

A Survey Based Exploratory Study Evaluating Chemist's Knowledge, Attitude, Concerns and Experience Regarding Generic Medicines in Urban Central Gujarat Region

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ABSTRACT

The questionnaire based survey study was conducted to understand the perception about the generic medicines in chemists' mind of urban Madhya Gujarat region precisely Vadodara, Dahod and Godhra. It was a questionnaire based survey intended to understand exactly what pharmacist think about generic medicines i.e. quality, knowledge attitude and experiences. The results of the study show that the chemists were not so clear and confident about these aspects regarding generic medicines but nearly all agreed that margins decrease as cost of medicines decreases. Nexus among doctor chemist and drug companies was also found evident. FDCs (Fixed dose combinations) were found in abundance. Branded generics were found to capture the major pie of the market. Pure generics were found very less against FDCs and branded generics. Short supply of generic medicine was found be an issue like there are no generic options available in many cases. Illegibility of prescriptions was considered as an issue by majority. Enlarged NLEM (national list of essential medicines), lowering of ceiling prices of many useful medicines and emergence of generic stores promoted by governments such efforts are marking their impact.

Keywords: Questionnaire, generic medicines, chemists, Vadodara, Godhra, Dahod

I. INTRODUCTION

Access to quality affordable medicines is of public health importance and has remained a major challenge in developing countries [1]. A generic medicine is a 'pharmaceutical product that is intended to be interchangeable with the innovator product, which is manufactured without a license from the innovator company, and marketed after the expiration of the patent or other exclusivity rights'[2]. Generic medicines are usually cheaper than innovator brands and therefore save costs on medicines[3,4]. In a cost-saving study conducted by Cameron et al. [4] in 17 developing countries, they reported that 'an average of 9–89% could be saved by an individual country in private sector purchases by switching from originator brands to lowest-priced generics'[3]. Many studies have investigated pharmacists' views and practices regarding generic medicines and have reported positive benefits, including a reduction in treatment costs and an increase in access to medicines [5-7]. In recent years, the roles of pharmacists have been expanded beyond their traditional role of preparing and dispensing medications to include influencing the prescribing process and

delivery of pharmaceutical care services, making them more involved in patient care [8]. The pharmacists' role has previously been defined as "the responsible provision of drug therapy for the purpose of achieving definite outcomes for improved patients' quality of life" [9]. As drug experts, pharmacists are equipped with skills to recognize, resolve and avoid drug-related problems. Additionally, pharmacists have the ability to recommend cost-effective therapy and counsel patients on drug therapy [10]. The escalating cost of prescription medicines to both the government and patients has placed pharmacists in a position to advise both prescribers and patients on the availability of cheaper generic medicines [11]. Several studies have suggested that pharmacists are generally supportive in promoting the use of generic medicines by their customers but, in terms of their knowledge of issues relating to bioequivalence, many pharmacists have inadequate knowledge on the criteria used by their respective country's drug regulatory bodies in the assessment and registration of generic medicines[12,13,14] Pharmacists need to be well trained to advise both patients and prescribers on not only the availability of these cheaper

alternative brands, but also issues relating to their safety and efficacy [15].

The perception of health care professionals, including doctors and pharmacists, regarding generic medicine substitution is of prime importance. Given the role of pharmacists in the management of medicines, including the selection and dispensing of medicines, they could be an important point of intervention for promoting generic medicine utilization in the health care system. This research was therefore carried out to investigate the views of pharmacists on generic medicines and generic substitution practices.

II. LITERATURE REVIEW

In Australia, a study by Hassali *et al* was carried out to determine any differences in knowledge and perceptions of generic medicines among final year medical students and pharmacy pre-registrants. The response rate for both medical student and pharmacy pre registrants showed 26.7% and 30.5% respectively. Both groups admitted having insufficient knowledge about the quality, safety and effectiveness of generic medicines. [16]

In Nigeria, a study was conducted to study perceptions of pharmacist regarding generic medicines it revealed that many respondents lacked confidence in the quality of the generics available on the Nigerian market, but a majority supported generic substitution practices. [17]

In New Zealand, a postal questionnaire based study to evaluate the views and knowledge of pharmacist revealed that 70 % of pharmacists stated there was no difference in safety between original brand and generic medicines. [12]

