois University at Carbondale

Dr. Osman Balci, Professor
Department of Computer Science
Virginia Tech, Virginia University
Ph.D.and M.S.Syracuse University, Syracuse, New York
M.S. and B.S. Bogazici University, Istanbul, Turkey

Yogita Bajpai
M.Sc. (Computer Science), FICCT
U.S.A.Email:
yogita@computerresearch.org

Dr. T. David A. Forbes
Associate Professor and Range Nutritionist
Ph.D. Edinburgh University - Animal Nutrition
M.S. Aberdeen University - Animal Nutrition
B.A. University of Dublin- Zoology

Dr. Wenying Feng
Professor, Department of Computing & Information Systems
Department of Mathematics
Trent University, Peterborough,
ON Canada K9J 7B8

Dr. Thomas Wischgoll
Computer Science and Engineering,
Wright State University, Dayton, Ohio
B.S., M.S., Ph.D.
(University of Kaiserslautern)

Dr. Abdurrahman Arslanyilmaz
Computer Science & Information Systems Department
Youngstown State University
Ph.D., Texas A&M University
University of Missouri, Columbia
Gazi University, Turkey

Dr. Xiaohong He
Professor of International Business
University of Quinnipiac
BS, Jilin Institute of Technology; MA, MS, PhD,. (University of Texas-Dallas)

Burcin Becerik-Gerber
University of Southern California
Ph.D. in Civil Engineering
DDes from Harvard University
M.S. from University of California, Berkeley & Istanbul University

Dr. Bart Lambrecht
Director of Research in Accounting and FinanceProfessor of Finance
Lancaster University Management School
BA (Antwerp); MPhil, MA, PhD (Cambridge)

Dr. Carlos García Pont
Associate Professor of Marketing
IESE Business School, University of Navarra
Doctor of Philosophy (Management), Massachusetts Institute of Technology (MIT)
Master in Business Administration, IESE, University of Navarra
Degree in Industrial Engineering, Universitat Politècnica de Catalunya

Dr. Fotini Labropulu
Mathematics - Luther College
University of ReginaPh.D., M.Sc. in Mathematics
B.A. (Honors) in Mathematics
University of Windso

Dr. Lynn Lim
Reader in Business and Marketing
Roehampton University, London
BCom, PGDip, MBA (Distinction), PhD, FHEA

Dr. Mihaly Mezei
ASSOCIATE PROFESSOR
Department of Structural and Chemical Biology, Mount Sinai School of Medical Center
Ph.D., Etvs Lornd University
Postdoctoral Training,
New York University

Dr. Söhnke M. Bartram
Department of Accounting and FinanceLancaster University Management SchoolPh.D. (WHU Koblenz)
MBA/BBA (University of Saarbrücken)

Dr. Miguel Angel Ariño
Professor of Decision Sciences
IESE Business School
Barcelona, Spain (Universidad de Navarra)
CEIBS (China Europe International Business School).
Beijing, Shanghai and Shenzhen
Ph.D. in Mathematics
University of Barcelona
BA in Mathematics (Licenciatura)
University of Barcelona

Philip G. Moscoso
Technology and Operations Management
IESE Business School, University of Navarra
Ph.D in Industrial Engineering and Management, ETH Zurich
M.Sc. in Chemical Engineering, ETH Zurich

Dr. Sanjay Dixit, M.D.
Director, EP Laboratories, Philadelphia VA Medical Center
Cardiovascular Medicine - Cardiac Arrhythmia
Univ of Penn School of Medicine

Dr. Han-Xiang Deng
MD., Ph.D
Associate Professor and Research Department Division of Neuromuscular Medicine
Davee Department of Neurology and Clinical NeuroscienceNorthwestern University Feinberg School of Medicine

Dr. Pina C. Sanelli
Associate Professor of Public Health
Weill Cornell Medical College
Associate Attending Radiologist
NewYork-Presbyterian Hospital
MRI, MRA, CT, and CTA
Neuroradiology and Diagnostic Radiology
M.D., State University of New York at Buffalo,School of Medicine and Biomedical Sciences

Dr. Roberto Sanchez
Associate Professor
Department of Structural and Chemical Biology
Mount Sinai School of Medicine
Ph.D., The Rockefeller University

Dr. Wen-Yih Sun
Professor of Earth and Atmospheric SciencesPurdue University Director National Center for Typhoon and Flooding Research, Taiwan University Chair Professor Department of Atmospheric Sciences, National Central University, Chung-Li, TaiwanUniversity Chair Professor Institute of Environmental Engineering, National Chiao Tung University, Hsin-chu, Taiwan.Ph.D., MS The University of Chicago, Geophysical Sciences
BS National Taiwan University, Atmospheric Sciences
Associate Professor of Radiology

Dr. Michael R. Rudnick
M.D., FACP
Associate Professor of Medicine
Chief, Renal Electrolyte and Hypertension Division (PMC)
Penn Medicine, University of Pennsylvania
Presbyterian Medical Center, Philadelphia
Nephrology and Internal Medicine
Certified by the American Board of Internal Medicine

Dr. Bassey Benjamin Esu
B.Sc. Marketing; MBA Marketing; Ph.D Marketing
Lecturer, Department of Marketing, University of Calabar
Tourism Consultant, Cross River State Tourism Development Department
Co-ordinator , Sustainable Tourism Initiative, Calabar, Nigeria

Dr. Aziz M. Barbar, Ph.D.
IEEE Senior Member
Chairperson, Department of Computer Science
AUST - American University of Science & Technology
Alfred Naccash Avenue – Ashrafieh

President Editor (HON.)

Dr. George Perry, (Neuroscientist)
Dean and Professor, College of Sciences
Denham Harman Research Award (American Aging Association)
ISI Highly Cited Researcher, Iberoamerican Molecular Biology Organization
AAAS Fellow, Correspondent Member of Spanish Royal Academy of Sciences
University of Texas at San Antonio
Postdoctoral Fellow (Department of Cell Biology)
Baylor College of Medicine
Houston, Texas, United States

Chief Author (HON.)

Dr. R.K. Dixit
M.Sc., Ph.D., FICCT
Chief Author, India
Email: authorind@computerresearch.org

Dean & Editor-in-Chief (HON.)

Vivek Dubey(HON.)
MS (Industrial Engineering),
MS (Mechanical Engineering)
University of Wisconsin, FICCT
Editor-in-Chief, USA
editorusa@computerresearch.org

Sangita Dixit
M.Sc., FICCT
Dean & Chancellor (Asia Pacific)
deanind@computerresearch.org

Suyash Dixit
(B.E., Computer Science Engineering), FICCTT
President, Web Administration and
Development , CEO at IOSRD
COO at GAOR & OSS

Er. Suyog Dixit
(M. Tech), BE (HONS. in CSE), FICCT
SAP Certified Consultant
CEO at IOSRD, GAOR & OSS
Technical Dean, Global Journals Inc. (US)
Website: www.suyogdixit.com
Email:suyog@suyogdixit.com

Pritesh Rajvaidya
(MS) Computer Science Department
California State University
BE (Computer Science), FICCT
Technical Dean, USA
Email: pritesh@computerresearch.org

Luis Galárraga
J!Research Project Leader
Saarbrücken, Germany

Contents of the Issue

i. Copyright Notice
ii. Editorial Board Members
iii. Chief Author and Dean
iv. Contents of the Issue

1. Service Quality and Customer Satisfaction: The Case of Cellular Phone users of Ethio-Telecommunications in Ambo Town. *1-7*
2. Brand Recall for Product Placement in Hindi Movies. *9-15*
3. Effectiveness of Push (SMS) Service: A Study on Grameenphone and Airtel Subscribers of Bangladesh. *17-43*
4. The Effect of Household Income and Heath Care Access on Youths Nutritional Status in Mumbai Metropolitan Region. *45-56*

v. Fellows and Auxiliary Memberships
vi. Process of Submission of Research Paper
vii. Preferred Author Guidelines
viii. Index

Global Journal of Management and Business Research: E Marketing
Volume 15 Issue 7 Version 1.0 Year 2015
Type: Double Blind Peer Reviewed International Research Journal
Publisher: Global Journals Inc. (USA)
Online ISSN: 2249-4588 & Print ISSN: 0975-5853

Service Quality and Customer Satisfaction: The Case of Cellular Phone users of Ethio-Telecommunications in Ambo Town

By Daniel Tadesse Tulu

Ambo University, Ethiopia

Abstract- The study is conducted on quality of service delivery and its effect on customer satisfaction in the case of Ethio-telecom in Oromia region in Ambo area on mobile telephone users. This study tried to provide relevant factors that cause customers to respond about mobile phone services delivered by Ethio-telecom. The research approach employed for the study is mixed approach i.e. both qualitative and quantitative approached used to find out the effect of Ethio-telecom service quality on customer satisfaction. For the purpose of the study both primary and secondary data are used. The primary data are collected through questionnaire and interview with the Ambo branch Ethio-telecom employees, manager and customers. Furthermore, secondary data are taken from documents and brochures that are available from the branch office. The research design employed is descriptive and uses charts and frequency table to discuss the output. A sample of 500 were selected through simple random sampling from the total population. Result of the study shows that mobile phone users faces awe-inspiring number of the problems like network busy, error in connection, poor network coverage, slow mobile internet service and expensive price of the service.

Keywords: ethio-telecom, service, customer satisfaction, cellular phone and network coverage.

GJMBR - E Classification : JEL Code : M31

SERVICEQUALITYANDCUSTOMERSATISFACTIONTHECASEOFCELLULARPHONEUSERSOFETHIOTELECOMMUNICATIONSINAMBOTOWN

Strictly as per the compliance and regulations of:

© 2015. Daniel Tadesse Tulu. This is a research/review paper, distributed under the terms of the Creative Commons Attribution-Noncommercial 3.0 Unported License http://creativecommons.org/licenses/by-nc/3.0/), permitting all non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.

Service Quality and Customer Satisfaction: The Case of Cellular Phone users of Ethio-Telecommunications in Ambo Town

Daniel Tadesse Tulu

Abstract- The study is conducted on quality of service delivery and its effect on customer satisfaction in the case of Ethio-telecom in Oromia region in Ambo area on mobile telephone users. This study tried to provide relevant factors that cause customers to respond about mobile phone services delivered by Ethio-telecom. The research approach employed for the study is mixed approach i.e. both qualitative and quantitative approached used to find out the effect of Ethio-telecom service quality on customer satisfaction. For the purpose of the study both primary and secondary data are used. The primary data are collected through questionnaire and interview with the Ambo branch Ethio-telecom employees, manager and customers. Furthermore, secondary data are taken from documents and brochures that are available from the branch office. The research design employed is descriptive and uses charts and frequency table to discuss the output. A sample of 500 were selected through simple random sampling from the total population. Result of the study shows that mobile phone users faces awe-inspiring number of the problems like network busy, error in connection, poor network coverage, slow mobile internet service and expensive price of the service.

Keywords: ethio-telecom, service, customer satisfaction, cellular phone and network coverage.

I. Back Ground of the Study

Telecommunication service was introduced first in Ethiopia during 1894 when the construction of the telephone line from Harar to the capital city, Addis Ababa (Finfinnee), was started. Later, in 1932, Ethiopia become a member of the international telecommunication union (ITU) immediately before the Italian invasion of 1935 and radio communication was introduced following the establishment of radio circuit links with Djibouti, Aden, Cairo and London. The companies was placed under the auspices of the ministry of post, telephone and telegraph (PTT) and then reorganized as imperial board of telecommunications of Ethiopia *(www.ethio telecom.et)*.

On November 1996 the telecommunications sectors was restructured and two separate independententities namely the Ethiopian Telecommunications authority (ETA) and the Ethiopian Telecommunication Corporation (Ibid).

The corporation in 1996 has enhanced the development of telecom infrastructures and quantity of service in both Rural and urban areas in the most efficient and timely manner. Ethiopian government has decided to focus on the improvement of telecommunication services, considering them as a key lever in development of Ethiopian. Then Ethio-telecom is born in November 2010 from this ambition of supporting the steady growth of the country (Ibid).

Ethio-telecom has played great role in fostering the growth and prosperity of the economy of Ethiopia by making communication faster than before. Even though it is crucial for development it has got sorts of problems nowadays. Although customer service in Ethio -telecom has shown some improvements all customers are not equally satisfied. It is observable that in Ethiopia Telecom faces variety of problems which in turn may cause customers dissatisfaction. There are few or no researched done previously on services delivered by telecommunication and customer's satisfaction in Ethiopia particularly in Ambo town. Hence this paper tries to identify what are the factors that make customers of Ethio-telecom which are cellular phone users dissatisfied for a better understanding of the relationship that exists between customer and service delivered by Ethio telecom in Ambo town.

II. Objective of the Study

The general objective of the study is to assess service delivery and customer satisfaction of mobile users in Ethio- telecom in Ambo town.

a) Specific objectives of the study includes

- ✓ To investigate customers response on quality service provided by Ethio telecom in Ambo town
- ✓ To identify factors which affect customer satisfaction on service provided by Ethio telecom in Ambo town
- ✓ To know the level of customer satisfaction on service provided by Ethio telecom

b) Research question

The research addresses the following main questions

- ✓ What is the attitude of customers towards to the service delivered by Ethio telecom?
- ✓ What factors affect customer satisfaction in Ethio telecom service?
- ✓ What is the status of satisfaction of customers?

Author: Ambo University, Department of Marketing, Ethiopia.
e-mail: danitadesse@ymail.com

© 2015 Global Journals Inc. (US)

III. Review of Related Literatures

Customer satisfaction depends on the products perceived performance relative to a buyer's expectations. If the product's performance falls short of expectations, the customer is dissatisfied. If performance matches expectations, the customer is satisfied. If performance exceeds expectations, the customer is highly satisfied or delighted. Highly satisfied customers make repeat purchases and tell others about their good experience with the product. (Kumar; 2006)

Customer Satisfaction is an important element of every business and a key for achieving the organizational objectives. Hence it must be well understood and communicated by every individual in the organizational structure. Every single individual should accomplish tasks by considering how that particular task can affect the level of customer satisfaction. (Palmer, 2001)

Activities that do not add any value for the customer should be avoided or improved to value adding activities, and customers are not willing to pay for those activities which are not value adding. Instead, they only want to pay for value adding activities. (Michael Wing 1993). According to the above scholar, business organizations should focus on those activities that add value to their customers and anything else should be avoided or set in order to satisfy customers (Michael Wing, 1993).

It is over a decade now that the Nigerian government success fully liberalized its Tele communication sectors and brought into existence Global system of Mobil GSM the study showed that customer satisfaction was influenced by age income perceived quality and perceived value but not pre purchasing expectations. Global System of Mobil GSM operators in Nigeria discovered that as revolutionary Global System of Mobil GSM problem identified were instability in power supply. Security of infrastructure and inter network connectivity. They stated that all this factors were controlled by the endogens variables and the firm has control over them. So they could effectively used to ensure customer satisfaction (Adegoke *et al* 2008).

According to the telecommunication sector in Pakistan has done outstandingly well in the past few year mainly because of liberalization of global trade and investment industry as well as opening local business to modem technology. It took drastic change as government took the initiative to make it a larger player of the industry. At the time of independence Pakistan has in net and insufficient telecom base of 1400 landlines. At that phase post telegraph and telephone were acting as one unit later in 1962 both were alienated to establish autonomous postal department and telephone and telegraph department. In the year 1990 Pakistan started to reform measures which were meant to encourage private sectors participation. As per United Nations prediction Pakistan's population is likely to grow to 190 million by 2018(Ibid).

Despite the economic down fall deregulation of the telecom industry of Pakistan has reveled positive but slow growth in terms of revenues and subscribes. Telecommunication of the countries density has jumped from 44.06% in 2006-07 to 58.8% in 2007-08 cellular mobile segment of the industry has been try in Pakistan. Cellular subscribers grew by about 40% in the year 2007-08, as against 82% in 2006-07 and more than 100% during 2005-06, as PTA (Pakistan telecom industry; 2009) has fried to put the cellular industry in to new stage with the prominences on quality, value added services with the aim of satisfying customers.

In September, 2000, a national telecommunication policy was formulated to provide Nigerians with the basic framework and primary building block for the much desired telecommunication revolution in the country. A major event was the launch of the Global system of mobile (GSM) communication service in 2001 and the privatization of Nigerian telecommunication limited (NITEL).

IV. Methodology

The study uses the total Mobile phone users in Ambo town as population. As per the information got from the Ethio telecom Ambo branch the total populations of the customer of Ethio telecom those who are mobile phone users are estimated to be around 30,000 and out of this total population 500 customers are taken as a sample. The study purposely taken equal size of male and female respondents i.e. 250 each to treat the view of both gender in the service equally. Primarily data is collected via questionnaire and interview from customers of Ethio telecom, employees and Branch manager. The sample size calculation is based on carvelo (1984). The sampling technique employed is simple random sampling. It is appropriate to use it because customers are selected randomly regardless of where they are (workers of government, students, teachers and others) who dwell in the town of Ambo. This implies sampling procedures is free of biases towards one particular groups of users rather include with diverse demographics and employment status.

© 2015 Global Journals Inc. (US)

Population	table for determining sample size		
	Low	Medium	High
59-90	5	13	20
91-150	8	20	32
151-280	13	32	50
281-500	20	50	80
501-1200	32	80	125
1201-3200	50	125	200
3201-10000	80	200	315
1001-35000	125	315	500
35001-150000	200	500	800

a) Age of respondents

The study deliberately excluded customers with the age of below 18 because it assumed peoples below 18 are not matured to explain things objectively. as observed from the table below the respondents are high in the age interval of 18-25 and 26-35 followed by 36-45 and over the age of 46.

Table 1 : Age distribution of the respondents

Age Interval	Male	Female	Total	Frequency
18-25	68	74	142	0.284
26-35	76	64	140	0.28
36-45	59	75	134	0.268
Over 46	47	37	84	0.168
Total	250	250	500	

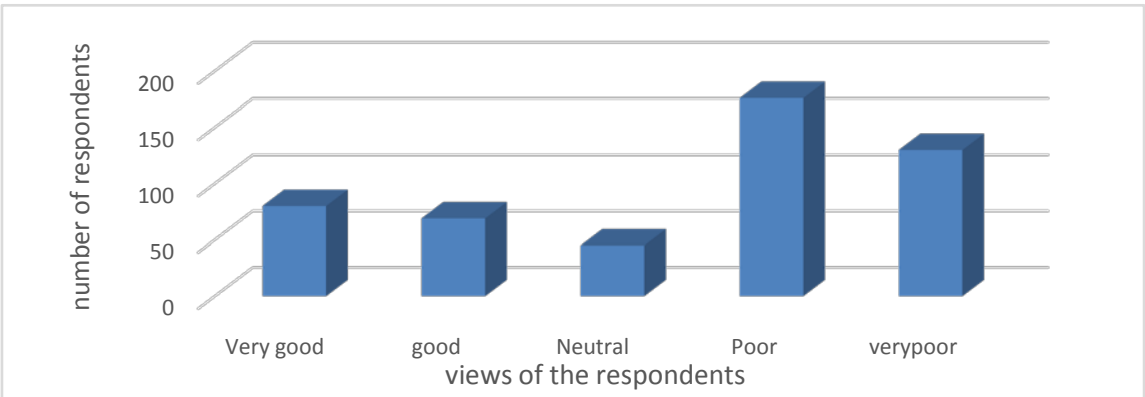
Source: questionnaire response, 2015

Table 2 : Duration of customership in the mobile phone service

Year of Customership	Number of Respondents		Total
	Male	Female	
1-5yrs	89	58	147
6-10yrs	70	87	157
above 10yrs	91	105	196
Total	250	250	500

Source: questionnaire response, 2015

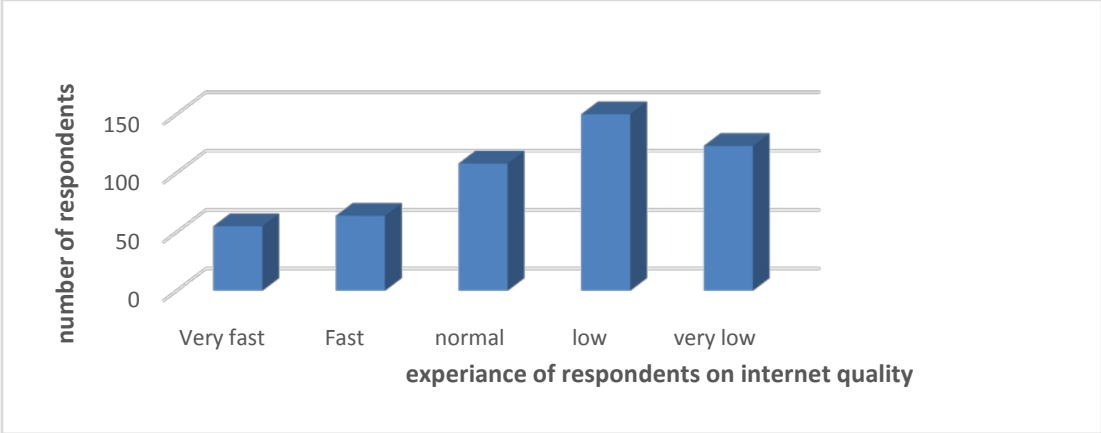
As depicted on the above table the number of customers of Ethio-telecom is increasing as the year of stay increases i.e.147, 157 and 196 for the year stay of 1-5, 6-10 and above 10yrs respectively. This shows that most of the customers are experienced in the service of the Ethio telecom.



Graph 1 : Ethio- telecoms' quality of mobile network

© 2015 Global Journals Inc. (US)

As shown in the above graph 35% of the total respondents said the quality of the network and services provided by Ethio telecom around Ambo area is poor followed by very poor which is rated as 26% of the total respondent. Other respondents reacted on the question about the quality of the network rated as very good and good which are 16 and 13 percent of the respondents. Other 9 percent of the respondents remains as neutral and said it is difficult to say it is good or bad. Generally it can be concluded that Ethio telecom mobile network quality is poor from the response of 130 respondents out 500 compared to the charge they paid.



Graph 2 : Quality of internet service provided by mobile phone by Ethio- telecom

It can be easily understood from graph 2 that the quality of internet service provided by Ethio telecom is low. This is represented by 30% of the respondents. Followed with very low quality which accounts about 25%. About 21% of the respondent replied the quality and speed of the internet service that is given via mobile phone is normal. To sum up Ethio telecom mobile internet service is very slow due to different factors like strength of the network or the type of the technology they are using.

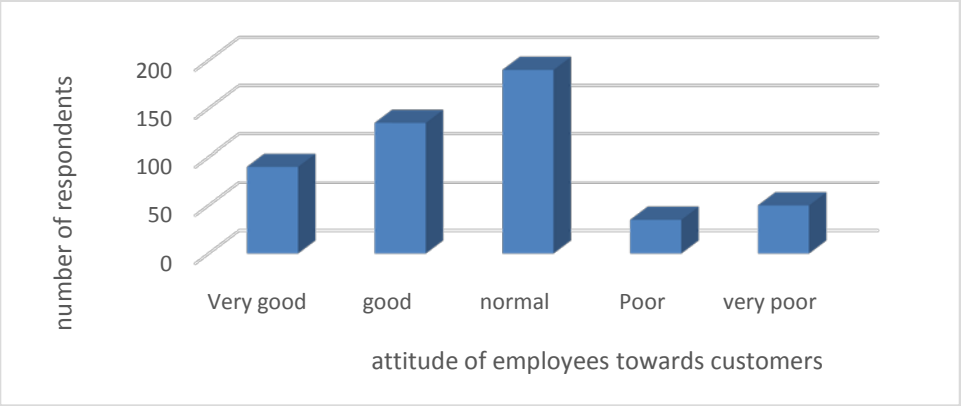
Table 3 : Satisfaction level of short message service (SMS)

Response	Respondents Number	percent
Very good	70	0.14
Good	170	0.34
Normal	168	0.336
Poor	50	0.1
Very poor	42	0.084
Total	500	

Source: questionnaire response, 2015

As it can be observe from table 3 above most of respondents said the satisfaction level of short message service is good which represented by 34% out of the total respondents followed by normal level of satisfaction which comprises nearly equal to good satisfaction which is 33%. Out of the total respondent 10% responded that the quality of short message service provided by Ethio telecom is poor due the factors. According to the response of the respondent short message service is irritating sometimes due inability of the service to deliver the message to the receiver which is owe to poor network facility. In addition to the service itself the charge amount per message is not appropriate. The other factor mentioned as a problem by the respondents is message sent to the receivers reaches after a week sometimes which in turn means it is not timely service and it reaches after the issue of the subject expired. Some other customers said that advertisement sent to each and every mobile user is not by consent of the user which can create a sort of discomfort on the service. Generally it can be concluded that more or less compared to other services like call service short message service is good and normal the customers of Ethio telecom.

© 2015 Global Journals Inc. (US)



Graph 3 : Ethio-telecom employees attitude toward their customer

As it is clearly shown on the graph employees are normal in serving the customers when they are in need of a solution from Ethio telecom. This represented by 38% of the respondents. More over handful number of respondents said the attitude of the staff towards the customer is good. this accounts about 27% of the in the same manner 7 % said the way some employees responds to the questions and services is unethical and includes insults and go out of the office while the customer is there to demand the service as respondents replied. Therefore itcan be concluded that there is good customer handling by employees of Ethio-telecom of Ambo branch which makes the respondents happy and satisfied to be their loyal customer.

Table 4 : Assessment of price of mobile phone services

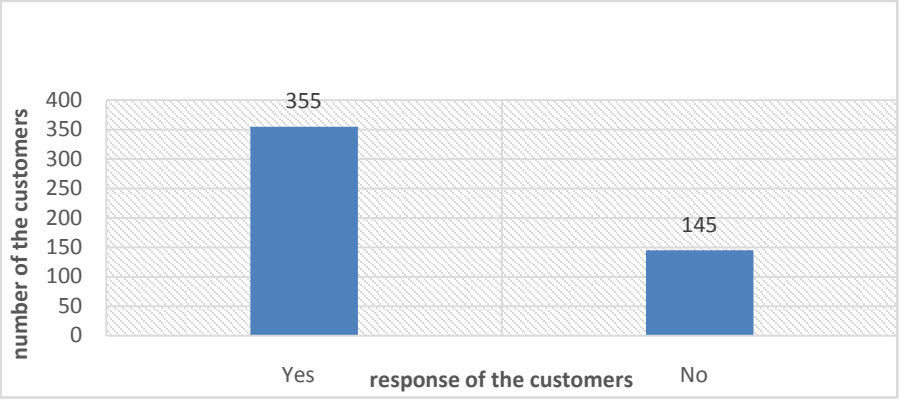
Item	Response	Respondents in Number	In percent
Do you agree that Ethio-telecom price for its services is fair?	strongly agree	15	0.03
	agree	30	0.06
	normal	120	0.24
	disagree	200	0.4
	strongly disagree	135	0.27
	Total	500	

Source: questionnaire response 2015

Concerning the price of telecom with the relation to the services provide by the telecom customers has replied that 40 percent are disagree. 27 percent and 24 percent are respectively responded strongly disagree and normal. Only 3 and 6 percent of the customers replied that strongly agree and agree respectively. Generally it can be concluded from customers reply that the price telecom charges for its services (individual call, group call, internet and voice call-currently launched) is not fair price which is exhibited by significant portion of respondents.

Communication is a heart of any business organizations as well as individuals since without communication nothing can be achieved. With this regard the role of telecommunication is very crucial. To this end there are various platforms for communication purpose which are delivered by telecom. The first and the most commonly used service is calling service which comprises individual as well as group calling. Any call from mobile to mobile, mobile to land line and vice versa across regions will cost the caller 72 cents per minute in the peak hours, when the air traffic of the service provider is at its busies and the whole days excepts Sunday and hours starting from 9 PM to 7 AM. In case of group calling the price is multiplied by number of peoples involved in the call. The other is internet service which is also not fair especially after 3G is started. It is very expensive and most customers are unregistering from the service due to its high and unfair charge. The other service and newly launched service is voice mail which charges more than 3 birr per a single voice mail which is also expensive. Finally the SMS (short message service) is the most commonly used one. The price for one SMS compared to other services is fair since it is 35 cents.

© 2015 Global Journals Inc. (US)



Graph 4 : Willingness of customers to stay as loyal

The above graph portrays that about 71 percent of the respondent shave an intention to shift to any private telecom if available due to various reasons like high charge for the services, poor network coverage and quality; and other reasons. The idea behind shift of the customers is that if there is other private competitor in telecom industry there may improvement of quality of mobile phone services. This is as a result of a competition among existing firms in the telecom industry. The rest 29 percent has still a desire to stay as a customer despite the dissatisfaction and other inconveniences. These respondents on their side said they don't want to shift other private telecom because they have a fear that private company may charge above Ethio-telecom to maximize profit rather than fulfilling need of the customer. They added there is no expectation that private telecom handle customer in a good manner and give consideration of the whole population better than the current one. Due to these reasons these customers wants to stay loyal to Ethio-com and they have not only intention to shift other private telecom at all.

b) Interview with the branch marketing and sales officer

As clearly pointed out in the methodology part interview is one of the data collection tool regarding the study. Accordingly to make data collection more reliable and correct interview is held. Regarding service provision, Ethio-telecom is rendering the service in a manner that can satisfy the customer's desires. The customers are using the service to facilitate their day to day tasks and performances. The officer added that Ethio-telecom of Ambo area is working hard to improve and quality of the mobile phone service dramatically so as to achieve its purpose (customer satisfaction). Concerning the level of customer complaints on the mobile service offered by Ethio-telecom marketing and sales officer replied that Ethio-telecom of ambo area has all indispensable mechanisms which are designed to handle complain of customers. The officer is added that the telecom has complain desk call center i.e. 994 on which customers can complain and express their dissatisfaction on different types of services. For example, they can ask questions concerning failure of network service, problem of balance recharging, how to use particular service and about other services provided by the telecom.

V. Conclusion

Depend on the data gathered from customers as well as marketing and sales officer of Ethio-telecom Ambo branch the following conclusions are drawn.

- Regarding mobile phone service there are problems which appears while calling or receiving calls like of *network busy*, *error in connection*, *call ended*, *no network coverage* and *number busy*. Hence it can be summed up that there is low quality network around Ambo area.
- There is a slow mobile internet connection which owes to poor network coverage and strength.
- Ethio- telecom gives mobile phone services like short message service (SMS), call, internet, voice mail and others with expensive price. Relatively the price paid for one SMS is good.
- Most customers have an idea to shift to other private telecom is available because of poor quality of connection, network coverage, high of price charge and others.
- Ethio-telecom employees' attitude toward their customer is more of normal. That means employees are treating the customers whenever customers come up with complains and questions regarding the services.
- Generally most customers of Ethio-telecom around Ambo area dissatisfied due to the reasons like poor network quality, high price charge and sometime scharge above service consumption. However some respondents are satisfied by customer handling, quality SMS and delighted by newly launched 3G internet services.

