

RESEARCH ARTICLE

Patient Psychology with Respect to Generic Drugs in Comparison to Branded Drugs

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ABSTRACT

The motto of conducting this study was to know about the various prevalent misconceptions and misapprehensions about what generic medicines would be or on what grounds do they stand apart from branded medicines. Since it was a research and survey based project, the methodology adopted was "Questionnaire-based cross-sectional study". Two types of survey were conducted named as - Qualitative survey and Quantitative survey.

The questionnaire of the Quantitative survey method could be divided into 3 parts i.e. Sociodemographic, medication profile and knowledge on the concept of generic medicines. The intent of including socio demographic analysis in this survey was to get a clear idea of the factors such as age group and occupation which would be having a direct impact on the type and extent of healthcare facilities availed by an individual. Similarly, the medication profile would give a clear view on the patients' psychology over the grounds of reliability on the generic or branded medicines and their inclination would come into light. Knowledge about the generic medicines would clearly demarcate the strengths and loopholes that the present scenario of medication harbors. The questionnaire for Qualitative survey was divided into two parts i.e. the satisfactory aspect and suggestions for medication adherence of patients in future. The satisfactory aspect would let us know the views of a generic-medicine- consumer and simultaneously if he wishes to adhere to it in the future, also by noting his suggestions or the problems faced by him while availing these facilities.

These factors were majorly considered, as in a developing country like India, the incidence of Catastrophic Healthcare Expenditure (CHE) is growing and is now estimated to be one of the major contributors to poverty

Keywords: Generic Drugs, Branded Drugs, Jan Aushadhi Kendra, Patient Psychology

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INTRODUCTION

India has a population of 1.324 billion (2016). World Bank says as of 2016, 12.5% Indians are *Below Poverty Line*. I.e., earn less than 1.95 USD a day or approx. 130 rupees a day and 70% Indians belonging to *Lower Class*.

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India is currently the world's third largest economy in terms of gross national income and has the potential to grow larger in a more equitably. The second important change in this context is the emergence of a 'health care industry' growing at 15% compound annual growth rate despite the global economic slowdown. Even though there exists a positive correlation of economic growth with improved health indicators, such a trend has not been observed in India. Thirdly, the incidence of Catastrophic Healthcare Expenditure (CHE) is growing and is now estimated to be one of the major contributors to poverty. Health care costs are more impoverishing than ever before and almost all hospitalizations, even in public hospitals leads to CHE and over 63 million people are facing poverty every year due to health care costs alone. Healthcare access in India is affected with 70:70 paradox; 70 percent of healthcare expenses are incurred by people from their pockets, of which 70 percent is spent on medicines alone, leading to impoverishment and indebtedness.¹

The Government expenditure on healthcare in India is only 1.04% of GDP which is about 4 % of total expenditure, less than 30% of total health spending which is Rs. 957 per capita at current market prices (1 US dollar = 65.04 Indian Rupee).²

In a developing country like India, the practical substitution of the retail pharmacies with generic drugs is not seen much, instead, the Bureau of Pharmaceutical PSUs of India (BPPI), Department of Pharmaceutical Ministry of Chemicals and Fertilizers, Government of India, took an initiative in 2008 for the establishment of generic pharmacies called "PRADHAN MANTRI BHARTIYA JAN AUSHADHI KENDRA" all over the country to make quality medicines available at affordable prices for all, particularly the poor and disadvantaged through exclusive outlets, so as to reduce and redefine the unit cost of treatment per person. Till date there are about 2800 stores spread over 33 states/UTs of the country. Through these initiatives, more and more patients are now getting exposed to the generic drugs' concept and can compare its advantages and disadvantages to purchase of branded drugs from the open market. Moreover, the studies of NCBI, India, says that Implementation of generic prescribing policy is however ongoing in institutional settings, where drugs can be procured in bulk and dispensed from the institutional inventory with appropriate quality control measures.³

So with a considerate view over the present statistical data about the socioeconomic status of the country and the perplexed condition of the present healthcare facilities

or pharmaceutical services to be specific, there comes a need of hour to revise and reverse the conditions on the grounds of accessibility and affordability. This could be done by bringing a little improvisation in the field of pharmaceutical services by shifting the masses towards the generic section of medicine which would cut off their bills up to less than 50% on an average.⁴

