Community Medicine



A STUDY ON AWARENESS REGARDING PRESCRIBED DRUGS OF PATIENTS ATTENDING OUTPATIENT DEPARTMENTS IN A TERTIARY CARE HOSPITAL OF DELHI

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ABSTRACT Background: The treatment outcomes of patients attending Outpatient Departments (OPD) in hospitals are largely dependent upon the awareness of patients about the prescribed drugs. This awareness about treating drugs further affects their compliance which is guided by the communication between the doctor and patient.

Objectives:

1. To know the proportion of prescription slips that was complete.

2. To study the level of awareness of patients attending OPDs regarding prescribed drugs.

Methods: It is a cross sectional study involving 200 patients attending OPDs in a tertiary care hospital. Adult patients leaving the outpatient departments (OPDs), who could understand local language, were selected randomly and their prescription slips were screened for completeness. Further, their awareness was assessed with the help of a semi-structured and pre-tested questionnaire.

Results: It was observed that of the two hundred prescription slips, one seventy three (86.5%) did not have complete instructions listed in them. However, one eighty seven patients (93.5%) had knowledge about their disease, one ninety one (95.5%) knew how to take the medicine (dose and timing), one eighty eight (94%) knew about the common side effects and one eighty five (92.5%) knew when they have to visit the doctor next. One ninety six (98%) said they knew that they should keep the medicines out of reach of children and the same number of respondents said they check expiry date before consuming the medicines

Conclusions: The study reveals that the patients are being communicated the relevant information, but documentation is insufficient and should be improved.

KEYWORDS : KAP, Drug Prescription, Patient Compliance, Treatment Outcome

Introduction

Education of patients about prescribed drugs is becoming an increasingly important aspect of public health care system throughout the world.¹ Knowledge about drug prescription among patients is important as incorrect drug dosage or faulty drug ingestion can lead to adverse drug reactions, which in worst case scenario can cause death. Adverse drug reactions are the fifth most common cause of death among hospitalized patients², and lead to a large number of hospital admissions and escalated healthcare costs³. The elderly are the most common patients to be affected by inappropriate drug usage.⁴ As reported by many studies, the drug compliance rate varies from 30-80% even in developed countries.⁵⁶ Hence, the importance of clear communication between the doctor and patient.

Many studies suggest that effective communication is often perceived differently by the two parties and this leads to the big communication gap that exists between doctors and patients.⁷⁸ The way a doctor communicates decides not only the patient satisfaction but also the treatment outcome, as faulty drug ingestion may lead to reduced efficacy, reduced compliance, wastage of drug and increased length of morbidity.⁹

The pharmacist's role should not be ignored as it is him who reinforces the instructions and informs the patient about the manner of taking the drug and storage of the same.

The last and often ignored communication link between the doctor's instructions and patient's perception is the prescription slip. Patients face the problem of receiving sub-optimal prescriptions or incomplete ones especially in government hospitals that are overflowing with patients. Literature suggests that suboptimal prescribing is common in outpatient departments.^[6,1] There is often a time lapse between the visit to the doctor and starting the medication and the doctor shouldn't rely entirely on the patients memory or understanding and thus should note down clear instructions in legible writing. This will not only improve compliance but will also help the patient's attendant or caregiver to administer drugs properly.

Materials and methods

This was a cross-sectional study carried out in a tertiary care hospital of New Delhi between Jan-Mar 2018. Two hundred patients (more than 18 years of age) attending the medicine, surgery and gynecology Out Patient Departments (OPD) of the hospital were included in the study. This is the only tertiary care hospital of north Delhi and has a high patient load of around 3000-4000 OPD patients per day. Once the patients came out of the OPD, they were selected randomly through simple random table. Prescription slips of those who agreed to take part in the study were screened for completeness in three aspects- manner of taking medicine (dosage and timing), common side effects and next visit. Their written informed consent was sought and they were interviewed with the help of a semi-structured and pre-tested questionnaire. The first part included questions regarding the demographic characteristics of the study subjects and the second part had questions regarding the awareness of patients about their medication. The patient's responses were noted as 'yes or no' and further testing of accuracy of their knowledge/ awareness was not done. The data was entered in Microsoft excel sheet and was analyzed with the help of SPSS. Chi-square test was used to determine significance of association between variables. The ethical clearance was obtained from the ethics review board of the hospital.

Results

Of the two hundred patients, one twenty eight were females (64%) and seventy two (36%) were males. Eleven (5.5%) were graduates or above, sixty one (30.5%) were below graduate but above matriculation and one twenty eight (64%) were below matriculation. According to BG Prasad socio-economic classification (based on per capita income), twenty three (11.5%) were in upper and upper-middle class, eighty five (42.5%) belonged to middle class and ninety two (46%) belonged to lower middle and lower class [Table 1].

On inspection, it was noted that of two hundred prescription slips, one seventy three (86.5%) did not have complete instructions like dose, timing of taking medicines, common side effects and information about next visit.

