

The common cold – do you take medications or wait for it to disappear?

Przeziębienie – zażywasz leki czy czekasz aż przejdzie?

Magdalena Hartman¹, Paweł Lichtański¹, Karolina Donocik²,
Ewa Klimacka-Nawrot¹, Barbara Błońska-Fajfrowska¹

ABSTRACT

¹Department of Basic Biomedical Science,
School of Pharmacy with the Division
of Laboratory Medicine in Sosnowiec,
Medical University of Silesia in Katowice
²General Surgery Ward,
District Hospital in Zawiercie

INTRODUCTION

Analysis of the frequency of using the following methods of treating a cold: the use of prescription medications, use of non-prescription drugs, or waiting for the disease to resolve spontaneously, as well as analysis of declared frequency with which package inserts provided with cold medications were read thoroughly was the objective of the study.

MATERIALS AND METHODS

The respondents were 129 persons from the Silesia Region (Poland), 73 of them were women, 56 of the subjects were men, all aged between 19 and 65 years old, without cold symptoms.

RESULTS AND CONCLUSIONS

The results were as follows: in order to treat a cold, the respondents most often used over the counter drugs. Waiting passively for the disease to clear up was the least popular form of therapy. Younger persons more often than older ones ignored the symptoms and waited for them to disappear. Among the respondents declaring frequent or very frequent use of over the counter drugs during a cold, 30% were not interested in reading package inserts thoroughly.

ADDRESS FOR CORRESPONDENCE:

Dr n. med. Magdalena Hartman
Department of Basic Biomedical Science
School of Pharmacy with the Division
of Laboratory Medicine in Sosnowiec
Medical University of Silesia in Katowice
Kasztanowa Street 3
PL 41-205 Sosnowiec, Poland
phone: +48 32 269 98 30
fax: +48 32 269 98 33
e-mail: mhartman@sum.edu.pl

KEY WORDS

the common cold, self-medication, reading medication package inserts

STRESZCZENIE

WSTĘP

Celem niniejszej pracy była ocena popularności leczenia przeziębienia lekami na receptę, bez recepty lub czekania na samoistne ustąpienie objawów oraz analiza deklarowanej częstości dokładnego czytania ulotek dołączanych do opakowań leków na przeziębienie.

MATERIAŁY I METODY

W badaniu ankietowym wzięło udział 129 mieszkańców województwa śląskiego (73 kobiety i 56 mężczyzn) w wieku od 19 do 65 lat, bez objawów przeziębienia.

WYNIKI I WNIOSKI

Analiza wykazała, że podczas leczenia przeziębienia ankietowani najczęściej stosują leki bez recepty, a najrzadziej czekają na samoistne ustąpienie objawów. Osoby młodsze częściej niż osoby starsze ignorują objawy przeziębienia i czekają na ich samoistne ustąpienie. Wśród osób deklarujących częste i bardzo częste stosowanie preparatów bez recepty podczas przeziębienia około 30% nie jest zainteresowane dokładnym czytaniem ulotek informacyjnych dołączonych do leków.

SŁOWA KLUCZOWE

przeziębienie, samoleczenie, czytanie ulotek informacyjnych o leku

INTRODUCTION

The common cold is generally a mild nasal mucosa and throat inflammation of viral etiology. The large number of viruses cause lifelong susceptibility to the disease, resulting in unpleasant indications of the disease, on average, two to four times a year. The well-known clinical picture of the disease comprises: sneezing, scratchy throat, cough, hoarse voice, headaches, and fever [1,2]. Usually, the illness does not require a visit to a doctor, and treatment is mainly based on alleviating the symptoms. However, when fever and runny nose last for too long, there is purulent eye discharge and accompanying ear and sinus pain, an appointment with a physician is indeed necessary [1]. There are many non-prescription cold medications available on the market. Such products can be bought from many establishments and there are no limits on the amounts purchased [3,4]. Research carried out by the OBOP agency in 2008 found that as many as 38% of Poles over the age of 15 treat their ailments with their own methods (non-prescription drugs, folk medicine) [5]. Taking into account how self-medication decreases expenses on health care, the data sounds reassuring [6]. Another report by TNS OBOP is, however, quite disturbing since it informs us that as much as 59% of Poles rely solely on their experiences when using OTC medications [5].