There comes the duty of pharmacists in delivering the patients with the right information about the generic drug market along with the provision of guidance in making a rational choice between branded and generic medicines. With this, an initiative was taken up in order to evaluate the prevalent psychological reason that pushes the masses towards the branded medicines so that we could come up with certain ways and means to change the juncture.^[5]

- *Generic Drugs:* A generic drug is a medication created to be as an already marketed brand-name drug in dosage form, safety, strength, route of administration, quality, performance characteristics, and intended use.⁶
- *Branded Drugs:* A drug that has a trade name and is protected by a patent (can be produced and sold only by the company holding the patent)
- *Branded-Generic Drugs:* A branded generic is the brand name given to a drug that is bioequivalent to the original (innovator) brand, but once the original brand has come off patent it is marketed under another company's brand name, not the generic name.⁷

Benefits of generic medicine over branded medicine

- According to a CDSCO report on "FORMULATE POLICY AND GUIDELINES FOR APPROVAL OF NEW DRUGS, CLINICAL TRIALS AND BANNING OF DRUGS": If new chemical entities (NCEs), new drug substances or their Generic drugs are to be introduced in India, BA/BE studies in patients should be done as a part of the clinical trials. Generic drugs produced in India for the first time should undergo BE studies in comparison with the innovator molecule. In case of generic drugs, similar biologics or new chemical entities (NCEs)/new biological entities (NBEs), the background information available on the safety profile from the innovator's trials, marketing experience and the limited trials within the country under the conditions specified should be given on the product label.⁸
- The generic drug is "pharmaceutically equivalent" to the brand. The generic drug needs to show that it is the same type of product (such as a tablet or an injectable) and uses the same time release technology (such as immediate-release, meaning for immediate effect of the drug, or extended-release, meaning one that is intended to slowly release the active ingredient over time).
- The manufacturer is capable of making the drug correctly. Often different companies are involved (such as one company manufacturing the active ingredient and another company manufacturing the finished drug). Generic drug manufacturers must produce batches of the drugs they want to market and provide information about the manufacturing of those batches for FDA to review.
- The manufacturer is capable of making the drug consistently. Generic drug manufacturers must explain how they intend to manufacture the drug, and provide evidence that each step of the manufacturing process will produce the same result each time. FDA scientists review those procedures and FDA inspectors go to the generic drug manufacturer's facility to verify that the manufacturer is capable of making the drug consistently and to check that the information the manufacturer has submitted to FDA is accurate.⁹
- The "active ingredient" is the same as that of the brand. An active ingredient in a medicine is the component that makes it pharmaceutically active - effective against the illness or condition it is treating. Generic drug companies must provide evidence that shows that their active ingredient is the same as that of the brand-name drug they copy, and FDA must review that evidence.
- The right amount of the active ingredient gets to the place in the body where it has effect. Two drug products with the same amount of active ingredient may be processed differently for different two drug products with the same amount of active ingredient may be processed differently for different people. Generic drug companies must perform studies that show that the same amount of drug gets to the bloodstream and that it gets there at about the same time. FDA scientists analyze the results to be sure the generic will produce the same result as the brand-name drug.¹⁰
- The "inactive" ingredients of the drug are safe. Some differences, which must be shown to have no effect on how the drug functions, are allowed between the generic drug and the brand. Generic drug companies must submit evidence that all the ingredients used in their products are safe, and FDA must review that evidence.
- The drug does not break down over time. Most drugs break down, or deteriorate, over time. Brand-name and generic drug companies must do months-long "stability tests" to show that their versions last for a reasonable time. FDA reviews the results of these studies.¹¹
- The container in which the drug will be shipped and sold is appropriate. The quality of the drug

can deteriorate if its container is not appropriate. Information must be submitted about the containers and FDA must evaluate the information.

- The label is the same as the brand-name drug's label. The drug information label for the generic drugs should be the same as the brand. Sometimes, disputes arise related to the patents or exclusivities a brand name drug has and which ones generic drugs can use. A generic drug can be approved for a use that is not protected by patents or legal exclusivities, and must remove all references to the legally protected use from the drug's label, so long as that removal does not take away information needed for safe use.¹²

Current scenario of generic medicine and branded medicine

The use of generic medicines, compared to their branded counterparts, has the potential to substantially reduce out-of-pocket expenditure on drugs for patients with chronic diseases. Generic substitution of brand prescriptions is an accepted practice in many parts of the world, and this is often done for economic reasons. In India, however, generic substitution is not a universally accepted practice. This results from various factors including nonavailability of generic formulations, distrust of generic medicines by practitioners often due to perceived inferior quality and counterfeiting of drugs. Implementation of generic prescribing policy is however ongoing in institutional settings, where drugs can be procured in bulk and dispensed from the institutional inventory with appropriate quality control measures.¹³

