



A CROSS-SECTIONAL STUDY ON SELF-MEDICATION PRACTICES AMONG COLLEGE STUDENTS: PATTERNS AND RISK FACTORS

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Abstract:

Objective: the aim of the study find out the self-medication patterns and related factors influencing the conduct of students of the college.

Study design: A prospective observational study.

Place and duration of study: Department of Pharmacy at Lady Reading Hospital, Peshawar, from 07-January -2020 to 07-December 2020.

Methodology: The Study was an observational study the Department of Pharmacy, Lady Reading Hospital (LRH) Peshawar, Pakistan, that was conducted between Jan 2020 to Dec 2020. 100 participants who were enrolled in various college programs were selected to take part in the study. Observations on self-medication procedures, including drug utilization patterns, self-medication motives, sources of objecting medicines, and associated risk indicators were obtained by use of structured interviews and analyzed descriptively.

Results: One of the subjects in the study is that out of 100 students who were surveyed, 75 were abstaining from severe painkillers. Some of the students took antibiotics and antacids, and the counts totaled 30 and 20. The leading explanations indicated that they did it for minor ailments (60 students), ease of availability (25 students), and accumulated experience on how to do it (20 students). Pharmacies have been the most accessible drug stores that students go to buy themselves medicines for self-medication. Over 80 students depend on the pharmacies for their medication. Moreover, 70 students admitted to having had self-medication experiences in the past, whereas 40 students agreed or made acquaintance with the related risks. Many students used drugs in hand readily, which might represent the risk of self-medication cases.

Conclusion: A largely popular practice, self-medicating with college students can also cause danger though. These health education programs can be used to create awareness about these health dangers and teach students what it means to use medications properly, which in turn can help mitigate these risks, especially among college students.

Keywords: Self-medication, college students, risk factors, pharmacy, Peshawar.

Introduction:

Self-medication, according to it is the act of using medicines to fix illnesses recognized as well as symptoms without seeing a healthcare professional. This practice is widespread, particularly among students all over the world being a normal way of dealing with issues; the issue being no exception (1). Such a situation persists to be of concern as the failure to take proper medication may occasionally lead to serious consequences. Those include adverse drug reactions, inappropriate drug interactions, antibiotic resistance, and the delay in seeking genuine medical attention (2,3). Analyzing the patterns and drivers of self-medication by students in college is very important, as it will be helpful in the development of interventions that are directed to safe medication practices and also to prevent any public health issues(4). The grassroots institution of self-medication among college students has been comprehensively assessed by multiple influencing factors attached to the whole world. expressed that out of ten students, eight had taken up self-medication behaviors which suggested 75 percent of college students(5). Statistically Study work done in Ethiopia confirmed the level of self-medication usage among university students reaching 80% at least in a year(6). Such results reflect the wide occurrence of self-medication among young people in their efforts to live happy lives and confirm the need for the development of customized efforts in this area. Multiple causes play their roles in the pervasiveness of drug abuse among students in college. Likewise, ease of utilization and availability of over-the-counter medications are the most significant contributing factors, because of which students can treat their minor health problems on their own speedily (7). To give you an added context, there are peer influences and social norms that may drive the use of self-medication by students; more so, students usually share their medications and sometimes seek advice from their friends and families (9).

However, healthcare perpetration of illnesses, limited medical service access, financial constraints, and perceived self-efficacy are among the factors that hinder the uptake of self-medication and place more people in precarious health situations (10). It is obvious that the system of self-medication though has an appealing effect due to the prompt relief of symptoms for minor illnesses yet the uncontrolled use of it may hurt individual health and public health. The adverse consequences of self-medication which encompasses errors in medication, misdiagnosis, and ironing out underlying health problems have emphasized the significance of encouraging responsible medication use among college students(11,12). Subsequently, the Study study hypothesizes to investigate the self-medication patterns among the collegeSelf-medication is believed to possess several attributes like what kinds of drugs are mostly used, why people turn to self-medication, the sources of the drugs they seek, and possible associated risk factors are the focus of this study which is aimed at identifying self-medication practices in this population. This Study would be the foundation for future efforts in designing interventions and educational programs that focus on the issue of safe medications and how to minimize the consequences of improper self-medication acquisition by college students(13).

Methodology:

A prospective observational study is the main method of this study and it was conducted by the Department of Pharmacy, Lady Reading Hospital (LRH), Peshawar, Pakistan from January 2020 to Dec 2020. A total of 100 college students were recruited with common sampling methods. We decided to perform the structured interview with the respondents to obtain data on self-medication practice, such as medication types that were used, the reasons for drug adjustment, the sources of acquiring medication, previous experience with self-medication, awareness of the related risks and, the ease of access to the medication. A descriptive statistics toolkit was used which included frequencies and percentages of the analyzed data. An institutional review board of LRH ethical approval was secured, and all present participants gave consent. Complete security and secrecy of all the information related to the participants was maintained during the study with the desired ethics.