It has not been established yet whether all those persons are aware, for instance, of possible cross reactions, overdose, adverse effects – dangers also concerning non-prescription drugs. For example, complex medications used in common cold therapy containing substances of antihistamine properties, apart from antihistaminic activity, produce a cholinolytic effect which can intensify the activity of other medicinal products used simultaneously. What is more, the penetration of antihistamines into the central nervous system may cause sedation, drowsiness and negative

well-being. For a person self-administering such a cold medication and e.g. driving a car, unawareness may end up tragically [7].

Proper use of OTC medications requires prior patient education. Patients must realize that the possibility of purchasing drugs without a visit to a doctor or a prescription does not mean such products can be used as and whenever they like without having to fear negative side effects. Education and raising awareness should be based on reliable and true information about a medication. In the case of OTC products sold at places other than pharmacies, package inserts are the most widely applied, and sometimes the only method of instructing the patient about the safest and most effective use of a drug. By law, drug manufacturers are obliged to provide each medication with a leaflet understandable to every potential buyer [8]. Although the rules ensure that package inserts contain detailed and reliable information, not many patients regard it as a set of instructions that are to be followed when using a medicine [9].

Treating illnesses with one's own methods is a trend that has increasingly been gaining popularity within society recently. Taking into consideration the fact that the sales of various OTC remedies are constantly on the increase, self-medication and related problems are a particularly important topic to discuss.

AIM

The purpose was to establish the popularity of the following approaches towards common cold treatment: the use of prescription medications, self-administering over the counter drugs, or waiting for the disease to resolve spontaneously, as well as analysis of declared frequency with which package inserts provided with cold medications were read thoroughly.

MATERIALS AND METHODS

The survey encompassed 129 respondents, 73 women and 56 men aged 19–65 years, without cold symptoms. The respondents were selected using a random method. The age range of 19 to 39 years included 69 persons, the remaining 60 subjects were between 40 and 65 years old. Higher education was declared by 30 persons, secondary by 72, vocational or primary by 27. The respondents, inhabitants of the Silesian Voivodeship, Poland, were asked to report whether during a cold they used prescription drugs, OTC medications, or waited for the symptoms to disappear spontaneously. With regard to using medicinal products, the subjects were to declare how thoroughly they read package inserts, whether they did it only sometimes or read them but not too thoroughly, or never read them. For the statistical analysis a chi-square test was used, with $\alpha = 0.05$ perceived as a statistically significant value.

RESULTS

Our findings show that non-prescription drugs are the most common therapy during a cold. Of all the respondents, 69% reported using that type of pharmaceuticals often or very often, 24.8% – rarely or very rarely, and 6.0% claimed they never used over the counter medicines. In the case of prescription medications the results were as follows: 34.9% declared self-administering prescription drugs often or very often, 55% – rarely or very rarely, while 10.1% – never. Waiting passively for the symptoms to clear up was the least popular method of treatment among the respondents. This way of coping with the common cold was frequently or very frequently chosen by 22.5% subjects, 40.3% used it rarely or very rarely, while 37.2% never did it (Fig. 1).

Persons between 19 and 39 years old more often than those aged 40–65 years waited passively for the disease to resolve spontaneously ($p < 0.05$). Such a course of action was often or very often followed by 31.9% of the younger and 11.7% of the older subjects, rarely or very rarely by 36.2% and 45%, and never by 31.9% and 43.3%, respectively (Fig. 2). The age of the respondents did not cause statistically significant differences between the frequencies of self-administering prescription and non-prescription drugs. The sex and education of the respondents did not have a statistically significant influence on the choice of treatment methods.

When asked how thoroughly they read cold medication package inserts, over 70% of respondents said they did it thoroughly or rather thoroughly, 14% sometimes did and sometimes did not read thoroughly,

7% rather did not read them or did it not too thoroughly, while 8.5% reported never reading medication package inserts (Fig. 3).