With the idea of promoting generic prescriptions in public sector hospitals, the Ministry of Health and Family Welfare, West Bengal, has been implementing a "fair price medicine shop (FPMS)" scheme run through public-private-partnership (PPP) from 2012. The government provides space and physical infrastructure for the medicine outlets within the hospital premises while the private partner undertakes procurement and dispensing activities under mutually agreed terms. The items are supplied at substantial discount to the maximum retail price. There is a mandatory list of items that are to be stocked for supply to hospital patients as well as many other items that are supplied under the supervision of local FPMS monitoring committees. In addition to this state government initiative, the Department of Pharmaceuticals, Ministry of Chemicals and Fertilizers, Government of India, has, since 2008, opened dedicated outlets called "Jan Aushadhi Stores" where generic medicines are sold at low prices. So far, 157 "Jan Aushadhi Stores" have been opened across 12 states of India including West Bengal. Through these initiatives, more and more patients, are now getting exposed to the generic drugs concept and can compare its advantages and disadvantages to purchase of branded drugs from the open market.¹⁴

The experience and attitude toward generic drugs are not uniform among physicians across countries as reported by investigators from India and abroad the scientific data regarding experience and attitude of consumers toward generic drugs is necessary for sustaining a generic drug use policy but have been explored to a limited extent. Reports on consumer attitudes and preferences are mostly available from countries where generic drug substitution in retail pharmacies is an accepted practice, unlike in India. In particular, recent reports on consumer behaviour, since the introduction of above initiatives, are lacking. We, therefore, undertook this study to evaluate the experiences and attitudes of patients toward generic drugs purchased from FPMS of a state government sponsored public hospital, comparing the same with the experience regarding branded medicines purchased from retail medicine shops in the same or adjoining localities.¹⁵

Shortcomings found in the current study

- Less awareness among the people about the generic medicine.
- High effectiveness and high safety of generic medicine.
- In India, in view of poor accessibility and affordability of people, it is absolutely essential that the generic drugs should be made available so that the cost of treatment can be minimized.

Therefore to create awareness about the generic medicine among common people the following study was conducted.¹⁶

Development of questionnaire

Survey Questionnaire

Name _____ Age _____ Sex. _____

Diseases and their medication

Ever tried generic medicine. Y/N

- Name of the person
- Age
- Occupation of the person
- Sex ☐ M ☐ F ☐ others
- How often do you consume medication for?
A) thyroid B) diabetes C) blood pressure
- Monthly expenditure of these diseases.
- What type of medicine do you take according to the prescription?
- What is generic medicine?
- Do you know the difference between generic and branded drugs? ☐ yes ☐ no

If yes

- Do you use it or not.

- A) If no then, why don't you use it.
- B) If yes then, there are any problems you faced while using it and are you satisfied using the generic medicine.
- How did you come to know about this?
If no – We will make aware them about the generic medicine and will advise them to buy the generic medicine.

Procedure

The method adopted for this research and survey project was "Questionnaire-based cross-sectional study". Two types of survey were conducted named as - Qualitative survey and Quantitative survey. Both the survey was conducted at different time and at two different places targeting different people.¹⁷

The Quantitative survey was conducted in the localities of Delhi and Delhi-NCR among the patients suffering from the common lifestyle diseases namely Diabetes, Hyper/Hypothyroidism and Hypertension with a sample size of 50 in the month of January, 2018.

The questionnaire of the quantitative survey method could be divided into 3 parts i.e., Sociodemographic, medication profile and knowledge on the concept of generic medicines. The intent of including socio demographic analysis in this survey was to get a clear idea of the factors such as age group and occupation which would be having a direct impact on the type and extent of healthcare facilities availed by an individual. Similarly, the medication profile would give a clear view on the patients' psychology over the grounds of reliability on the generic or branded medicines and their inclination would come into light. Knowledge about the generic medicines would clearly demarcate the strengths and loopholes that the present scenario of medication harbours.¹⁸

The Qualitative survey was conducted in the All India Institute of Medical Sciences (AIIMS), New Delhi, among its regularly visiting patients, suffering from various chronic and acute ailments like gastric problems, rheumatologically problems, neurological disorders, orthopaedics department, etc. with a sample size of 25 people.