© 2015 Global Journals Inc. (US)

VI. Recommendation

According to the discussion and analysis the following recommendations are forwarded to enable Ethio-telecom to have quality customer service and good customer satisfaction. Those possible recommendations are:

- The Ethio- telecom should give continuous training to their staff members on how to handle their customer's complaints better. This enhance them to give possible appropriate answer and good handling for complains.
- In order to solve poor network quality and coverage problem Ethio-telecom ought to take the following measures;
  - ✓ Diversify network system options so that network is highly available and gives quality services.
  - ✓ Import modern machinery and technology of network which can provide better service to telecom industry.
  - ✓ Hiring and giving a continuous training for technical operators of network systems so that network problems will get solved soon.
- Ethio- telecom have to utilize new technological invention of mobile phone services in order to satisfy its customers through adoption of foreign country technology of telecom to improve service delivery system of internet network.
- Since the payment of various serviced provided by Ethio-telecom is expensive there should be a mechanism devised to revise the payment amount through benchmarking other countries in the world where there is optimum payment system.

References Références Referencias

1. Adegoke; A. S; Boboloda; I.T and Balogam; W.A(2008) PERFORMANCE evaluation of GSM subscriber; communication of IBIM Vol1; 84-90.
2. Anderson, E.W, Fornell, C and Lehmann, D.R (1994)" Customer satifsfaction, market share and profitability; FINDINGS FROM SWEDEN, "JORNAL OF MARKETING, VOL, 58, PP, 53-66.
3. Birtner, m. j; Booms, B.H & tetreawet, M.s(1990)" the service encounter; diagnosing favorable and unfavorable and unfavorable incodemts " journal of marketing favorable and unfavorable incindents" jornal of marketing, 54:71 – 84.
4. Eggert. A & Ulaga, W, (2002) customer perceived value: a substitute for satisfaction in business markets, journal of business and industrial marketing 17(2-3) pp. 107-118.
5. Internet, w. w. weth io telecom.et and w. w. wetc net.et
6. Jackson, D; ketin; J.& Burdick, R.(1985) "Examining the relative importance of distribution service elements" Jornal of Business Logistics 7(2) pp 14 -32.
7. Kim: M. K. Park. M. C & Joung. D. H (2004) The effect of customer satisfaction and switching barrier on customer loyality in corian mobile telecommunication service. Tele communication policy 28(2): 145-159.
8. Kotler; P&K elvin; K. (2006) marketing management 12thedpearasoun Education Inc. New jersey.
9. Nash and Nash "The behavioral consequence of service quality "journal of marketing April 2003 pp. 31-46.
10. Oliver; R. L. (1992) Advance in consumer research (vol.19) Assosation for consumer research. prov; pp. 237-244.
11. Parasurman; A; Zeithamalv & Berry L. (2002) "aconseptual model of service quality and its implication on feuture research" journal of marketing 48(fall); 41-50.
12. Philikotler marketing management, 11th edition (upper suddle river, NJ: precentice hall, 2006) pp. 219-220.
13. See jamnes A, Heskett, w. earl Sesser jv and Christopher w.L hart (new York free press 1997).

© 2015 Global Journals Inc. (US)

This page is intentionally left blank

© 2015 Global Journals Inc. (US)

Global Journal of Management and Business Research: E Marketing
Volume 15 Issue 7 Version 1.0 Year 2015
Type: Double Blind Peer Reviewed International Research Journal
Publisher: Global Journals Inc. (USA)
Online ISSN: 2249-4588 & Print ISSN: 0975-5853

Brand Recall for Product Placement in Hindi Movies

By Prof. Chirag R. Patel & Dr. Pankajray V. Patel

S.P. College of Engineering, India

Abstract- In present era, media fragmentation and proliferation has directed advertisers' interest in developing more effective ways to communicate with consumers. So they are moving with the new concept of promotion named product placement. In this paper, researchers try to study the impact of movie genre, product placement type, and viewer gender on audiences' recall of brand placed in movies in order to know which one gets more attention and more attraction for buying behaviour. This study uses experimental design and comprises samples of 137 students enrolled in MBA course, who watch hindi movies. The research was conducted with three hindi movies and respondents' were asked to recall brands placed in these movies after watching video clips. Data has been collected by the use of questionnaire. This research paper has implications for both academicians and practitioners which include the advertising agency people, the media planners, the brand managers, the movie scriptwriters and producers for developing strategies to increase the use of product placement as a tool for brand communications. Findings suggest that product placed in prominent mode has higher brand recall than product placed in subtle mode. Further it reveals that automobile products are highly recognized products among other products placed in selected hindi movies.

Keywords: product placement, hindi movies, brand recall.

GJMBR - E Classification : JEL Code : M39

BRANDRECALLFORPRODUCTPLACEMENTINHINDIMOVIES

Strictly as per the compliance and regulations of:

© 2015. Prof. Chirag R. Patel & Dr. Pankajray V. Patel. This is a research/review paper, distributed under the terms of the Creative Commons Attribution-Noncommercial 3.0 Unported License http://creativecommons.org/licenses/by-nc/3.0/), permitting all non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.

Brand Recall for Product Placement in Hindi Movies

Prof. Chirag R. Patel[α] & Dr. Pankajray V. Patel[σ]

Abstract- In present era, media fragmentation and proliferation has directed advertisers' interest in developing more effective ways to communicate with consumers. So they are moving with the new concept of promotion named product placement. In this paper, researchers try to study the impact of movie genre, product placement type, and viewer gender on audiences' recall of brand placed in movies in order to know which one gets more attention and more attraction for buying behaviour. This study uses experimental design and comprises samples of 137 students enrolled in MBA course, who watch hindi movies. The research was conducted with three hindi movies and respondents' were asked to recall brands placed in these movies after watching video clips. Data has been collected by the use of questionnaire. This research paper has implications for both academicians and practitioners which include the advertising agency people, the media planners, the brand managers, the movie scriptwriters and producers for developing strategies to increase the use of product placement as a tool for brand communications. Findings suggest that product placed in prominent mode has higher brand recall than product placed in subtle mode. Further it reveals that automobile products are highly recognized products among other products placed in selected hindi movies.

Keywords: product placement, hindi movies, brand recall.

I. Introduction

In recent era, brands and products are more and more appearing in Hindi movies popularly known as Bollywood. Otherwise such concept was only popular in Hollywood movies. Increasingly, the Indian movie industry is using this technique for promoting as well as earning revenue. Obviously for audiences, it makes movie viewing experience more real. Two reasons are attributable to such a change. First, with increase in production cost of movies, such secondary sources of revenue act as an additional benefit to the financers as well as producers of a movie. Second, with the growing population of the young urban middle class in the Indian economy it becomes more important to satisfy need of this changing economy that this class follows. From the brand managers' point of view using product placements as a tool in movies provides his product and or brand with a higher reach and penetration level. It is true for India that many villages don't have electricity but they have cinema halls running on generator sets. This makes the use of product placement through celebrities as an ideal way to push them for use. From the perspective of a sponsor neither advertisement nor publicity provides the appropriate blend as the sponsor has control over the message and its content only but the audience decides its credibility. Hence according to Balasubramanian (1994) a different form of marketing communication tool is required. Product placement is a tool which can effectively combine both advertisement and publicity components. Again since placements are paid for they are sponsor controlled messages both in their format and content. In the broader Integrated Marketing Communication (IMC) context, all the elements of the marketing mix need to be integrated and co-ordinate to achieve both the marketing and organizational objectives, in targeting a specific market. Van der Waldt (2005) contextualized product placements in movie and broadcast programmers as a communication vehicle within IMC.

Since 1970s, product placement in movies existed in India. One of the famous product placements in Hindi movie was appearance of the yellow coloured 'Rajdoot' bike in the movie 'Bobby'. However the first recognized in-film placement in India was that of 'Cocacola' in the movie 'Taal' in the year 1999. Thereafter, Indian movie producers, advertisers and corporate began to show interest in this advertising technique. They started to use it as a part of their Integrated Marketing Communication Strategy and accounted for 10-15% of their total marketing budget as confirmed by report published and as quoted in book. This industry is still at its nascent stage in India. In Bollywood, 'In-film' placements help to garner business of not more than Rs.10 crore each year, which is minuscule compared to Hollywood as one of the news article confirms.

In recent time, though concept of placing brands in movies is widespread, it is not easy to determine the effectiveness of brand placements because much of the data on their effectiveness is proprietary (Karrh, 1998; Yang, Roskos-Ewoldsen, & Roskos-Ewoldsen, 2004). Consequently, very little is known about the effect of brand placements despite the dynamic nature of this practice (Babin & Carder, 1996a; Bhatnagar, Aksoy, & Malkoc, 2004; d'Astous & Chartier, 2000; Gupta, Balasubramanian, & Klassen, 2000). For

Author α: Assistant Professor, Department of Business Management, S.P. College of Engineering, Visnagar, Gujarat, India.
e-mail: crpspce@gmail.com
Author σ: Director, Gujarat Technological University, Ahmedabad, Gujarat, India.

© 2015 Global Journals Inc. (US)

example, how the brands are placed in the movie may influence their effectiveness (Ong & Meri, 1994). Thus, testing different types of brand placements has been proposed (Babin & Carder, 1996a; d'Astous & Chartier, 2000). Indeed, scholars have tested the effect of different types of brand placements such as whether the placement is visual or verbal (Gupta & Lord, 1998; Russell, 2002), the visual prominence of the placement (Brennen, Dubas, & Babin, 1999; d'Astous & Chartier, 2000; Law & Braun, 2000), and if the placement is involved in the plot of the story (Russell, 2002). It is also important to note that above studies are focused on Hollywood movies and very few have done research on hindi movies.

Many studies with content analysis of films have documented the prevalence of brand placements in films. Troup (1991) reveals brands are frequently placed in comedy movies, with an average of 18 brands per film. Sapolsky and Kinney (1994) also found an average of 14 brand placements per film in both comedies and dramas. Russell (1998) anticipated a theoretical framework for brand placement based on McCracken's meaning transfer model (1988). According to Russell, "the product meaning associated with a movie is ultimately transferred to the individual viewer."

As with the many previous studies, the main purpose of the current study was to explore the effect of brands placed in hindi movies. First, prior research suggests that how the brands were presented in the movie might lead to different responses from the audience (Russell, 2002). The current study focused on the how movie genre, type of placement and gender of viewers influence the recall of brands placed in Hindi movies. Second, the current study also explored which product categories are highly recognized by the viewers. Brand recall was used as measure of explicit memory, which has been used in measuring the effect of brand placements.

II. Literature Review

Theoretically, product placement has been defined as "a paid product message aimed at influence movie or TV audiences via the planned and unobtrusive entry of a branded product into the movie or TV programme" (Balasubramanian, 1994). Also Brand placements can be defined as ''the paid inclusion of branded products or brand identifiers, through audio and/or visual means, within mass media programming'' (Karrh, 1998, p. 33). Though, it is not stated in this definition, brand placements have been conducted for increasing brand familiarity and sales. Some of the advantages of brand placements practices include overcoming the problem of zapping because people are unlikely to change the channel or leave the room when a brand appears within a movie like they do for commercials (Avery & Ferraro 2000; d'Astous & Chartier, 2000). In addition, product placements often involve an endorsement by the celebrity using the brands which have a influence on attitudes toward the brand (Avery & Ferraro, 2000). Further, brand placements allow advertisers to target very specific audiences because the demographics of who attends what kind of movie are well understood (Nebenzhal & Secunda, 1993). Brand placements also have a longer life span than typical advertisements (Brennan et al., 1999; d'Astous & Chartier, 2000). When a movie is released as a DVD or shown on TV, the brand placement is typically still present. Finally, surveys have found that audiences like brand placements because they improve the realism of a movie or TV show (Gupta & Gould, 1997; Gupta et al., 2000; Nebenzahl & Secunda, 1993; Ong & Meri, 1994).

The research regarding the effect of brand placements on memory generally finds that memory is improved for a brand that is placed within a movie, compared with the same brand that is not placed within a movie (Karrh, 1998). However, the early research on the effect of brand placements on brand memory was mixed (Babin & Carder, 1996a, 1996b; Ong & Meri, 1994).

The inconsistency of these early findings altered the research question from whether the brand placements were effective to the factors that moderate the effect of brand placements on brand memory. Studies found that placements that are more visually prominent result in greater memory for the brand than do less prominent placements (Brennen et al., 1999; d'Astous & Chartier, 2000; Gupta & Lord, 1998; Law & Braun, 2000).

Gupta and Lord (1998) also distinguished the product placement into two modes by the strategic purpose. They based on the degree of product placement and how obvious it is. The two modes are Prominent Product Placement and Subtle Product Placement.

Above studies reveals that very little work has been done in the Indian context and on Bollywood movies. In order to fill that gap, authors have tried to investigate impact of different types of Product Placement types in Hindi Movies.

III. Development of Hypothesis

This study is designed to provide understanding of factors which may influence viewer recall of brands appeared in Hindi movies. And such understanding is important for public relations practitioners while counselling clients about strategic brand placements in movies and when they consider placement decisions within strategic public relations program planning. In this research, we examine three variables which have been little researched with respect to brand placement in Hindi movies: Movie genre (Action/ Drama/ Comedy), placement type (Prominent/Subtle), and viewer gender. Three hypotheses were developed as follows.

© 2015 Global Journals Inc. (US)

a) Movie Genre

According to Tan (1996), an important motivation for watching movies is the emotional experience they offer. Television programs and movies have been found to induce strong and enduring emotions and moods (Capentier et al., 2001; Forgas & Moylan, 1987; Goldberg & Gorn, 1987; Singh & Churchill, 1987), which have been shown to influence viewer recognition and recall (Axelrod, 1963; Gardner, 1985; Goldberg & Gorn, 1987; Kennedy, 1971; Pavelchak, Antil, & Munch, 1988; Soldow & Principe, 1981; Yuspeh, 1979). Movie genre may produce different viewer emotional reactions and recall. Today, comedy, drama, and action are the most popular categories of entertainment programming in movie and television. Comedy is the most popular movie genre with audiences (Zillmann, 2000). Comedy provides memory escape from real life and elicits laughter through exaggeration of situation, characters action and language. Action movies, on the other hand, supply a different mood to viewers by using non-stop motion, chase scenes, frequent stunts fights, and spectacular sounds and rhythms compared to other genre (Dirks, 2000). Drama is the largest movie genre (Dirks, 2000) and it invites more audience involvement (Vorderer & Knobloch, 2000), it is most frequently used movie genre for placing brands in movies (Sapolsky & Kinney, 1994), the following hypothesis is proposed:

H1: Viewer recall scores will be significantly higher for brands placed in drama movies than in other movie genres.

b) Placement Type

Most recall studies suggest that viewers do recognize and recall brands, products, and services placed in movies. For example, Steortz (1987) used telephone and theatre exit surveys to test brand recall, finding that aided recall averaged about 38% among audiences and that recall was affected by prominence of product placement in the movie. Similarly, Zimmer and Delorme (1997) found in a movie clip experiment that viewers recalled about 33% of brands and recognized 55% of brands. Viewer recall appeared to be affected by prominence of the displayed brand, whether or not brands were mentioned verbally, and the extent of character involvement with the brand. In another movie clip experiment, more than 90% of viewers were able to recall products (Vollmers & Mizerski, 1994). Children also recognized and recalled brands, products, and services (Vollmers, 1995).

H2: Viewer recall scores will be significantly higher for brands placed in prominent type than in subtle type.

c) Gender Differences

Several studies have examined relationships between viewer gender and movie genre. Richards and Sheridan (1987) examined the appeal of different movie genres using a sample of 550 moviegoers. They found that females preferred romance, history, and love story themes, while males preferred action, crime, and sex story themes. In studying gender differences regarding the enjoyment of sad or unhappy movies (dramas), Oliver (1993) demonstrated that males are less involved with, less interested in, less emotionally responsive to, and take less enjoyment in sad movies compared to females. Such differences in involvement, interest, and emotional responses suggest the following hypotheses regarding viewer gender and brand placement in movies:

H3: There is Significant difference between recall scores different Genders.

IV. Research Methodology

a) Participants

One hundred and thirty seven Post graduate students pursuing their MBA participated in this study. The sample had 94 females and than 43 males and all the participants ranged in age from 20 to 24 years. Members of this age group attend movies at least one each month and are referred to as the "target market" for many movies (Dortch, 1996). Upon arrival at a classroom, participants were randomly assigned movie clips to view and assess. Through this process, 53 respondents were assigned to action movie, 43 to comedy, and 41 to drama.

b) Selection of Movies

3 Hindi movies (one per each genre) were selected and edited to 10 minutes in length. Ten-minute movie clips are long enough to induce various emotions and present genre's differences (Gunter, Furnham, & Beeson, 1997; Kennedy, 1971). Most experimental studies use movie clips ranging from 5–30 minutes in length. The 4 movies used for the movie clips were drawn from the list lists of box office hit movies. The genre of each movie was determined by using Dirks's (2000) comprehensive movie classification system and by assessing the distinguishing characteristics of the movie content. Also Product placement type was determined with help of experts of the topic.

The movies and brands used and type of placement in the experiment are listed in Table 1. Most of the selected brands are very familiar to customers, and this may have reduced the potential for variance of recall among brands.

© 2015 Global Journals Inc. (US)

Table 1 : Product Placement Type & Modes in Selected Movies

Movie name	Products	Brand name	Product Placement Type
Ajab Prem ki Gajab Kahani (Drama)	Soft drink	Pepsi	Prominent
	DTH service	Reliance big TV	Subtle
	Ice Cream	Baskin Robbins	Subtle
	Coffee	Nescafe	Prominent
Kaminey (Action)	Mobile Handset	Samsung	Prominent
	Radio FM	93.5 FM	Subtle
	DTH service	Reliance big TV	Subtle
	Two wheeler	Pleasure	Prominent
All the best (Comedy)	Apparels	Barcelona	Prominent
	LCD TV	Samsung	Subtle
	Wrist watch	Rolex	Prominent
	Airlines	Kingfisher, Jet airways	Subtle

c) Procedure

The experiment was conducted in classroom and clips were shown to participants with the help of projector with sound system. Before movie clips were shown, the researchers briefly informed participants about the movie titles and shared short movie descriptions. The goal of the experiment was not revealed. After viewing the 10-minutes movie clips, respondents completed a brief questionnaire. The questionnaire asked respondents to recall brands for the given product categories. Here product categories were given as clue for recalling brands. Respondents also were also asked to indicate age and gender.

Viewer recall and recognition have long been used as indicators of potential effectiveness (Rossiter & Percy, 1997; Stewart, Ratneshwar, Strow, & Bryant, 1985), and in brand placement studies, aided recall, unaided recall, and recognition tests have been used extensively.

Each respondent's combined score in recall tests was used as the dependent variable. The range for possible scores was 0 to 4 because each movie clip was featuring four brands. Genre, Placement type, and gender were used as independent variables in each analysis. Data analysis was performed using SPSS. To test the hypotheses, ANOVA tests and t-tests were performed with the recall scores as the dependent variable.

V. Results

a) Movie Genre and Brand Recall

The one way analysis of variance test was used to compare differences in brand recall scores according to genre (Table-2). Means for the three genres were: action (2.53), comedy (3.00), and drama (3.08). The difference between mean brand recall scores for drama and action movies is statistically significant (F 2, 2.810, p. < .05), while differences between means for comedy and drama movies, and comedy and action movies, are not significant. Thus, respondents demonstrated significantly higher recall scores for brands in drama versus action movies, and H1 is partially supported.

Table 2 : One way ANOVA for Recall Scores Between Different Movie Genres

Source	SS	Df	MS	F
Between Groups	14.23	2	7.43	2.80*
Within Groups	233.43	134	1.53	
Total	250.42	136		

*$*p < .05$.

b) Placement Type and Brand Recall

The One way ANOVA test was used to compare differences in brand recall scores according to placement type genre (Table-3). Means for the two placement type were: Subtle (2.40), and Prominent (3.60). This difference between mean brand recall scores for Prominent and subtle placement type is statistically significant (F 2, 3.58, p. < .05), thus, respondents demonstrated significantly higher recall scores for brands placed in prominent type than in subtle type, and H2 is strongly supported.

© 2015 Global Journals Inc. (US)

Table 3 : One way ANOVA for Recall Scores Between Different Placement Types

Source	SS	Df	MS	F
Between Groups	14.23	2	7.43	3.58*
Within Groups	233.43	134	1.53	
Total	250.42	136		

*$p < .05$.

c) *Gender of viewers and Brand Recall*

Anticipated differences in brand recall by gender were not found. Though mean brand recall scores for male respondents were higher those of female respondents (Table-4), but the differences were not statistically significant. Thus, H3 was not supported.

Table 4 : Brand Recall According to Gender

Gender	Mean	SD	N
Male	3.30	1.11	43
Female	3.10	1.26	94

VI. Discussion

The goal of this study was to examine whether movie genre, placement type, and viewer gender influenced brand recall, all factors which might be considered by practitioners during strategic decision making and which have been little researched. Results suggested that brand recall scores are highest in drama movies for both genders, and dramas may therefore provide better placement opportunities for some brands and products. Further it reveals that placing products prominently in movies generate higher recall than placing subtly.

Finally, Research presented here could be improved in several respects. First, the intensity of viewer emotion was not examined, and emotional intensity during encoding has been shown to influence the extent to which stimuli are recalled (Dutta & Kanugo, 1975). The specific mood states induced by different movie genres need further investigation. Second, movie involvement and interest are other important variables, and these were not studied. The degree of viewer involvement with, a movie and product can be important factors in brand recall (Gunter & Wober, 1992). Similarly, Gunter et al. (1997) demonstrated that audience evaluation of programs was significantly related to advertising recall.

References Références Referencias

1. Avery, Rosemary J., & Rosellina Ferraro (2000). "*Verisimiltude or Advertising? Brand Appearances on Prime-Time Television*", in: *Journal of Consumer Affairs*, 34(2).
2. Babin, L. A., and S. T. Carder (1996b). "*Advertising Via the Box Office: Is Product Placement Effective?*" Journal of Promotion Management 3(1/2): 31-51.
3. Babin, L. A., and S. T. Carder (1996a). "*Viewers' Recognition of Brands Placed Within a Film*." International Journal of Advertising 15: 140-151.
4. Balasubramanian, Siva K. (1994). "*Beyond Advertising and Publicity: Hybrid messages and Public Policy Issues*", in: *Journal of Advertising,* 32(4).
5. Bhatnagar, N., L. Aksoy, & S.A. Malkoc (2004). "*Embedding Brands Within Media Content: The Impact of Message, Media, and Consumer Characteristics on Placement Efficacy*", in: Shrum (ed.). The Psychology of Entertainment Media: Blurring the Lines between Entertainment and Persuasion. Mahwah, NJ: Lawrence Erlbaum.
6. Brennan, I., Dubas, K.M., Babin, L.A., 1999. "*The influence of product-placement type and exposure time on product-placement recognition*". International Journal of Advertising 18, 323-337.
7. Capentier, F., Yu, H., Butner, R., Chen, L., Hong, S., Park, D. -J., & Bryant, J. (2001, April). "*Dimensions of the entertainment experience factors in the enjoyment of action, comedy, and horror films*". Paper presented at the Broadcasting Education Association 46th Annual Convention, Las Vegas, Nevada.
8. D'Astous, Alain, & Chartier, F. (2000). "A study of Factors Affecting Consumer Evaluations and Memory of Product Placements in Movies". Journal of Current Issue and Research in Advertising, 22(2), 31-40.
9. Dirks, T. (2000). "*Main film genres*". Retrieved from http//:www.filmsite.org/genres.html
10. Dortch, S. (1996, December). "*Going to the movies*". *American Demographics*, *18*(12), 4–8.
11. Dutta, S., & Kanugo, R. N. (1975)." *Affect and memory: A reformulation*". Oxford, UK: Pergamon.
12. Forgas, J. P., & Moylan, S. J. (*1987). "After* the movie: The effects of transient mood states on social judgments". *Personality and Social Psychology Bulletin*, *13*, 478–489.
13. Goldberg, M. E., & Gorn, G. J. (1987). "*Happy and sad TV programs: How they affect reactions to commercials*." *Journal of Consumer Research*, *14*(3), 387–403.
14. Gunter, B., & Wober, M. (1992). *The reactive viewer*. London, UK: John Libbet.
15. Gunter, B., Furnham, A., & Beeson, C. (1997). *"Recall of television advertisements as a function of program evaluation". Journal of Psychology*, *131*(5), 541–553.
16. Gupta Pola B, Siva K. Balasubramanian, and Michael L. Klassen (2000), "*Viewers' Evaluations of Brand Placements in Movies: Public Policy Issues*

© 2015 Global Journals Inc. (US)

and Managerial Implications," Journal of Current Issues and Research in Advertising, 22 (2), 41–52.

17. Gupta, P. B., & Lord, K. R. (1998). "*Product Placement in Movies: The Effect of Prominence and Mode on Audience Recall*." Journal of Current Issues and Research in Advertising, 20(1), 47-59.
18. Gupta, Pola B. and Stephen J. Gould (1997), "*Consumers' Perceptions of the Ethics and Acceptability of Brand Placements in Movies: Brand Category and Individual Differences,*" Journal of Current Issues and Research in Advertising, 14, 37–50.
19. Karrh, J. A. (1998). "*Brand Placement: A Review*." Journal of Current Issues and Research in Advertising 20(2): 31-49.
20. Kennedy, J. R. (1971). "*How program environment affects TV commercials*." *Journal of Advertising Research*, *11*(1), 33–38.
21. Law, Sharmistha, and Kathryn A. Braun (2000), "*I'll Have What She's Having: Gauging the Impact of Product Placements on Viewers*," Psychology and Marketing, 17 (12), 1059-1075.
22. Litman, B. R. (1998). "*Themotion picture mega-industry"*. Needham, MA: Ally & Bacon.
23. McCracken, G. (1988). "*Culture and consumption: New approaches to the symbolic character of consumer goods and activities"*. Bloomington, IN: Indiana University Press.
24. Nebenzahl, I. D., and E. Secunda (1993). "*Consumers' Attitudes toward Product Placement.*" International Journal of Advertising 12(1): 1-12.
25. Oliver, M. B. (1993). "*Exploring the paradox of the enjoyment of sad films"*. *Human Communication Research*, *19*(3), 315–342.
26. Ong, B. S., and D. Meri (1994). "*Should Product Placement in Movies be Banned?*" Journal of Promotion Management 2(3/4): 159-175.
27. Pavelchak, M. A., Antil, J. H., & Munch, J. M. (1988). "*The Super Bowl: An investigation into the relationship among program context, emotional experience, and ad recall"*. *Journal of Consumer Research*, *15*(3), 360– 367.
28. Richards, J., & Sheridan, D. (1987). "*Mass observation at the movies"*. London, UK and New York, NY: Routledge & Kegan Paul.
29. Rossiter, J. R., & Percy, L. (1997). "*Advertising communications & promotion management"* (2nd Ed.). Boston, MA: McGraw-Hill.
30. Russell, C. A. (1998). "*Toward a framework of product placement: Theoretical proposition." Advances in Consumer Research*, *25*(1), 357–362.
31. Russell, C.A. (2002). "*Investigating the Effectiveness of Product Placement in Television Shows: The Role of Modality and Plot Connection Congruence on Brand Memory and Attitude*". Journal of Consumer Research, 29, 306-318.
32. Sapolsky, B. S., & Kinney, L. (1994). "*You oughta be in pictures: Product placements in the top grossing films of 1991"*. In K. W. King (Ed.), *Proceedings of the 1994 conference of the American Academy of Advertising* (p. 89). Athens, GA: American Academy of Advertising.
33. Singh, S. N., & Churchill, G. A. (1987). "*Arousal and advertising*". *Journal of Advertising*, *16*(1), 4–10.
34. Soldow, G. F., & Principe, V. (1981, April). "*Response to commercials as a function of program context"*. *Journal of Advertising Research*, *21*(2), 59– 65.
35. Steortz, E. M. (1987). "*The cost efficiency and communication effects associated with brand name exposure within motion pictures". (Unpublished master's thesis)*. University of West Virginia, Morgantown, WV.
36. Stewart, D. W., Ratneshwar, S., Strow, J., & Bryant, B. (1985). "*Methodological and theoretical foundations of advertising copy testing: A review*". *Current issues and research in advertising*, *2*, 1–75.
37. Tan, E. S. (1996). "*Emotion and the structure of narrative film: Film as an emotion machine*". Mahwah, NJ: Lawrence Erlbaum.
38. Troup, M. L. (1991). *The captive audience: A content analysis of product placement in motion pictures*. (Unpublished master's thesis). Florida State University, Tallahassee, FL.
39. Van der Waldt DLR (2005). "*The role of product placement in feature films and broadcast television programmes: an IMC perspective.*"Journal for Communication Sciences in Southern Africa 24 (1) / Jul: 1-16.
40. Vollmers, S. (1995). "*The impact on children of brands and product placements in films*". (Unpublished doctoral dissertation). Florida Sate University, Tallahassee, FL.
41. Vollmers, S., & Mizerski, R. (1994). *"A review and investigation into the effectiveness of product placements in films*". In K. W. King (Ed.), *Proceedings of the 1994 conference of the American Academy of Advertising* (pp. 97–102). Athens, GA: American Academy of Advertising.
42. Vorderer, P., & Knobloch, S. (2000). "*Conflict and suspense in drama"*. In D. Zillmann & P. Voder (Eds.), *Media entertainment: The psychology of its appeal* (pp. 59–72). Mahwah, NJ: Lawrence Erlbaum.
43. Yang, M., B. Roskos-Ewoldsen, & D.R. Roskos-Ewoldsen (2004). "*Mental Models for Brand Placement*", in: Shrum (ed.). *The Psychology of Entertainment Media: Blurring the Lines Between Entertainment and Persuasion*. Mahwah, NJ: Lawrence Erlbaum.
44. Yuspeh, S. (1979). "*The medium versus the message"*. In G. Hafer (Ed.), *A look back, a look ahead, proceedings of the 10th National Attitude Research Conference* (pp. 109–138). Chicago, IL: American Marketing Association.