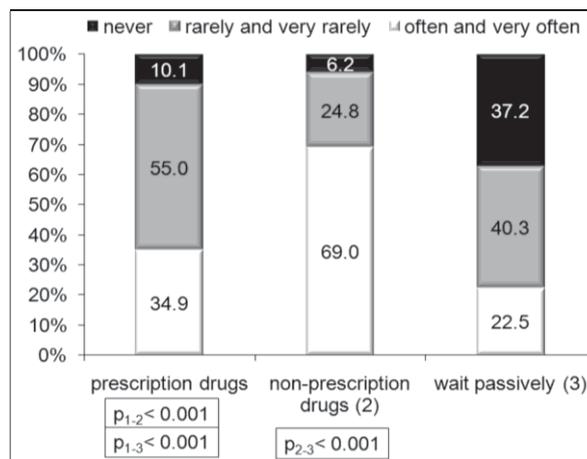


Fig. 1. Percentage of respondents reporting prescription drugs, OTC medications, or waiting for disease to clear up to be best therapy during a cold (n = 129).

Ryc. 1. Deklarowana częstość kurowania się z przeziębienia lekami na receptę, lekami bez recepty, wyczekiwania na samoistne ustąpienie dolegliwości (n = 129).

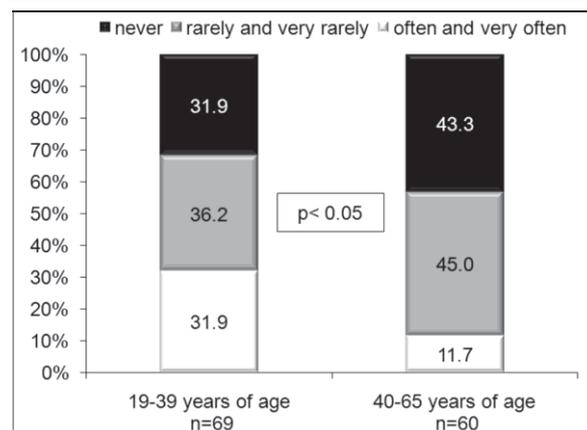


Fig. 2. Declared frequency of waiting passively for symptoms to disappear among persons of various ages (n = 129).

Ryc. 2. Deklarowana częstość wyczekiwania na samoistne ustąpienie przeziębienia wśród osób w różnym wieku (n = 129).

Simultaneous analysis of the frequency of using anti-cold OTC medicines and reading package leaflets among the persons who declared very frequent use of such products showed that 31.6% read them thoroughly, 42.1% rather thoroughly, 15.8% sometimes did it thoroughly, and sometimes not, 5.3% did not read package inserts thoroughly, and 5.3% never read them. Among those who often used OTC cold medications the results were as follows: 32.9%, 34.3%, 14.3%, 8.6%, 1.4% and 8.6%, respectively. Forty four percent of the subjects who reported occasional use of non-prescription drugs to treat the common cold read package inserts thoroughly, 24% – rather thoroughly

DISCUSSION

20% – sometimes thoroughly, and sometimes not, 4% – not thoroughly, 8% – never read package inserts provided with medicinal products. Of those respondents who very rarely chose to use OTC cold pharmaceuticals 71.4% said they read package leaflets thoroughly, and at the level of 14.3% were the answers: “I read them thoroughly” as well as “I Sometimes read them thoroughly, and sometimes I do not”. Fifty percent of the respondents who reported never having self-administered OTC cold medications declared they read leaflets thoroughly or rather thoroughly, 25% – sometimes thoroughly and sometimes not, and 25% never read information attached to medicines (Fig. 4).

