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IMPACT OF INFORMATION TECHNOLOGY IN INSURANCE INDUSTRY IN INDIA

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ABSTRACT

In everyone is affected by risk in many ways. This risk arises when there is the possibility of more outcomes like a financial loss, Individuals, businesses and other organizations face various risks in their different activities and insurance helps protect them against the risks. Insurance is playing important role in our individuals, commerce, Industry and etc. Now a days Information technology is impact in all areas including insurance sector also. The insurance companies are using information technology for better customer service, cost reduction, new product designs and developments etc. Based on this back ground this paper aims to study the role of information technology in Indian insurance sector and its impact in providing online services to their customers. The study found that that the elements such as time saving, ease to use, convenience, accessibility, accuracy in premium amount, not dependent on insurance agents are significantly influence the clients in accessing and availing online insurance services.

Keywords: Risk, Insurance, Information technology, online services

INTRODUCTION

Insurance protects people from loss, damage, and uncertainty. It a social device to reduce or eliminate risk of loss to life, property, business and so on. This industry is support to the general economic growth and develop of financial institutions to the society. The insurance sector in India is approximately the past two centuries old. In India 57 insurance companies in life insurance business and 33 companies are non-line insurers. Life insurers are 6 public sector insurers. In addition to these, there is sole national re-insurer, viz., General Insurance Corporation of India (GIC Re). Other

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participants in Indian Insurance market include individual and corporate agents, brokersand third party administrators servicing health insurance claims.

Now a day's more new private companies entered into the insurance company in India. In this competitions among insurers service has become an important issue. Today managing the customer is critical for the insurer especially in the very competitive situation. Companies apply various sets of regulations and treatment standards to different client needs and desires. So that personalise messaging, insurers must gather client data in a centralised system. With the proliferation of websites and increased access to direct insurance policy information, better strategies are required to provide customers with a completely personalised experience. Personalization assistances organizations to reach their customers with more impact and to generate new revenue through cross selling activities.

Information Technology-Business Process Outsourcing (IT-BPO) sector has become one of the most significant growth catalysts for the Indian economy. IT-BPO industry has repeatedly influence the lives of many Indians through an active contribution to gross domestic product (GDP), employment and standard of living directly and indirectly. This industry playing a significant role in changing India's image as a global player in providing world class technology solutions and business services (National Association of Software and Service Companies 2012). In this junction, the developments in Information Technology supporting to all the industry include the insurance industry in India. The advancements in information technology are performing miracles in all fields of activity. It has become possible to send and receive information almost instantaneously. Traditionally, insurers have been quick and easy to react to new innovations in the world of IT. It has constantly played a important role in the operations of every insurance company. Hence this paper aims to study the role of information technology in Indian insurance sector and its impact in providing online services to their customers.

RESEARCH MEHODOLOGY

• The study is conducted in Coimbatore city and is based on primary and secondary data. Primary data are collected through questionnaire by adopting convenient sample method and the secondary data needed for the study has been obtained from published books, journals, newspaper, magazines and internet etc.

LITERATURE REVIEW

1. R. Meikanda Ganesh Kumar and Dr. P. Anbuoli, In this paper covers various aspects of the use of IT in the insurance sector- Integration Technologies and Standards, Information Security, Claim Management, Insurance Inclusion, CRM Technology etc

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- 2. ParvanehSalatini, FatemehYadollahili, Sahar Eslambolchi, The main purpose of this paper is to examine theoretical relationship between the level of ICT impact on insurance industry in selected average income countries by using panel data for the period 2002-2010. The results of assessment by fixed effects panel and GMM method indicated that the effect of the number of mobile users (per hundred people) as an ICT index on insurance and financial services (% of commercial service exports) as an insurance industry index is positive and significant.
- 3. Dr. C K Hebbar, Sandeep S Shenoy, Guru Prasad Rao and Abhishek Rao, This study found that insurance firms in India have implemented information technology systems in their firm with private sector slightly lower than public sector. The employees young in age with high potentials easily understand the application and efficient use of new systems. Increase of sales and good knowledge of management and better stakeholder relationship will be considered important with respect to corporate related benefits while transparency, speed of claim management and desired CRM through continuous service and high productivity will be considered important customer related benefits.

Development of Insurance

Insurance in its current form dates back to 1818, when Anita Bhavsar founded Oriental Life Insurance Company in Kolkata to serve the needs of the European community. Prior to independence, there was discrimination in India between the lives of foreigners (English) and Indians, with the latter paying higher rates. The Bombay Mutual Life Assurance Society was founded in 1870.