© 2015 Global Journals Inc. (US)

45. Zillmann, D. (2000). "*Humor and comedy*". In D. Zillmann, & P. Voder (Eds.), m*edia entertainment: The psychology of its appeal* (pp. 37–57). Mahwah, NJ: Lawrence Erlbaum.
46. Zimmer, M. R., & DeLorme, D. (1997, August). "*The effect of brand placement type and a disclaimer on memory for brand placements in movies*". Paper presented at Association for Education in Journalism and Mass Communication Annual Conference, Chicago.

© 2015 Global Journals Inc. (US)

This page is intentionally left blank

© 2015 Global Journals Inc. (US)

Global Journal of Management and Business Research: E Marketing
Volume 15 Issue 7 Version 1.0 Year 2015
Type: Double Blind Peer Reviewed International Research Journal
Publisher: Global Journals Inc. (USA)
Online ISSN: 2249-4588 & Print ISSN: 0975-5853

Effectiveness of Push (SMS) Service: A Study on Grameenphone and Airtel Subscribers of Bangladesh

By Md. Touhidul Islam & Md. Asfaqur Rahman

Pabna University of Science & Technology, Bangladesh

Abstract- The rapid increase of the use of mobile phones has created a new channel for marketing. SMS Marketing can be an effective medium of advertising in Bangladesh. The use of Short Messaging Service (SMS) has become more important to access potential customers through their mobile phones. The purpose of this paper is to measure & compare the effectiveness of push (SMS) service between Grameenphone and Airtel Telecommunication Company of Bangladesh. Results show that in most of the dimensions of push service like language of push SMS, degree of customers' irritation, degree of annoying, social, educational and govt. information, relevancy to customers' life style, Airtel is lagging behind GP. Being the young company, Airtel is in the good position regarding information about service activation & deactivation, customer satisfaction level, special offer and advance permission. Most of the dimensions do not match with the effectiveness of push services especially customers of both companies are irritated and annoyed about push SMS. So in case of overall evaluation for both companies the effectiveness of push service is not in satisfactory level.

Keywords: *push marketing, sms, grameenphone, airtel, medium of advertising.*

GJMBR - E Classification : *JEL Code : M37*

EFFECTIVENESSOFPUSHSMSSERVICEASTUDYONGRAMEENPHONEANDAIRTELSUBSCRIBERSOFBANGLADESH

Strictly as per the compliance and regulations of:

© 2015. Md. Touhidul Islam & Md. Asfaqur Rahman. This is a research/review paper, distributed under the terms of the Creative Commons Attribution-Noncommercial 3.0 Unported License http://creativecommons.org/licenses/by-nc/3.0/), permitting all non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.

Effectiveness of Push (SMS) Service: A Study on Grameenphone and Airtel Subscribers of Bangladesh

Md. Touhidul Islam [α] & Md. Asfaqur Rahman [σ]

Abstract- The rapid increase of the use of mobile phones has created a new channel for marketing. SMS Marketing can be an effective medium of advertising in Bangladesh. The use of Short Messaging Service (SMS) has become more important to access potential customers through their mobile phones. The purpose of this paper is to measure & compare the effectiveness of push (SMS) service between Grameenphone and Airtel Telecommunication Company of Bangladesh. Results show that in most of the dimensions of push service like language of push SMS, degree of customers' irritation, degree of annoying, social, educational and govt. information, relevancy to customers' life style, Airtel is lagging behind GP. Being the young company, Airtel is in the good position regarding information about service activation & deactivation, customer satisfaction level, special offer and advance permission. Most of the dimensions do not match with the effectiveness of push services especially customers of both companies are irritated and annoyed about push SMS. So in case of overall evaluation for both companies the effectiveness of push service is not in satisfactory level. The findings of this study necessitate the ways for Airtel as well as GP to adopt customer-centric strategic approach through competitive offerings & quality services to enhance the customer attractiveness towards push SMS and improve the effectiveness of push service. The study will contribute significantly regarding the policy making of the business professionals, advertising professionals as well as Telecommunications Company (especially GP & Airtel) in selecting, evaluating and establishing the proper SMS marketing and push service methods.

Keywords: push marketing, sms, grameenphone, airtel, medium of advertising.

I. Introduction

Over the last few years, the number of mobile subscribers in Bangladesh has been more than or close to more than doubling on an annual basis. The subscriber base had reached 119.623 million at the end of November 2014and is continuing to grow at a fast rate. Individually, Bangladesh's leading mobile operator, Grameenphone, has 51.119 Million customers, Banglalink has 30.681 Million, Robi has 25.251 Million and Airtel has 7.468 Million subscribers. On the other side, City cell, Bangladesh oldest mobile operator, has added 1.306 Million subscribers and finally Government phone company Tele talk has 3.805 Million subscribers.

Operator		Subscriber(in million)
1.	GP	51.112
2.	Bangla Link	30.681
3.	Robi	25.251
4.	Airtel	7.468
5.	Citycell	1.306
6.	Teletalk	3.805

Source: www. Btrc.gov.bd/content/mobile phone_ subscribers (November 2014)

Bangladeshi Mobile Phone Company takes these huge mobile phone subscribers as the source or medium to reach the enormous people to conduct Mobile marketing. Mobile advertisers can deliver timely phone message service (SMS) ads to consumers based on their demographic characteristics and geographic information. Worldwide, wireless advertisers have already integrated SMS into the media mix. As the mobiles are in high use, advertising companies are also running after people who use mobile phones. Mobiles were invented for the purpose of communications only but on the way they have got a new dimension. This dimension is that mobiles are used for advertisement. Most of the companies have started sending promotional messages in the form of SMS to people because of today mobile marketing is one of the cheapest means of advertisements. Mobile marketing can be done through SMS, MMS, Voice call etc. Also, people keep mobiles with them, and hence, as soon as people get messages on their cell phones they instantly check their messages. Moreover, mobile marketing saves much time.

Companies through push marketing can make people to read their promotional messages. Grameenphone is the leading mobile phone company

Author α: Student, BBA, MBA from Department of Business Administration, Pabna University of Science & Technology.
e-mail: touhidpust@gmail.com
Author σ: Lecturer, Department of Business Administration, Pabna University of Science & Technology.

© 2015 Global Journals Inc. (US)

as well as Airtel is the growing mobile phone company in Bangladesh. Both companies conduct their push marketing activity to their subscribers. Although today pull marketing is the new concept in the market but both push Marketing &pull marketing are used by those company. The effectiveness of push Marketing varies from company to company. This paper will show the comparative effectiveness of push marketing between Grameenphone and Airtel mobile company. Hence, Present study emphasizes and tries to measure the Effectiveness of push Marketing of GP and Airtel Company towards the customers.

a) Research Problem

The present study is basically a customer survey, conducted with the objective of knowing the customer opinion about the effectiveness of push marketing of cellular phone service providers. Today there is a stiff competition prevailing among the cellular phone service providers. Hence under this scenario, it is important to know the factors that impact on the push marketing towards potential customer as well as to know the effectiveness of push (SMS) Marketing of selected mobile phone company(GP and Airtel) which are the leading and growing mobile phone operator of telecom service in Bangladesh.

b) Significance of the Study

This paper will help the telecom industry to know the current scenario of customer opinion about their push service as well as it helps to understand them assess their comparative position in context of push marketing.

c) Objectives of the Study

The general objective of this research is to assess the effectiveness of push marketing toward potential customer of GP and Airtel.

Specifically, the study is aimed at the following objectives:

- To know about the overview of Grameenphone and Airtel company.
- To determine and compare the perception of mobile phone users in Bangladesh about push service in respect of selected variables with regard to GP and Airtel.
- To know about the level of Performance & Effectiveness of GP and Airtel regarding the push service.
- To make a comparison between Grameenphone and Airtel in the context of push service by analyzing customer opinion and experience.
- To evaluate the overall position and measure the effectiveness of push services for both companies.
- To provide some recommendations to increase the effectiveness of push service of Grameenphone and Airtel Company in regard to the selected variables.

d) Scope of the Study

The scope of the research is based on two mobile phone companies and it throws light on the effectiveness of push marketing with respect to Grameenphone and Airtel Company. The report is written from the point of view of Grameenphone & Airtel users of Pabna city from Bangladesh. This report will represent the overall condition of effectiveness of push service of mobile phone subscribers based on the survey conducted over 100 mobile phone users.

e) Limitations of the Study

- The study concentrates only on the customers of GP and Airtel of Pabna city in Bangladesh.
- Due to time constraints it is not possible to cover vast area. So that survey has limited scope for application in wide market.
- Few customers are hesitate to deliver some information's due to the time wasted in the providing the same.
- Cost constraints leads to reduction in number of respondents.

II. Organizational Overview

a) Overview of Grameenphone

Grameenphone Ltd., the largest telecommunications service provider in Bangladesh received its operating license in November, 1996 and started its operations from March 26, 1997, the Independence Day of Bangladesh. Grameenphone was also the first operator to introduce the pre-paid service in September 1999. Today, Grameenphone is the leading telecommunications service provider in Bangladesh with more than 51.112 million subscribers as of November 2014 (http://www.btrc.gov.bd). It is a joint venture enterprise between Telenor and Grameen Telecom Corporation, a non-profit sister concern of the internationally acclaimed microfinance organization and community development bank Grameen Bank. Telenor, the largest telecommunications company in Norway, owns 55.8% shares of Grameenphone; Grameen Telecom owns 34.2% and the remaining 10% is publicly held.

Since its inception Grameenphone has built the largest cellular network in the country with over 13,000 base stations in more than 7000 locations. Presently, nearly 98 percent of the country's population is within the coverage area of the It established the first 24-Hour Call Center, introduced value-added services such as VMS, SMS, fax and data transmission services, international roaming service, WAP, SMS-based *Push-pull* services, EDGE,3G, personal ring back tone and many other products and services.

© 2015 Global Journals Inc. (US)

Grameenphone at a Glance

The full name:	Grameenphone Ltd
Head Office:	Clebration Point, Plot # 3&5, Rode # 113/A, Gulshan-2,Dhaka - 1212,Bangladesh
Date of incorporation:	November 28, 1996
Service Launched:	March 26, 1997
Product & Services:	More than 50 products, services, promotions and features, Grameenphone customer centers in 6 Divisional cities, 600 Service Desk all over the country.
No of divisions:	11
No of Subscribers:	51.112 millions
Shareholders:	Telenor (62%), Grameen telecom (38%)
Vision:	We're here to help (This vision crystallizes customer focus as the Cornerstone of everything they do: helping customers get the full benefit of communications in their daily life.
Values:	Make it Easy; Keep Promises, Be Inspiring, Be Respectful
Website	http://www.Grameenphone.com

Source: (http://www.Grameenphone.com)

i. *Grameen Phone's Value Added Services*

SMS (Phone Message Service), SMS Push-Pull Services: By using people can enjoy more than 160 contents (Ex: Sports news, Emergency numbers, Restaurants. Airline and Railway timing, Travel info etc.), Voice Mail Service (VMS), Fax and Data, Wireless Application Protocol (WAP), News Service Event Based sports Update (2002), Iftar and Sehri Timings (1515), Bangla SMS, Apps & Gams, Lifestyle Content, Financial services.

b) Overview of Airtel

Airtel, formerly known as Warid Telecom, is a *GSM* and *3G* based cellular operator in *Bangladesh*. Airtel is the sixth mobile phone carrier to enter the Bangladesh market, and originally launched commercial operations under the brand name Warid on May 10, 2007. In 2010, *Bharti Airtel* bought out majority share of the company. As of August 2013, Airtel Bangladesh has 7.97 million subscribers with 7.3% of market share. Warid Telecom International, an Abu Dhabi based consortium, sold a majority 70% stake in the company to India's Bharti Airtel Limited. Bharti Airtel is making a fresh investment of USD 300 million to rapidly expand the operations of Warid Telecom. This is the largest investment in Bangladesh by an Indian company. This is Bharti Airtel's second operation outside of India. Dhabi Group continues as a strategic partner retaining 30% shareholding and has its nominees on the Board of the Company. Bharti Airtel Limited took management control of the company and its board, and rebranded the company's services under its own Airtel brand from December 20, 2010. The Bangladesh Telecommunication Regulatory Commission approved the deal on Jan 4, 2010. The company offers a wide array of innovative mobile services, including voice, value added services, data and m-commerce products and is focused on expanding its state-of-the-art mobile network both for coverage and capacity.

With a customer base of more than 7.468 million (www.btrc.gov.bd), Airtel Bangladesh is the most preferred youth brand of the country that thrives on excellent data service. And data experience with Airtel will only be better when the company will introduce its array of 3G services. To make customers' lives easier Airtel Bangladesh has Doorstep Service by which customers can enjoy all kinds of service at their preferred place. M-Commerce opened a new Horizon in money transfer that gives Airtel customers the freedom to send money to their dear ones instantly from their mobile. Through M-health, customers can now reach professional doctors over phone 24/7 and get basic treatment. To enrich the lives of the customers Airtel has 7 Airtel Experience Centers (AEC) and 77 Airtel Relationship Centers (ARC) across the country and our corporate office is situated in Banani (House 34, Road 19/A), Dhaka 1213, Bangladesh.

Airtel Bangladesh Ltd. at a Glance

Type:	Private
Industry:	Telecommunication
Founded:	December 1, 2010 (Registration date)
Headquarters:	House 34, Road 19/A, Banani, Dhaka 1213, Bangladesh
Products:	Telephony, mobile telephony
Total subscriber:	7.468 million (November 2014)
Website:	http://www.bd.airtel.com

Source: www. bd. Airtel.com

i. *Airtel's Value Added Services*

Voice Mail Service (VMS), Short Message Service (SMS), Multimedia Message Service(MMS), Tunes, Data service, Sports, News update, Astrology, Travel, Finance, Information service, Location based service, Research & bill pay service.

© 2015 Global Journals Inc. (US)

III. Review of Related Literature and Origin of Push Marketing

a) *Mobile Advertising*

Traditionally, the purpose of advertising has been to communicate brand messages to consumers in order to understand the communication process behind advertising [Shannon's (1948)]. Advertising, in today's business world is the most prioritize filed that a business normally concentrate and put large emphasize on that. During recent years, the popularity of text messaging (SMS) has grown exponentially, which has led to the rise of the mobile advertising phenomenon [James, 2004]. Chang and Villegas (2008) argue that the mobile phone has tremendous potential for delivering advertisements because of its high penetration rate.

b) *SMS Advertising*

In this competitive world, where in each step you will find competition. In order to have win-win position in this competitive world there should be some strong weapons to be used to have winning edge. One of the strong weapons is advertising through SMS. In the current scenario people are lacking time, there is a very urgent need for quick and effective communication system. Bulk SMS Solutions are considered as the safest and quickest mode of communication. The marketer shave found a new way of advertising to reach the consumers with the growth in the cellular market. Millions of SMS or more are sent in a month. SMS advertising has emerged as the most suitable and effective medium for advertising due addiction towards SMS and its popularity among youths. According to the GSM association, the cellular phone users send 10 million or more SMS in a month. The addiction towards SMS and its popularity among youths has contributed to SMS advertising to emerge as the most suitable and effective medium for advertising. The SMS has emerged as marketing communication phenomenon for the advertisers to reach their clients anywhere, anytime. One can use SMS gateways to generate the maximum awareness in client's mind with the minimum possible costs. The SMS gateway can also be used for brand recalling. According to the research the text message advertisements have found to boost the clients' inclination to purchase by 36% which explains its popularity among marketers. This is perhaps because SMS advertising is the most popular form of mobile advertising [Scharl, 2005].

c) *Origin of Push Marketing*

Actually push marketing concept comes from mobile advertising or mobile marketing. Mobile marketing is can be defined as "Using interactive wireless media to provide customers with time and location sensitive, personalized information that promotes goods, services and ideas, thereby generating value for all stakeholders" This definition includes an important concept of adding value not just for the marketing party, but also for the consumer.

Mobile marketing can be categorized into two types one is push marketing and other is pull marketing.

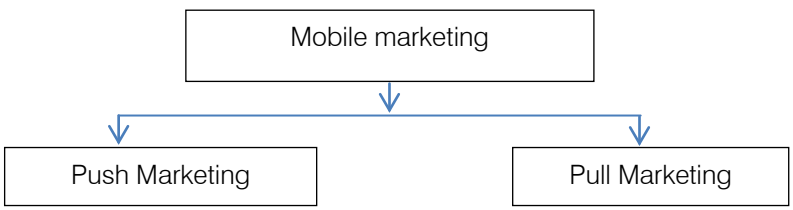


Figure 1 : Types of mobile Marketing

d) *Push-Pull Marketing*

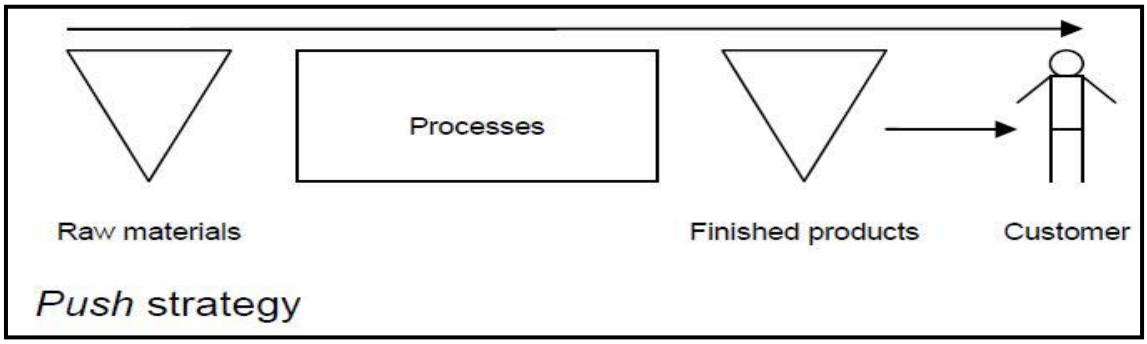
Mobile advertising can be categorized into two basic types: Push and Pull [Wallace et al., 2002?].Providers can take the form of pull-based (user request information and services based on their locations) or Push-based (location-sensitive content is automatically sent to users based on their location) advertising. Push advertising without any filtering is something like spam e-mail which might be perceived as annoying or irritating. Lawer and Knox (2006) describe Push marketing as company centric marketing strategies that push the benefits of company offerings to specific marketing segments. When defining mobile marketing a further distinction can be made between push and pull marketing campaigns. Lawer and Knox (2006) describe Push marketing as company centric marketing strategies that push the benefits of company offerings to specific marketing segments.

i. *Push Marketing*

Push marketing focuses on taking the product to the customer, and putting the product in front of the customer at the point of purchase. This type of marketing strategy hopes to minimize the amount of time between a customer discovering a product and buying that product. To accomplish this, companies use aggressive and wide-reaching ads to make the biggest and most immediate impact they can on customers. Node performs order planning for succeeding node. Like stated by Bonney et al. (1999) control information flow is in the same direction of goods flow. Push Marketing sounds much more aggressive than it actually is It creates a situation within the retail environment

© 2015 Global Journals Inc. (US)

where the manufacturer and the retailer work together to promote one specific product model or entire product line. This strategy makes use of a company's sales force, trade promotion activities, and promotional relationships to create consumer demand for a product (i.e. sales incentives/spiffs, coupons or discounts, and heavy product training for retail staff).With a Push strategy, the producer (1) promotes the product to wholesalers, the wholesalers to the retailers, and the retailers to the consumers, and (2) sets production levels based on the wholesalers and/or retailers' historical ordering patterns and product sales, and forecasted demand. Often it takes time for Push-based supply to respond to changes in demand, as they are basing their inventory on historical data.



Source : Elaboration of A. by P. G. Brabazon, B. Mac Carthy, Order Fulfillment Models from the Catalog Mode of Mass Customization –A Review, in T. Blecker, G. Friedrich (eds.), Mass Customization: Challenges and Solutions, Springer, New York, 2006, pp. 211-231, p. 214.

Fig. 3 : Push strategies

Often manufacturers look at incorporating a Push strategy into their overall marketing efforts when:

- Consumers do not know their product's brand, benefits or How to use it and therefore need to be educated;
- Consumers are price sensitive;
- They are competing with an industry leader that has a large marketing budget; or when their goal is to inspire trial with the hope of building long-term product loyalty.

ii. *PULL Marketing*

Pull marketing, on the other hand, takes the opposite approach. The goal of pull marketing is to get the customers to come to you, hence the term pull, where marketers are attempting to push customers in. Common sales tactics used for push marketing include mass media promotions, word-of-mouth referrals and advertised sales promotions. From a business perspective, pull marketing attempts to create brand loyalty and keep customers coming back, whereas push marketing is more concerned with phone-term sales. Pull Marketing creates a situation in which consumers knowingly request a branded product and "pull" it through the distribution channel. For this strategy to work, manufacturers must build consumer demand through heavy (and often expensive) advertising and promotional campaigns. A pull strategy could arguably be more effective than a push strategy because it is easier to sell to a consumer who has a strong positive view of the product. However, creating this positive impression often requires a high amount of exposure over a long period of time.

Often manufacturers look to use mediums such as:

- Mass advertising
- Word of mouth or buzz marketing
- Image advertising
- In-store advertising, sampling, demonstrations
- Viral marketing (getting decision makers and influencers to become advocates)

Although this sounds easy, it often takes considerable time and resources to build awareness for a product to the point where it is identifiable by consumers. Often manufacturers will look at incorporating a push strategy when:

- Consumers want to purchase the product because of a strong affiliation to the brand.
- They have created a product that is easily differentiated and identifiable from competitor products.
- They have adequate funds to support a large advertising campaign.

e) *Short Message Service (SMS)*

SMS is a text messaging service component of phone, Web, or mobile communication systems. It uses standardized communications protocols to allow fixed line or mobile phone devices to exchange phone text messages. SMS was the most widely used data application, with an estimated 3.5 billion active users, or about 80% of all mobile phone subscribers at the end of 2010. The term "SMS" is used for both the user activity and all types of phone text messaging in many parts of

© 2015 Global Journals Inc. (US)

the world. SMS is also employed in direct marketing, known as SMS marketing. SMS in subscriber mobile acts like an advanced pager. Subscriber can send and receive text messages of up to 160 characters. Subscriber can use your mobile phone attached to a computer to send faxes or transfer date, even they need not to be connected with a fixed line.

f) Voice Mail Service (VMS)

VMS is a unique answering machine. It provides subscriber with a personal electronic mail box in our voice mail center. When subscriber is not available or outside the coverage area or simply busy even switch off his or her cell phone, the caller can leave a message in subscriber's voice mailbox, which subscriber may listen or retrieve at subscriber's convenience. It provides 24- Hour automatic secretarial service makes one available to his calling person anytime. When users are unreachable or unable to answer any call within 20 s, the service will automatically divert the call to voice mail. User will receive a SMS notifying us that we have a message and we may retrieve it at a convenient time.

g) Multimedia Message Service (MMS)

Multimedia message service (MMS) on the other hand, provides more visual and active messages. Marketers can benefit from use of photos, music, logos and animation, videos in advertising to consumers' mobile phones. SMS and MMS advertising are expected to achieve higher response rates compared to e-mail or television advertising, because all advertisements can be sent personally [Zabadi, Shura & Elsayed, 2012]. MMS mobile marketing can contain a timed slideshow of images, text, audio and video. This mobile content is delivered via MMS (Multimedia Message Service). Nearly all new phones produced with a color screen are capable of sending and receiving standard MMS message. Brands are able to both send (mobile terminated) and receive (mobile originated) rich content through MMS A2P (application-to-person) mobile networks to mobile subscribers. MMS mobile marketing can contain a timed slideshow of images, text, audio and video. This mobile content is delivered via MMS (Multimedia Message Service). Nearly all new phones produced with a color screen are capable of sending and receiving standard MMS message. Brands are able to both send (mobile terminated) and receive (mobile originated) rich content through MMS A2P (application-to-person) mobile networks to mobile subscribers. In some networks, brands are also able to sponsor messages that are sent P2P (person-to-person).

h) Voice Call

Actually voice call is a service provide by mobile phone operator that enables people to communicate and exchange their voice by using transmission frequency. The 3GPP has defined the Voice Call Continuity (VCC) specifications in order to describe how a voice call can be persisted, as a mobile phone moves between circuit switched and packet switched radio domains.

i) Voice SMS

A voice SMS is a text message that people can send that includes a message (usually 30 seconds or less) that the other person can hear in the text message. Save time and personalize subscribes message through a voice SMS. This service provides user the flexibility to record up to 120 s of audio; so even if user desired number is unreachable, message will reach out live!

j) Service Quality

Service quality was defined differently through the view of many researchers. For example: Bitner, Booms and Mohr (1994) defined service quality as 'the consumer's overall impression of the relative inferiority / superiority of the organization and its services'. Therefore, service quality is the key of survival to all servicing companies. Cronin and Taylor (1994) viewed service quality as a form of attitude representing a long-run overall evaluation. Maintaining service quality at certain level and improving service quality must be life-time efforts to those companies who desire life-time prosperity in customers' heart. Parasuraman, Zeithaml and Berry (1985) defined service quality as 'a function of the differences between expectation and performance along the quality dimensions' [Likewise, Roest and Pieters' (1997)]. The same definition that service quality is a relativistic and cognitive discrepancy between experiences based norms and performance concerning service benefits. Service quality is a critical element of customer perceptions. Service quality will be the dominant element in customers' evaluations. Service quality may also be very critical in determining customer satisfaction.

k) Customers Perception and Evaluation

Customer perception of services refers how they assess whether they have experienced quality service, and whether they are satisfied. Perceptions are always considered relative to expectations.

IV. Methodology and Hypotheses Development

The business research used in this report is descriptive nature. Through this descriptive research this report seeks to determine the answers the research questions of the GP and Airtel Bangladesh Ltd. The users of GP and Airtel were the population of this study. This study was mainly based on primary data that were collected by using a structured survey questionnaire and secondary data that were collected from journal, books, website etc. Some data and other necessary information were collected by the website of GP and Airtel.

This study included Total 100 respondents as the sample (50 customers of Grameenphone and 50 customers of Airtel) were surveyed through the random

© 2015 Global Journals Inc. (US)

sampling method with structured questionnaire from July to December 2014. After collection of primary data, hypotheses were formulated and T-test, Z test, one-way ANOVA analysis, frequency analysis, and descriptive analysis ware used to test the hypotheses with 0.05 level of statistical significance. The statistical computer package SPSS version 17.0 was used to analyze the data. Out of 100 respondents, 21 were service holders and 79 were students.

a) Population and Sample

Sampling Size–100 respondents, Convenient Sampling method is used for the study.

b) Sources of Data

This study is based on both primary and secondary data. Primary data were collected through a structured questionnaire survey. Secondary data were collected from the published official statistics, report documents, laws, ordinance, books, articles, annual reports of concerned cell phone operators, ministry of posts & telecommunications, websites etc.

c) Data Collection Methods

Primary data has been used by me in the form of Questionnaire & Observation, which are the two basic methods of collecting primary data, which suffices all research objectives. Secondary data sources like website of the company & some articles with reference to web-sites.

d) Data Analysis Methods

A five-point Likert type scale statements were used to measure the variables where 1 stands for strongly disagreed and 5 stands for strongly agreed effect on the statements [(Luthans, 2002)]. After collection of primary data, hypotheses were formulated and paired samples t-test, Frequency analysis, and regression analysis ware used to test the hypotheses with 0.05 level of statistical significance. The statistical computer package SPSS version 17.0 was used to analyze the data.

e) Questionnaire Design

The primary data were collected from relative mobile phone companies' customers from Pabna city. Total 100 customers (50 customers of Grameenphone and 50 customers of Airtel) were surveyed through the convenience sampling method with questionnaire from July to December 2014.

f) Hypotheses Formulation

Research hypothesis is an unproven statement, which helps the researcher to draw the suggestion on his hypothetical assumption whether it is true or false based on some specific statistical test (Alam and Neger, 2009). For the convenience of the study the following hypotheses are developed which are to be tested.

i. *Hypotheses Formulation (For comparing effectiveness of push service between GP and Airtel)*

Hypothesis 1:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel in terms of *Service Charge.*

Hypothesis 2:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel regarding *Language of SMS*.

Hypothesis 3:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel on the subject of *Contents of SMS*.

Hypothesis 4:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel in *context of irritation.*

Hypothesis 5:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel with regard to *annoying SMS*.

Hypothesis 6:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel in terms of *Update information about product & service.*

Hypothesis 7:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel regarding *Information about service activation & deactivation.*

Hypothesis 8:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel on the subject of *Customer satisfaction of Push service.*

Hypothesis 9:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel in context of

© 2015 Global Journals Inc. (US)

Push SMS about social, educational and govt. information.

Hypothesis 10:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel with regard to Contents those *relevant to customers' lifestyle.*

Hypothesis 11:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel on the subject of *Special offers to customers.*

Hypothesis 12:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel in context of *Advance permission to provide SMS.*

Hypothesis 13:
Ho: μ MG = μ MA
Ha: μ MG $\neq$ μ MA

Where, Ho: There is no significant difference between Mean of GP and Mean of Airtel with regard to *Service of customer care center about Push service.*

ii. *Hypotheses Formulation (For overall evaluation and to test the effectiveness of push service for both companies)*

Hypothesis 1:
H_0: Both companies (GP and Airtel) have satisfactory service charge to the customers.
Ha: Both companies (GP and Airtel) have not satisfactory service charge to the customers.

Hypothesis 2:
H_0: Language of push SMS of GP and Airtel is easily readable to the customers.
Ha: Language of push SMS of GP and Airtel is not easily readable to the customers.

Hypothesis 3:
H_0: Contents of push SMS of GP and Airtel are phone and to the point.
Ha: Contents of push SMS of GP and Airtel are not phone and to the point.

Hypothesis 4:
H_0: Respondents of both companies are irritated when they receive push SMS.
Ha: Respondents of both companies are not irritated when they receive push SMS.

Hypothesis 5:
H_0: Contents of push SMS of GP and Airtel are often annoying to the customers.
Ha: Contents of push SMS of GP and Airtel are not often annoying to the customers.

Hypothesis 6:
H_0: Both companies provide update information about their products & services to the customers through push SMS.
Ha: Both companies do not provide update information about their products & services to the customers through push SMS.

Hypothesis 7:
H_0: Both companies provide information about activation and deactivation of push service through push SMS.
Ha: Both companies do not provide information about activation and deactivation of push service through push SMS.

Hypothesis 8:
H_0: Respondents of both companies are satisfied on getting the push service.
Ha: Respondents of both companies are not satisfied on getting the push service.