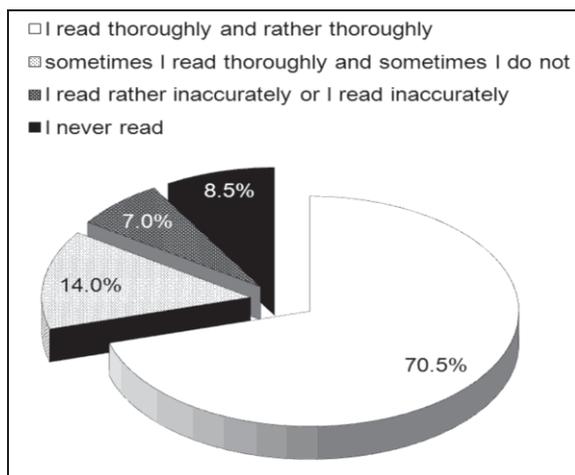


Fig. 3. Percentage of respondents reporting different levels of thorough reading of cold medicine package inserts (n = 129).

Ryc. 3. Odsetek respondentów deklarujących różny stopień dokładności czytania ulotek informacyjnych dołączanych do opakowania leku na przeziębienie (n=129).

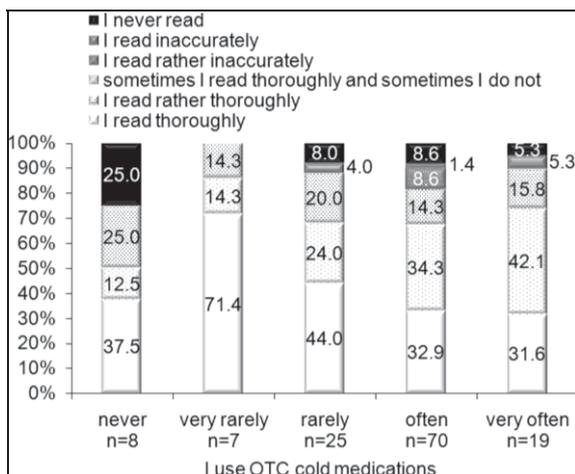


Fig. 4. Declared thoroughness of reading cold medicine package inserts (both OTC and ATC) among patients reporting various frequencies of using anti-cold OTC medicine information.

Ryc. 4. Dokładność czytania ulotek informacyjnych o lekach na przeziębienie (wszystkich OTC i ATC) deklarowana przez respondentów stosujących z różną częstotliwością preparaty OTC na przeziębienie.

Over the counter medications is one of the main branches of the pharmaceutical market. The value of the sector is increasing, and according to the report “OTC medication market in Poland, 2010” in the year 2012 it may exceed the level of 10.6 billion PLN [10]. Undoubtedly, the society is the factor which stimulates the market to grow. The results of our survey suggest that self-administering non-prescription drugs is the most popular method of treating the common cold. A total of 69% of respondents often and very often decided on this form of therapy during a cold. The percentage was two times higher compared to those subjects who preferred prescription drugs, and almost three times larger than the percentage of persons waiting passively for the symptoms to clear up. The survey participants in the U.S declared similar behavior regarding the use of OTC drugs for colds. When treating the common cold, OTC medicines were used by 69.1% of respondents, while prescription drugs – 11.3%, of which 8.2% used antibiotics and 3.1% other drugs to alleviate the symptoms of the disease [11].

However, this study did not focus on people’s approach towards self-medication in the case of a cold but it concerned the expenses on treatment incurred by insurance companies and citizens. The fact that OTC remedies are accessible to everyone without a visit to a physician, diagnosis, or a prescription, it is beneficial to both the National Health Service (saving time and money spent on medical consultation and writing prescriptions) and the patient who does not need to wait in line to buy remedies for a cold. Despite the financial benefits and saved time, it must not be forgotten that self-medication by means of over the counter products might also cause a number of significant health problems. One of the them results from the unrestricted access to non-prescription drugs, which can be easily obtained from non-pharmacy establishments [7,12,13,14].