Many insurance businesses were created during the turn of the twentieth century. The Life Insurance Companies Act and the Provident Fund Act were both passed in 1912 to govern the insurance industry. The Life Insurance Companies Act of 1912 mandated that premium-rate tables and company valuations be certified by an actuary on a regular basis. However, discrimination between Indian and foreign enterprises continued to exist. The National Insurance Firm, which was created in 1906 and is still in operation, is India's oldest insurance company.

On January 19, 1956, the Government of India adopted an Ordinance to nationalise the Life Insurance business, and the Life Insurance Corporation was established the same year. The Life Insurance Corporation (LIC) acquired 154 Indian and 16 non-Indian insurers, as well as 75 provident societies, for a total of 245 Indian and foreign insurers. The Indian Parliament approved the General Insurance Business (Nationalisation) Act in 1972, and as a result, the general insurance business was nationalised on January 1, 1973. The National Insurance Company Ltd., the New India Assurance Company Ltd., the Oriental Insurance Company Ltd., and the United India Insurance Company Ltd. were formed through the amalgamation of 107 insurers. The

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General Insurance Corporation of India was established in 1971 and began operations on January 1, 1973.

Until the late 1990s, when the insurance industry was revived to the private sector, the LIC enjoyed a monopoly. There were just two state insurers before that: Life Insurers (Life Insurance Corporation of India, LIC) and General Insurers (General Insurance Corporation of India, GIC). GIC had a total of four subsidiaries. Oriental Insurance Business Limited, New India Assurance Company Limited, National Insurance Company Limited, and United India Insurance Company were de-linked from the parent company in December 2000 and established as independent insurance companies.

Impact of Information Technology in Insurance Industry

The insurance industry has fast develop and growth with help of new technology and technical innovations. The last few years have seen mobile devices, GPS functionality and social media engagement effect hugely as to how insurance claims are processed by companies, policies assessed by insurance agents and customers. This innovative ways to reduce expenditure while expediting the organization's business processes also.

Fast Moving Consumer Goods businesses which a large variety of products to offer, insurance companies have fewer policy products to sell. Acquisition of new customer is always an essential issue and companies are forced to increase their sales team to reach out to new buyers. To growth and profit on a continual basis, online marketing processes can help the insurance providers to reach out directly to the vast magnitude of online buyers.

Increasing the use of internet of things is support to improve communication methods and data processing power also. The data are very easy transmitted by IoT can be further analysed using data processing techniques for useful insights.

Auto-insurers are changing toward Usage-based Insurance, which will aid them to enhance their claim handling capabilities and enable them to perform better customer segmentation. The insurers can have a better segmentation of risk profiles and enhanced claim handling capabilities. New direct insurance start-ups serving customers entirely through mobile or online touch points will emerge.

The insurance companies use the big data analytics enables to identify and report events in a fast and effective way and the claim valuation activity can now be automatically assigned based on the performance of the adjuster and difficulty of the claim. Insurance companies can efficiently implement the subrogation and settlement process.

Aerial and digital images and the technical innovations in it can be used by insurance companies for continuous data management, avoiding risks, providing a quick response

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to catastrophe events, identifying fraud and it decreases the cost of insurance companies processing claims also.

The insurance companies have an information security division and some best practices to avoid cyber-crime, it is impossible to ensure complete protection from cyber-crimes. Cybercrimes has been termed as a potential global threat by the World Economic Forum. The increase in cyber threats are the prime causes for the current essential of cyber insurance. The cyber insurance covers various damages.

The social media is about helping people connect. Consumer and agent expectations for linking have been established through social media that provide an opportunity for people to work together, share information and improve decisions processes both internally with carriers and externally with the distribution channel.

Table 1: Demographic Profile of the respondents				
Demographic Characteristics	Classification	Number of respondents	Percentage	
Sex	Male	113	64.5	
	Female	62	35.5	
	Below 20 years	8	4.5	
	21-30 years	66	38	
Age	31-40 years	31-40 years 53		
	41-50 years	36	20.5	
	Above 50 years	12	7	
	Up to HSC	17	10	
	Graduate	74	42	
Education	Post Graduate	45	26	
	Diploma	28	16	
	Others	11	6	
	Business	32	18	
	Government Employee	29	17	
Occupation	Private Employee	63	36	
	Professional	32	18	

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	Others	19	11
Marital Status	rital Status Married		66
Unmarried		59	34
	Below 2 lakhs	42	24
	Rs.2 – 3 lakhs	60	34.3
Annual Income	Rs.3- 4 lakhs	31	17.7
	Rs.4-5 lakhs	37	21
	Above 5 lakhs	5	3

Table 1 indicates the demographic profile of respondents in Coimbatore city. Out of 175 respondents 64.5 % of them are male, 38 % of the respondents are belonged to the age group of 21-30 years, 30% of the respondents belong to the age group between 31-40 years. 42% of the respondents are graduates, 36% of the respondents are working as private employee. 34.3% of the respondents get annual family income between Rs.2 lakhs and Rs 3 lakhs. Also most of the respondents are married.