Hypothesis 9:
H_0: Both companies provide available push SMS to customers about social, educational, govt. info.
Ha: Both companies do not provide available push SMS to customers about social, educational, govt. info.

Hypothesis 10:
H_0: Push SMS are relevant to customers' life style.
Ha: Push SMS are not relevant to customers' life style.

Hypothesis 11:
H_0: Both companies provide special offers to customers through push SMS.
Ha: Both companies do not provide special offers to customers through push SMS.

Hypothesis 12:
H_0: Both companies take the permission from respondents in advance to provide push SMS.
Ha: Both companies do not take the permission from respondents in advance to provide push SMS.

Hypothesis 13:
H_0: Services of customer care center of GP and Airtel regarding push service are in satisfactory level.
Ha: Services of customer care center of GP and Airtel regarding push service are not in satisfactory level.

V. Data Analysis, Hypotheses Testing and Findings

An analysis is generated from the questionnaire to achieve the objectives of the study. In order to analyze the collected data a 5-point Likert type scale has been used, where 5 stands for highly satisfied (Strongly Agreed) customers, 4 stands for satisfied (Agreed) customers, 3 stands for neutral customers, 2 stands for dissatisfied (Disagreed) customers, and 1 stands for highly dissatisfied (Highly Disagreed) customers. Several judgments were made from the responses of customers to validate the objectives of the study. The results of different tests are presented below:

© 2015 Global Journals Inc. (US)

a) Demographic Characteristics of the Respondents

Table 01 : Respondents Demographics (N*=100)

		Frequency	Percent	Cumulative Percent
Occupation	Service Holder	21	21.0	21.0
	Student	79	79.0	100.0
	Total	100	100.0	
Education Level	Below SSC	1	1.0	1.0
	SSC	3	3.0	4.0
	HSC	14	14.0	18.0
	Bachelor	76	76.0	94.0
	Master	5	5.0	99.0
	PhD	1	1.0	100.0
	Total	100	100.0	
Age	Below 20	19	19.0	19.0
	20 to 40	80	80.0	99.0
	Above 40	1	1.0	100.0
	Total	100	100.0	
Gender	Male	75	75.0	75.0
	Female	25	25.0	100.0
	Total	100	100.0	
Operator	GP	50	50.0	50.0
	Airtel	50	50.0	100.0
	Total	100	100.0	

Source: Questionnaire Survey, July to December 2014
*Note:*N = Total frequency = 100*

Table 1 reveals that respondents involved in this study were Students and Service Holders in Pabna city. Number of Student respondents is 79% where service Holders are 29%. It reveals that 1% of the respondents are educated below SSC, 3% of the respondents belong to SSC, 14% of the respondents are HSC, 76% of the respondents are Bachelor, 5% of the respondents are Master and 1% of the respondents are PhD.

Most of the respondents came from the age group of 20-40 years (80%), because it is a typical age of most Institutional students in Pabna and this is due to the more acceptability of push (SMS) advertising in the age group of 20 to 40 years. Other respondents were in the age group of below 20 years (19%), above 40 years (1%).Table 1 reveals that 75% of the respondents are males and 25% of the respondents are females. It is concluded that majority of respondents are males.

It also reveals that 50%of the respondents use GP and 50% of the respondents use Airtel from the total 100 of respondents.

b) Customer Opinion about SMS, MMS and Voice SMS

Customer opinion about SMS, MMS, and Voice SMS is an important factor to the customers. They give more emphasis in this particular point in receiving the PUSH SMS.

Table 2 : Customer opinion about SMS, MMS, Voice SMS(N*=100)

		Frequency		Percent (%)	
		GP	Airtel	GP	Airtel
Options	SMS	38	40	76.0	80.0
	MMS	1	2	2.0	4.0
	Voice SMS	11	8	22.0	16.0
Total		**50**	**50**	**100**	**100**
Mean value ($\overline{X}$)		1.46	1.36		
Standard Deviation (SD)		.838	.749		
Coefficient of variation (CV)		.702	.562		

Source: Questionnaire Survey, July to December 2014
*Note:*N = Total frequency = 100*

Table 2 reveals that, out of 100 respondents 76% respondents of GP are comforts to receive SMS where 80 % respondents of Airtel are comfort to receive SMS. 2% respondents of GP are comfort to receive MMS where 4 % respondents of Airtel are comfort to receive MMS. On the other hand, 22% respondents of GP are comfort to receive Voice SMS where 16 % respondents of Airtel are comfort to receive Voice SMS. Here mean value of GP and Airtel respondents regarding customer choice about SMS, MMS, Voice

© 2015 Global Journals Inc. (US)

SMS are respectively 1.46 and 1.36, Standard Deviation are respectively .838 and .749 and the coefficient of variation are respectively .702 and .562, which indicate that GP is in a very strong position than Airtel in context of push Marketing. So, GP need to provide Voice SMS as a way of push Marketing to increase the effectiveness of push Marketing because 22 % customer are comfort to receive the Voice SMS. On the other hand Airtel should give more concern about the SMS because 80% respondents prefer to accept SMS as a way of push service.

c) Attractiveness of push SMS to Customer

Customer incentive is the strong factor to determine the effectiveness of push service. Customers always expect that their operators will give some incentive to them regularly. The operators, who are providing incentive to customers, are getting more customers. Table 3 reveals that about 44% respondents of GP receive the incentive where 38% respondents of Airtel receive the incentive.

Table 3 : Attractiveness of push SMS to customer

		Frequency		Percent (%)	
		GP	Airtel	GP	Airtel
SMS attractiveness (Incentives)	Yes	22	19	44.0	38.0
	No	28	31	56.0	62.0
Total		50	50	100	100
Mean value ($\overline{X}$)		1.56	1.62		
Standard Deviation (SD)		.501	.490		
Coefficient of variation (CV)		.251	.240		

Source: Field Survey, July to December 2014.

Here the frequency about "Yes" of GP and Airtel respondents regarding incentive to the customers are respectively 22 and 19the frequency about "No" of GP and Airtel respondents regarding incentive to the customers are respectively 28 and 31. It indicates that GP is in a better position than Airtel in case of providing incentive to the customers.

d) Necessary Push SMS Received and Read by Customer

It is possible to compare the effectiveness of push service between GP and Airtel by analyzing the frequency of push SMS reception and amount of SMS reading. Customer will read the SMS if it contains more attractive and necessary element for what the customer will wait.

Table 4 : Necessary push SMS receive and read by customer

		Frequency		Percent (%)	
		GP	Airtel	GP	Airtel
SMS receive (per day)	Below 3	10	20	20.0	40.0
	3 to 5	34	21	68.0	42.0
	above 5	6	9	12.0	18.0
Total		50	50	100	100
Mean value ($\overline{X}$)		1.92	1.78		
Standard Deviation (SD)		.566	.737		
Coefficient of variation (CV)		.320	.542		
SMS read (per day)	None	14	10	28.0	20.0
	Only one	6	9	12.0	18.0
	3 to 5	3	17	6.0	34.0
	All of them	27	14	54.0	28.0
Total		50	50	100	100
Mean value ($\overline{X}$)		2.86	1.78		
Standard Deviation (SD)		1.340	.737		
Coefficient of variation (CV)		1.796	.542		

Source: Field Survey, July to December 2014.

From the above table, it is found that 20% respondents of GP receive below 3 push SMS per day where 40% respondents of Airtel receive below 3 push SMS per day.68% respondents of GP receive 3 to 5push SMS per day where 42% respondents of Airtel receive 3 to 5 push SMS per day. On the other hand, 12%

© 2015 Global Journals Inc. (US)

respondents of GP receive above 5 push SMS per day where 18% respondents of Airtel receive above 5push SMS per day. On the other side within 50 respondent 28% respondent of GP do not read anyone SMS where 20% respondent among 50 Airtel respondents do not read anyone SMS.12% respondent of GP read only one SMS where 18% respondent of Airtel read only one SMS. 54% respondent of GP read all of them SMS where 28% respondent of Airtel read all of them SMS. Mean value of GP is 2.86 and Airtel is 1.78 which indicate that content of GP's push SMS is more acceptable and attractive as well as effectiveness of push service of GP is high than Airtel.

e) Medium of Communication (Language of push SMS)

Language of push SMS is the imperative variable to determine the effectiveness of push service. Table 5 shows that 66% respondents of GP get Bangla by English spelling SMS where 58% respondents of Airtel get Bangla by English spelling SMS.

0% respondents of GP get Bangla SMS where 2% respondents of Airtel get Bangla SMS. 17% respondents of GP get English SMS where 19% respondents of Airtel get English SMS.

Table 5 : Medium of communication

		Frequency		Percent (%)	
		GP	Airtel	GP	Airtel
Language of PUSH SMS	Bangla by English Spelling	33	29	66.0	58.0
	Bangla	--	2	0.0	4.0
	English	17	19	34.0	38.0
Total		50	50	100	100
Mean value ($\overline{X}$)		1.68	1.80		
Standard Deviation (SD)		.957	.969		
Coefficient of variation (CV)		.916	.939		

Source: Field Survey, July to December 2014.

Mean value of GP (1.68) is lower than of Airtel (1.80) which refer Airtel in good position than GP because it provides 3 categories of SMS that match among categories of respondents. Sometime Bangla by English spelling SMS is ambiguous so respondents will be more comfortable to read the Bangla SMS. If both companies increase the amount of Bangla SMS than effectiveness of PUSH service will be high.

f) Number of Necessary push SMS Reception and Activation

It is possible to measure the effectiveness of push service between GP and Airtel by analyzing the number of necessary push SMS to the respondents and the number of service activation also the sign of measuring effectiveness.

Table 6 reveals that, out of 50 respondents of GP 18% respondents are argue that they receive 1 necessary push SMS within one month where out of 50 respondents of Airtel 10% respondents are argue that they receive 1 necessary push SMS within one month. 24%, 10%, 14%, 10%, 24% of GP 's respondent argue that they receive respectively 2, 3, 4, 5, and above 5 necessary push SMS within one month where 22%, 40%, 2%, 8%, 18% of Airtel's respondent argue that they receive respectively 2, 3, 4, 5, and above 5 necessary push SMS within one month. The mean value (3.46) and CV (3.519) of GP is higher than the mean value (3.30) and CV (2.541) of Airtel in context reception of necessary push SMS. It indicates that GP's push SMS match more with respondent's demand than of Airtel and effectiveness of push service of GP is high than of Airtel.

© 2015 Global Journals Inc. (US)

Table 6 : Number of necessary PUSH SMS reception and activation

		Frequency		Percent (%)	
		GP	Airtel	GP	Airtel
Necessary PUSH SMS	1	9	5	18.0	10.0
	2	12	11	24.0	22.0
	3	5	20	10.0	40.0
	4	7	1	14.0	2.0
	5	5	4	10.0	8.0
	above 5	12	9	24.0	18.0
Total		50	50	100	100
Mean value ($\overline{X}$)		3.46	3.30		
Standard Deviation (SD)		1.876	1.594		
Coefficient of variation (CV)		3.519	2.541		
Number of service Activation	1	31	42	62.0	84.0
	2	12	4	24.0	8.0
	3	6	4	12.0	8.0
	4	1	--	2.0	--
	5	--	--	--	--
	above 5	--	--	--	--
Total		50	50	100	100
Mean value ($\overline{X}$)		1.54	1.24		
Standard Deviation (SD)		.788	.591		
Coefficient of variation (CV)		.621	.349		

Source: Field Survey, July to December 2014.

From the table- 6 it is clear that number of service activation is more in respect of Airtel subscribers. 84% of Airtel's subscribers activate minimum one service within one month where 62% of GP's subscribers activate minimum one service within one month.SD of Airtel is lower than of GP which refer that effectiveness of push SMS of Airtel is high than of GP. It is possible because of attractive power of that push SMS higher than of GP.

g) *Time of PUSH SMS Reception and Preference of Customers' Push SMS Reception*

If the service provider able to provide the push SMS to the subscriber mobile phone at the right time it means when the customer prefer to receive than the effectiveness of push SMS will be high. Table- 7 Shows that 68% of GP's subscribers get push SMS when they are busy where 82% respondents of Airtel are get push SMS when they are busy. Both companies should find out the customers busy time and avoid sending the push SMS in their busy time because 38% of GP's respondents prefer to receive push SMS in the relax time as well as 34% of Airtel's respondents prefer to receive push SMS in the relax time. Airtel should more concern to provide push SMS than GP to increase the effectiveness of push service.

Table 7 : Time of push SMS reception and preference of customers' push SMS reception

		Frequency		Percent (%)	
		GP	Airtel	GP	Airtel
Time of PUSH SMS reception	in your busy time	34	41	68.0	82.0
	in morning	6	3	12.0	6.0
	relax time	7	4	14.0	8.0
	mid night	3	2	6.0	4.0
Total		50	50	100	100
Mean value ($\overline{X}$)		1.58	1.34		
Standard Deviation (SD)		.950	.798		
Coefficient of variation (CV)		.902	.637		
Sixteen	in your busy time	--	--	--	--
	in morning	3	5	6.0	10.0
	relax time	38	34	76.0	68.0
	mid night	9	11	18.0	22.0
Total		50	50	100	100
Mean value ($\overline{X}$)		3.12	3.12		
Standard Deviation (SD)		.480	.558		
Coefficient of variation (CV)		.230	.312		

Source: Field Survey, July to December 2014.

© 2015 Global Journals Inc. (US)

h) Satisfaction Level of Customer (Regarding Push SMS Reception)

It is needed to know about the level of customer satisfaction regarding the push SMS reception to enhance the effectiveness of push service. The table-8 states the overall satisfaction level of the respondents' views towards the push SMS reception from their service provider.

Table 8 : Satisfaction Level

		Frequency	
		GP	Airtel
Satisfaction Level of customer	Highly dissatisfied (1)	14	1
	Dissatisfied (2)	12	21
	Neutral (3)	10	10
	Satisfied (4)	14	18
	Highly satisfied (5)	--	--
Total		50	50
Mean value ($\overline{X}$)		2.48	2.90
Standard Deviation (SD)		1.182	.931
Coefficient of variation (CV)		1.398	.867

Source: Field Survey, July to December 2014.

From the table-8, it is found that 12 respondents of GP are dissatisfied, 14 respondents are satisfied and no highly satisfied respondent towards the level of satisfaction on getting push SMS and its service.14 respondents of GP are highly dissatisfied and 10 respondents showed their neutrality on getting push SMS and its service. On the other hand, no respondents of Airtel are highly satisfied, 1 respondent of Airtel is highly dissatisfied and 18 respondents are satisfied 21 respondents are dissatisfied and 10 respondents showed their neutrality regarding push SMS reception. Here mean value of GP and Airtel respondents regarding push SMS reception from their service provider are respectively 4.48 and 2.90 and the coefficient of variation are respectively 1.398 and .867, which indicate that Airtel is in a very strong position than GP. Respondents of GP as well as Airtel are significantly satisfied but respondents are not highly satisfied for both companies so both companies should increase the quality and attractiveness of push SMS and service to reach the optimum position of effectiveness to their push service.

i) Service Charge of Push Service

Service charge of push service is the vigorous factor to determine the customer evaluation towards push service and service charge has a prodigious impact to the effectiveness of push service. Respondents of GP and Airtel have comment on their own service provider's service charge of push service.

Table -9 indicates that service charge to the 48% respondents of GP is not important at all it means they are not at all happy where service charge to the 38% respondents of Airtel is not important at all. 38% respondents of GP said, service charge is not bad where 56% respondents of Airtel said, service charge is not bad. 6% respondents of GP said, service charge is extremely important to them it means they are highly satisfied where only 2% respondents of Airtel said, service charge is extremely important to them.

Table 9 : Service charge

		Frequency		Percent (%)	
		GP	Airtel	GP	Airtel
Comment on service Charge	Not important at all	24	19	48.0	38.0
	Not bad	19	28	38.0	56.0
	Important	3	1	6.0	2.0
	Vary important	1	1	2.0	2.0
	Extremely important	3	1	6.0	2.0
Total		50	50	100	100
Mean value ($\overline{X}$)		1.80	1.74		
Standard Deviation (SD)		1.069	.777		
Coefficient of variation (CV)		1.143	.604		

Source: Field Survey, July to December 2014.

Here the mean of GP is 1.80 and Airtel is 1.74 which refer subscribers are not satisfied about their service charge. Both companies should set their service charge at minimum level it means important level so that customer's can be satisfied.

j) Respondents' Opinion about Time Chosen for Push SMS

Sending time and receiving time of push SMS has a great effect on the effectiveness of push service.

© 2015 Global Journals Inc. (US)

Table 10 : Satisfaction Level

		Frequency	
		GP	Airtel
I like to receive PUSH SMS in which it's receiving time chosen by myself	Strongly disagree (1)	1	--
	Disagree(2)	4	1
	Neutral (3)	9	7
	Agree (4)	21	23
	Strongly agree (5)	15	19
Total		50	50
Mean value ($\overline{X}$)		3.90	4.20
Standard Deviation (SD)		.995	.756
Coefficient of variation (CV)		.990	.571

Source: Field Survey, July to December 2014.

Table- 10 presents that 15 and 21 respondents of GP among 50 respondents are respectively strongly agree and agree to receive the push SMS in which it's receiving time chosen by themselves where 19 and 23respondents of Airtel among 50 respondents are respectively strongly agree and agree to receive the push SMS in which it's receiving time chosen by themselves. Only 4 respondents of GP and 1 respondent of Airtel are disagreeing about this statement. Most of the respondents of GP and Airtel are eager to choose the time by themselves for receiving Push SMS from their service provider. So the both companies gather the data from the subscribers about their preference time to provide push SMS so that their push service will be effective.

k) Customers' Perception and Sensation about Existing Push SMS and Intent towards Future

Is the push SMS service effective or not, it is possible to measure by analyzing the respondent's opinion regarding push SMS reception. In present customer are more sensitive and awareness as well their demand is changing. For the rivalry among existing mobile phone company the communication strategy has been changing. Customers also comfort to accept the service in their convenient way and time. It is possible to measure the existing perception and future perception about push SMS by analyzing the following questions and answers.

Table 11 : Customers' existing & future sensation about push SMS

		Frequency		Percent (%)	
		GP	Airtel	GP	Airtel
I get irritated when I receive PUSH SMS	Strongly disagree (1)	--	--	--	--
	Disagree(2)	6	3	12.0	6.0
	Neutral (3)	7	6	14.0	12.0
	Agree (4)	16	19	32.0	38.0
	Strongly agree (5)	21	22	42.0	44.0
Total		50	50	100	100
Mean value ($\overline{X}$)		4.04	4.20		
Standard Deviation (SD)		1.029	.881		
Coefficient of variation (CV)		1.060	.776		
I have an intention to receive PUSH SMS in future	Strongly disagree (1)	13	8	26.0	16.0
	Disagree(2)	13	18	26.0	36.0
	Neutral (3)	9	7	18.0	14.0
	Agree (4)	13	15	26.0	30.0
	Strongly agree (5)	2	2	4.0	4.0
Total		50	50	100	100
Mean ($\overline{X}$)		2.56	2.70		
Standard Deviation (SD)		1.248	1.182		
Coefficient of Variation (CV)		1.558	1.398		

Source: Field Survey, July to December 2014.

Table-11shows 42% respondents of GP are strongly agree that they are irritated when they receive push SMS from their service provider where only 12% respondents of GP disagree about this statement. On the other hand 44%42% respondents of Airtel are strongly agree that they are irritated when they receive push SMS in their cell phone where narrowly 6% respondents of Airtel disagree about this statement. Mean of GP and Airtel for current perception of respondents are respectively 4.04 and 4.20 that means

© 2015 Global Journals Inc. (US)

negative effect is high here. In context of future push SMS reception, 26%respondents of GP strongly disagree and also 26% respondents of GP disagree to receive push SMS in future where only 4% strongly agree and 26% agree to receive push SMS in future. On the other hand 16%respondents of Airtel strongly disagree and 36% respondents of Airtel disagree to receive push SMS in future. Although 30% respondents of Airtel are agree to receive the push SMS in future. Mean (2.70) of Airtel is higher than the mean(2.56) of GP. It means the number of respondents of Airtel is more than of GP to receive the push SMS in future. Although the position of Airtel is good than GP in context of future push SMS reception but most of the respondents for both companies would not like to receive the push SMS in future.

So it is clear that, here the effectiveness of push service is very low. Both companies should take another strategy like push SMS service, door to door advertising, seasonal campaign etc. to communicate with customers.

l) Customers' Overall Evaluation as a Whole towards the Push Service of Grameen Phone and Airtel

It is possible to determine the effectiveness of push service by analyzing the following factors in respect of GP and Airtel mobile phone Company. Table-12 shows the GP's and Airtel's frequency, mean, standard deviation and variance in respect of related variables. From analyzing the result of GP and Airtel, we can measure the overall and comparative effectiveness of push service.

Factor 1 reveals that Airtel's mean(1.62) is higher than GP's mean(1.56) as well SD(.501)of GP is higher than SD(.490) of Airtel it means the position of Airtel is higher than GP in context of providing incentive SMS.

Factor 2 reveals that the mean (2.86) of GP is higher than the mean (2.70) of Airtel and variance (1.796) of GP is higher than the variance (1.194) of Airtel that means the condition of GP is higher than of Airtel regarding push SMS read by respondents. So the effectiveness of push service is high of GP.

Factor 3 shows that the mean (3.46) of GP is higher than the mean (3.30) of Airtel and variance (3.519) of GP is higher than the variance (2.541) of Airtel that means the condition of GP is higher than of Airtel regarding the necessary push SMS received by respondents. So the effectiveness of push service of GP is higher than of Airtel.

Table 12 : Push SMS Service of GP and Airtel

		Gp				Airtel			
Factors	Options	Frequency	Mean	Std. Deviation	Variance	Frequency	Mean	Std. Deviation	Variance
1.Incentive	Yes	22				19			
	No	28	1.56	.501	.251	31	1.62	.490	.240
	Total	**50**				**50**			
2.SMS read	None	14				10			
	Only one	6				9			
	3 to 5	3	2.86	1.340	1.796	17	2.70	1.093	1.194
	All of them	27				14			
	Total	**50**				**50**			
3.SMS receive	1	9				5			
	2	12				11			
	3	5				20			
	4	7	3.46	1.867	3.519	1	3.30	1.594	2.541
	5	5				4			
	above 5	12				9			
	Total	**50**				**50**			
4.Service activation	1	31				42			
	2	12				4			
	3	6				4			
	4 5	1 0	1.54	.788	.621	0 0	1.24	.591	.349
	Above 5	0				0			
	Total	**50**				**50**			
	Highly Dissatisfied	14				1			
	Dissatisfied	12				21			
	Neutral	10	2.48	1.182	1.398	10	2.90	.931	.867

© 2015 Global Journals Inc. (US)

5.Satisfaction level	Satisfied	14				18			
	Highly Satisfied	0				0			
	Total	**50**				**50**			
6.Service charge	Not important at all	24				19			
	Not bad	19				28			
	Important	3	1.80	1.069	1.143	1	1.74	.777	.604
	Vary important	1				1			
	Extremely important	3				1			
	Total	**50**				**50**			
7.Language	Strongly Disagree	3				0			
	Disagree	8				22			
	Neutral	8	3.48	1.111	1.234	10	3.04	1.087	1.182
	Agree	24				12			
	Strongly Agree	7				6			
	Total	**50**				**50**			
8.Contents	Strongly Disagree	0				0			
	Disagree	11				11			
	Neutral	8	3.54	.994	.988	15	3.40	.990	.980
	Agree	24				17			
	Strongly Agree	7				7			
	Total	**50**				50			
9.Information About product And Service	Strongly Disagree	9				2			
	Disagree	16				10			
	Neutral	12	2.62	1.141	1.302	15	3.26	1.006	1.013
	Agree	11				19			
	Strongly Agree	2				4			
	Total	**50**				**50**			
10.Information About Service activation & deactivation process	Strongly Disagree	8				8			
	Disagree	13				14			
	Neutral	0	3.10	1.344	1.806	1	3.20	1.498	2.245
	Agree	24				14			
	Strongly Agree	5				13			
	Total	**50**				**50**			
11.Service Activation Deactivation Method	Strongly Disagree	3				2			
	Disagree	16				18			
	Neutral	7	3.20	1.229	1.510	9	3.20	1.262	1.592
	Agree	16				10			
	Strongly Agree	8				11			
	Total	**50**				**50**			
12.Social, Educational, Govt. info SMS	Strongly Disagree	1				2			
	Disagree	5				19			
	Neutral	8	3.86	1.010	1.021	3	3.16	1.167	1.362
	Agree	22				21			

© 2015 Global Journals Inc. (US)

	Strongly Agree	14				5			
	Total	**50**				**50**			
13.Relevancy to Customers' Life style	Strongly Disagree	7				9			
	Disagree	21				16			
	Neutral	12	2.56	1.091	1.190	8	2.80	1.340	1.796
	Agree	7				10			
	Strongly Agree	3				7			
	Total	**50**				**50**			
14.Special Offer to Customers	Strongly Disagree	12				2			
	Disagree	9				20			
	Neutral	6	2.86	1.340	1.796	10	2.94	1.058	1.119
	Agree	20				15			
	Strongly Agree	3				3			
	Total	**50**				**50**			

Source: Field Survey, July to December 2014.

Factor 4 shows that the mean (1.54) of GP is higher than the mean (1.24) of Airtel and variance (.621) of GP is higher than the variance (.349) of Airtel that means the condition of GP is higher than of Airtel regarding the service activation after reading PUSH SMS by respondents. So the effectiveness of push service of GP is higher than of Airtel.

Factor 5 reveals that, out of 50 respondents of GP 14 respondents are highly dissatisfied and 12 respondents are dissatisfied where out of 50 respondents of Airtel only 1 respondent is highly dissatisfied and 21 respondents are dissatisfied. On the other hand 14 respondents of GP are satisfied where 18 respondents of Airtel are satisfied. The mean (2.90) of Airtel is higher than the mean (2.48) of GP that indicate the customers of Airtel are more satisfy towards Airtel than of GP regarding push SMS reception from their operator.

Factor 6indicates that the mean of GP is 1.80 and Airtel is 1.74 which refer subscribers are not satisfied about their service charge. Both companies should set their service charge at minimum level it means important level so that customer s can be satisfied.

Factor 7shows that the mean (3.48) of GP is higher than the mean (3.04) of Airtel and variance (1.234) of GP is higher than the variance (1.182) of Airtel that means the condition of GP is higher than of Airtel regarding the language of Push SMS. So the effectiveness of push service of GP is higher than of Airtel.

Factor 8 exposes that the mean (3.54) of GP is higher than the mean (3.40) of Airtel and variance (.988) of GP is higher than the variance (.980) of Airtel that directs the condition of GP is higher than of Airtel concerning the contents of push SMS. So the effectiveness of push service of GP is higher than of Airtel.

Factor 9 reveals that the mean (3.26) of Airtel is higher than the mean (2.62) of GP and SD (1.006) of Airtel is lower than the SD (1.141) of GP that directs the condition of Airtel is higher than of GP in relation to the information about products and services through push SMS. So the effectiveness of push service of Airtel is higher than of GP.

Factor 10 discloses that the mean (3.20) of Airtel is higher than the mean (3.10) of GP and variance (2.245) of Airtel is higher than the variance (1.141) of GP that directs the condition of Airtel is higher than of GP regarding the information about service activation and deactivation process. Subsequently the effectiveness of push service of Airtel is higher than of GP.

Factor 11unveils that the mean (3.20) of GP is equal the mean (3.20) of Airtel but SD (1.229) of GP is lower than the SD (1.262) of Airtel that leads the condition of GP is higher than of Airtel regarding service activation and deactivation method. Afterward the effectiveness of push service of Airtel is higher than of GP.

Factor 12 exposes that the mean (3.86) of GP is higher than the mean (3.16) of Airtel and SD(1.010) of GP is lower than the SD (1.167) of Airtel that directs the condition of GP is higher than of Airtel regarding the push SMS reception about social awareness, educational and govt. info. So it is clear that effectiveness of push service of GP is higher than of Airtel.

Factor 13 divulges that the mean (2.80) of Airtel is higher than the mean (2.56) of GP and variance (1.796) of Airtel is higher than the variance (1.141) of GP that directs that the condition of Airtel is higher than of GP in relation to relevancy of push SMS to subscribers' lifestyle. So the effectiveness of push service of Airtel is higher than of GP.

Factor 14 exposes that the mean (2.94) of Airtel is higher than the mean (2.86) of GP and SD (1.058) of

© 2015 Global Journals Inc. (US)

Airtel is lower than the SD (1.340) of GP that directs the condition of Airtel is higher than of GP regarding special offers to customers'. So it is clear that effectiveness of push service of Airtel is higher than of GP.

m) Effectiveness of Push Service in Respect of Following Interrelated Variables (A Comparative Presentation between GP and Airtel)

Table -13 represent the total frequency, number of respondents, Mean, Standard deviation and variance of selected factors that present the comparative picture of effectiveness of push service between GP and Airtel.