The questionnaire for quantitative survey was divided into two parts i.e. the satisfactory aspect and suggestions for medication adherence of patients in future. The satisfactory aspect would let us know what exactly a generic medicine consumer has his views on the same and simultaneously if he wishes to adhere to it in the future, also by noting his suggestions or the problems faced by him while availing these facilities.^{19,24}

Both the surveys were conducted in the language that was best suitable among the masses by extending a huge respect to their preferences and devotion of their time to be a participant of this survey project.^{20,25} The various Government and non-Governmental organisations were approached as a part of this survey

like the Bureau of Pharma PSUs of India (BPPI) and the Free Generic Pharmacy, AIIMS, New Delhi to understand the concept of action of the generic stores (Pradhan Mantri Jan Aushadhi Kendras) the and the working of the pharmacy at AIIMS respectively.^{21,22}

The analysis of this data was done by using IBM SPSS package statistical analysis. The summary statistics have been expressed by pictorial representation and percentages for categorical variables. Chi square test and Pearson's rank correlation was applies to find out the relations between various variables.²³

RESULTS

The results can be divided into two halves: quantitative and qualitative.

For the procurement of *Quantitative results*, a sample size (n) of 50 patients of different age groups of lifestyle diseases-diabetes, hyperthyroidism, hyper/hypotension were surveyed. The age-wise distribution of the sample (n=50) are presented and compared in the following Table 1 and 2:

This showed (Figure 1) that the maximum numbers of patients were distributed in the age group of 41–50 and 51–60 which comprises of the active and moderate workforce of the country. On an average, their monthly expenditure over the medicines, be it branded or generic,

Table 1: Age wise distribution of the sample

Age group	Number of People		Total
	Male	Female	
<=30	0	3	3
31-40	1	2	3
41-50	8	10	18
51-60	9	9	18
61-70	3	2	5
>70	0	3	3
Total	21	29	50

AGEWISE DISTRIBUTION OF THE SAMPLE

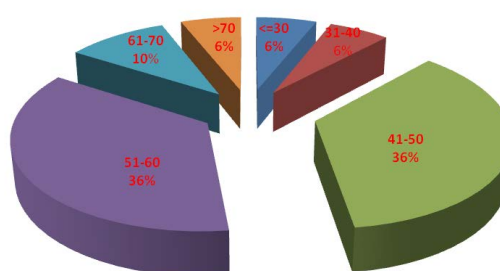


Figure 1: Age-wise distribution of the people surveyed in the Quantitative Survey. All the people surveyed were suffering from common lifestyle diseases A) Diabetes B) Hypertension C) Thyroid. Maximum people were from the age group of 51-60 years and 41-50 years.

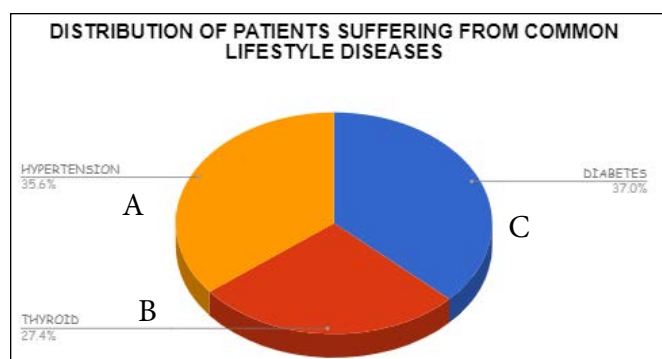


Figure 2: Pie chart represents the distribution of the patients in the lifestyle diseases chosen. A) Type 1 and Type 2 Diabetes B) Hypertension C) Hyperthyroidism

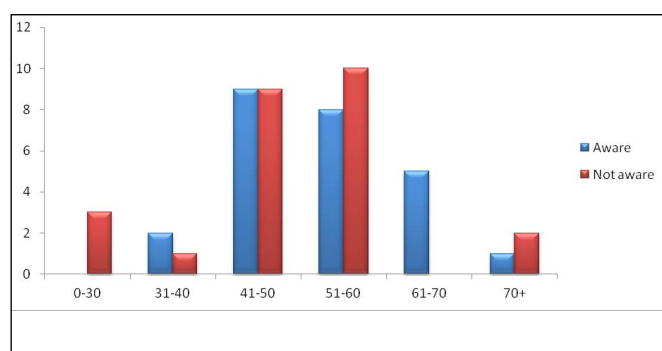


Figure 3: A cluster column chart representing the awareness about generic medicines among the general public. Maximum awareness was seen among the age group of 41-50 years followed by 51-60 years.

accounts for mode of Rs.1000 .Out of these patients, 52.7% were females with maximum of them as homemakers. The rest 47.3% male, since were employed had a better exposure and hence a better level of knowledge in the usage and consumption of medicines.