In Sweden, an interview based study revealed that Pharmacists found it positive that generic substitution decreased the costs for pharmaceuticals but also emphasized that the switch can confuse and worry patients, which could result in less benefit from treatment. [18]

In France, a postal survey to know pharmacists' opinions and attitude regarding generic medicines revealed that 90 % of the pharmacists were favorable to the implementation of generic substitution. 42.5 % declared they systematically offered patients the generic

drug, whereas 55 % chose to target specific populations for substitution. [19]

In Ireland, an interview based study on pharmacists revealed that a small number demonstrated some reticence regarding generics while 89 % of pharmacists reported receiving patient complaints regarding use of generic medicine, although 64 % suggested that this was due to a nocebo effect (that is, a result of patient's preconceived notions that generics were inferior). Only a minority (21%) reported that they had attempted to educate patients as to the equivalency of generics. [20]

III. METHODS AND MATERIAL

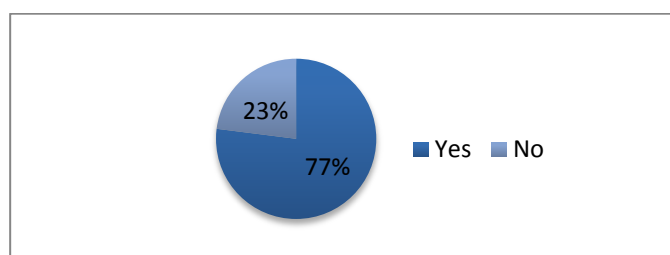
It was a questionnaire based exploratory investigation. Responses were collected from 256 chemists of urban madhya gujarat region (namely 3 cities Vadodara, Godhra and Dahod) by convenience sampling.

A questionnaire to get the detailed idea about knowledge, attitude, readiness and experience of chemist about generic medicines was developed under the guidance of respected technical supervisor. Chemists were selected for the survey through convenience sampling method. The questionnaire consisted of 14 open ended questions which were to investigate chemist's knowledge, attitude, concerns and experiences regarding generic medicines business.

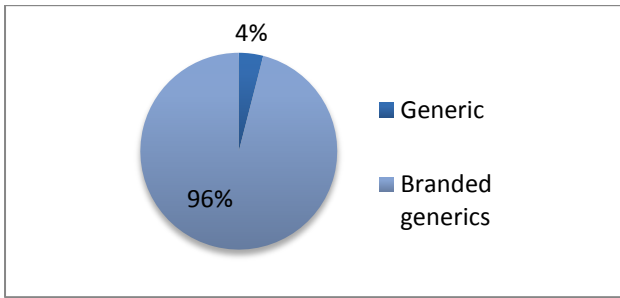
The questionnaire was designed in a way that the survey takes as less time as possible. It was estimated that it hardly took 5 minutes to fill the questionnaire completely. Frequency analysis was carried out thereafter to understand the trend.

The below portion depicts the analysis:

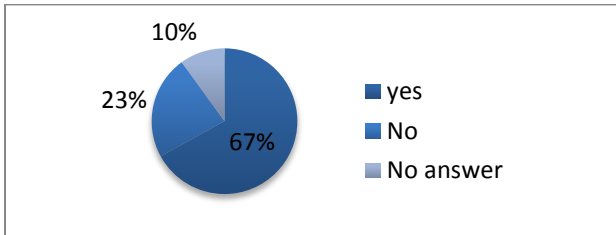
Q.1 Do you sell generic (not branded generic) medicines?



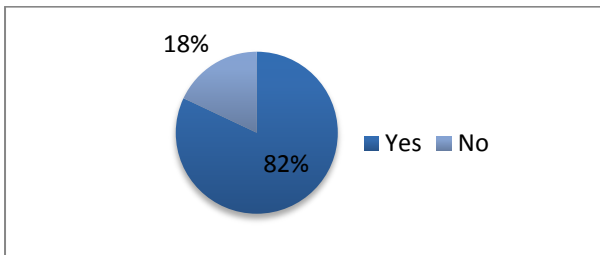
Q.2 the majority of medicines available at store are