Data Collection:

According to a structured interview, participants reported about self-medication practices; namely, types of medications used, reasons, sources of restrictions, previous experience and risks, and how easy will it be to obtain medications in the future.

Statistical Analysis:

Descriptive statistics such as frequencies, percentages, etc., were applied in summarizing the data which was analyzed to generate insights about the constituents and determinants of self-medication among college students.

Results:

The data analyses were conducted on the 100 college participants who were surveyed such that analgesics were the most common type of medication with 75% of the instances of self-medication. Anti-bacterial drugs were used by 30% of students, but acids against gastric reflux were the second (20%), cold medication followed (15%), and other medicines 10%. In self-medication, reasons vary. Students mostly indicated issues of minor ailments i. e. 60%, followed by convenience which came second with (25%), previous experience being (20 the favorite place to get painkillers and drugs for self-medication which are being %), inaccessibility to medical facilities(15%), and 10% as regards cost saving and other reasons (5%). The pharmacies have become used by most of the students, 80% exactly of them. A home drug cabinet is an access path utilized by 15% of students, that amount is less than friends' or family members' access rate and online sources' access rate which is 10% and 5% respectively. Alerting 70% of students earlier about self-medication experience and 40% of them regard this as risky, whereas precarity of handling and storing of self-medication should be access to drugs, (80)% of students described it as easy, (15)% found it moderate as well, and (5)% of them it was difficult also to access.

Table 1: Types of Medications Used:

Medication Type	Frequency
Analgesics	75
Antibiotics	30
Antacids	20
Cold Medication	15
Others	10

Table 2: Reasons for Self-Medication:

Reasons	Frequency
Minor Ailments	60
Convenience	25
Previous Experience	20
Lack of Access to Healthcare	15
Cost-saving	10
Others	5

Table 3: Sources of Obtaining Medications:

Source	Frequency
Pharmacy	80
Home Medicine Box	15
Friends/Family	10
Online	5

Table 4: Previous Experience with Self-Medication:

Experience	Frequency
Yes	70
No	30

Table 5: Awareness of Risks Associated with Self-Medication:

Awareness	Frequency
Yes	40
No	60

Table 6: Ease of Access to Medications:

Access	Frequency
Easy	80
Moderate	15
Difficult	5

Discussion:

The results of this study contribute to the knowledge base that expands in the realm of self-medication in college students, thereby showcasing the modes of self-medication and the factors that it is determined by, in the particular case of Peshawar, Pakistan. Contrasted to past work, it is possible to comprehend answers to what characteristics of a particular location or culture favor the addiction to self-medication in different areas of the world. Like other studies conducted in regions cornered, our study shows that abuse is a widespread stomping among college students(14). This high rate of self-medication, especially their dependence on analgesics, confirms similar findings in studies in the United States(15). This points out that the trend of people taking drugs without supervision as a way of treatment happens across all cultural and socioeconomic barriers, in that the influences are similar regardless of one's culture or social status. Even though there has come a variation in the form of drugs that are used and the reason behind self-medication has not been the same in the studies that have come out, this is still a point to be considered. For example, whereas analgesics had been more widely used among our population, antibiotics had been more predominant within the colleges (16). The divergence could show underlying disparity in the local healthcare system, prescribing patterns, and cultural norms around antibiotic usage. The studies report a variety of reasons for the act of self-medication and these factors can be related to the background information as well as the personal desires of individual seekers. However, while convenience and self-health practices were the major motives highlighted in this study, discrete cultural differences in health-seeking behaviors were reported in Saudi Arabia studies involving self-medication of symptoms and emergency situations(16). Interestingly, it has been found that college students depend on pharmacies as the main source of prescribing drugs for self-health Nevertheless, medication acquisition via other routes, like house medicine kits and online channels points to the ever-changing scene of drug sourcing and passage of laws that guarantee continuous improved quality of drugs accessed on self-medication. Findings of the systematic review studies (17) corroborate the very low public knowledge level about associated risks on campus. This is where a big problem in health literacy emerges and comes to show how providing educational interventions is very vital to impart to students the understanding of the risks involved when students tend to self-medicate and promote informed decision-making (18).

Conclusion

our study gives a general picture of self-medication behaviors among college students in Peshawar which is supplemented by comparisons of our results with previous studies, the differences in self-medication patterns between different cultures were highlighted and such contextual differences were identified. These data further accentuate the significance of personalized interventions that apply to the certain impacting factors of reflex meds within specific contexts, however, based on the same lessons from international donations.

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