Figure 2, shows that 37% of the patients suffered from both type 1 and type 2 diabetes , 35.6% of them from hyper/hypotension and 27.4% of them from hyperthyroidism. It includes the patients who were the sufferers of multiple lifestyle diseases mentioned above. (The value of correlation co-efficient shows that there is no significant relation between age group and Number of disease) (Table 3).

Figure 3 symbolises that 36% of the people surveyed were aware of what generic medicines stood for and rest 64% were unaware. ($p \Rightarrow 0.005$ signifies that there is no association between age groups and awareness on Generic medicine) (Table 4)

The analysis showed that out of 36% of aware ones, 36% of them belonged to the age group of 41–50 years who have been suffering from these diseases for more than 5 years. Out of those aware, 10% of them were the regular consumers of generic medicines and 90% of them were the branded consumers. The inclination of these patients towards the branded medicines accounted for a large

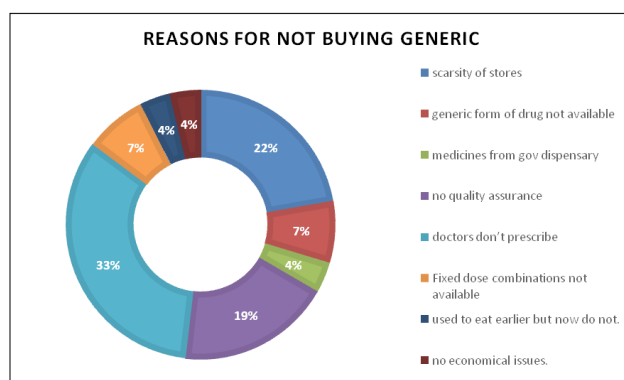


Figure 4: Pie chart representing the reasons why people do not buy generic medicines. A) Scarcity of stores B) generic forms of drugs not available C) medicines from government dispensaries D) no quality assurance E) doctors don't prescribe F) fixed dose combinations not available G) consumed earlier but not now G) no economic issues.

number of reasons and thus pushing themselves more towards not buying them in future even after the properly equipping them with satisfactory knowledge by using print and video media (Table 5).

Across the 50 prescriptions analysed, 38 brands and only 5 generic drugs were prescribed. The maximum amount of variation among the brands were found with the diabetic drugs and the least with thyroid ones. All the drugs prescribed were listed in the “National Essential Drug List” (Table 6).

The experience and the attitude of consumers of generic and branded medicines showed their resilience towards the buying of generic medicines. The scarcity of the generic stores, the prescriptions being dominated by the branded names, unavailability of certain potent drugs in generic forms , unavailability of fixed dose combinations, the psychological interference with the quality of these medicines, certain schemes laid by the Government who are or where the employees of central or state Government, unavailability of any economic constraints in the family were the major unavoidable reasons that were highlighted during the analysis depicted in Figure 4 .

This Figure 5 highlights the major sources of awareness by which the 36% of the people (18) procured their knowledge about the generic medicines. The major players in this part were the hospital and medical personnel's accounting for 32% followed by advertisements through different media and self - learning which accounts for 20% each (Table 7).

Figure 6 shows the distribution of the sample upon the willingness of the people to buy generic medicines for those who knew what generic medicines were and still weren't buying them and those surveyed for the second time after educating them about what generic medicines were and how could they be benefitted by the same. It was seen that 10% of people were aware and were interested

to buy and 40% of people were made aware and were still not willing to buy. The reasons remain the same. In Spite of being educated, they showed their interests in buying branded medicines only by confining to reliance issues. ($p > 0.005$ signifies that there is no significant difference in the willingness to buy before and after creating awareness (Table 8).

QUALITATIVE PART

AIIMS Hospital in Delhi provided the facility of free generic medicines to their patients. The regular patients of AIIMS Hospital, New Delhi, India, with a sample size 25, suffering from neurology, rheumatology, gastrology, psychiatry, cardiology, orthopaedics and certain other common diseases.

