# **Original Research Article**

# Prevalence of Self-Medication among First Year Medical Students in Government Medical College at Jamnagar, Gujarat

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#### ABSTRACT

**Background:** Self-medication is medication taken by person without professional advice. MBBS students are future professionals but during first year they don't have proper knowledge about different medications. So, during first year of study, they are more vulnerable to self-medication and their potential side effects.

Material and methods: Pretested structured validated self-medication questionnaire was used in this study.

**Results:** We have found that out of 360 participants 289 (80.30%) students accepted that they had taken self-medication within one-year duration after taking admission in first year MBBS.

**Conclusion:** Self-medication is present in medical students prior to any proper knowledge about hazards of medications. Students should be properly guided about self-medication and their hazards during their first year MBBS study to protect them from self-medication inflicted hazards.

Keywords: Self-medication, Medical Students

### INTRODUCTION

Self-medication refers to the practice of treating oneself with medications without professional guidance. While it can provide immediate relief for minor ailments, it poses several risks including incorrect dosage, drug interactions, misdiagnosis and dependency. Medical students are future physicians and prescribers. Self-medication among first-year medical students can be a common practice, often driven by stress, academic pressure, and a desire for quick relief from minor ailments. We have designed this study to understand self-medication and awareness regarding hazards of self-medication in medical students during the first year of their study.

### MATERIAL AND METHODS

We have conducted this cross-sectional study at Shree MP Shah govt. medical college Jamnagar. Prior approval from the ethical committee was obtained. We have conducted this study in two different year batches (Admission Batch 2022 and 2023) of first year MBBS students from same institute. A total number of 360 undergraduate first year medical students of Govt medical college Jamnagar city have participated in this

study. We have used a Pretested structured validated self-medication questionnaire. This questionnaire had 23 questions including different aspects of selfmedication. We have collected all data after obtaining the consent of participants. We have used simple random sampling to collect data.

We have included first year medical students of Shree MP Shah govt medical college who are willing to participate in this study. We have excluded students learning in second and third year of MBBS. We have collected all the data with the use of google form. Students have administered all the responses by themselves in their google form. We have collected all the data in excel sheet.

# RESULTS

Out of 360 participants 250 (69.40%) were male and 110 (30.60%) were female students. We have found that out of 360 participants 289 (80.30%) students accepted that they had taken self-medication within one-year duration.in questionnaire response they have responded that self-medication saves their time (32%). They have taken self-medication mostly related to past experiences (50.3%) and previous prescription (49.2%).66% participants have taken self-medication for fever, followed by headache, cough and acidity. They have obtained medicines directly from pharmacy (78.9%) without proper prescription.

In the questionnaire we have also asked question about required knowledge about the drugs. We have found that 98.6% of participants believed that information on the drug is necessary before taking medication. Out of them only 83% participants can only partially understand information on strip.60% participants already knew that self-medication can be hazardous, even after that they have opt for it. After taking selfmedication 78.3% of participants have revealed that they have experienced side effects after taking medication and then they have sought professional advice.

Table-1: Demographic data

Gender	Number	Percentage
Male	250	69.40%
Female	110	30.60%
Total	360	

#### Table-2: Motivation for self-medication

Reason	Number (Percentage)
Doctor / clinic far from home	62 (17.2 %)
High fees of doctor	47 (13.1 %)
medicines of family members	114 (31.7 %)
Pharmacist advice	73 (20.3 %)
Saves time	117 (32.5%)
Old prescription	160 (44.4 %)
More convenient	68 (18.9 %)

Table-3: Self-Medication in study participants

	Yes	No	Total
Male	208 (83.2%)	42	250
Female	94 (85%)	16	110
Total	302 (83.8 %)	58	360

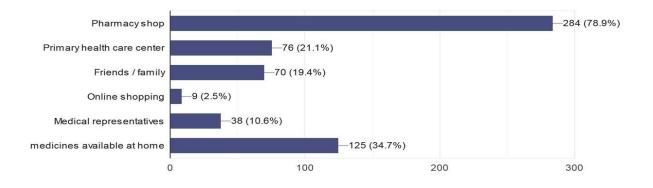


Figure-1: Sources of medication for self-medication in study participants

# DISCUSSION

In our study we have found that 80.30% of students had taken self-medication within one year. Previous studies also suggest a high prevalence of self-medication among medical students. The prevalence of self-medication increases from first year MBBS to Final year MBBS due to access to medical knowledge.<sup>1,6</sup> Previous studies also found that self-medication is more in female medical students.<sup>2,5</sup>

In our study we have found that fever is a common symptom for which self-medication was taken. Previous studies also reported that common medication for self-medication is for antipyretics.<sup>3,7</sup> some studies also found that antibiotics are also common drugs used for self-medication.<sup>2</sup> In selection medication allopathy drugs are used more for selfmedication followed by homeopathy and ayurvedic drugs.<sup>4</sup> It may be due to the easy availability of allopathic medications, available previous prescription and past experiences.

Self-medication is also common due to the busy schedule of medical students. With help of fellow colleagues, seniors and family members students takes self-medication.in our study and some previous studies have found that students usually got these medicines from pharmacy stores and extra medicines available at home from previous treatments.

# CONCLUSIONS

Self-medication is present in first year medical students. These students take medication due to prior prescription and help from fellow students. These students lack knowledge about side effects and drug interaction of medication they are taking. So, after taking admission in medical college prior sensitization is very important to prevent self-medication. Easy accessibility to medical care can be provided by college administration to prevent self-medication practices among medical students

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