Many people tend to forget that remedies purchased at a kiosk or a gas station could cause damage to their health if used improperly. General practitioners, pharmacologists, and toxicologists, who treat “victims” of irresponsible self-medication, warn against not gaining sufficient knowledge about medicines before use. Self-administering OTC medications at one’s own discretion, often contrary to instructions, may lead to serious complications e.g. cross reactions or poisoning. Easily accessible non-prescription products are often bought by young, inexperienced persons, unaware of the danger. What is more, studies carried out in the year 2007 by Pracownia Profilaktyki Młodzieżowej “Pro-M” (The Center for Prophylaxis among Teenagers) showed that even children often

use OTC medications. As many as 50% of 1387 polled teenagers reported having used non-prescription remedies during the last month. Many young persons “cured themselves” with medications whose purpose and possible negative results were unknown to them. Some of the reasons why teenagers use OTC products are e.g. for fun, for the taste, to impress peers, or to feel like under the influence of illegal drugs [15].

Another serious problem regarding both self-medication and waiting for symptoms to disappear is the idea of self-diagnosis. It is impossible to know whether every person who self-medicates is able to differentiate between mild diseases only requiring OTC products from a more serious illness. In the case of incorrect diagnosis, the decision to rely on self-medication in treating a seemingly minor symptom, can only delay receiving appropriate therapy and aggravate the state of the patient [16].

Self-medication sometimes brings more negative than positive effects, according to the organizers of “Days of Good Habits”, which this year take place in Warsaw and Cracow [17]. In fact, many medicinal products, if used improperly, can cause additional health problems, even a common ginkgo herbal remedy taken together with aspirin [18]. For the abovementioned reasons, the growth of the OTC medication market requires proper education of the society. The task is mainly fulfilled by package inserts provided with pharmaceuticals.

However, our research proves that such a method is not completely effective. Only 70.5% of respondents claim that they read package leaflets rather thoroughly, or thoroughly, while as many as 8.5% never read the attached information. It is alarming that among the respondents reporting frequent or very frequent use of OTC medications during a cold, about 30% are not interested in thorough reading of package inserts. This problem is noticed not only in Poland. Due to the fact that in the United States from 30% to 50% of people taking drugs do not do so in accordance with recommendations, the FDA (Food and Drug Administration) distributes specially prepared, brochures, easy for a layman to read, informing how to use OTC preparations safely and what to pay attention to when reading medicine leaflets [19].

Why do so many people take non-prescription products without prior reading of the information? Could it be a sign of ignorance, lack of responsibility, or simple negligence? Taking into consideration the opinion of the society, the problem lies in the insert itself. Patients complain about too much information, many unknown and useless terms (often in very small font),

which seem to be more to protect the producer against potential patient claims rather than to help to learn more about a given product [21]. For many people, package inserts are not understandable and not tailored to individual problems or needs of the ill [20]. On the other hand, the patients’ abilities are an important factor. Research performed within the Program for International Student Assessment has shown that 30% of Poles understands only partly what they are reading, and 40% does not understand what they are reading [9]. Therefore, it is worth asking – will a package insert, as a source of information on a medicinal product, ever have the chance to increase awareness among all the persons using OTC goods? Studies conducted in India evaluating the knowledge of safe self-medication before and after educational activities indicate that taking part in small discussion groups coupled with clear brochures help achieve and maintain knowledge of the characteristic symptoms of colds and the risks that occur when taking OTC drugs for colds by children and pregnant women [22]. Perhaps it would be wise to introduce additional forms of education in Poland as well, apart from the traditional leaflets attached to medications, in order for self-treatment to be effective and safe.

The OTC market is growing fast. There is an increasing number of available non-prescription products, none of which is safe. Undoubtedly, responsible self-medication requires gaining knowledge about self-administering medical substances, and this knowledge should be passed on to the patient. The findings indicate that leaflets provided with medicines are not completely successful in performing this task. The information does reach a large number of persons using non-prescription medicaments. In the world oriented towards self-medication, the situation has become particularly dangerous and problematic. It is a challenge to find more effective methods of raising society’s awareness.

CONCLUSION

In conclusion, the most popular method of treating the common cold is the use of non-prescription drugs, while the least preferred one consists in waiting passively for symptoms to clear up.

The younger more often than the older wait until cold symptoms resolve spontaneously.

Among those declaring frequent or very frequent use of OTC drugs to cure a cold, a total of 30% is not inclined to reading package inserts thoroughly.

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