The data about the knowledge of the generic medicines which these people consumed was noted and was found that 56% of the people were consuming the generic medicines without having any knowledge about it, while the rest 44% knew what generic medicines were. (Figure 7)

Hence, this part of survey focuses on the aspect of their satisfaction and reliability on these medicines. According to the responses recorded, the patients reacted positively upon the negotiation over the same. 96% of the people

were satisfied with the current services and wish to buy the same in future as well (Figure 8).

However, during the, they encounter certain problems and have hence, put forth their suggestions for the same. 21.4 % of people generally travel from very far off places for attaining the services offered by the hospital and 32.1% of people feel that they need to wait for around 3 hours for while buying these medicines apart from the time they generally spend in order to encounter the doctor for his scheduled appointment. 17.9% of the people showed the inconvenience caused to terms of unavailability of certain the drugs. There were a few people who faced multiple of the above listed problems but still these issues did not bother them much as they were bestowed with best services. (Figure 9 and Table 9)

DISCUSSION

In spite of India being one of the major players in the field of pharmacy, both in terms of generic and branded medicines, the influence made by the generic medicines on the mind-sets of the Indian population still remains very small. The highlighting factor that allows the generic medicines stand out of the crowd is being highly economical and equally effective at the same time. This factor is universally accepted so far and remains unparalleled.

A large proportion of educated people have a misconception that cheaper items are unreliable and vulnerable in terms of their quality. This belief they follow with the healthcare or in the procurement of medicines, to be precise as well. According the NCBI's report on generic verses branded medicines (2017), since 2012, Ministry of Health and Family Welfare, Government of West Bengal, has started implementing

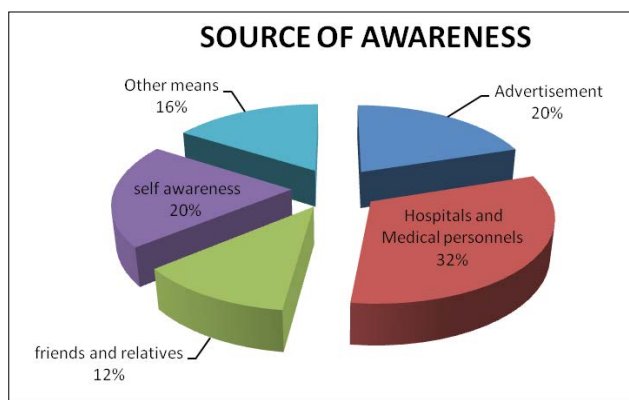


Figure 5: Pie chart representing the different ways people gained knowledge about generic medicines. A) Advertisements B) hospitals and medical personnel C) friends and relatives D) self-awareness E) other means

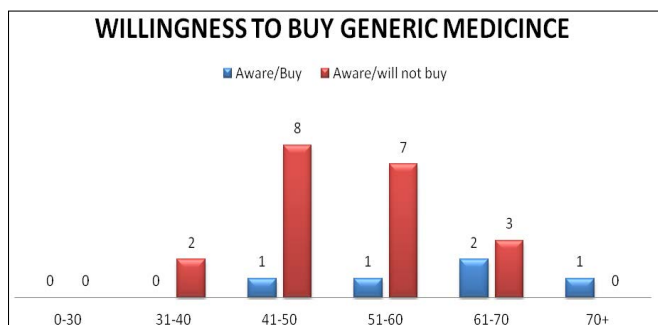


Figure 6: A cluster column chart representing the willingness among the aware section of people who were not buy the generic medicines due to various reason even after they were educated through videos and pictorial representations.

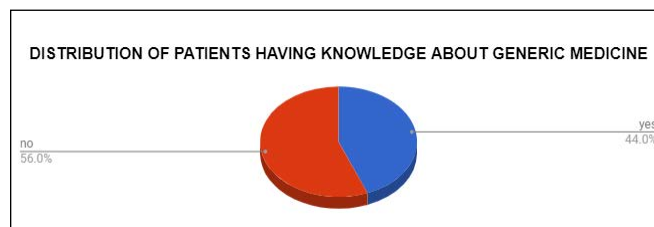


Figure 7: Pie chart representing the knowledge about generic medicines among the people surveyed at AIIMS, Free Generic Pharmacy.