Factor analysis is a statistical method for examining data in the fields of psychology, social sciences, and business. An analysis of factors is typically conducted as part of a business research project to determine the correlation between variables. Since the study focuses on impact of information technology in insurance industry. There are several factors which significantly influence the customers in accessing and availing insurance services from the insurer. In the current study factor analysis is applied to measure relationships among factors contributing in availing online insurance services are examined and represented in terms of a few underlying factors. The analysis is done through XLSTAT.

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Table 2 : Factor Analysis : Summary Statistics			
Variable	Mean	Std. deviation	
Familiarity about payment details	3.331	1.063	
Updating policy details	2.389	1.154	
Knowing status of online complaints	3.429	1.111	
Help in grievance redressal	3.051	1.247	
Know about bonus details	3.486	1.174	
Not dependent on Insurance agents	2.920	1.036	
Time saving	3.360	0.865	
Ease to use	2.303	1.142	
Convenience	2.463	0.829	
Ease to submit documents	3.269	1.237	
Knowing status of online claims	3.217	1.098	
Selecting new policies	2.389	1.134	
Filing online complaints	2.920	1.036	
Ease to make online claims	3.331	1.063	
Accuracy in premium amount	3.360	0.865	
Accessibility	3.360	0.865	
Prompt payment	2.463	0.829	

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Table 3: Principal Component Analysis			
	Eigenvalue	Variability (%)	Cumulative %
F1	4.934	29.021	29.021
F2	3.344	19.669	48.691
F3	3.101	18.243	66.934
F4	1.633	9.607	76.541
F5	1.093	6.427	82.968
F6	0.790	4.645	87.613
F7	0.689	4.052	91.666
F8	0.534	3.142	94.807
F9	0.348	2.046	96.853
F10	0.300	1.766	98.619
F11	0.219	1.289	99.908
F12	0.016	0.092	100.000

Table 4 : Kaiser-Meyer-Olkin measure of sampling adequacy:			
Familiarity about payment details	0.585		
Updating policy details	0.643		
Knowing status of online complaints	0.776		
Help in grievance redressal	0.699		
Know about bonus details	0.550		
Not dependent on Insurance agents	0.585		
Time saving	0.540		
Ease to use	0.672		

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Convenience	0.620	
Ease to submit documents	0.652	
Knowing status of online claims	0.605	
Selecting new policies	0.653	
Filing online complaints	0.585	
Ease to make online claims	0.585	
Accuracy in premium amount	0.540	
Accessibility	0.540	
Prompt payment	0.620	
KMO	0.597	
Cronbach's alpha:		0.779

Results after the Varimax rotation:				
Rotation matrix:				
	D1	D2	D3	D4
D1	0.671	0.477	0.285	0.491
D2	0.485	-0.762	-0.334	0.271
D3	0.207	0.431	-0.853	-0.208
D4	0.521	-0.077	0.283	-0.801
Percentage of variance after Varimax rotation:				
	D1	D2	D3	D4
Variability (%)	20.424	20.659	17.192	14.666
Cumulative %	20.424	41.083	58.275	72.941

Before conducting factor extraction, Kaiser-Meyer-Olkin (KMO) test was applied to ensure that the characteristics of data set were suitable for factor analysis. KMO analysis yielded an index of 0.597 and Cronbach's alpha of 0.779. After Varimax

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rotation two factors has optimise the effect with the total cumulative variance of 41.083%. From the above analysis it is found that the factors such as time saving, ease to use, convenience, accessibility, accuracy in premium amount, not dependent on insurance agents are significantly influence the clients in accessing and availing online insurance services. The others factors online filing of clients, complaints, grievance redressal need to be improved further.

Conclusion:

The insurance is playing important role in our individuals, commerce, industry and other organizations face various risks in their different activities, and insurance helps protect them against these risks. Now a days Information technology is impact the insurance sector for better customer service, to reduce the working capital and offer a wonderful opportunity for insurance companies to increase higher profit through online, funds transfer and process automation which are all made possible using reliable technologies. The top insurers are awake the need to use the new technologies to compete in future markets, the natural resistance to high tech changes because of their automatize characteristics, it must be overcome because the speed of transition is indeed dependent on people-acceptance and technical capability. In the nutshell, the insurance companies and the customers have benefitted from the use of information technology in the insurance sector.

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