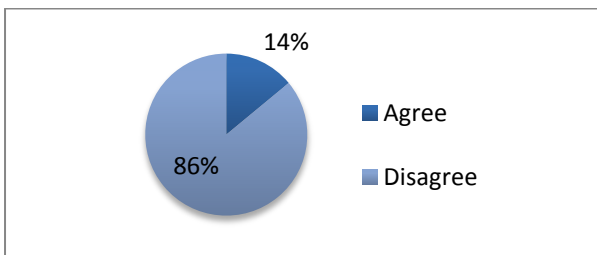
Q.3 Medicines available at your store are of choice of nearby physicians



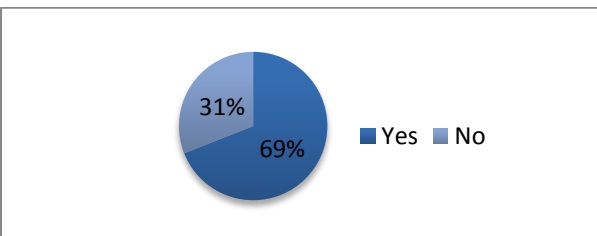
Q.4 Does your majority stock contains fixed dose combinations (FDC)



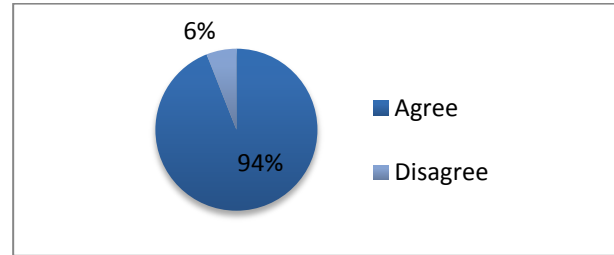
Q.5 Majority of Fixed dose combinations (FDC) are irrational



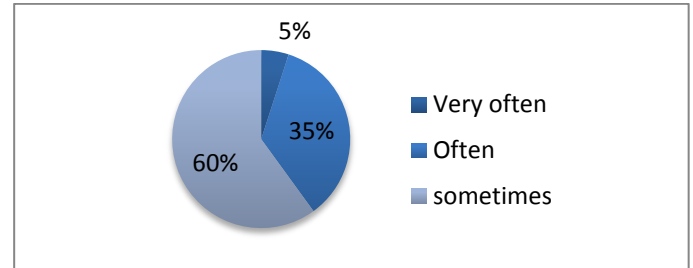
Q.6 'short supply' is an issue with generic medicines



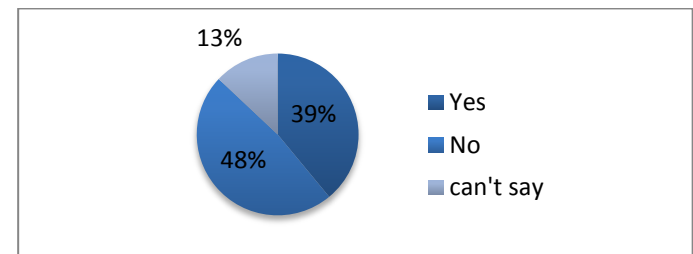
Q.7 Generic medicines give fewer margins than branded generics



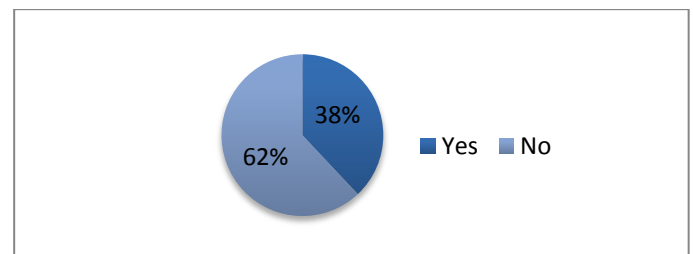
Q.8 Generic medicines are found in prescriptions



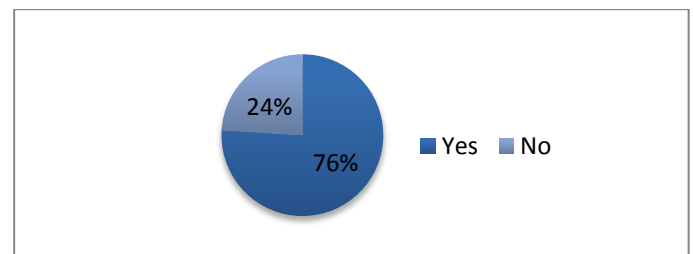
Q.9 Generic medicines are poor at quality, efficacy and safety