Table 13 : Comparative presentation of effectiveness of push service for GP and Airtel

S.N	Key Issue	Name of company	Strongly Agree (5)	Agree (4)	Neutral (3)	Disagree (2)	Strongly Disagree (1)	Total N	Mean	Std. Deviation (SD)	Variance (var.)
1	Service charge	GP	3	1	3	19	24	50	1.80	1.069	1.143
		Airtel	1	1	1	28	19	50	1.74	.777	.604
2	Ambiguous SMS	GP	9	18	4	15	4	50	3.26	1.291	1.666
		Airtel	3	32	6	5	4	50	3.50	1.035	1.071
3	Language of SMS	GP	7	24	8	8	3	50	3.48	1.111	1.234
		Airtel	6	12	10	22	0	50	3.04	1.087	1.182
4	Contents of SMS	GP	7	24	8	11	0	50	3.54	.994	.988
		Airtel	7	17	15	11	0	50	3.40	.990	.980
5	Perception About offer	GP	10	18	7	11	4	50	3.38	1.260	1.587
		Airtel	10	17	16	5	2	50	3.56	1.053	1.109
6	Irritation	GP	21	16	7	6	0	50	4.04	1.029	1.060
		Airtel	22	19	6	3	0	50	4.20	.881	.776
7	Annoying SMS	GP	19	20	3	6	2	50	3.96	1.142	1.304
		Airtel	24	16	8	2	0	50	4.24	.870	.758
8	SMS Restriction	GP	28	14	7	1	0	50	4.38	.805	.649
		Airtel	31	13	1	5	0	50	4.40	.948	.898
9	Service Information	GP	2	11	12	16	9	50	2.62	1.141	1.302
		Airtel	4	19	15	10	2	50	3.26	1.006	1.013
10	Prior Permission	GP	22	11	9	6	2	50	3.90	1.216	1.480
		Airtel	26	12	7	3	2	50	4.14	1.125	1.266
11	Activation & deactivation Information	GP	5	24	0	13	8	50	3.10	1.344	1.806
		Airtel	13	14	1	14	8	50	3.20	1.498	2.245
12	Activation & deactivation Method	GP	8	16	7	16	3	50	3.20	1.229	1.510
		Airtel	11	10	9	18	2	50	3.20	1.262	1.592
13	Intention to receive Information	GP	4	20	9	13	4	50	3.14	1.143	1.307
		Airtel	7	21	10	8	4	50	3.38	1.159	1.342
14	Customers Satisfaction	GP	2	14	6	19	9	50	2.62	1.193	1.424
		Airtel	2	13	18	12	5	50	2.90	1.035	1.071
15	Push SMS about social welfare, educational & govt. info	GP	14	22	8	5	1	50	3.86	1.010	1.021
		Airtel	5	21	3	19	2	50	3.16	1.167	1.362
16	Contents of SMS are Relevant to life style	GP	3	7	12	21	7	50	2.56	1.091	1.190
		Airtel	7	10	8	16	9	50	2.80	1.340	1.796
17	Special offers to customers	GP	3	20	6	9	12	50	2.86	1.340	1.796
		Airtel	3	15	10	20	2	50	2.94	1.058	1.119
18	Time chosen for PUSH SMS	GP	15	21	9	4	1	50	3.90	.995	.990
		Airtel	19	23	7	1	0	50	4.20	.756	.571
19	Advance permission to provide SMS	GP	4	8	3	9	26	50	2.10	1.403	1.969
		Airtel	3	8	7	10	22	50	2.20	1.325	1.755

© 2015 Global Journals Inc. (US)

20	Service of customer care center	GP	6	30	8	4	2	50	3.68	.935	.875
		Airtel	4	24	10	9	3	50	3.34	1.062	1.127

Source: Field Survey, July to December 2014.

This table show, in case of service charge the mean (1.80) value of GP is higher than the mean (1.74) value of Airtel. So it indicates that GP is in good position than of Airtel. In case of ambiguous SMS, most of the respondents of Airtel agree to receive the ambiguous SMS and the mean (3.50) value of Airtel is higher than the mean (3.26) value of GP. It impact negatively so it refers that GP is in good position than of Airtel.

In case of language of SMS the mean (3.48) value of GP is higher than the mean (3.04) value of Airtel. So it indicates that GP is in good position than of Airtel.

In case of contents of SMS the mean (3.54) value of GP is higher than the mean (3.40) value of Airtel. So it specifies that GP is in good position than of Airtel. In case of perception about offer the mean (3.38) value of GP is lower than the mean (3.56) value of Airtel. It refers most of the respondents of GP disagree that offers of push SMS are misleading in nature. So it states that regarding effectiveness of push service GP is in then good position than of Airtel. In case of Irritation most of the respondents of Airtel is agree and strongly agree that they are irritated when they receive the push SMS. The mean (4.20) value of Airtel is higher than the mean (4.04) value of GP that negatively present this statement that specifies Airtel is in the poor position than GP. In case of Annoying SMS most of the respondents of Airtel is agree and strongly agree that they are Annoyed when they receive the push SMS. The mean (4.24) value of Airtel is higher than the mean (3.96) value of GP that negatively impacts this statement that specifies Airtel is in the poor position than GP regarding Push service. In case of SMS restriction, the mean (4.40) value of Airtel is higher than the mean (4.38) value of GP. That indicates the position of Airtel is good than GP. In case of Service information, the mean (3.26) value of Airtel is higher than the mean (2.62) value of GP. That states the effectiveness of Push service of Airtel is higher than of GP. In case of prior permission most of the respondents of Airtel agree and strongly agree that prion permission is necessary to send push SMS. GP's mean is 3.90 and Airtel's mean is 4.14. so it is negatively refers that Airtel should take prior permission than of GP. In case of information about activation and deactivation of service, the mean (3.20) value of Airtel is higher than the mean (3.10) value of GP. That indicates the effectiveness of push service of Airtel is higher than of GP. In case of activation and deactivation method of service, the mean (3.20) value of Airtel is equal the mean (3.20) value of GP but the SD (1.229) of GP is lower than the SD (1.262) of Airtel that indicates the effectiveness of push service of GP is Higher than of Airtel. In case of intention to receive more information about products, services by push SMS, the mean (3.38) value of Airtel is higher than the mean (3.14) value of GP. That indicates the effectiveness of push service of Airtel is higher than of GP. In case of customers' satisfaction regarding push service, the mean (2.90) value of Airtel is higher than the mean (2.62) value of GP. That indicates the effectiveness of push service of Airtel is higher than of GP. In case of push SMS about social welfare, Educational & govt. information the mean (3.86) value of GP is higher than the mean (3.16) value of Airtel. That specifies the effectiveness of push service of GP is higher than of Airtel. In case of "Contents of SMS are Relevancy to life style" the mean (2.80) value of Airtel is higher than the mean (2.56) value of GP. That indicates the effectiveness of push service of Airtel is higher than of GP. In case of special offer to customers, the mean (2.94) value of Airtel is higher than the mean (2.86) value of GP. That indicates the effectiveness of push service of Airtel is higher than of GP. In case of Time chosen for push SMS, most of the respondents of Airtel want to choose the time for receiving the push SMS than of GP. Mean of GP is 3.90 and mean of Airtel is 4.20. This mean negatively impact the statement so the effectiveness of push service of Airtel is lower than of GP. In case of advance permission to provide SMS, the mean (2.20) value of Airtel is higher than the mean (2.10) value of GP. That indicates the effectiveness of push service of Airtel is higher than of GP. In case of service of customer care center, the mean (3.68) value of GP is higher than the mean (3.34) value of GP. That indicates the effectiveness of push service of GP is higher than of Airtel.

n) Hypotheses testing

(For comparing effectiveness of push service between GP and Airtel)

Data were analyzed with a Likert type 5-point scale ranging from highly dissatisfied (1) to highly satisfied (5). Z-test is done to test hypotheses 1 to 13.

Test of hypotheses and results have been presented in the below table 14 by the help of the statistical package SPSS version 17.0. The interpretations of the hypotheses testing have been given after the table 14.

© 2015 Global Journals Inc. (US)

Table 14 : Hypotheses testing and Comparative evaluation of GP & Airtel

Key factors	GP		Airtel		Calculated Z value	5% level of significance Critical z Value	Result (Ho)
	Mean	SD	Mean	SD			
1. Service charge	1.80	1.069	1.74	.777	0.31227	1.96	Accepted
2. Language of SMS	3.48	1.111	3.04	1.087	2.84256	1.96	Rejected
3. Contents of SMS	3.54	.994	3.40	.990	0.70282	1.96	Accepted
4. Irritation	4.04	1.029	4.20	.881	-0.81863	-1.96	Rejected
5. Annoying SMS	3.96	1.142	4.24	.870	-1.39582	-1.96	Rejected
6. Update information about products& services	2.62	1.141	3.26	1.006	-3.08851	-1.96	Accepted
7. Information about service activation & deactivation	3.10	1.344	3.20	1.498	-0.41944	-1.96	Rejected
8. Customer satisfaction of PUSH service	2.62	1.193	2.90	1.035	-1.32643	-1.96	Rejected
9. Push SMS about social, educational and govt. information	3.86	1.010	3.16	1.167	3.35470	1.96	Rejected
10. Contents of lifestyle relevant to lifestyle	2.56	1.091	2.80	1.340	-1.08844	-1.96	Rejected
11. Special offers to customers	2.86	1.340	2.94	1.058	-0.36530	-1.96	Rejected
12. Advance permission to provide SMS	2.10	1.403	2.20	1.325	-0.42812	-1.96	Rejected
13. Service of customer care center	3.68	.935	3.34	1.062	1.70128	1.96	Accepted

Source: SPSS output.

From the above table (Table: 14) the hypotheses are tested by using differences between the two means of GP and Airtel. At 5% level of significance, the critical value of z for two tailed test is = ± 1.96. If the computed value of Z is greater than +1.96 or less than -1.96, then reject Ho, otherwise accept Ha.

According to the test statistics, calculated Z value of *'Service charge'* is 0.31227 which are lower than our critical value 1.96. Hence, we may accept the null hypothesis. That means Ha is rejected.

According to the test statistics, calculated Z value of *'Language of SMS'* is 2.84256 which are greater than our critical value 1.96. So, we may reject the null hypothesis. That means Ha Accepted.

According to the test statistics, calculated Z value of *'Contents of SMS'* is 0.70282 which are lower than our critical value 1.96. Hence, we may accept the null hypothesis. That means Ha is rejected.

According to the test statistics, calculated Z value of *'Irritation'* is -0.81863 which are lower than our critical value -1.96. Hence, we may reject the null hypothesis. That means Ha Accepted.

According to the test statistics, calculated Z value of *'Annoying SMS'* is -1.39582 which are lower than our critical value -1.96. Hence, we may reject the null hypothesis. That means Ha Accepted.

According to the test statistics, calculated Z value of *'update information about products and services'* is -3.08851 which are higher than our critical value -1.96. Hence, we may accept the null hypothesis. That means Ha is rejected.

According to the test statistics, calculated Z value of *'Information about service activation & deactivation'* is -0.41944 which are lower than our critical value -1.96. Hence, we may reject the null hypothesis. That means Ha Accepted.

According to the test statistics, calculated Z value of *'Customer satisfaction of push service'* is -1.32643 which are lower than our critical value -1.96. So,

© 2015 Global Journals Inc. (US)

we may reject the null hypothesis. That means Ha Accepted.

According to the test statistics, calculated Z value of *'Push SMS about social, educational and govt. information'* is 3.35470 which are greater than our critical value 1.96. So, we may reject the null hypothesis. That means Ha Accepted.

According to the test statistics, calculated Z value of *'Contents of lifestyle relevant to lifestyle'* is -1.08844 which are lower than our critical value -1.96. So, we may reject the null hypothesis. That means Ha Accepted.

According to the test statistics, calculated Z value of *'Special offers to customers'* is -0.36530 which are lower than our critical value -1.96. So, we may reject the null hypothesis. That means Ha Accepted.

According to the test statistics, calculated Z value of *'Advance permission to provide SMS'* is -0.42812 which are lower than our critical value -1.96. So, we may reject the null hypothesis. That means Ha Accepted.

According to the test statistics, calculated Z value of *'Service of customer care center'* is 1.70128 which is lower than our critical value 1.96. So, we may accept the null hypothesis. That means Ha is rejected.

o) Summary of findings

(Comparing effectiveness between GP and Airtel in case of push services)

The above table represents that 4 variables are accepted whereas rest of the 9 variables are rejected i.e. there is a significant difference in terms of the 9 variables whereas, there are no significant differences in terms of the 4 variables (service charge, contents of SMS, update information about products and services, service of customer care center).

- It leads us to the decision that here is no significant difference between Mean of GP and Mean of Airtel in terms of service charge. Which refer, subscribers are not satisfied about their service charge.
- It is found that here is significant difference between Mean of GP and Mean of Airtel regarding language of SMS. So, it is refers that the opinion of the customers of GP is less scattered than Airtel that indicates GP is in good position than of Airtel in context of language.
- It leads us to the decision that there is no significant difference between GP and Airtel regarding contents of SMS.
- It is observed that GP is in a better position than Airtel. Customers of Airtel are more irritated than of GP.
- It is observed that GP is in a better position than Airtel. Customers of Airtel are more annoyed when they get Push SMS than of GP.
- It leads us to the decision that there is no significant difference between GP and Airtel regarding up to date information about their products & services through Push SMS.
- It is observed that Airtel is in a better position than GP in providing information about activation and deactivation of Push services through Push SMS.
- Customers of Airtel are more satisfied about of PUSH service than of GP. So in this subject GP is in weak compared to Airtel.
- Customers of GP receive more Push SMS about social, educational and govt. information than of Airtel. It is observed that GP is in a better position than Airtel.
- It is observed that GP is in a better position than Airtel in providing push SMS that is relevant to customers' lifestyle. It is found that the opinion of the customers of GP is less scattered than Airtel.
- It is observed that Airtel is in a better position than GP in providing special offers to the customers.
- Although there is a very little significant regarding advance permission to send push SMS therefore Airtel is better position than of GP.
- It is found that there is no significant difference between GP and Airtel regarding Service of customer care center. The customers of both the operators are satisfied in case Service of customer care center.

p) Hypotheses Testing

(For overall evaluation and test the effectiveness of push service for both companies)

Data were analyzed with a Likert type 5-point scale ranging from highly dissatisfied (1) to highly satisfied (5). In this study weighted average value of 3.50 (test value) has been considered as the optimum level for every case. One-sample t-test is done to test hypotheses 1to13.

© 2015 Global Journals Inc. (US)

Table 15 : Table One-Sample t Test

		Test Value = 3.5					
						95% Confidence Interval of the Difference	
S.N	Factors	T	df	Sig. (2-tailed)	Mean Difference	Lower	Upper
1	Service charge	-18.593	99	.000	-1.730	-1.91	-1.55
2	Language of push SMS is easily understandable to me	-2.151	99	.034	-.240	-.46	-.02
3	Contents of SMS are phone and to the point	-.303	99	.762	-.030	-.23	.17
4	I get irritated when I receive push SMS	6.482	99	.000	.620	.43	.81
5	Contents in push SMS are often annoying	5.882	99	.000	.600	.40	.80
6	My network provider keeps me up to date about product & service by push SMS	-5.011	99	.000	-.560	-.78	-.34
7	My network provider provide information about Activation & deactivation of Push service	-2.470	99	.015	-.350	-.63	-.07
8	Customer satisfaction level	-6.606	99	.000	-.740	-.96	-.52
9	Receptions of available push SMS about social welfare, educational, govt. info.	.088	99	.930	.010	-.22	.24
10	Contents of Push SMS are relevant to my lifestyle	-6.712	99	.000	-.820	-1.06	-.58
11	Special offer to customers	-4.992	99	.000	-.600	-.84	-.36
12	My network provider obtain my permission in advance to provide push SMS to me	-9.936	99	.000	-1.350	-1.62	-1.08
13	Customer care provides relative solutions related the push SMS service	.099	99	.921	.010	-.19	.21

Source: SPSS output.

The test statistic table 15 shows the results of the one-sample t test. The t column displays the observed t statistic for each sample, calculated as the ratio of the mean difference divided by the standard error of the sample mean. The 95% confidence interval of the difference provides an estimate of the boundaries between which the true mean difference lies in 95% of all possible random samples of the factors (13 factors) in the test.

Since, for the factor "Both companies (GP and Airtel) have satisfactory service charge to the customers" confidence interval lies entirely below 0. Hence H_0 is rejected that is Ha is accepted.

Hence, for the factor "Language of push SMS of GP and Airtel is easily readable to the customers" confidence interval lies entirely below 0. Thus, H_0 is rejected and Ha is accepted.

Therefore, in support of the factor "Contents of push SMS of GP and Airtel are phone and to the point" confidence interval lies entirely below 0. As a result, H_0 is rejected that is Ha is accepted.

Therefore, in support of the factor "Respondents of both companies are irritated when they receive push SMS" confidence interval lies entirely above 0. As a result, H_0 Holds true. That means, H_0 is accepted and Ha is rejected.

Hence, for the factor "Contents of push SMS of GP and Airtel are often annoying to the customers" confidence interval lies entirely above 0. As a result, H_0 Holds true. That means, H_0 is accepted and Ha is rejected.

Consequently, in favor of the factor "Both companies provide update information about their products & services to the customers through push SMS" confidence interval lies entirely below 0. Thus, H_0 is rejected and Ha is accepted.

Hence, for the factor "Both companies provide information about activation and deactivation of push service through push SMS" confidence interval lies entirely below 0. Thus, H_0 is rejected and Ha is accepted.

Hence, in support of the factor "Respondents of both companies are satisfied on getting the push service" confidence interval lies entirely below 0. As a result, H_0 is rejected and Ha is accepted.

Therefore, in support of the factor "Both companies provide available push SMS to customers about social, educational, govt. info" confidence interval

© 2015 Global Journals Inc. (US)

lies entirely above 0. As a result, H_0 Holds true. That means, H_0 is accepted and Ha is rejected.

Consequently, in favor of the factor "push SMS are relevant to customers' life style" confidence interval lies entirely below 0. As a result, H_0 is rejected that is Ha is accepted.

Hence, for the factor "Both companies provide special offers to customers through push SMS" confidence interval lies entirely below 0. As a result, H_0 is rejected that is Ha is accepted.

Consequently, in favor of the factor "Both companies take the permission from respondents in advance to provide push SMS" confidence interval lies entirely below 0. As a result, H_0 is rejected that is Ha is accepted.

Consequently, in favor of the factor "Services of customer care center of GP and Airtel regarding push service are in satisfactory level." confidence interval lies entirely above 0. Thus, H_0 is accepted and Ha is rejected.

q) Summary of Findings

(Overall evaluation for both companies in case of effectiveness of push services)

- It can be concluded that both companies (GP and Airtel) have not satisfactory service charge to the customers.
- It can be decided that the Language of push SMS of GP and Airtel is not satisfactory level to read the SMS easily.
- It can be concluded that Contents of push SMS of GP and Airtel are not phone and to the point.
- It can be concluded that Respondents of both companies are irritated when they receive push SMS.
- It can be established that Contents of push SMS of GP and Airtel are often annoying to the customers.
- It can be concluded that both companies do not provide update information about their products & services to the customers through push SMS.
- It can be concluded that both companies do not provide information about activation and deactivation of push service through push SMS.
- It can be decided that the Respondents of both companies are dissatisfied on getting the push service.
- It can be concluded that both companies provide available push SMS to customers about social, educational, govt. info.
- It can be concluded that push SMS are not relevant to customers' life style.
- It can be settled that both companies do not provide special offers to customers through push SMS.
- It can be determined that both companies do not take the permission from respondents in advance to provide push SMS.
- Finally, it can be concluded that Services of customer care center of GP and Airtel regarding push service are in satisfactory level.

VI. Recommendations and Conclusion

a) Recommendations for Grameenphone

This study suggested some recommendations for improving the effectiveness of push service for Grameenphone are as follows-

i. The authority of Grameenphone should reduce its higher Service charge so that the customers can be satisfied to activate their services.

ii. It should provide push SMS which contents will be phone and to the point.

iii. The Company should Provide update information about their products and services to increase the effectiveness of push service.

iv. GP should provide information about activation and deactivation of Push services through Push SMS so that customers can easily activate as well deactivate the push service.

v. GP should increase their quality and attractiveness of push service to make satisfy their customers.

vi. The authority of GP should give more concern for providing special offer to customers.

vii. In case of push service GP should take advance permission to provide push SMS to the phone of customers to increase the effectiveness of push service.

So, if GP takes initiative to remove or reduce these drawbacks as well enhance the effectiveness of push service to customers then it will be more successful in the telecommunications industry of Bangladesh.

b) Recommendations for Airtel

The following are the provided recommendations by this study to improve the effectiveness of push service of Airtel-

i. Customers are not more satisfy about the service charge. So, Airtel should set a service charge in affordable level so that customers can activate their services frequently.

ii. Airtel should ensure that the language of push SMS should be easy and understandable to the customers.

iii. The authority of Airtel should give more concern about the contents of SMS. Content of SMS should be phone and to the point.

iv. Customers are irritated when they get push SMS. So Airtel should enhance the attractiveness of push SMS or take another way to enhance the effectiveness of push service like PULL SMS, door to door to campaign etc.

© 2015 Global Journals Inc. (US)

v. Customers are more Annoy when they get push SMS. So, Airtel should take another strategy to communicate with customer.

vi. Airtel should provide up to date information about their products and services to enhance their effectiveness of push service.

vii. Providing information about activation and deactivation of push services through push SMS.

viii. Airtel should provide Push SMS about social, educational and govt. information to enhance their effectiveness of push service.

ix. Airtel should provide push SMS that is relevant to customers' life style.

x. To enhance the effectiveness and acceptance of push SMS, Airtel may take the advance permission from customers to provide push SMS to their mobile phone.

c) Conclusion

The general objective of this study was to determine the effectiveness of push service and comparing among selected dimensions between Grameen phone and Airtel as well as to evaluate the overall effectiveness of push service of both companies. The research has provided insights like what are positive and negative aspects of both of the operators. In most of the dimensions of push service like language of push SMS, degree of customers' irritation, degree of annoying, social, educational and govt. information, relevancy to customer life style, GP seems to be better than Airtel. Being the young company, Airtel is in the good position regarding information about service activation & deactivation, customer satisfaction level, special offer and advance permission. Although Grameenphone is in a better position in comparison to Airtel but it cannot be said that its services are much attractive to the customers. It has some other problems like lack of providing special offer, advance permission, service activation & deactivation process. It is found that customers are irritated and annoyed when they receive push SMS from their service providers so that it has a negative impact on effectiveness of push service. Irritating SMS are regarded by consumers as unwanted. Also the more frequently consumers are exposed to push SMS the more they become immune and regard these SMS as unwanted. A major finding is that consumers have fairly negative attitudes towards push SMS.

The negative attitude toward push SMS implies that marketers have to take lot of strategy and plan to make push SMS and service more attractive. The results indicate that attitude toward push service via mobile devices strongly depends on language, contents and characteristics of message. The message language, contents and characteristics need to be developed carefully. Marketers may use the findings to design mobile push SMS and push service that create positive attitudes and avoid possible negative effects. While push SMS and service offer lots of benefits to subscribers, its low acceptance rate will hinder and effectiveness of push Service will be enhanced. Marketers of GP and Airtel can take a new concept of service that is Pull SMS strategy, advertising campaigns, fair, door to door campaigns and media advertising etc. to enhance their services. The manager of Airtel should improve all the factors and the manager of Grameen phones hold reduce service charge and provide better facilities for the customers of other operator.

References Références Referencias

1. Akterujjaman, S. M., Md Biswas, and Md Siddique. "Performance of Grameenphone and Robi in Telecom. Sector of Bangladesh: A Comparative Study." *Nur-E-Alam, Performance of Grameenphone and Robi in Telecom. Sector of Bangladesh: A Comparative Study (July 20, 2011). ASA University Review* 5.2 (2011).
2. Siddique, Md, S. M. Akterujjaman, and Rumana Perveen. "Customers' Satisfaction towards the Services of Customer Care Centers of Grameenphone: A Study on Dhaka and Khulna Cities." *ASA University Review* 6.2 (2012).
3. Alam, M. J., and M. Neger. "Measuring consumer attitude towards beautification products: A study on some selected brands in Bangladesh." *Journal of Business and Technology (Dhaka)* 4.2 (2009): 61.
4. Barnes, Stuart J. "Wireless digital advertising: nature and implications." *International journal of advertising* 21.3 (2002): 399-420.
5. Bauer, Hans H., et al. "Driving consumer acceptance of mobile marketing: a theoretical framework and empirical study." *Journal of electronic commerce research* 6.3 (2005): 181-192.
6. Sabokwigina, Deo, Gabriel Malima, and Hosea Mpogole. "SMS advertising in Tanzania: Factors affecting consumer attitudes." *IST-Africa Conference and Exhibition (IST-Africa), 2013*. IEEE, 2013.
7. Ewen, Stuart. *Captains of consciousness: Advertising and the social roots of the consumer culture*. Basic Books, 2008.
8. BOSE, TARUN KANTI, et al. "SMS ADVERTISING AND ITS PROSPECTS IN BANGLADESH." *Journal of Theoretical & Applied Information Technology* 11 (2010).
9. Dickinger, Astrid, et al. "An investigation and conceptual model of SMS marketing." *System Sciences, 2004. Proceedings of the 37th Annual Hawaii International Conference on*. IEEE, 2004.
10. Barnes, Stuart J., and Eusebio Scornavacca. "Mobile marketing: the role of permission and acceptance." *International Journal of Mobile Communications* 2.2 (2004): 128-139.

© 2015 Global Journals Inc. (US)

11. Merisavo, Marko, et al. "The effectiveness of targeted mobile advertising in selling mobile services: an empirical study." *International Journal of Mobile Communications* 4.2 (2006): 119-127.
12. Goode, Mark MH, et al. "Determining customer satisfaction from mobile phones: a neural network approach." *Journal of Marketing Management* 21.7-8 (2005): 755-778.
13. Lai, Tung Lai. "Service quality and perceived value's impact on satisfaction, intention and usage of short message service (SMS)." *Information Systems Frontiers* 6.4 (2004): 353-368.
14. Leung, Felix, and Christy Cheung. "Consumer attitude toward mobile advertising." *AMCIS 2004 Proceedings* (2004): 331.
15. Hossain, M. S., et al. "THE DRIVERS OF CUSTOMERS'SATISFACTION OF AIRTEL BANGLADESH LIMITED."
16. Islam, Md Zahidul. "Measuring Customer Satisfaction of Mobile Phone Users: A Comparative Study between Grameen Phone and Teletalk Based on Khulna City, Bangladesh." *European Journal of Business and Management* 3.6 (2011): 20-29.
17. Tsang, Melody M., Shu-Chun Ho, and Ting-Peng Liang. "Consumer attitudes toward mobile advertising: An empirical study." *International Journal of Electronic Commerce* 8.3 (2004): 65-78.
18. Rahman, Muhammad Sabbir. "Service Quality, Corporate Image and Customer's Satisfaction Towards Customers Perception: An Exploratory Study on Telecom Customers in Bangladesh." *Business Intelligence Journal* 5.1 (2012): 56-63.
19. Hossain, Sahadat, and Farhana Islam. "Comparison of Customer Satisfaction Between Grameen Phone Ltd and Robi."
20. Turel, Ofir, Alexander Serenko, and Nick Bontis. "User acceptance of wireless short messaging services: Deconstructing perceived value." *Information & Management* 44.1 (2007): 63-73.
21. Kim, Gil Son, Se-Bum Park, and Jungsuk Oh. "An examination of factors influencing consumer adoption of short message service (SMS)." *Psychology & Marketing* 25.8 (2008): 769-786.
22. Aalto, Lauri, et al. "Bluetooth and WAP push based location-aware mobile advertising system." *Proceedings of the 2nd international conference on Mobile systems, applications, and services*. ACM, 2004.
23. Rahman, Hasebur, et al. "Factors Affecting Customer Satisfaction on Grameenphone Users in Bangladesh." *Global Journal of Management And Business Research* 14.3 (2014).
24. Rahman, Hasebur. "Factors aFFecting customer satisFaction in mobile telecommunication industry in bangladesh." *Business, Management and Education* 1 (2014): 74-93.
25. George E. Belch & Michael A. Belch. 'Advertising and Promotion: An Integrated Marketing Communications Perspective', 7th Edition, McGraw Hill.2006.
26. Kotler, Philip & Keller, Kevin L.; Marketing Management; PP-132-135, 13th Edition; Pearson Education (India); 2010.
27. Lovelock, C. H., Patterson, P. G., and Walker, R. H. 'Services Marketing: An Asia-Pacific Perspective', Australia: prentice Hall (2011).
28. Malhotra, Naresh K.; Marketing Research: An Applied Orientation; PP-203-235, 5th Edition; Prentice-Hall of India; 2011.
29. P. Kotler, G. Amstrong. 'Principles of Marketing', 11th Ed., New Jersey, Pearson Prentice Hall 2006.