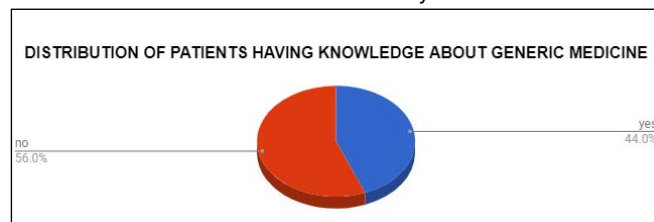


Figure 8: Pie chart representing the satisfaction with the therapeutic effect of the generic medicines purchased from the Generic Free Pharmacy at AIIMS. Result showed that 96% of the people were satisfied with these medicines.

Table 2: Age-wise distribution of sample (n=50) belonging to the quantitative survey

Age group	Number of People		Total
	Male	Female	
<=30	0	3	3
31-40	1	2	3
41-50	8	10	18
51-60	9	9	18
61-70	3	2	5
>1570	0	3	3
Total	21	29	50

the policy of “mandatory generic drug use” in state government-funded hospitals. Simultaneously, to ensure availability of generic drugs which are seldom available in the open market, the FPMS scheme on a PPP model has been launched in larger public hospitals all across the state. Out of 121 proposed FPMS, 93 have become operational providing generic medicines at low retail price. This initiative has the potential to create public awareness and to increase faith to generic medicines. This prompted us to carry out a pilot study for evaluation of the experience of generic drug usage among patients of chronic diseases attending government hospitals.

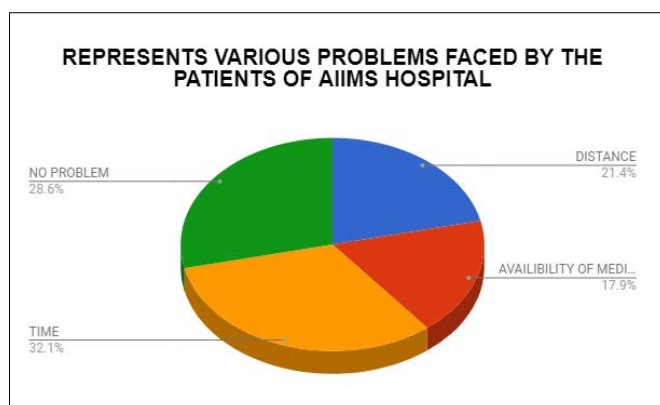


Figure 9: Pie chart representing the problems faced by the people visiting AIIMS, Generic Free Pharmacy. A) Distance B) time C) availability of all medicines D) no problem

Table 3: Correlation between Age-groups and disease

Correlations			
Age_level	Pearson Correlation	Age level	Disease
		1	.235
	Sig. (2-tailed)		.100
	N	50	50
Disease	Pearson Correlation	Age level	Disease
		235	1
	Sig. (2-tailed)	100	
	N	50	50

The value of correlation co-efficient shows that there is no significant relation between age group and Number of diseases.

Table 4: Chi-square test for association between age groups and awareness

Case Processing Summary								
			Cases					
			Valid		Missing		Total	
			N	Percent	N	Percent	N	Percent
Age_level * Aware_of_generic_medicine_Yes_1__No__2			50	100.0%	0	0.0%	50	100.0%
Age_level * Aware_of_generic_medicine_Yes_1__No__2 Cross tabulation								
			Aware_of_generic_medicine_Yes_1__No__2				Total	
			1.00			2.00		
Age_level	1.00	Count	2		4		6	
		Expected Count	3.0		3.0		6.0	
		Residual	-1.0		1.0			
	2.00	Count	9		9		18	
		Expected Count	9.0		9.0		18.0	
		Residual	0.0		.0			
	3.00	Count	7		9		16	
		Expected Count	8.0		8.0		16.0	
		Residual	-1.0		1.0			
	4.00	Count	7		3		10	
		Expected Count	5.0		5.0		10.0	
		Residual	2.0		-2.0			
Total	Count	25		25		50		
	Expected Count	25.0		25.0		50.0		

<i>*Chi-Square Tests</i>			
	<i>Value</i>	<i>df</i>	<i>Asymp. Sig. (2-sided)</i>
Pearson Chi-Square	2.517 ^a	3	0.472
Likelihood Ratio	2.576	3	0.462
Linear-by-Linear Association	1.425	1	0.233
N of Valid Cases	50		

The p value > 0.005 signifies that there is no association between age groups and awareness on Generic medicine