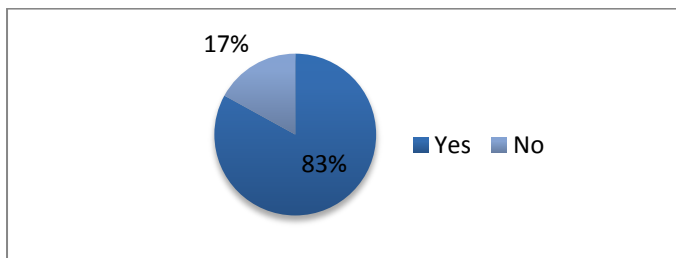
Q.10 do patient ask for generic substitution in case of OTC medicines?



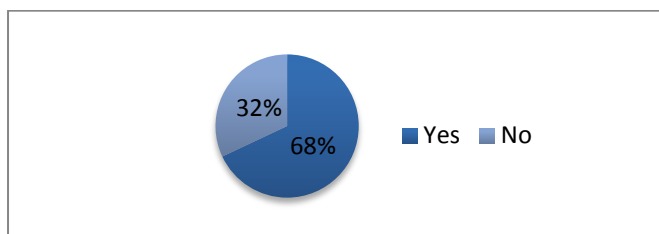
Q.11 Do you face illegibility issue with prescriptions?



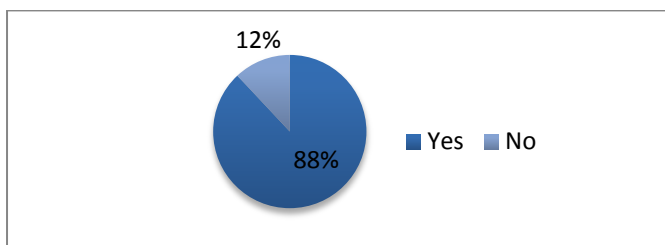
Q.12 Have you heard about "prescription by generic names only" law?



Q.13 it will allow pharmacist to decide the brand of medicine to be dispensed, will it help the consumer?



Q.14 Enlarged NLEM (national list of essential medicines) and lowering of ceiling prices affect your profit?



IV. RESULTS AND DISCUSSION

The results of the survey throw light on many aspects regarding perception about generic medicines among the chemists of urban Madhya Gujarat region. When asked about generic medicines it was found that profit was less so most had very less stock at their respective shops. So chemists were not motivated to do business of generic medicines. Majority were selling medicines of nearby physicians' choice. The majority of their stock consisted of FDCs. When asked about the quality of generic medicines there was confusion was abundant although nearly half of them replied that generics are poor on quality. Short supply of generic medicines was also found to be an issue for chemists. It was revealed through their experience that many prescriptions had generic medicines but still branded generics were more. Majority considered illegibility as an issue. Majority were aware about 'Prescription by generic medicine name only' and agreed that it will benefit the consumers. When asked about NLEM and lower

ceiling prices it was found to be affecting their margins.

V. CONCLUSION

The survey revealed that low prices of generic medicines give fewer margins. That is the biggest reason that there are no takers for generic medicines. It was observed that there is a direct nexus among doctor pharmacist and drug companies. Fresh efforts by the government to encourage generic medicines are creating a stir in the age old business of medicines. FDCs (fixed dose combinations) were found to constitute a larger chunk among the medicines. Enlarging of the NLEM and lowering of ceiling prices were also affecting chemist business. Illegibility in the prescription was the major issue which the new law where doctors have to write in block letters will be resolved. Chemists had not much positive attitude towards generic medicines' quality although they were happy and hopeful with the new law which will make the generic prescriptions mandatory for doctors and make chemist the ultimate choice maker of medicine brand. This will shift the drug companies' focus from doctor to chemist. If safeguards are not kept in place the end user (patient) will not be benefitted. Without strict implementation of such law which demands serious monitoring the consumers will not be benefitted.

VI. REFERENCES

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