Web references

1. BTRC [online] Available: www.btrc.gov.bd [Cited on: January 18, 2015]
2. About Grameenphone [online] Available: http://-www.grameenphone.com/personal/customerservice [Cited on: January 18, 2015]
3. About Grameenphone [online] Available: http://www.grameenphone.com/personal/vas [Cited on: January 18, 2015]
4. About Airtel [online] Available: http://www.-bd.airtel.com/ [Cited on: January 18, 2015]
5. About Airtel [online] Available: http://en.-wikipedia.org/wiki/Airtel_Bangla [Cited on: January 18, 2015]
6. About Airtel [online] Available: https://www.-facebook.com/airtelbuzz?fref=ts [Cited on: January 20, 2015]
7. Telecommunications in Bangladesh [online] Available: http://en.wikipedia.org/wiki/Telecommu-nications_in_Bangladesh [Cited on: January 18, 2015]
8. About marketing [online] Available: http://www.-marketing-schools.org/[[Cited on: January 19, 2015]

© 2015 Global Journals Inc. (US)

Appendix (1) : List of Abbreviation

01	GP	: Grameenphone
02	GSM	: Global System for Mobile communications
03	SMS	: Short Message Service
04	MMS	: Multimedia Messaging Service
05	VMS	: Voice Mail Service
06	ANOVA	: Analysis of Variance
07	AEC	: Airtel Experience Centers
09	BTRC	: Bangladesh Telecommunication Regulatory Commission
10	df	: Degree of Freedom
11	Sig	: Significant
12	3G	: Third Generation
13	A2P	: Application- to- Person
14	P2P	: Person – to – Person
15	VCC	: Voice Call Community
16	CV	: Coefficient of Variation
17	SD	: Standard Deviation
18	EDGE	: Enhanced Data GSM Environment
19	WAP	: Wireless Application Protocol
20	N	: Number

Appendix (2) : Questionnaire

For each question given below, please tick (√) only one number that best reflects your opinion on the following five point scale:

1	2	3	4	5
☐ Strongly Disagree	☐ Disagree	☐ Neutral	☐ Agree	☐ Strongly Agree

S.N	Question	1	2	3	4	5
1	PUSH SMS of my network provider that I receive is sometime ambiguous (Contents in the SMS ads are sometimes ambiguous)					
2	The language or contents of PUSH SMS that I receive is easily readable/ understandable to me.					
3	Contents of SMS are short and to the point					
4	Offers on SMS ads are often misleading in nature					
5	I get irritated when I receive PUSH SMS from my network provider					
6	Contents in PUSH SMS are often annoying					
7	Number of PUSH SMS should be restricted in a day					
8	My network provider's Mobile marketing (PUSH SMS) helps me keep up-to-date about products and services for which I am interested.					
9	I believe prior permission of the mobile users is necessary for sending push SMS					
10	My service provider provides information about activate & deactivate of a service is specified by the PUSH SMS					
11	It is easy to opt. in(activate) and opt. out (deactivate) my intended service					
12	Most of the SMS that I have received within one month are necessary/effective for me					
13	I like to receive PUSH SMS which revealed(disclose) how I can stop receiving further SMS/ services					
14	I am interested in getting more information concerning the product, service, offer or event mentioned in the PUSH SMS					
15	I fell comfort or I am satisfied by activating and taking services from my service provider					
16	I receive available PUSH SMS about social welfare, social awareness, educational & Govt. info.					
17	Contents of SMS are relevant to my life style					

© 2015 Global Journals Inc. (US)

18	Special offer to customers (I get special offer from my service provider through PUSH SMS)					
19	I am comfortable with accepting the PUSH SMS					
20	In general I am willing to receive my network provider's PUSH SMS in the future(I have an intention to receive PUSH SMS from my service provider)					
21	I like to receive PUSH SMS in which it's receiving time chosen by myself					
22	My network service provider obtain my permission in advance to provide SMS / SMS Service-					
23	After taking Push SMS service I am satisfied					
24	Overall performance of my network provider is high (overall rating on the Services of PUSH SMS)					
25	Customer care provides relative solutions to my objections about the PUSH SMS service					

26. In my opinion my network provider's PUSH SMS is-

1	2	3	4	5
Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree

a.	☐ Positive ☐ Negative (select one option)	☐	☐	☐	☐	☐
b.	☐High quality ☐Low quality (select one option)	☐	☐	☐	☐	☐
c.	☐Valuable ☐Worthless (select one option)	☐	☐	☐	☐	☐

27. I am satisfied with the service of my network provider-

1	2	3	4	5
☐ Strongly Disagree	☐ Disagree	☐ Neutral	☐ Agree	☐ Strongly Agree

** "PUSH SMS"- Which SMS sent by the network provider to the subscriber's mobile device without taking permission of users. Which SMS comes from the network provider to the subscriber's mobile device without informing the users/ without willingness of the users.*

© 2015 Global Journals Inc. (US)

This page is intentionally left blank

© 2015 Global Journals Inc. (US)

Global Journal of Management and Business Research: E Marketing
Volume 15 Issue 7 Version 1.0 Year 2015
Type: Double Blind Peer Reviewed International Research Journal
Publisher: Global Journals Inc. (USA)
Online ISSN: 2249-4588 & Print ISSN: 0975-5853

The Effect of Household Income and Heath Care Access on Youths Nutritional Status in Mumbai Metropolitan Region

By Sanjay Rode

Mumbai University, India

Abstract- Youths should have access to education, nutrition and health care. Educated and healthy youths help nation to develop fast. Mumbai Metropolitan Region is most developed region of India. But the prevalence of malnutrition is widely viewed across slums in region. The incidence of malnutrition is increasing with increase in age among youths. The parent's lower educational achievement is a cause of malnutrition among youths. At lower household income, the incidence of malnutrition is higher but as the income increases the incidence of malnutrition declines among youths. The various asset holding is lower with malnourished youths of slums in region. Most of nutritious food is eaten by the youths but still prevalence of malnutrition is higher among youths. The logit model for youths is positively correlated to sex, water requirement, read newspaper and magazines, prenatal care. It is negatively co-related to car owned, contraceptives used, child care at home. The logit regression for female is positively correlated to sex, weekly water requirement, IUD, prenatal care. It is negatively co-related to known of nutrition, condom use, child care at home. The logit regression for male is positively co-related to private source of drinking water, weekly water requirement; purify drinking water, known nutrition, curd and vegetable consumption. It is negatively correlated to sex, pulses and fruits consumption.

Keywords: health, public policy, safe water.

GJMBR - E Classification : JEL Code : P36

THEEFFECTOFHOUSEHOLDINCOMEANDHEATHCAREACCESSONYOUTHSNUTRITIONALSTATUSINMUMBAIMETROPOLITANREGION

Strictly as per the compliance and regulations of:

© 2015. Sanjay Rode. This is a research/review paper, distributed under the terms of the Creative Commons Attribution-Noncommercial 3.0 Unported License http://creativecommons.org/licenses/by-nc/3.0/), permitting all non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.

The Effect of Household Income and Heath Care Access on Youths Nutritional Status in Mumbai Metropolitan Region

Sanjay Rode

Abstract- Youths should have access to education, nutrition and health care. Educated and healthy youths help nation to develop fast. Mumbai Metropolitan Region is most developed region of India. But the prevalence of malnutrition is widely viewed across slums in region. The incidence of malnutrition is increasing with increase in age among youths. The parent's lower educational achievement is a cause of malnutrition among youths. At lower household income, the incidence of malnutrition is higher but as the income increases the incidence of malnutrition declines among youths. The various asset holding is lower with malnourished youths of slums in region. Most of nutritious food is eaten by the youths but still prevalence of malnutrition is higher among youths. The logit model for youths is positively correlated to sex, water requirement, read newspaper and magazines, prenatal care. It is negatively co-related to car owned, contraceptives used, child care at home. The logit regression for female is positively correlated to sex, weekly water requirement, IUD, prenatal care. It is negatively co-related to known of nutrition, condom use, child care at home. The logit regression for male is positively co-related to private source of drinking water, weekly water requirement; purify drinking water, known nutrition, curd and vegetable consumption. It is negatively correlated to sex, pulses and fruits consumption. In order to reduce the incidence of malnutrition among youths, the state government and municipal corporations must provide infrastructural facilities in slums. Most of the slums are not provided sewage line, electricity, water supply and solid waste collection system etc. The water supply in slums is very important to reduce the water washed and water borne diseases. State government must provide vocational training to poor people of slums. Such skills will improve income and asset holdings. Youth need counseling related to good behavior, nutritious diet, examinations and carrier etc. The role of teachers, parents and NGO's are important for counseling to youths. Health care facilities must be provided to the youths in each slum of region. Such policies will certainly reduce the incidence of malnutrition among youths in region.

Keywords: health, public policy, safe water.

I. Introduction

The youth form the engine of the labor force and represent the future of any nation. The energy, skills and aspirations of youths are invaluable assets that no country can afford to squander (Akintayo D.I. and Adiat K. O. 2013). Malnutrition is consequently the most important risk factor for the burden of disease in developing countries. It is the direct cause of about thirty thousand deaths per year and is indirectly responsible for about half of all deaths in young children. The risk of death is directly correlated with the degree of malnutrition (Muller, Olaf and Michael Krawinkel 2005, Ergin F.et.al 2007). In India, the young people in the age group of 10-24 year constitute one of the precious resources. But nearly 10-30 per cent of young people suffer from health impacting behaviors and conditions that need urgent attention of policy makers and public health professionals (Singh Sunitha and Gopalkrishna Gururaj 2014).

Youth needs nutrition for physical growth, educational achievement and future work. The additional supplementation of protein, iron, and other nutrients support growth. The need of nutrition is much higher for the young girls because physical growth, menstruation cycles, future pregnancy. For healthy and productive population, the youth nutrition cannot be ignored. Youth also play an important role in economic development of any country. Healthy youths always acquire skills in a competitive environment. The skilled workforce can help to achieve higher economic growth. India has an opportunity of demographic dividend. Therefore youth issues are very important from current and future perspective. The malnutrition among youths involves many underlying factors such as social, economic, cultural, and environmental conditions. The underlying factors that affect household conditions directly and indirectly include parental education, employment and support. The malnutrition incidence among youths varies among different societies. Therefore it is important to explore these relationships in societies with common social and cultural backgrounds (Rikimaru Toru et.al 1998)

Mumbai Metropolitan Region is economically developed region of Maharashtra state. The development of services sector demand different skills from youths. Youths in the region are facing a higher competitive environment in terms of employment and education. All youths do not have same socio-economic environment. The parents of youths are less educated and live in slums. Therefore they do not understand the youth's different issues. The poor families of slums earn very low income from daily activities. Most of the

Author: Ph.D, Assistant Professor, Department of Economics, S. K. Somaiya College, Mumbai University, India.
e-mail: sanjayjrode@gmail.com

© 2015 Global Journals Inc. (US)

households are depends on construction activities, small scale self employment. Self employment include sell of cloths, fish, garlic, vegetables, plastic etc. The daily income earned from self employment activities is very low. The earning members of family get maximum share of food, money and health care. The children, youths and older members left with very low share. They have no choice but to satisfy basic needs. The poor families do not able to invest in youth's health and education. Youths spend maximum time for household chores and caring of sibling. Some youths play different games after school and college hours. They do not go regularly to school and college and concentrate on study. Parents are involved in daily wage earning and self employment. Therefore they do not have time to monitor youth activities. Poor health status and low educational achievement is responsible for drop out from schools of youths. The girls get busy with household chores. If they are older then they work along with their mothers. The girls also help in household chores and caring of other members. The poverty at household level does not help youths to achieve more academic progress. Families do not afford more education of youths. Females are not allowed to pursue more education. The male get more priority in food and health care. The male members get more qualitative diet as compare to female. The female are offered very low intake of food. The gender bias is practiced in slums in terms of health care and education. Access to electronic assets such as television, radio helps youths to get more information knowledge as current affairs. But families do not have money to buy such assets. Therefore youths do not get any knowledge and information. Access to vehicles such as bike, car and bicycle helps youths to use infrastructural facilities more effectively. But families in slums are very poor. They cannot afford to buy such expensive assets. It affects on the overall mobility of the household members and youths. Most of the youths carry drinking water in slums. The households often transfer responsibility on youths because there is no any kind of choice. Household size is large and there is scarcity of resources. Most of the poor families do not allow youths to buy different day today needs. The first part of paper deals with data collection and economic model. The second part of research paper deals with socio-economic determinants of malnutrition among youths in metropolitan region. The second last part of research paper deals with regression results. The last part of paper explains conclusion and policy implication.

II. Data and Methodology

For this study, we have collected primary data of slum households in Mumbai Metropolitan Region. We have collected 767 households' data from eight slums such as Mankhurd East and West, Govandi East and West, Kalwa, Koparkhairne, Rabale, Turbhe, Vashi and Ghatkopar. The household heads and women are interviewed during survey. The questionnaire comprises as different questions related to household members, youths, income and expenditure, fertility behavior, household assets, media exposure and illness. We focused more on the youth behavior, health status, contraceptive knowledge and health care access. The primary data is collected in May-June 2014. We have analyzed data in SPSS@20 and STATA@12 software.

a) Economic model

We have developed economic model to understand the malnutrition among youths in metropolitan region.

$$M=(C, Y, A) \quad (1)$$

Malnutrition is observed among children, youths and adults in any region.

$$Y_m=f(A) \quad (2)$$

Malnutrition among youths is related to age. We have considered age of youths as per United Nations definition.

b) Region

We have studied the incidence of malnutrition among youths in Mumbai Metropolitan Region

$$Y_m= (E, C, W, T) \quad (3)$$

Incidence of malnutrition in Mumbai Metropolitan Region is observed in Eastern, Central, Western and Thane district.

$$Y_m= (Se,Mo,Mi) \quad (4)$$

Youth malnutrition mainly categorized as severely, moderate and mild malnutrition.

c) Education

Parent's education is sole determinant of youth malnutrition in region. Youths own education is also important. It is categorized as follows.

$$Y_m= E_e,M_e,F_e(I,P,S,H_S,C) \quad (5)$$

Youth malnutrition is because of education of youth, mother and father. Each members education is further classified as illiterate, primary, secondary, high school studied and college.

d) Household income

Household income decides the health status of youths.

$$Y_m=(Y) \quad (6)$$

Youth malnutrition is a function of household income.

© 2015 Global Journals Inc. (US)

e) Asset holding

Every house has physical, electronic assets and they are determinant of youth health.

$$Y_m=(A_s) \quad (7)$$

The assets in the house are categorized as follows.

$$A_s=(C,B,W,E,F,Bi,Sm,Ra,Tel,Bi,Ca) \quad (7a)$$

The assets are categorized as cooker, bed, watch, electricity, fan, bicycle, sewing machine, radio, telephone, refrigerator, television, bike and car.

f) Age at marriage

Age of marriage and nutritional status play an important role. Poor health status and marriage make the youths more vulnerable.

$$Y_m= (A_m) \quad (8)$$

Malnutrition among youth is related to age at marriage. The age at marriage is classified into three types.

$$A_m= (La, Aa, Oa) \quad (8a)$$

The age of marriage is defined as lower age, actual legal age and over age.

g) Food intake

The adequate food intake is the first determinant of youth malnutrition.

$$Y_m=N_k \quad (9)$$

Malnutrition among youth is related to nutrition knowledge and food eaten.

$$Nk= (M, C, P, B, Ve, Fr, E, Ch, Me, Fi) \quad (9a)$$

Nutritional knowledge and food eaten is categorized as milk, curd, pulses, beans, vegetables, fruits, eggs, chicken, meat, fish etc.

h) Drinking water

Safe, affordable and adequate drinking water is must for all households. It is the basic requirement and determinant of good health status.

$$Y_m= (D_w) \quad (10)$$

Malnutrition among youths is related to drinking water.

$$D_w=(S,I_d,W_p,T, C,P_c) \quad (10a)$$

Drinking water is related to safe water, liters daily required, water purified, time to carry water, cost of water, persons carry drinking water.

$$D_w= (P_s,G_s) \quad (10b)$$

Drinking water is mainly brought from private and government sources.

$$D_w=P (M_a, Fe, C_h) \quad (10c)$$

Drinking water is carried by male, female and children in slums.

III. Malnutrition among Youths in MMR

Malnutrition is a global problem. In the developing countries, malnutrition is severe problem in all age groups. The protein energy malnutrition affects infant, school children and pregnant women. The micro nutrients are essential for mother and the growing baby. But they do not get adequate quantity and quality of food (Opara J.A et.al 2011). Youths do not get the quality diet health care as well as care in the poor households. Malnutrition reduces their physical capacity to do study and achieve knowledge. It is required for skilled workforce. They cannot complete more education as well as earn future income. There are direct and indirect factors responsible for the malnutrition among youths.

Table 1 : Malnutrition among youths in MMR (Percent)

Suburb	Severe		Moderate		Mild	
	M	F	M	F	M	F
Mankhurd(E)	25.00	7.41	7.50	14.81	25.00	22.22
Mankhurd(W)	5.00	0.00	10.00	3.70	30.00	14.81
Govandi(E)	0.00	6.25	0.00	0.00	25.00	18.75
Govandi (W)	30.77	10.53	7.69	7.89	23.08	10.53
Kalwa	19.44	8.40	11.11	9.16	22.22	14.50
Koparkhairne	33.33	2.86	13.33	5.71	13.33	5.71
Rabale	0.00	14.29	0.00	0.00	0.00	21.43
Turbe	17.39	2.63	30.43	39.47	21.74	18.42
Vashi	0.00	6.67	17.65	13.33	11.76	13.33
Ghatkopar	11.11	22.22	11.11	0.00	11.11	11.11
Total	18.27	7.14	12.18	11.14	20.81	14.57

Source: Computed from primary data

© 2015 Global Journals Inc. (US)

We found there is gender difference of incidence of malnutrition among youths. Incidence of severe malnutrition among male is 33.33 percent in Koparkhairne but among female it is 22.22 percent in Ghatkopar. The incidence of moderate malnutrition among male is 30.43 percent. But it is 39.47 percent among female in Turbhe. In Turbhe, the slums do not have basic facilities such as water supply, electricity, sewage and solid waste collection. It is affecting on youths health status. The incidence of moderate malnutrition among male is 30 percent in Mankhurd (W). Moderate malnutrition is 22.22 percent among female in Mankhurd (E). We have not found any incidence of malnutrition among male in Rabale. We found that the incidence of moderate and severe malnutrition is more among male. The incidence of obesity is found more among the female as compare to male.

a) Age wise incidence of malnutrition

The United Nations have defined 'youth' as those persons between the ages of 15 and 24 years. We have used same definition to categorize youth in region. As the age of youth increases, he/she understand more about the proper nutrition and diet. He can develop good friend circle and talk to nutrition experts. They visit with friends to market, cinema and community centers. Youth can chat on various topics with friends and can have own opinion about different things. They understand what is good for their health and well being. At smaller age youths have less mobility and do not have frequent movement in the community. As age is growing, youths are listening radio, watch television and listen views of parents, friends, teachers and experts.

Table 2 : Age-wise malnutrition among youths (Percent)

Suburb/Age	15-17		18-20		21-23		24-25	
	M	F	M	F	M	F	M	F
Mankhurd(E)	16.67	22.64	33.33	41.51	27.27	16.98	22.73	18.87
Mankhurd(W)	14.71	10.00	26.47	25.00	29.41	25.00	29.41	40.00
Govandi(E)	11.11	31.82	38.89	22.73	16.67	27.27	33.33	18.18
Govandi (W)	30.91	16.07	27.27	35.71	20.00	16.07	21.82	32.14
Kalwa	15.63	14.74	21.88	25.64	21.88	32.69	40.63	26.92
Koparkhairn	32.00	15.56	26.00	31.11	10.00	24.44	32.00	28.89
Rabale	19.05	29.41	38.10	11.76	19.05	17.65	23.81	41.18
Turbe	15.91	20.45	43.18	43.18	11.36	11.36	29.55	25.00
Vashi	6.25	6.25	50.00	62.50	18.75	12.50	25.00	18.75
Ghatkopar	0.00	15.38	50.00	38.46	20.00	23.08	30.00	23.08
Total	19.02	17.10	30.98	31.82	20.00	23.59	30.00	27.49

Source: As per table one

The 32 percent male of Koparkhairne in 15-17 age group are malnourished. The female in this age group are 29.41 percent in Rabale. The half male in 18-20 age groups are malnourished in Vashi and Ghatkopar. The females are 62.50 percent in this category. Such incidence of malnutrition is very high in this age group. The girls required quality intake of food and care bit it is not given in this age group in Vashi. In 21-23 age groups, nearly 29.41 percent male in Mankhurd (E) are malnourished. Among female, it is 32.69 percent in Kalwa. In 24-25 age groups, 33.33 percent male of Govandi (E) are malnourished. Among female, it is 41.18 percent in Rabale. In 18-20 age group, the female are more malnourished as compare to male.

Table 3 : Age wise incidence of malnutrition among youths (Percent)

Type of malnutrition/ Age group	Sex	15-17	18-20	21-23	24-25	Total
Sever	M	15.15	23.29	17.14	14.29	18.27
	F	9.30	9.09	6.82	4.59	7.14
Moderate	M	15.15	9.59	14.29	12.50	12.18
	F	9.30	16.36	6.82	10.09	11.14
Mild	M	33.33	16.44	17.14	21.43	20.81
	F	11.63	14.55	13.64	16.51	14.57

Source: As per table one

© 2015 Global Journals Inc. (US)

In 18-20 age group, 23.29 percent male are severe malnourished. Among female, it is 9.30 percent in 15-17 age group. The 15.15 percent male of 15-17 age group are in moderate category. The females in this category are 16.36 percent in 18-20 age groups. The mild malnutrition is 33.33 percent in 15-17 age groups among male. Among female, it is 16.51 percent in 24-25 age group.

b) Youth's education and malnutrition

Educated youth always understand the benefits of good health. He/she takes positive steps in terms of quality health care. The less educated youths do not understand the quality health care and future health care needs. They are the neglected part by family and society. Educated youth read newspaper, watch television and cinema. Youth learn many health and carrier related things in day to day life.

Table 4 : Youths education and malnutrition (Percent)

Malnutrition/ Education	Sex	Illiterate	Primary	Secondary	Higher secondary	College
Sever	M	3.75	6.38	8.41	12.50	14.29
	F	4.17	10.64	5.31	6.25	0.00
Moderate	M	5.00	2.13	3.54	12.50	0.00
	F	11.67	2.13	4.42	0.00	0.00
Mild	M	5.00	4.26	9.73	6.25	0.00
	F	10.00	12.77	9.29	0.00	14.29

Source: As per table one

The college studied 14.29 percent male are severely malnourished. The 10.64 percent female of primary studied are severely malnourished. The moderate malnourished college studied youth is not found in our survey. But 11.67 percent female are moderate malnourished and they are illiterate. Illiteracy certainly not helps to females to have good health. Among male, it is 12.50 percent but they are higher secondary studied. Mild malnutrition among male is 9.73 percent and they are secondary school studied. There are 14.29 percent female are mild malnourished but they are college studied.

c) Parent's education and malnutrition among youths

Education of parents is most important to wipe out malnutrition. But low parents parent's does not help to provide good food, quality care and assets to youths. Educated parents easily understand the needs of youths. They always prepare to invest more in education, health of youths.

Table 5 : Parents education and malnutrition among youths (Percent)

Malnutrition and parents education	Sex	Mothers Education			Fathers education		
		Sever	Moderate	Mild	Sever	Moderate	Mild
Illiterate	M	6.97	11.94	14.43	16.03	18.32	18.32
	F	8.29	15.61	13.17	19.38	18.60	18.60
Primary	M	9.68	9.68	9.68	0.00	16.67	8.33
	F	4.35	8.70	17.39	42.86	14.29	14.29
Secondary	M	11.58	12.63	8.42	7.50	27.50	25.00
	F	11.11	4.94	14.81	27.66	17.02	17.02
Higher secondary	M	5.26	0.00	0.00	0.00	0.00	0.00
	F	16.67	0.00	0.00	0.00	0.00	0.00
College	M	100	0.00	0.00	0.00	0.00	0.00
	F	66.67	0.00	0.00	0.00	0.00	0.00
Total	M	8.65	11.24	11.53	12.97	20.00	18.92
	F	9.40	11.91	13.48	22.40	18.03	18.03

Source: As per table one

© 2015 Global Journals Inc. (US)

Nearly 12 percent male are moderate malnourished but the mothers are illiterate. Among female, 15.61 percent are moderate malnourished and the mother are illiterate. The 16.13 percent male are obese 1 but the mothers are primary studied. Total 17.39 percent female are mild malnourished. The mild malnourished female are 14.81 percent and mothers are secondary studied. The mothers are higher secondary studied. The 16.67 percent female are severe malnourished but the mothers are higher secondary studied. All male are severely malnourished but the mothers have college education. The females are 66.67 percent in this category. It is because the college studied mothers are few and incidence is more. But we can say that more educated mothers have less incidence of malnutrition among youths. As far as father's education is concerned then, 18.32 percent male are mild and moderate malnourished but the father is illiterate. The female are 19.38 percent severely malnourished but the father is illiterate. The 16.67 percent male are mild malnourished but the fathers have primary education. The 42.86 percent male and female are severely malnourished but the fathers are primary studied. The 27.50 percent male are mild malnourished but the father is secondary studied. The female severely malnourished are 27.66 percent and father is secondary studied. We have not found malnourished youths with father's higher secondary school and college education.

d) Monthly income and malnutrition among youths

Household income is the significant determinant of health of youth. At lower income, family does not buy basic needs for members. Most of the time youth compromise with households economic conditions and start working at early age. It does not help their carrier and health. In short period, the knowledgeable youth earn more income for family. The households with higher income help youths to get more economic freedom. They can study well and can have good health. The low household income is a failure of youth's future carrier.

Table 6 : Per capital income and nutritional status of youths (Percent)

Malnutrition/ Monthly income(Rs.)	Sex	500-4500	4500-8500	8500-12500	12500-16500	16500-Above
Sever	M	19.35	51.61	12.90	16.13	0.00
	F	21.43	42.86	32.14	3.57	0.00
Moderate	M	20.83	41.67	20.83	8.33	8.33
	F	22.50	37.50	22.50	5.00	12.50
Mild	M	35.14	45.95	10.81	5.41	2.70
	F	25.00	42.31	25.00	3.85	3.85

Source: As per table one

Nearly half of the severely malnourished males have monthly income between Rs 4500-8500. Among 42.86 percent severely malnourished female are also from same category. Total 20.83 percent male are moderate malnourished and income category is 41.67 percent. For female, it is 37.50 percent. The 35.14 percent male are mild malnourished and they have income category of Rs 500-4500. The mild malnourished females are one fourth and they have income of Rs.500-4500 and Rs 13000-16500. Nearly 66.67 percent male are obese one and their income is between Rs.4500-8500. Among female it is 56.82 percent. The obese two are 50 percent and their income is Rs 13000-16500. Among female, it is 56.67 percent and income is in the range of Rs 4500-8500. We have not found obese 3 male in region. But 60 percent female are obese three and they are in income category of Rs.500-4500. We have found that at lower income there is higher incidence of obesity. There is need of more research to understand such relationship in slums of metropolitan region.

e) Assets holding and malnutrition among youths

Assets in the households such as radio, television, refrigerator, car and bike are very useful to access different kinds of information and nutrition. All physical and electronic assets help youths to have good health as well as education. Youths can develop their carrier and earn more income in future.

© 2015 Global Journals Inc. (US)

Table 7 : Asset holding and incidence of malnutrition among youths

Assets	Severe		Moderate		Mild	
	M	F	M	F	M	F
Cooker	11.84	21.37	8.98	9.40	14.69	23.08
Bed	7.41	31.03	11.11	10.34	16.67	13.79
Watch	8.16	28.13	4.08	3.13	8.16	25.00
Electricity	9.32	22.22	7.89	8.89	14.34	22.96
Fan	9.39	22.22	7.94	8.89	14.44	22.96
Bicycle	11.76	27.78	11.76	16.67	23.53	11.11
Swing machine	0.00	0.00	0.00	0.00	0.00	100.00
Radio	0.00	0.00	0.00	0.00	0.00	0.00
Telephone	8.18	3.13	8.18	6.25	13.64	18.75
Refrigerator	25.00	0.00	0.00	0.00	25.00	50.00
Television	9.47	17.28	9.47	8.64	11.83	28.40
Bike	10.00	30.77	0.00	7.69	20.00	30.77
Car	0.00	0.00	0.00	0.00	0.00	0.00

Source: As per table one

Only 8.98 percent male and 9.40 percent female are moderate malnourished but have cooker in house. Similarly 11.11 percent moderate malnourished male and 10.34 percent moderate malnourished female have bed at home. Only 3.13 percent moderate malnourished male and 4.08 percent moderate malnourished female have watch at home. Nearly 14.34 percent mild malnourished male households and 22.96 percent mild malnourished female have continuous electricity in house. Around 42.24 percent normal BMI male and 38.52 percent normal BMI female have fan in house. Obese 3 category male and female have not owned bicycle. All moderate malnourished female and normal BMI male have owned swing machine. All normal BMI male have owned the radio. The 8.18 percent male and 3.13 percent female are severely malnourished and they have owned the television. Nearly half male and female have owned refrigerator and they have normal BMI. Only 9.47 percent severely malnourished male and 17.28 percent severely malnourished female have owned the television. Only 7.69 percent mild malnourished female have owned bike. But the households of mild malnourished male have not owned bike. Car is not owned by any households of malnourished male and female. The asset holding such as bike and car is low in slums. The incidence of malnutrition among youth is more with less asset holding of families.

Table 8 : Age at marriage and malnutrition

Age at marriage	Sex	Before>15	15-17	18-20	21-23	23-Above
Severe	M	5.88	7.89	12.50	30.00	0.00
	F	12.00	3.85	6.31	0.00	10.00
Moderate	M	17.65	7.89	10.71	10.00	0.00
	F	4.00	7.69	6.31	5.56	0.00
Mild	M	23.53	18.42	21.43	30.00	50.00
	F	8.00	17.95	8.11	27.78	0.00

Source: As per table one

Nearly 60 percent normal BMI female got married before age of 15 in slums. The male are 52.94 percent in this category. Total 18.42 percent male and 17.95 percent female are mild malnourished but they got married in 15-17 age group. Total 12.50 percent male and 6.31 percent female are severely malnourished but they got married between 18-20 years. The 55.56 percent female got married in 21-23 age group and they have normal BMI. The 50 percent male and 40 percent female got married in 23 and above age group and they are in normal BMI category. The standard human capital theory suggests that youths choose daily diets in order to maximize utility function. But it is subject to two constraints. The first constraint is

© 2015 Global Journals Inc. (US)

the information that they have available about the link between food inputs and health outcomes that they care about. The second constraint is the household budget. The poor households do not have knowledge and resources. It leads to the question of whether mis-nourished youths lack information about the relation between nutrition and health or whether they lack resources. We have asked to the youths about nutrition eaten in household.

Table 9 : Food consumption and BMI categories

Nutritional knowledge/ Malnutrition	Severe		Moderate		Mild	
Sex	M	F	M	F	M	F
Milk	17.49	8.38	12.57	10.4	20.22	14.74
Curd	24.18	6.79	9.89	9.5	19.78	12.22
Pulses	22.55	8.33	10.78	9.21	16.67	13.6
Beans	20.83	7.88	12.5	9.36	19.44	15.76
Vegetable	18.04	8.75	13.4	12.24	20.1	9.33
Fruits	20.16	8.71	10.08	9.06	17.83	12.89
Eggs	18.59	8.21	10.26	9.42	17.95	13.07
Chicken	18.24	8.28	10.69	8.9	18.24	13.5
Meat	18.57	8.64	10	9.3	20.71	13.95
Fish	18.29	8.43	11.59	10.84	21.34	13.55

Source: As per table one

Nearly 24.18 percent male eat curd but they are severely malnourished. The 8.75 percent female are vegetarian but they are severely malnourished. The 13.40 percent male are mild malnourished and they are vegetarian. The 12.24 percent female are mild malnourished but they are vegetarian. The 20.22 percent male are eating milk regularly but they are moderate malnourished. The 15.76 percent female eat beans but they are moderate malnourished. Total 44.19 percent male eat fruits and they have normal BMI. The 45.71 percent female are eating chicken and they have normal BMI. The 7.14 percent male are obese 1 and they eat meat. The 15.84 percent female are obese 1 but they eat curd in diet. Only 1.55 percent male are vegetarian but they are obese 2. The obese 2 female are 10.34 percent but they eat beans. The obese three male are not found in our sample. The obese 3 female are 1.97 percent and they eat beans in their diet. Most of the youths told that they have knowledge of nutrition and they eat most of the food. But we don't know how often they eat nutritious food in house. We need to understand the relationship between income and BMI status of youths in region. The relationship is explained as follows.