Table 5: Depicts the various no. of reasons that prevent the patients from buying generic medicines along with their frequencies

<i>Reasons</i>	<i>No. of People</i>
scarcity of stores	6
generic form of drug not available	2
medicines from gov. dispensary	1
no quality assurance	5
doctors don't prescribe	9
Fixed dose combinations not available	2
Used to eat earlier but now do not.	1
No economical issues.	1

Table 6: Depicts the various sources of awareness adopted by the people for procuring the information on generic medicines along with their frequencies (n=50)

<i>Sources of awareness</i>	<i>No. of persons</i>
1- Advertisement	5
2- Hospitals and Medical personnel	8
3-friends and relatives	3
4- self awareness	5
5- Other means	4
Total	25

Table 7: Depicts the frequency of the sample aware and not aware about generic medicines.

<i>Age group</i>	<i>Aware</i>	<i>Not aware</i>
0-30	0	3
31-40	2	1
41-50	9	9
51-60	8	10
61-70	5	0
70+	1	2
Total	25	25

Table 8: Depicts the frequency of the people that is aware about generic medicines and wishes to buy or not buy (n=50)

<i>Age Group</i>	<i>Aware/Buy</i>	<i>Aware/will not buy</i>
0-30	0	0
31-40	0	2
41-50	1	8
51-60	1	7
61-70	2	3
70+	1	0
Total	5	20

Table 9: Shows Significant difference on creating awareness and willing to buy

<i>Case Processing Summary</i>						
<i>Cases</i>						
	<i>Valid</i>	<i>Missing</i>		<i>Total</i>		
	<i>N</i>	<i>Percent</i>	<i>N</i>	<i>Percent</i>	<i>N</i>	<i>Percent</i>
Aware_of_generic_medicine_Yes_1_No_2	32	64.0%	18	36.0%	50	100.0%
* Will_be_intereseted_in_future_Yes1_No2_0Dont_know						
Aware_of_generic_medicine_Yes_1_No_2 * Will_be_intereseted_in_future_Yes1_No2_0Dont_know Crosstabulation						
		<i>Will_be_intereseted_in_future_Yes1_No2_0Dont_know</i>			<i>Total</i>	
		<i>1.00</i>	<i>2.00</i>			
Aware_of_generic_medicine_Yes_1_No_2	1.00	Count	12	4	16	
		Expected Count	13.5	2.5	16.0	
		Residual	-1.5	1.5		
	2.00	Count	15	1	16	
		Expected Count	13.5	2.5	16.0	
		Residual	1.5	-1.5		
Total		Count	27	5	32	
		Expected Count	27.0	5.0	32.0	

Solutions

The conclusion, hereby, states that the only trait that prevents the masses to avail the generic drug facilities are the psychological errors and taboos they have in

their minds. The eradication of such myths stands as big challenge to conquer and also , a very demanding field to work upon.

**Chi-Square Tests*

	Value	df	Asymp. Sig. (2-sided)	Exact Sig. (2-sided)	Exact Sig. (1-sided)
Pearson Chi-Square	2.133 ^a	1	0.144		
Continuity Correction ^b	.948	1	0.330		
Likelihood Ratio	2.261	1	0.133		
Fisher's Exact Test				0.333	0.166
Linear-by-Linear Association	2.067	1	0.151		
N of Valid Cases	32				

The p value > 0.005 signifies that there is no significant difference in the willingness to buy before and after creating awareness.

The principal persons who would play a key role in this assignment would be DOCTORS, PHARMACISTS and GENERAL PUBLIC themselves along with the guidance and supervision of the Indian Government.

For general public

By undertaking the various means of spreading awareness and help layman to understand this concept, the assistance from the media on a whole could be taken. The various media like:

- Print (pamphlets, brochures, posters, magazines, newspapers etc.),
- Audio (ana log tape cassettes, speeches, digital cds),
- Video, etc could be used.

CONCLUSION

As it was already evident that the various states in our country is performing extraordinarily well in the field of generics as in case of FPMS Scheme (2012) in West Bengal; the Karunya Pharmacy initiative, Kerala; Public Health Centres (PHCs), Pondicherry, these kind of proposals should be upraised and welcomed to be implemented in the different states of the country and appreciable results are expected. It was also seen that the audio and video media itself had the potential to propel the concept of generic medicines and bring about a psychological revolution among the people. Hence, this mode of communication is likely to act as propulsion for this area of study.

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