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It was seen that only 24(12%) of the patients were visiting the facility for the first time, one forty eight (74%) were visiting it for the second time and for twenty eight (14%) it was the third time or more.

Despite of the incompleteness of prescription slips, one eighty seven patients (93.5%) had knowledge about their disease, one ninety one (95.5%) knew how to take the medicine (dose and timing), one eighty eight (94%) knew about the common side effects and one eighty five (92.5%) knew when they have to visit the doctor next [Table 2].

The respondents were also asked about the storage of medicines. One ninety six (98%) said they knew that they should keep the medicines out of reach of children and the same number of respondents said they check expiry date before consuming the medicines. One ninety nine (99.5%) of respondents knew about the action that needs to be taken if the medicine is expired *[Table 2]*.

There was no significant association between the awareness of patients and their gender, education or socio-economic classification. However, patients who had visited the facility for more than once had better knowledge about how to take the medicine, common side effects and their next visit (p-value 0.014, 0.041, 0.008 respectively).

Discussion

A drug prescription is an important tool to provide quality treatment to the patients.^{12,13} However, due to massive load of patients, lack of time and shortage of manpower – doctors often neglect the importance of a legible, complete and error free prescription slip. In India, the doctor-patient ratio is inadequate, i.e., 1:1700; as compared to the world average ratio of 1.5:1000.¹⁴ Apart from written instructions, the way a doctor communicates with the patient is of paramount importance. A faulty communication can lead to conflict, dissatisfaction, discouragement to visit the doctor further, emotional stress, reduced faith in treatment and ultimately increased duration of morbidity.^{15,16} The current study was planned to understand the communication between doctors and patients, both written (prescription) and verbal (spoken instructions). It may be noted that the backdrop of the study is an urban hospital and the patients are usually literate and their responses were not verified and were noted verbatim.

In the current study only 13.5% of the prescriptions were passed as complete and legible. This finding is congruent with other studies like one from Saudi Arabia, which states that errors made in handwritten prescriptions are much higher than in electronic prescriptions.¹⁰ Another study from Yemen has reported that only 0.87% prescriptions are good quality prescriptions.¹¹ Lack of time is a factor that deters the doctors from writing complete instructions in the prescription slips. Recruitment of more doctors, training of doctors in prescription writing and computerization of prescription slips should be done to improve the written instructions quality. Also, patients need to be motivated to read the slips carefully before taking the drugs.

The awareness of patients regarding disease and medication was found to be good in the current study. More than 90% knew about the manner of taking the drug correctly (dose and timing), this is similar to another study from India.¹ In response to a question when they have to report back, 92.5% knew about their next visit, which is more than that reported in another study¹ (71.9%). The patients also had good knowledge about the side effects, expiry and storage of medicines. Ninety eight percent knew that the medicine had to be kept away from the reach of children. The findings suggest that the verbal communication between the doctor and patient has been satisfactory and effective. Since the knowledge about storage of drugs was also sufficient so it is imperative to extend the appreciation to pharmacists as well. Majority of patients in our study were coming to the facility for second or more number of times and thus seem to have better knowledge.

Conclusions

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The traditional teaching excludes imparting the communication skills to the physicians and there is no formal training in prescription writing. Continuous professional development programs are required to improve the quality of prescription slips and communication.

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 Table 1: The demographic and socio-economic variables of subjects (N=200):

Characteristic	n	%	
Gender	F	128	64.0
	М	72	36.0
Age (years)	<30	65	32.5
	30-49	89	44.5
	50 or More	46	23.0
Education	Below 10th Class	128	64.0
	10th to12th Class	61	30.5
	Graduate or More	11	5.5
No. of Family Members	4 or less	65	32.5
	5 or more	135	67.5
BG Prasad Socio-economic	1 & 2	23	11.5
Classification	3	85	42.5
	4 & 5	92	46.0

Source: Original

Table 2: Knowledge and awareness of patients about prescribed drugs (N=200):

S. no	Knowledge and Awareness Questions	Response	n	%
1.	Do you know the name of the disease	No	13	6.5
	you are suffering from?	Yes	187	93.5
2.	Do you know how to take the	No	9	4.5
	medicine (dose & timing)?	Yes		95.5
		No	12	6.0
	effects of the prescribed medicine?	Yes	188	94.0
	If the answer to question no.3 is yes,	Go to the	7	
		doctor		
	of a side effect?	Do Nothing	181	
5.	Do you know when you have to visit next?	Ν	15	7.5
		Y	185	92.5
6.	Do you keep medicines out of reach of	Ν	4	2.0
	children?	Υ	196	98.0
7.	Have any of your children ever	Ν	197	98.5
	consumed your medicine by mistake?	Y	3	1.5
8.	If the answer to question no.7 is yes,	Did nothing	2	66.7
	then what action did you take?	Took the	1	33.3
		child to the		
		doctor		
9.	Do you check expiry date before	Ν	4	2.0
	taking medicine?	Y	196	98.0
10.	What do you do with expired	Don't know	1	.5
	medicine?	Throw out/	199	99.5
		Discard		
	0.1.1			-

Source: Original

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