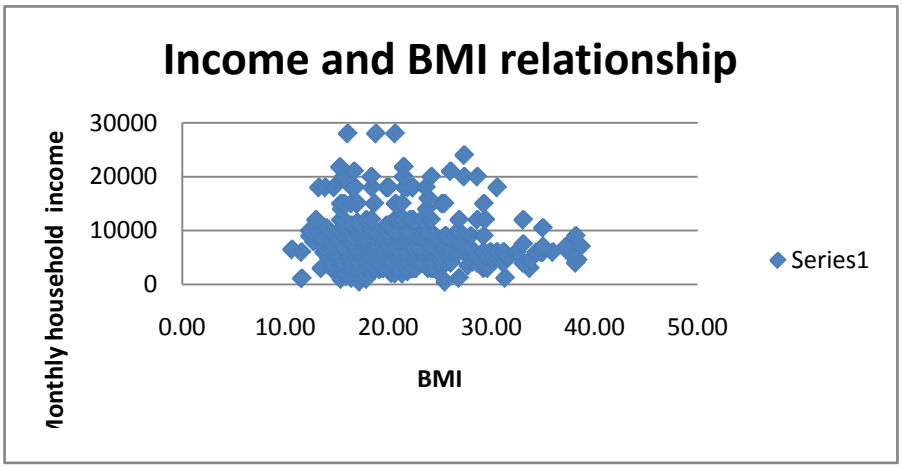


Figure 1.1 : Relationship between monthly income and BMI of youths

© 2015 Global Journals Inc. (US)

The above diagram shows that average households in slums have Rs. 5000 monthly income. Few youths have less BMI due to low household income. But as the household income increases, the BMI of youths also increases. Most of the youths have above 18.5 BMI at Rs.5000-10000 monthly income. But at the same monthly income, the BMI increases from 20 to 30. The BMI upto 25 is considered as normal. But the interventions are required for the higher BMI at lower household income. At higher income, the BMI of youths is observed in normal category.

IV. Logit Regression Results

We used Logit regression model (Greene W.H. 2003) in order to examine the socio-economic reasons behind the youth malnutrition. Such model is used to all age group youths in slums. The youth is classified as malnourished if the BMI falls below 18.5 and above 25. Logit model for youths in slums is as follows

$$\Pr ob(a\ \ given\ \ youth\, is\ \ ma\ln urished = 1) = \frac{Exp(b`x)}{1+\exp(b`x)}$$

We have used such model for male, female and both for MMR slums. The results are presented in the following table.

Table 10 : Regression results for male and female malnutrition

Variables	Coefficient	Std error	Z stat
Sex	0.29**	0.14	2.02
Wages	-0.91**	0.32	-2.84
Water requirement	0.72**	0.30	2.37
Car	-1.04*	0.28	-3.70
Read magazine and newspapers	0.67**	0.30	2.23
Not known of contraceptives	-0.32***	0.18	-1.70
Prenatal care	0.49**	0.19	2.55
Child care at home	-1.58**	0.77	-2.03
Constant	-0.36	0.34	-1.07
	LR chi^2 =46.81 Prob > chi^2 =0.0000		Log likelihood = -544.45518 Pseudo R^2 =0.0412

- *significant at 1 percent ** significant at 5 percent *** significant at 10 percent*

Female are more malnourished as compare to male because female are offered less qualitative food. Medical facilities are offered less to female. The educational opportunities are offered more to male as compare to the female. In India, girls are discriminated in womb itself. Therefore they are more malnourished as compare to boys. The malnutrition among younger female is much more than male. It is statistically significant and positively co-related. The income is the sole determinant of nutrition among youths. But the households have low income. They cannot afford to spend income on the health, education and nutrition. The lowest income does not help households to invest in health of youths. The low purchase of food, fruits does not help youth to gain weight. It affects on future skills and learning. The household income is negatively co-related to malnutrition among youths. Water requirement is large in slums. Households do not get adequate water in slums. Households get water from common taps but it is insufficient. They have to carry water from long distance. Therefore water brought is low and it is laborious activity. Therefore less water is available for regular use. Water requirement is statistically significant and positively co-related in slums. Most of the households are poor. They do not have money to buy different needs of family. The poor households cannot buy car because they do not have money to buy it and park it because of space. Most of the youths read newspaper and magazines. They have up to date information about current affairs. Most of the youths watch television and listen news on radio. The contraceptive related knowledge is not known to youths. This is because no health workers are visiting to slums and explain about contraceptives. Youths are not provided the knowledge of contraceptives at health facility. Health facilities in suburbs are most crowded. Social media does not provide the knowledge on contraceptives. The youths read magazines and newspaper regularly. It is statistically significant and it is positively co-related. Malnourished youths do not know about contraceptives. It is negatively correlated with malnutrition. Most of the female get prenatal care. They visit nearby health care facility. They visit at least two to three times and get the required health checkups.

© 2015 Global Journals Inc. (US)

Prenatal treatment is positively co-related with malnourished youths. Most of the female do not get the child care at home. They have to carry children at work. There is no child care facility available at home. Families do not support the young couples because families are nuclear in nature. The child care at home is negatively correlated with malnourished female youths. Most of the females are working and they do not have child care facility.

Table 11 : Regression result for female youth

Variables	Coefficient	Std error	Z stat
Sex	1.14 *	0.19	6.13
Weekly water requirement	0.78**	0.36	2.20
Known nutrition	-0.21*	0.07	-2.73
Condom used	-0.77*	0.28	-2.71
IUD used	0.46**	0.18	2.57
No of prenatal visits	0.73*	0.18	3.89
Child care at home	-1.37***	0.79	-1.72
Constant	-1.91*	0.21	-8.84
	LR chi^2 =94.63 Prob > chi^2 = 0.0000		Log likelihood = -422.6337 Pseudo R^2 =0.1007

- ** significant at 1 percent ** significant at 5 percent *** significant at 10 percent*

Females are more malnourished as compare to male. They are discriminated in terms of food and care. They do not get medical care. Therefore female are more malnourished. The females are more malnourished as compare to the male in MMR. In slums, water taps are not available in households. At common tap, there is queue for water. Therefore the water supply is less available to households. The water requirement is more but the water availability is less. The weekly water requirement is positive and statistically significant. Most of the female do not know about nutrition. They eat food which is less in nutritional quality. They watch television but they watch movies. They do not get knowledge on television and radio. Such low knowledge of nutrition negatively affects on health outcome. The knowledge of nutrition among female is negatively co-related and statistically significant. Female do not use condom as family planning method. They do not know about it and health staff does not counseling women about use of condom. Female often shy to buy condom at shops. The condom use is negatively among female and it is statistically significant. Female know about IUD. This is because IUD counseling is done at health facility. Female often use it to provide the space among children. But the IUD use is positive and statistically significant. The prenatal care is available of women among slums. After pregnancy they often visit to health care facilities. They visit once or twice and get the necessary health care. The prenatal care is positive and statistically significant among female. The child care at home is negatively co-related and significant. Child care is not available for female in slums. Most of the families are nuclear in nature. Therefore female do not get child care at home. Females often carry children at work. Child care is not exists in slums. It makes the things difficult to improve human resource.

Table 12 : Regression result for male youth

Variables	Coefficient	Std error	Z stat
Sex	-1.38*	0.24	-5.75
Private source of water	0.75*	0.27	2.76
Liter weekly	0.00*	0.00	2.67
Purify water	1.00*	0.38	2.62
Know nutrition	0.78*	0.28	2.76
Curd	0.49***	0.29	1.66
Pulses	-0.49**	0.27	-1.79
Vegetables	0.45**	0.25	1.83
Fruits	-0.67**	0.29	-2.27
Constant	-2.25*	0.42	-5.32
	LR chi^2 =77.45 Prob > chi^2 =0.0000		Log likelihood = -287.97Pseudo R^2 =0.1185

- *significant at 1 percent ** significant at 5 percent *** significant at 10 percent*

© 2015 Global Journals Inc. (US)

The male are less malnourished as compare to female. The male are offered care, food and medical care at home. They are often considered as source of future income and security. Therefore they are less malnourished as compare to female. The male malnutrition is negatively co-related as compare to female. The malnourished male households often buy water from private source. They do not get water from government pipeline. Such water source is denied by government. The slums households those have build their houses before 2000 do not get the water. Such slums are on government land. They are denied the water. Therefore they buy water from private sources. It is very expensive for slum households. The private source of water is positively co-related and statistically significant. Water requirement is positively co-related. Malnourished youths do not get sufficient water. They often get the low supply of water from different sources. Therefore it is statistically significant. The weekly liters of water supply are positive and statistically significant. Malnourished male of household purify water by different methods. They often use cloths to purify water. They do not use machine to purify water. But traditional methods of water purification are used. The households are purifying water by simple method and it is statistically significant. Male know about nutrition. They read books, listen radio and television. Only economic problem is they cannot afford to buy the nutrition. The nutrition knowledge of male is statistically significant and positively co-related. Most of the male eat curd in diet. Most of the male eat curd. It's made when the small quantity of milk is available at home. They eat curd regularly in diet. Eating curd helps youths to get some nutrition. The male eat curd in diet and it is statistically significant and positively co-related. Male do not eat pulses in diet. Pulses are costly. Households cannot afford to buy the pulses. They bring small fresh vegetables at lower prices and eat at home. It worsens health of the youths. But the pulses eaten are negatively co-related and statistically significant. Most of the youths are eating vegetables. They buy the vegetables from street while returning. Therefore youths eat vegetables regularly in diet. Most of malnourished male are vegetarian and it is statistically significant. Households do not eat fruits. They are poor and cannot afford to buy fruits. They are poor and cannot afford to buy fruits. Fruits are expensive and cannot eat every day in diet. The fruits contain various micronutrients but youths cannot afford to buy it and eat it. It affects negatively on their health outcome. In order to reduce the incidence of malnutrition more fruits must be eaten by male. They do not eat fruit and it is negatively co-related and statistically significant.

V. Policy Implication and Conclusion

Government must invest more in infrastructure facilities. Such facilities like water supply, electricity, sewage and housing. All such infrastructure facilities are scarce in slums. It will help youth to achieve future development. Youths need counseling and guidance for carrier. Most of the youths do not have educational background at home. They often lack the economic support. They often chosen activities carrier which is already chosen by their friends. Youths need access of health care. Most of the youth's do not have knowledge of contraceptives and reproductive activities. Health staff does not provide knowledge to such youths. Role of state is very important in terms of educational policy. All the courses are made more competitive and youth require playing, developing hobbies. But parent's educational system has made youth more exam oriented. Youths spend more time in doing study, play indoor games, chat on mobile etc. Role of government and NGO's is very important to change the present educational system. Government must introduce the vocational skills to youths. It will increase their employability. They can get good skills and job and improve standard of living. The metropolitan region requires developed workforce for high economic growth. Youth are in growing stage and learn many skills required for their future carrier. Therefore counseling of youths is required. The role of teacher is important. There should be regular meeting of psychologists, youths, parents and teachers required. Such meeting must be organized on the subject of carrier, present achievements, socio-economic issues, friend circle etc. The NGO's must help economically backward youths to continue their education. Their behavioral, economic, cultural belief problems must get solved by the social organizations. Most of the youths are involved in the number of risky behaviors. They need continuous guidance for different problems. All such counseling will certainly help youths to develop their carrier. Dietary intake and habits of young people are not favorable implementing informative programs and developing practical policies should be noted to improve the diet quality of adolescents and young adults (Akbari F, Azadbakht L 2014). Youths must be taught of nutrition in their curriculum they do not have knowledge of food, vitamins and nutrition. Most of the youths end up eating street and unhygienic food. They must be taught of nutritious food with different vitamins. Such vitamins and calories are required to youths in physically growing stage. But unhygienic and less qualitative food makes them more vulnerable. Such youth cannot achieve more education. It also affects on their future work capacity. Such youths often fail in trap of poverty. Therefore government, parents, teacher, NGO'S must think to have more investment in youths overall development.

© 2015 Global Journals Inc. (US)

Such policies will certainly help those youths to develop them selves.

VI. Acknowledgement

Author would like to thank to Indian Council of Social Science Research (ICSSR), New Delhi, India for providing research grant. Mr. Akshay Kamble, Research Assistant, helped for data collection and analysis.

Bibliography

1. Akbari F, Azadbakht L. A Systematic Review on Diet Quality among Iranian Youth: Focusing on Reports from Tehran and Isfahan. Arch. Iran Med. 2014; 17(8): 574 – 584.
2. Akintayo DI & Adiat KO (2013) 'Human Resource Development for Sustainable Development: Perspective for Youth Empowerment in Nigeria' International Journal of Advances in management and Economics, Vol.2 (5):17-21.
3. Bhattacharya, Jay, Janet Currie (2001) 'Youths at Nutrition Risk: Malnourished or Misnourished?' Edited by Jonathan Gruber, Risky Behavior among Youths: An Economic Analysis University of Chicago Press, January 2001.
4. Ergin, Filiz, Pınar Okyay, Gonca Atasoylu, Erdal Beşer (2007) 'Nutritional status and risk factors of chronic malnutrition in children under five years of age in Aydın, a western city of Turkey' The Turkish Journal of Pediatrics 2007; 49: 283-289.
5. Greene, W. (2003). Econometric Analysis Fifth edition, Pearson Education Private Ltd, Indian Branch, Delhi, India.
6. Muller, Olaf and Michael Krawinkel (2005) 'Malnutrition and health in developing countries' CMAJ, 173 (3) pp 279-286.
7. Opara, Jacinta A., Helen E. Adebola, Nkasiobi S. Oguzor and Sodienye A. Abere (2011) 'Malnutrition During Pregnancy among Child Bearing Mothers in Mbaitolu of South-Eastern Nigeria' Advances in Biological Research 5 (2): 111-115, 2011.
8. Rikimaru Toru, Juliana F. Yartey, Kiyosu Taniguchi, David O. Kennedy and Francis K. Nkrumah (1998) 'Risk Factors for the Prevalence of Malnutrition among Urban Children in Ghana' Nutr Sci Vitaminol, Vol.44, 391-407.
9. Singh Sunitha and Gopalkrishna Gururaj (2014) 'Health behaviors and problems among young people in India: Cause for concern & call for action' Indian J Med Res 140, pp 185-208, August 2014.

© 2015 Global Journals Inc. (US)

Global Journals Inc. (US) Guidelines Handbook 2015

www.GlobalJournals.org

FELLOW OF ASSOCIATION OF RESEARCH SOCIETY IN BUSINESS (FARSB)

Global Journals Incorporate (USA) is accredited by Open Association of Research Society (OARS), U.S.A and in turn, awards "FARSB" title to individuals. The 'FARSB' title is accorded to a selected professional after the approval of the Editor-in-Chief/Editorial Board Members/Dean.

- The "FARSB" is a dignified title which is accorded to a person's name viz. Dr. John E. Hall, Ph.D., FARSB or William Walldroff, M.S., FARSB.

FARSB accrediting is an honor. It authenticates your research activities. After recognition as FARSB, you can add 'FARSB' title with your name as you use this recognition as additional suffix to your status. This will definitely enhance and add more value and repute to your name. You may use it on your professional Counseling Materials such as CV, Resume, and Visiting Card etc.

The following benefits can be availed by you only for next three years from the date of certification:

FARSB designated members are entitled to avail a 40% discount while publishing their research papers (of a single author) with Global Journals Incorporation (USA), if the same is accepted by Editorial Board/Peer Reviewers. If you are a main author or co-author in case of multiple authors, you will be entitled to avail discount of 10%.

Once FARSB title is accorded, the Fellow is authorized to organize a symposium/seminar/conference on behalf of Global Journal Incorporation (USA).The Fellow can also participate in conference/seminar/symposium organized by another institution as representative of Global Journal. In both the cases, it is mandatory for him to discuss with us and obtain our consent.

You may join as member of the Editorial Board of Global Journals Incorporation (USA) after successful completion of three years as Fellow and as Peer Reviewer. In addition, it is also desirable that you should organize seminar/symposium/conference at least once.

We shall provide you intimation regarding launching of e-version of journal of your stream time to time.This may be utilized in your library for the enrichment of knowledge of your students as well as it can also be helpful for the concerned faculty members.

The FARSB can go through standards of OARS. You can also play vital role if you have any suggestions so that proper amendment can take place to improve the same for the benefit of entire research community.

As FARSB, you will be given a renowned, secure and free professional email address with 100 GB of space e.g. johnhall@globaljournals.org. This will include Webmail, Spam Assassin, Email Forwarders,Auto-Responders, Email Delivery Route tracing, etc.

The FARSB will be eligible for a free application of standardization of their researches. Standardization of research will be subject to acceptability within stipulated norms as the next step after publishing in a journal. We shall depute a team of specialized research professionals who will render their services for elevating your researches to next higher level, which is worldwide open standardization.

The FARSB member can apply for grading and certification of standards of their educational and Institutional Degrees to Open Association of Research, Society U.S.A. Once you are designated as FARSB, you may send us a scanned copy of all of your credentials. OARS will verify, grade and certify them. This will be based on your academic records, quality of research papers published by you, and some more criteria. After certification of all your credentials by OARS, they will be published on your Fellow Profile link on website https://associationofresearch.org which will be helpful to upgrade the dignity.

The FARSB members can avail the benefits of free research podcasting in Global Research Radio with their research documents. After publishing the work, (including published elsewhere worldwide with proper authorization) you can upload your research paper with your recorded voice or you can utilize chargeable services of our professional RJs to record your paper in their voice on request.

The FARSB member also entitled to get the benefits of free research podcasting of their research documents through video clips. We can also streamline your conference videos and display your slides/ online slides and online research video clips at reasonable charges, on request.

© Copyright by Global Journals Inc.(US)| Guidelines Handbook

The FARSB is eligible to earn from sales proceeds of his/her researches/reference/review Books or literature, while publishing with Global Journals. The FARSB can decide whether he/she would like to publish his/her research in a closed manner. In this case, whenever readers purchase that individual research paper for reading, maximum 60% of its profit earned as royalty by Global Journals, will be credited to his/her bank account. The entire entitled amount will be credited to his/her bank account exceeding limit of minimum fixed balance. There is no minimum time limit for collection. The FARSC member can decide its price and we can help in making the right decision.

The FARSB member is eligible to join as a paid peer reviewer at Global Journals Incorporation (USA) and can get remuneration of 15% of author fees, taken from the author of a respective paper. After reviewing 5 or more papers you can request to transfer the amount to your bank account.

MEMBER OF ASSOCIATION OF RESEARCH SOCIETY IN BUSINESS (MARSB)

The ' MARSB ' title is accorded to a selected professional after the approval of the Editor-in-Chief / Editorial Board Members/Dean.

The “MARSB” is a dignified ornament which is accorded to a person’s name viz. Dr. John E. Hall, Ph.D., MARSB or William Walldroff, M.S., MARSB.

MARSB accrediting is an honor. It authenticates your research activities. After becoming MARSB, you can add 'MARSB' title with your name as you use this recognition as additional suffix to your status. This will definitely enhance and add more value and repute to your name. You may use it on your professional Counseling Materials such as CV, Resume, Visiting Card and Name Plate etc.

The following benefitscan be availed by you only for next three years from the date of certification.

MARSB designated members are entitled to avail a 25% discount while publishing their research papers (of a single author) in Global Journals Inc., if the same is accepted by our Editorial Board and Peer Reviewers. If you are a main author or co-author of a group of authors, you will get discount of 10%.

As MARSB, you will be given a renowned, secure and free professional email address with 30 GB of space e.g. johnhall@globaljournals.org. This will include Webmail, Spam Assassin, Email Forwarders,Auto-Responders, Email Delivery Route tracing, etc.

© Copyright by Global Journals Inc.(US) | Guidelines Handbook

We shall provide you intimation regarding launching of e-version of journal of your stream time to time.This may be utilized in your library for the enrichment of knowledge of your students as well as it can also be helpful for the concerned faculty members.

The MARSB member can apply for approval, grading and certification of standards of their educational and Institutional Degrees to Open Association of Research, Society U.S.A.

Once you are designated as MARSB, you may send us a scanned copy of all of your credentials. OARS will verify, grade and certify them. This will be based on your academic records, quality of research papers published by you, and some more criteria.

It is mandatory to read all terms and conditions carefully.

Auxiliary Memberships

Institutional Fellow of Open Association of Research Society (USA)-OARS (USA)

Global Journals Incorporation (USA) is accredited by Open Association of Research Society, U.S.A (OARS) and in turn, affiliates research institutions as "Institutional Fellow of Open Association of Research Society" (IFOARS).

The "FARSC" is a dignified title which is accorded to a person's name viz. Dr. John E. Hall, Ph.D., FARSC or William Walldroff, M.S., FARSC.

The IFOARS institution is entitled to form a Board comprised of one Chairperson and three to five board members preferably from different streams. The Board will be recognized as "Institutional Board of Open Association of Research Society"-(IBOARS).

The Institute will be entitled to following benefits:

The IBOARS can initially review research papers of their institute and recommend them to publish with respective journal of Global Journals. It can also review the papers of other institutions after obtaining our consent. The second review will be done by peer reviewer of Global Journals Incorporation (USA) The Board is at liberty to appoint a peer reviewer with the approval of chairperson after consulting us.

The author fees of such paper may be waived off up to 40%.

The Global Journals Incorporation (USA) at its discretion can also refer double blind peer reviewed paper at their end to the board for the verification and to get recommendation for final stage of acceptance of publication.

The IBOARS can organize symposium/seminar/conference in their country on behalf of Global Journals Incorporation (USA)-OARS (USA). The terms and conditions can be discussed separately.

The Board can also play vital role by exploring and giving valuable suggestions regarding the Standards of "Open Association of Research Society, U.S.A (OARS)" so that proper amendment can take place for the benefit of entire research community. We shall provide details of particular standard only on receipt of request from the Board.

The board members can also join us as Individual Fellow with 40% discount on total fees applicable to Individual Fellow. They will be entitled to avail all the benefits as declared. Please visit Individual Fellow-sub menu of GlobalJournals.org to have more relevant details.

We shall provide you intimation regarding launching of e-version of journal of your stream time to time. This may be utilized in your library for the enrichment of knowledge of your students as well as it can also be helpful for the concerned faculty members.

After nomination of your institution as "Institutional Fellow" and constantly functioning successfully for one year, we can consider giving recognition to your institute to function as Regional/Zonal office on our behalf.
The board can also take up the additional allied activities for betterment after our consultation.

The following entitlements are applicable to individual Fellows:

Open Association of Research Society, U.S.A (OARS) By-laws states that an individual Fellow may use the designations as applicable, or the corresponding initials. The Credentials of individual Fellow and Associate designations signify that the individual has gained knowledge of the fundamental concepts. One is magnanimous and proficient in an expertise course covering the professional code of conduct, and follows recognized standards of practice.

Open Association of Research Society (US)/ Global Journals Incorporation (USA), as described in Corporate Statements, are educational, research publishing and professional membership organizations. Achieving our individual Fellow or Associate status is based mainly on meeting stated educational research requirements.

Disbursement of 40% Royalty earned through Global Journals : Researcher = 50%, Peer Reviewer = 37.50%, Institution = 12.50% E.g. Out of 40%, the 20% benefit should be passed on to researcher, 15 % benefit towards remuneration should be given to a reviewer and remaining 5% is to be retained by the institution.

We shall provide print version of 12 issues of any three journals [as per your requirement] out of our 38 journals worth $ 2376 USD.

Other:

The individual Fellow and Associate designations accredited by Open Association of Research Society (US) credentials signify guarantees following achievements:

- The professional accredited with Fellow honor, is entitled to various benefits viz. name, fame, honor, regular flow of income, secured bright future, social status etc.

- In addition to above, if one is single author, then entitled to 40% discount on publishing research paper and can get 10%discount if one is co-author or main author among group of authors.
- The Fellow can organize symposium/seminar/conference on behalf of Global Journals Incorporation (USA) and he/she can also attend the same organized by other institutes on behalf of Global Journals.
- The Fellow can become member of Editorial Board Member after completing 3yrs.
- The Fellow can earn 60% of sales proceeds from the sale of reference/review books/literature/publishing of research paper.
- Fellow can also join as paid peer reviewer and earn 15% remuneration of author charges and can also get an opportunity to join as member of the Editorial Board of Global Journals Incorporation (USA)
- • This individual has learned the basic methods of applying those concepts and techniques to common challenging situations. This individual has further demonstrated an in–depth understanding of the application of suitable techniques to a particular area of research practice.

Note :

"

- In future, if the board feels the necessity to change any board member, the same can be done with the consent of the chairperson along with anyone board member without our approval.
- In case, the chairperson needs to be replaced then consent of 2/3rd board members are required and they are also required to jointly pass the resolution copy of which should be sent to us. In such case, it will be compulsory to obtain our approval before replacement.
- In case of "Difference of Opinion [if any]" among the Board members, our decision will be final and binding to everyone. "

Process of submission of Research Paper

The Area or field of specialization may or may not be of any category as mentioned in 'Scope of Journal' menu of the GlobalJournals.org website. There are 37 Research Journal categorized with Six parental Journals GJCST, GJMR, GJRE, GJMBR, GJSFR, GJHSS. For Authors should prefer the mentioned categories. There are three widely used systems UDC, DDC and LCC. The details are available as 'Knowledge Abstract' at Home page. The major advantage of this coding is that, the research work will be exposed to and shared with all over the world as we are being abstracted and indexed worldwide.

The paper should be in proper format. The format can be downloaded from first page of 'Author Guideline' Menu. The Author is expected to follow the general rules as mentioned in this menu. The paper should be written in MS-Word Format (*.DOC,*.DOCX).

The Author can submit the paper either online or offline. The authors should prefer online submission.Online Submission: There are three ways to submit your paper:

(A) (I) First, register yourself using top right corner of Home page then Login. If you are already registered, then login using your username and password.

(II) Choose corresponding Journal.

(III) Click 'Submit Manuscript'. Fill required information and Upload the paper.

(B) If you are using Internet Explorer, then Direct Submission through Homepage is also available.

(C) If these two are not convenient, and then email the paper directly to dean@globaljournals.org.

Offline Submission: Author can send the typed form of paper by Post. However, online submission should be preferred.

Preferred Author Guidelines

MANUSCRIPT STYLE INSTRUCTION (Must be strictly followed)

Page Size: 8.27" X 11'"

- Left Margin: 0.65
- Right Margin: 0.65
- Top Margin: 0.75
- Bottom Margin: 0.75
- Font type of all text should be Swis 721 Lt BT.
- Paper Title should be of Font Size 24 with one Column section.
- Author Name in Font Size of 11 with one column as of Title.
- Abstract Font size of 9 Bold, "Abstract" word in Italic Bold.
- Main Text: Font size 10 with justified two columns section
- Two Column with Equal Column with of 3.38 and Gaping of .2
- First Character must be three lines Drop capped.
- Paragraph before Spacing of 1 pt and After of 0 pt.
- Line Spacing of 1 pt
- Large Images must be in One Column
- Numbering of First Main Headings (Heading 1) must be in Roman Letters, Capital Letter, and Font Size of 10.
- Numbering of Second Main Headings (Heading 2) must be in Alphabets, Italic, and Font Size of 10.

You can use your own standard format also.
Author Guidelines:

1. General,

2. Ethical Guidelines,

3. Submission of Manuscripts,

4. Manuscript's Category,

5. Structure and Format of Manuscript,

6. After Acceptance.

1. GENERAL

Before submitting your research paper, one is advised to go through the details as mentioned in following heads. It will be beneficial, while peer reviewer justify your paper for publication.

Scope

The Global Journals Inc. (US) welcome the submission of original paper, review paper, survey article relevant to the all the streams of Philosophy and knowledge. The Global Journals Inc. (US) is parental platform for Global Journal of Computer Science and Technology, Researches in Engineering, Medical Research, Science Frontier Research, Human Social Science, Management, and Business organization. The choice of specific field can be done otherwise as following in Abstracting and Indexing Page on this Website. As the all Global

Journals Inc. (US) are being abstracted and indexed (in process) by most of the reputed organizations. Topics of only narrow interest will not be accepted unless they have wider potential or consequences.

2. ETHICAL GUIDELINES

Authors should follow the ethical guidelines as mentioned below for publication of research paper and research activities.

Papers are accepted on strict understanding that the material in whole or in part has not been, nor is being, considered for publication elsewhere. If the paper once accepted by Global Journals Inc. (US) and Editorial Board, will become the copyright of the Global Journals Inc. (US).

Authorship: The authors and coauthors should have active contribution to conception design, analysis and interpretation of findings. They should critically review the contents and drafting of the paper. All should approve the final version of the paper before submission

The Global Journals Inc. (US) follows the definition of authorship set up by the Global Academy of Research and Development. According to the Global Academy of R&D authorship, criteria must be based on:

1) Substantial contributions to conception and acquisition of data, analysis and interpretation of the findings.

2) Drafting the paper and revising it critically regarding important academic content.

3) Final approval of the version of the paper to be published.

All authors should have been credited according to their appropriate contribution in research activity and preparing paper. Contributors who do not match the criteria as authors may be mentioned under Acknowledgement.

Acknowledgements: Contributors to the research other than authors credited should be mentioned under acknowledgement. The specifications of the source of funding for the research if appropriate can be included. Suppliers of resources may be mentioned along with address.

Appeal of Decision: The Editorial Board's decision on publication of the paper is final and cannot be appealed elsewhere.

Permissions: It is the author's responsibility to have prior permission if all or parts of earlier published illustrations are used in this paper.

Please mention proper reference and appropriate acknowledgements wherever expected.

If all or parts of previously published illustrations are used, permission must be taken from the copyright holder concerned. It is the author's responsibility to take these in writing.

Approval for reproduction/modification of any information (including figures and tables) published elsewhere must be obtained by the authors/copyright holders before submission of the manuscript. Contributors (Authors) are responsible for any copyright fee involved.

3. SUBMISSION OF MANUSCRIPTS

Manuscripts should be uploaded via this online submission page. The online submission is most efficient method for submission of papers, as it enables rapid distribution of manuscripts and consequently speeds up the review procedure. It also enables authors to know the status of their own manuscripts by emailing us. Complete instructions for submitting a paper is available below.

Manuscript submission is a systematic procedure and little preparation is required beyond having all parts of your manuscript in a given format and a computer with an Internet connection and a Web browser. Full help and instructions are provided on-screen. As an author, you will be prompted for login and manuscript details as Field of Paper and then to upload your manuscript file(s) according to the instructions.

To avoid postal delays, all transaction is preferred by e-mail. A finished manuscript submission is confirmed by e-mail immediately and your paper enters the editorial process with no postal delays. When a conclusion is made about the publication of your paper by our Editorial Board, revisions can be submitted online with the same procedure, with an occasion to view and respond to all comments.

Complete support for both authors and co-author is provided.

4. MANUSCRIPT'S CATEGORY

Based on potential and nature, the manuscript can be categorized under the following heads:

Original research paper: Such papers are reports of high-level significant original research work.

Review papers: These are concise, significant but helpful and decisive topics for young researchers.

Research articles: These are handled with small investigation and applications

Research letters: The letters are small and concise comments on previously published matters.

5.STRUCTURE AND FORMAT OF MANUSCRIPT

The recommended size of original research paper is less than seven thousand words, review papers fewer than seven thousands words also.Preparation of research paper or how to write research paper, are major hurdle, while writing manuscript. The research articles and research letters should be fewer than three thousand words, the structure original research paper; sometime review paper should be as follows:

Papers: These are reports of significant research (typically less than 7000 words equivalent, including tables, figures, references), and comprise:

(a)Title should be relevant and commensurate with the theme of the paper.

(b) A brief Summary, "Abstract" (less than 150 words) containing the major results and conclusions.

(c) Up to ten keywords, that precisely identifies the paper's subject, purpose, and focus.

(d) An Introduction, giving necessary background excluding subheadings; objectives must be clearly declared.

(e) Resources and techniques with sufficient complete experimental details (wherever possible by reference) to permit repetition; sources of information must be given and numerical methods must be specified by reference, unless non-standard.

(f) Results should be presented concisely, by well-designed tables and/or figures; the same data may not be used in both; suitable statistical data should be given. All data must be obtained with attention to numerical detail in the planning stage. As reproduced design has been recognized to be important to experiments for a considerable time, the Editor has decided that any paper that appears not to have adequate numerical treatments of the data will be returned un-refereed;

(g) Discussion should cover the implications and consequences, not just recapitulating the results; conclusions should be summarizing.

(h) Brief Acknowledgements.

(i) References in the proper form.

Authors should very cautiously consider the preparation of papers to ensure that they communicate efficiently. Papers are much more likely to be accepted, if they are cautiously designed and laid out, contain few or no errors, are summarizing, and be conventional to the approach and instructions. They will in addition, be published with much less delays than those that require much technical and editorial correction.

The Editorial Board reserves the right to make literary corrections and to make suggestions to improve briefness.

It is vital, that authors take care in submitting a manuscript that is written in simple language and adheres to published guidelines.

Format

Language: The language of publication is UK English. Authors, for whom English is a second language, must have their manuscript efficiently edited by an English-speaking person before submission to make sure that, the English is of high excellence. It is preferable, that manuscripts should be professionally edited.

Standard Usage, Abbreviations, and Units: Spelling and hyphenation should be conventional to The Concise Oxford English Dictionary. Statistics and measurements should at all times be given in figures, e.g. 16 min, except for when the number begins a sentence. When the number does not refer to a unit of measurement it should be spelt in full unless, it is 160 or greater.

Abbreviations supposed to be used carefully. The abbreviated name or expression is supposed to be cited in full at first usage, followed by the conventional abbreviation in parentheses.

Metric SI units are supposed to generally be used excluding where they conflict with current practice or are confusing. For illustration, 1.4 l rather than 1.4 × 10-3 m3, or 4 mm somewhat than 4 × 10-3 m. Chemical formula and solutions must identify the form used, e.g. anhydrous or hydrated, and the concentration must be in clearly defined units. Common species names should be followed by underlines at the first mention. For following use the generic name should be constricted to a single letter, if it is clear.

Structure

All manuscripts submitted to Global Journals Inc. (US), ought to include:

Title: The title page must carry an instructive title that reflects the content, a running title (less than 45 characters together with spaces), names of the authors and co-authors, and the place(s) wherever the work was carried out. The full postal address in addition with the e-mail address of related author must be given. Up to eleven keywords or very brief phrases have to be given to help data retrieval, mining and indexing.

Abstract, used in Original Papers and Reviews:

Optimizing Abstract for Search Engines

Many researchers searching for information online will use search engines such as Google, Yahoo or similar. By optimizing your paper for search engines, you will amplify the chance of someone finding it. This in turn will make it more likely to be viewed and/or cited in a further work. Global Journals Inc. (US) have compiled these guidelines to facilitate you to maximize the web-friendliness of the most public part of your paper.

Key Words

A major linchpin in research work for the writing research paper is the keyword search, which one will employ to find both library and Internet resources.

One must be persistent and creative in using keywords. An effective keyword search requires a strategy and planning a list of possible keywords and phrases to try.

Search engines for most searches, use Boolean searching, which is somewhat different from Internet searches. The Boolean search uses "operators," words (and, or, not, and near) that enable you to expand or narrow your affords. Tips for research paper while preparing research paper are very helpful guideline of research paper.

Choice of key words is first tool of tips to write research paper. Research paper writing is an art.A few tips for deciding as strategically as possible about keyword search:

- One should start brainstorming lists of possible keywords before even begin searching. Think about the most important concepts related to research work. Ask, "What words would a source have to include to be truly valuable in research paper?" Then consider synonyms for the important words.
- It may take the discovery of only one relevant paper to let steer in the right keyword direction because in most databases, the keywords under which a research paper is abstracted are listed with the paper.
- One should avoid outdated words.

Keywords are the key that opens a door to research work sources. Keyword searching is an art in which researcher's skills are bound to improve with experience and time.

Numerical Methods: Numerical methods used should be clear and, where appropriate, supported by references.

Acknowledgements: Please make these as concise as possible.

References

References follow the Harvard scheme of referencing. References in the text should cite the authors' names followed by the time of their publication, unless there are three or more authors when simply the first author's name is quoted followed by et al. unpublished work has to only be cited where necessary, and only in the text. Copies of references in press in other journals have to be supplied with submitted typescripts. It is necessary that all citations and references be carefully checked before submission, as mistakes or omissions will cause delays.

References to information on the World Wide Web can be given, but only if the information is available without charge to readers on an official site. Wikipedia and Similar websites are not allowed where anyone can change the information. Authors will be asked to make available electronic copies of the cited information for inclusion on the Global Journals Inc. (US) homepage at the judgment of the Editorial Board.

The Editorial Board and Global Journals Inc. (US) recommend that, citation of online-published papers and other material should be done via a DOI (digital object identifier). If an author cites anything, which does not have a DOI, they run the risk of the cited material not being noticeable.

The Editorial Board and Global Journals Inc. (US) recommend the use of a tool such as Reference Manager for reference management and formatting.

Tables, Figures and Figure Legends

Tables: Tables should be few in number, cautiously designed, uncrowned, and include only essential data. Each must have an Arabic number, e.g. Table 4, a self-explanatory caption and be on a separate sheet. Vertical lines should not be used.

Figures: Figures are supposed to be submitted as separate files. Always take in a citation in the text for each figure using Arabic numbers, e.g. Fig. 4. Artwork must be submitted online in electronic form by e-mailing them.

Preparation of Electronic Figures for Publication

Even though low quality images are sufficient for review purposes, print publication requires high quality images to prevent the final product being blurred or fuzzy. Submit (or e-mail) EPS (line art) or TIFF (halftone/photographs) files only. MS PowerPoint and Word Graphics are unsuitable for printed pictures. Do not use pixel-oriented software. Scans (TIFF only) should have a resolution of at least 350 dpi (halftone) or 700 to 1100 dpi (line drawings) in relation to the imitation size. Please give the data for figures in black and white or submit a Color Work Agreement Form. EPS files must be saved with fonts embedded (and with a TIFF preview, if possible).

For scanned images, the scanning resolution (at final image size) ought to be as follows to ensure good reproduction: line art: >650 dpi; halftones (including gel photographs) : >350 dpi; figures containing both halftone and line images: >650 dpi.

Color Charges: It is the rule of the Global Journals Inc. (US) for authors to pay the full cost for the reproduction of their color artwork. Hence, please note that, if there is color artwork in your manuscript when it is accepted for publication, we would require you to complete and return a color work agreement form before your paper can be published.

Figure Legends: Self-explanatory legends of all figures should be incorporated separately under the heading 'Legends to Figures'. In the full-text online edition of the journal, figure legends may possibly be truncated in abbreviated links to the full screen version. Therefore, the first 100 characters of any legend should notify the reader, about the key aspects of the figure.

6. AFTER ACCEPTANCE

Upon approval of a paper for publication, the manuscript will be forwarded to the dean, who is responsible for the publication of the Global Journals Inc. (US).

6.1 Proof Corrections

The corresponding author will receive an e-mail alert containing a link to a website or will be attached. A working e-mail address must therefore be provided for the related author.

Acrobat Reader will be required in order to read this file. This software can be downloaded

(Free of charge) from the following website:

www.adobe.com/products/acrobat/readstep2.html. This will facilitate the file to be opened, read on screen, and printed out in order for any corrections to be added. Further instructions will be sent with the proof.

Proofs must be returned to the dean at dean@globaljournals.org within three days of receipt.

As changes to proofs are costly, we inquire that you only correct typesetting errors. All illustrations are retained by the publisher. Please note that the authors are responsible for all statements made in their work, including changes made by the copy editor.

6.2 Early View of Global Journals Inc. (US) (Publication Prior to Print)

The Global Journals Inc. (US) are enclosed by our publishing's Early View service. Early View articles are complete full-text articles sent in advance of their publication. Early View articles are absolute and final. They have been completely reviewed, revised and edited for publication, and the authors' final corrections have been incorporated. Because they are in final form, no changes can be made after sending them. The nature of Early View articles means that they do not yet have volume, issue or page numbers, so Early View articles cannot be cited in the conventional way.

6.3 Author Services

Online production tracking is available for your article through Author Services. Author Services enables authors to track their article - once it has been accepted - through the production process to publication online and in print. Authors can check the status of their articles online and choose to receive automated e-mails at key stages of production. The authors will receive an e-mail with a unique link that enables them to register and have their article automatically added to the system. Please ensure that a complete e-mail address is provided when submitting the manuscript.

6.4 Author Material Archive Policy

Please note that if not specifically requested, publisher will dispose off hardcopy & electronic information submitted, after the two months of publication. If you require the return of any information submitted, please inform the Editorial Board or dean as soon as possible.

6.5 Offprint and Extra Copies

A PDF offprint of the online-published article will be provided free of charge to the related author, and may be distributed according to the Publisher's terms and conditions. Additional paper offprint may be ordered by emailing us at: editor@globaljournals.org .

You must strictly follow above Author Guidelines before submitting your paper or else we will not at all be responsible for any corrections in future in any of the way.

Before start writing a good quality Computer Science Research Paper, let us first understand what is Computer Science Research Paper? So, Computer Science Research Paper is the paper which is written by professionals or scientists who are associated to Computer Science and Information Technology, or doing research study in these areas. If you are novel to this field then you can consult about this field from your supervisor or guide.

TECHNIQUES FOR WRITING A GOOD QUALITY RESEARCH PAPER:

1. Choosing the topic: In most cases, the topic is searched by the interest of author but it can be also suggested by the guides. You can have several topics and then you can judge that in which topic or subject you are finding yourself most comfortable. This can be done by asking several questions to yourself, like Will I be able to carry our search in this area? Will I find all necessary recourses to accomplish the search? Will I be able to find all information in this field area? If the answer of these types of questions will be "Yes" then you can choose that topic. In most of the cases, you may have to conduct the surveys and have to visit several places because this field is related to Computer Science and Information Technology. Also, you may have to do a lot of work to find all rise and falls regarding the various data of that subject. Sometimes, detailed information plays a vital role, instead of short information.

2. Evaluators are human: First thing to remember that evaluators are also human being. They are not only meant for rejecting a paper. They are here to evaluate your paper. So, present your Best.

3. Think Like Evaluators: If you are in a confusion or getting demotivated that your paper will be accepted by evaluators or not, then think and try to evaluate your paper like an Evaluator. Try to understand that what an evaluator wants in your research paper and automatically you will have your answer.

4. Make blueprints of paper: The outline is the plan or framework that will help you to arrange your thoughts. It will make your paper logical. But remember that all points of your outline must be related to the topic you have chosen.

5. Ask your Guides: If you are having any difficulty in your research, then do not hesitate to share your difficulty to your guide (if you have any). They will surely help you out and resolve your doubts. If you can't clarify what exactly you require for your work then ask the supervisor to help you with the alternative. He might also provide you the list of essential readings.

6. Use of computer is recommended: As you are doing research in the field of Computer Science, then this point is quite obvious.

7. Use right software: Always use good quality software packages. If you are not capable to judge good software then you can lose quality of your paper unknowingly. There are various software programs available to help you, which you can get through Internet.

8. Use the Internet for help: An excellent start for your paper can be by using the Google. It is an excellent search engine, where you can have your doubts resolved. You may also read some answers for the frequent question how to write my research paper or find model research paper. From the internet library you can download books. If you have all required books make important reading selecting and analyzing the specified information. Then put together research paper sketch out.

9. Use and get big pictures: Always use encyclopedias, Wikipedia to get pictures so that you can go into the depth.

10. Bookmarks are useful: When you read any book or magazine, you generally use bookmarks, right! It is a good habit, which helps to not to lose your continuity. You should always use bookmarks while searching on Internet also, which will make your search easier.

11. Revise what you wrote: When you write anything, always read it, summarize it and then finalize it.

12. Make all efforts: Make all efforts to mention what you are going to write in your paper. That means always have a good start. Try to mention everything in introduction, that what is the need of a particular research paper. Polish your work by good skill of writing and always give an evaluator, what he wants.

13. Have backups: When you are going to do any important thing like making research paper, you should always have backup copies of it either in your computer or in paper. This will help you to not to lose any of your important.

14. Produce good diagrams of your own: Always try to include good charts or diagrams in your paper to improve quality. Using several and unnecessary diagrams will degrade the quality of your paper by creating "hotchpotch." So always, try to make and include those diagrams, which are made by your own to improve readability and understandability of your paper.

15. Use of direct quotes: When you do research relevant to literature, history or current affairs then use of quotes become essential but if study is relevant to science then use of quotes is not preferable.

16. Use proper verb tense: Use proper verb tenses in your paper. Use past tense, to present those events that happened. Use present tense to indicate events that are going on. Use future tense to indicate future happening events. Use of improper and wrong tenses will confuse the evaluator. Avoid the sentences that are incomplete.

17. Never use online paper: If you are getting any paper on Internet, then never use it as your research paper because it might be possible that evaluator has already seen it or maybe it is outdated version.

18. Pick a good study spot: To do your research studies always try to pick a spot, which is quiet. Every spot is not for studies. Spot that suits you choose it and proceed further.

19. Know what you know: Always try to know, what you know by making objectives. Else, you will be confused and cannot achieve your target.

20. Use good quality grammar: Always use a good quality grammar and use words that will throw positive impact on evaluator. Use of good quality grammar does not mean to use tough words, that for each word the evaluator has to go through dictionary. Do not start sentence with a conjunction. Do not fragment sentences. Eliminate one-word sentences. Ignore passive voice. Do not ever use a big word when a diminutive one would suffice. Verbs have to be in agreement with their subjects. Prepositions are not expressions to finish sentences with. It is incorrect to ever divide an infinitive. Avoid clichés like the disease. Also, always shun irritating alliteration. Use language that is simple and straight forward. put together a neat summary.

21. Arrangement of information: Each section of the main body should start with an opening sentence and there should be a changeover at the end of the section. Give only valid and powerful arguments to your topic. You may also maintain your arguments with records.

22. Never start in last minute: Always start at right time and give enough time to research work. Leaving everything to the last minute will degrade your paper and spoil your work.

23. Multitasking in research is not good: Doing several things at the same time proves bad habit in case of research activity. Research is an area, where everything has a particular time slot. Divide your research work in parts and do particular part in particular time slot.

24. Never copy others' work: Never copy others' work and give it your name because if evaluator has seen it anywhere you will be in trouble.

25. Take proper rest and food: No matter how many hours you spend for your research activity, if you are not taking care of your health then all your efforts will be in vain. For a quality research, study is must, and this can be done by taking proper rest and food.

26. Go for seminars: Attend seminars if the topic is relevant to your research area. Utilize all your resources.

27. Refresh your mind after intervals: Try to give rest to your mind by listening to soft music or by sleeping in intervals. This will also improve your memory.

28. Make colleagues: Always try to make colleagues. No matter how sharper or intelligent you are, if you make colleagues you can have several ideas, which will be helpful for your research.

29. Think technically: Always think technically. If anything happens, then search its reasons, its benefits, and demerits.

30. Think and then print: When you will go to print your paper, notice that tables are not be split, headings are not detached from their descriptions, and page sequence is maintained.

31. Adding unnecessary information: Do not add unnecessary information, like, I have used MS Excel to draw graph. Do not add irrelevant and inappropriate material. These all will create superfluous. Foreign terminology and phrases are not apropos. One should NEVER take a broad view. Analogy in script is like feathers on a snake. Not at all use a large word when a very small one would be sufficient. Use words properly, regardless of how others use them. Remove quotations. Puns are for kids, not grunt readers. Amplification is a billion times of inferior quality than sarcasm.

32. Never oversimplify everything: To add material in your research paper, never go for oversimplification. This will definitely irritate the evaluator. Be more or less specific. Also too, by no means, ever use rhythmic redundancies. Contractions aren't essential and shouldn't be there used. Comparisons are as terrible as clichés. Give up ampersands and abbreviations, and so on. Remove commas, that are, not necessary. Parenthetical words however should be together with this in commas. Understatement is all the time the complete best way to put onward earth-shaking thoughts. Give a detailed literary review.

33. Report concluded results: Use concluded results. From raw data, filter the results and then conclude your studies based on measurements and observations taken. Significant figures and appropriate number of decimal places should be used. Parenthetical remarks are prohibitive. Proofread carefully at final stage. In the end give outline to your arguments. Spot out perspectives of further study of this subject. Justify your conclusion by at the bottom of them with sufficient justifications and examples.

34. After conclusion: Once you have concluded your research, the next most important step is to present your findings. Presentation is extremely important as it is the definite medium though which your research is going to be in print to the rest of the crowd. Care should be taken to categorize your thoughts well and present them in a logical and neat manner. A good quality research paper format is essential because it serves to highlight your research paper and bring to light all necessary aspects in your research.

Informal Guidelines of Research Paper Writing

Key points to remember:

- Submit all work in its final form.
- Write your paper in the form, which is presented in the guidelines using the template.
- Please note the criterion for grading the final paper by peer-reviewers.

Final Points:

A purpose of organizing a research paper is to let people to interpret your effort selectively. The journal requires the following sections, submitted in the order listed, each section to start on a new page.

The introduction will be compiled from reference matter and will reflect the design processes or outline of basis that direct you to make study. As you will carry out the process of study, the method and process section will be constructed as like that. The result segment will show related statistics in nearly sequential order and will direct the reviewers next to the similar intellectual paths throughout the data that you took to carry out your study. The discussion section will provide understanding of the data and projections as to the implication of the results. The use of good quality references all through the paper will give the effort trustworthiness by representing an alertness of prior workings.

Writing a research paper is not an easy job no matter how trouble-free the actual research or concept. Practice, excellent preparation, and controlled record keeping are the only means to make straightforward the progression.

General style:

Specific editorial column necessities for compliance of a manuscript will always take over from directions in these general guidelines.

To make a paper clear

· Adhere to recommended page limits

Mistakes to evade

- Insertion a title at the foot of a page with the subsequent text on the next page
- Separating a table/chart or figure - impound each figure/table to a single page
- Submitting a manuscript with pages out of sequence

In every sections of your document

· Use standard writing style including articles ("a", "the," etc.)

· Keep on paying attention on the research topic of the paper

· Use paragraphs to split each significant point (excluding for the abstract)

· Align the primary line of each section

· Present your points in sound order

· Use present tense to report well accepted

· Use past tense to describe specific results

· Shun familiar wording, don't address the reviewer directly, and don't use slang, slang language, or superlatives

· Shun use of extra pictures - include only those figures essential to presenting results

Title Page:

Choose a revealing title. It should be short. It should not have non-standard acronyms or abbreviations. It should not exceed two printed lines. It should include the name(s) and address (es) of all authors.

Abstract:

The summary should be two hundred words or less. It should briefly and clearly explain the key findings reported in the manuscript--must have precise statistics. It should not have abnormal acronyms or abbreviations. It should be logical in itself. Shun citing references at this point.

An abstract is a brief distinct paragraph summary of finished work or work in development. In a minute or less a reviewer can be taught the foundation behind the study, common approach to the problem, relevant results, and significant conclusions or new questions.

Write your summary when your paper is completed because how can you write the summary of anything which is not yet written? Wealth of terminology is very essential in abstract. Yet, use comprehensive sentences and do not let go readability for briefness. You can maintain it succinct by phrasing sentences so that they provide more than lone rationale. The author can at this moment go straight to shortening the outcome. Sum up the study, with the subsequent elements in any summary. Try to maintain the initial two items to no more than one ruling each.

- Reason of the study - theory, overall issue, purpose
- Fundamental goal
- To the point depiction of the research
- Consequences, including definite statistics - if the consequences are quantitative in nature, account quantitative data; results of any numerical analysis should be reported
- Significant conclusions or questions that track from the research(es)

Approach:

- Single section, and succinct
- As a outline of job done, it is always written in past tense
- A conceptual should situate on its own, and not submit to any other part of the paper such as a form or table
- Center on shortening results - bound background information to a verdict or two, if completely necessary
- What you account in an conceptual must be regular with what you reported in the manuscript
- Exact spelling, clearness of sentences and phrases, and appropriate reporting of quantities (proper units, important statistics) are just as significant in an abstract as they are anywhere else

Introduction:

The **Introduction** should "introduce" the manuscript. The reviewer should be presented with sufficient background information to be capable to comprehend and calculate the purpose of your study without having to submit to other works. The basis for the study should be offered. Give most important references but shun difficult to make a comprehensive appraisal of the topic. In the introduction, describe the problem visibly. If the problem is not acknowledged in a logical, reasonable way, the reviewer will have no attention in your result. Speak in common terms about techniques used to explain the problem, if needed, but do not present any particulars about the protocols here. Following approach can create a valuable beginning:

- Explain the value (significance) of the study
- Shield the model - why did you employ this particular system or method? What is its compensation? You strength remark on its appropriateness from a abstract point of vision as well as point out sensible reasons for using it.
- Present a justification. Status your particular theory (es) or aim(s), and describe the logic that led you to choose them.
- Very for a short time explain the tentative propose and how it skilled the declared objectives.

Approach:

- Use past tense except for when referring to recognized facts. After all, the manuscript will be submitted after the entire job is done.
- Sort out your thoughts; manufacture one key point with every section. If you make the four points listed above, you will need a least of four paragraphs.

- Present surroundings information only as desirable in order hold up a situation. The reviewer does not desire to read the whole thing you know about a topic.
- Shape the theory/purpose specifically - do not take a broad view.
- As always, give awareness to spelling, simplicity and correctness of sentences and phrases.

Procedures (Methods and Materials):

This part is supposed to be the easiest to carve if you have good skills. A sound written Procedures segment allows a capable scientist to replacement your results. Present precise information about your supplies. The suppliers and clarity of reagents can be helpful bits of information. Present methods in sequential order but linked methodologies can be grouped as a segment. Be concise when relating the protocols. Attempt for the least amount of information that would permit another capable scientist to spare your outcome but be cautious that vital information is integrated. The use of subheadings is suggested and ought to be synchronized with the results section. When a technique is used that has been well described in another object, mention the specific item describing a way but draw the basic principle while stating the situation. The purpose is to text all particular resources and broad procedures, so that another person may use some or all of the methods in one more study or referee the scientific value of your work. It is not to be a step by step report of the whole thing you did, nor is a methods section a set of orders.

Materials:

- Explain materials individually only if the study is so complex that it saves liberty this way.
- Embrace particular materials, and any tools or provisions that are not frequently found in laboratories.
- Do not take in frequently found.
- If use of a definite type of tools.
- Materials may be reported in a part section or else they may be recognized along with your measures.

Methods:

- Report the method (not particulars of each process that engaged the same methodology)
- Describe the method entirely
- To be succinct, present methods under headings dedicated to specific dealings or groups of measures
- Simplify - details how procedures were completed not how they were exclusively performed on a particular day.
- If well known procedures were used, account the procedure by name, possibly with reference, and that's all.

Approach:

- It is embarrassed or not possible to use vigorous voice when documenting methods with no using first person, which would focus the reviewer's interest on the researcher rather than the job. As a result when script up the methods most authors use third person passive voice.
- Use standard style in this and in every other part of the paper - avoid familiar lists, and use full sentences.

What to keep away from

- Resources and methods are not a set of information.
- Skip all descriptive information and surroundings - save it for the argument.
- Leave out information that is immaterial to a third party.

Results:

The principle of a results segment is to present and demonstrate your conclusion. Create this part a entirely objective details of the outcome, and save all understanding for the discussion.

The page length of this segment is set by the sum and types of data to be reported. Carry on to be to the point, by means of statistics and tables, if suitable, to present consequences most efficiently.You must obviously differentiate material that would usually be incorporated in a study editorial from any unprocessed data or additional appendix matter that would not be available. In fact, such matter should not be submitted at all except requested by the instructor.

Content

- Sum up your conclusion in text and demonstrate them, if suitable, with figures and tables.
- In manuscript, explain each of your consequences, point the reader to remarks that are most appropriate.
- Present a background, such as by describing the question that was addressed by creation an exacting study.
- Explain results of control experiments and comprise remarks that are not accessible in a prescribed figure or table, if appropriate.
- Examine your data, then prepare the analyzed (transformed) data in the form of a figure (graph), table, or in manuscript form.

What to stay away from

- Do not discuss or infer your outcome, report surroundings information, or try to explain anything.
- Not at all, take in raw data or intermediate calculations in a research manuscript.
- Do not present the similar data more than once.
- Manuscript should complement any figures or tables, not duplicate the identical information.
- Never confuse figures with tables - there is a difference.

Approach

- As forever, use past tense when you submit to your results, and put the whole thing in a reasonable order.
- Put figures and tables, appropriately numbered, in order at the end of the report
- If you desire, you may place your figures and tables properly within the text of your results part.

Figures and tables

- If you put figures and tables at the end of the details, make certain that they are visibly distinguished from any attach appendix materials, such as raw facts
- Despite of position, each figure must be numbered one after the other and complete with subtitle
- In spite of position, each table must be titled, numbered one after the other and complete with heading
- All figure and table must be adequately complete that it could situate on its own, divide from text

Discussion:

The Discussion is expected the trickiest segment to write and describe. A lot of papers submitted for journal are discarded based on problems with the Discussion. There is no head of state for how long a argument should be. Position your understanding of the outcome visibly to lead the reviewer through your conclusions, and then finish the paper with a summing up of the implication of the study. The purpose here is to offer an understanding of your results and hold up for all of your conclusions, using facts from your research and generally accepted information, if suitable. The implication of result should be visibly described. Infer your data in the conversation in suitable depth. This means that when you clarify an observable fact you must explain mechanisms that may account for the observation. If your results vary from your prospect, make clear why that may have happened. If your results agree, then explain the theory that the proof supported. It is never suitable to just state that the data approved with prospect, and let it drop at that.

- Make a decision if each premise is supported, discarded, or if you cannot make a conclusion with assurance. Do not just dismiss a study or part of a study as "uncertain."
- Research papers are not acknowledged if the work is imperfect. Draw what conclusions you can based upon the results that you have, and take care of the study as a finished work
- You may propose future guidelines, such as how the experiment might be personalized to accomplish a new idea.
- Give details all of your remarks as much as possible, focus on mechanisms.
- Make a decision if the tentative design sufficiently addressed the theory, and whether or not it was correctly restricted.
- Try to present substitute explanations if sensible alternatives be present.
- One research will not counter an overall question, so maintain the large picture in mind, where do you go next? The best studies unlock new avenues of study. What questions remain?
- Recommendations for detailed papers will offer supplementary suggestions.

Approach:

- When you refer to information, differentiate data generated by your own studies from available information
- Submit to work done by specific persons (including you) in past tense.
- Submit to generally acknowledged facts and main beliefs in present tense.

The Administration Rules

Please carefully note down following rules and regulation before submitting your Research Paper to Global Journals Inc. (US):

Segment Draft and Final Research Paper: You have to strictly follow the template of research paper. If it is not done your paper may get rejected.

- The **major constraint** is that you must independently make all content, tables, graphs, and facts that are offered in the paper. You must write each part of the paper wholly on your own. The Peer-reviewers need to identify your own perceptive of the concepts in your own terms. NEVER extract straight from any foundation, and never rephrase someone else's analysis.

- Do not give permission to anyone else to "PROOFREAD" your manuscript.

- Methods to avoid Plagiarism is applied by us on every paper, if found guilty, you will be blacklisted by all of our collaborated research groups, your institution will be informed for this and strict legal actions will be taken immediately.)
- To guard yourself and others from possible illegal use please do not permit anyone right to use to your paper and files.

Criterion for Grading a Research Paper (Compilation) by Global Journals Inc. (US)

Please note that following table is only a Grading of "Paper Compilation" and not on "Performed/Stated Research" whose grading solely depends on Individual Assigned Peer Reviewer and Editorial Board Member. These can be available only on request and after decision of Paper. This report will be the property of Global Journals Inc. (US).

Topics	Grades		
	A-B	**C-D**	**E-F**
Abstract	Clear and concise with appropriate content, Correct format. 200 words or below	Unclear summary and no specific data, Incorrect form Above 200 words	No specific data with ambiguous information Above 250 words
Introduction	Containing all background details with clear goal and appropriate details, flow specification, no grammar and spelling mistake, well organized sentence and paragraph, reference cited	Unclear and confusing data, appropriate format, grammar and spelling errors with unorganized matter	Out of place depth and content, hazy format
Methods and Procedures	Clear and to the point with well arranged paragraph, precision and accuracy of facts and figures, well organized subheads	Difficult to comprehend with embarrassed text, too much explanation but completed	Incorrect and unorganized structure with hazy meaning
Result	Well organized, Clear and specific, Correct units with precision, correct data, well structuring of paragraph, no grammar and spelling mistake	Complete and embarrassed text, difficult to comprehend	Irregular format with wrong facts and figures
Discussion	Well organized, meaningful specification, sound conclusion, logical and concise explanation, highly structured paragraph reference cited	Wordy, unclear conclusion, spurious	Conclusion is not cited, unorganized, difficult to comprehend
References	Complete and correct format, well organized	Beside the point, Incomplete	Wrong format and structuring

Index

A

Auspices · 1

D

Divulges · 55

E

Elicits · 28

I

Inclination · 39

P

Prodigious · 50
Prominences · 3

R

Relativistic · 42

V

Vigorous · 50

save our planet

Global Journal of Management and Business Research

Visit us on the Web at www.GlobalJournals.org | www.JournalofBusiness.Org
or email us at helpdesk@globaljournals.org

ISSN 9755853

© Global Journals