

Review

Assessment of Attitude and perception of homeopathic students towards Effectiveness and Cost of Complementary and Alternative Medicine

Atif Raza¹, Zikria Saleem^{1, 2}, Muhammad Zubair Qureshi³, Asia Raza³, Syeda Zurriat Abbas³, Farhat Yasmeen³

¹Section of Pharmacy Practice, University College of Pharmacy, University of the Punjab, Allama Iqbal Campus, Lahore, Pakistan

²School of Pharmaceutical Sciences, University Sains Malaysia, Malaysia

³Pakistan Homeopathic College, Hospital and Research Center, Lahore, Pakistan.

Received April 16, 2018; Accepted June 05, 2018; Published June 07, 2018

Copyright: © 2018 Zikria Saleem et al.

Abstract

The objective of this study was to assess homeopathic student's perception and attitude about effectiveness and price of homeopathic products. An institutional survey was carried out in Pakistan homeopathic medical college, hospital and research center among undergraduate homeopathic students. Total 65 students participated in this study and a pretested questionnaire was filled by all students. Students were asked to rate their answers on a Likert scale. 29 students from BHMS department (7 male, 22 female) and 36 students (6 male, 30 female) from DHMS department were participated in this survey. After compiling the answers of respondents we observed that BHMS and DHMS had same point of view on some aspects while contradictions on others aspects. When respondents were asked that all homeopathic products are effective in treating the disease, DHMS students were strongly agreed and many BHMS students were just agreed on it while some not agree on it. When the respondents were asked that is cost of homeopathic products are less than the allopathic products than DHMS students were strongly agreed while BHMS students were neutral. Major findings of this study were that, homeopathic students have positive approach towards complementary and alternative medicine. Both BHMS and DHMS have the same opinion that further scientific testing should be done in homeopathy for its further acceptance. They supported the efficacy of homeopathy with least side effects and adverse reactions. Both groups were in favor of effectiveness of homeopathy in almost every disease.

*Corresponding Author: Zikria Saleem, School of Pharmaceutical Sciences, University Sains Malaysia, Malaysia, Email: xikria@gmail.com, 92-322-9801981

Introduction

Homeopathy is the combination of two Greek words "homeo" (similar) and "pathos" (suffering). (1-4) Basically it is a branch of medicine which consider the patient and his illness totally in a different manner from the conventional medicinal approach.(1) It is an effective system which assists the body's natural tendency to heal itself. (2) Doctor Samuel Hahnemann discovered this curative system of medicine and spread it throughout the world. (5) Homeopathy is based upon its unique principle the "LAW OF SIMILIA" meaning "likes cure likes".(6-9) In its curative discipline, the physiological effects of crude substance are similar to symptoms of illness which get cured by the corresponding homeopathic remedy; this is the what the law of similia describes.(10) Homeopathy has been used by people for more than two centuries and continues to be used as an effective source for curing the disease and palliating the incurable disease. It became popular in 19th century because of its marvelous success in epidemics.(3)

In recent years, the trend of using alternative medicine got considerable attention because of its efficacy.(11) Due to high cost of conventional medicine, safe and effective alternate therapies are getting popularity.(12) Numerous surveys have proven that the people

who tend to seek homeopathic treatment are considerably more educated than the people who don't.(13) Using of homeopathic medicine is a growing trend in United States.(14) Similarly in Pakistan complementary and alternative medicines are considered as the basic treatment line in rural areas where 80% of population lives.(15) However the health seeking behavior in a population have several determinants including physical, socio economic, political and cultural contexts.(6) Thus objective of this study was also to assess homeopathic student's perception and attitude about effectiveness and price of homeopathic products.

Methodology

The observational survey was carried out among undergraduate homeopathic doctors at Pakistan Homeopathic Medical college, hospital and research center. Ethical approval was obtained from college administration. The study population comprised total 65 students from BHMS (Bachelors in Homeopathic medicine and science) and DHMS (Diploma in Homeopathic medicine and science) department. Respondents from BHMS department were 29 (7 male 22 female) and from DHMS department were 36 (6 male and 30 female). The aspect on which they were interrogated was perception about

complementary medicine and homeopathic products. For this purpose, a questionnaire was designed for their assessment. The questionnaire was consisting of 3 segments of questions. Which were perception about holistic medicine, homeopathic products and the price of homeopathic products. Before the application of questionnaire on a relatively a large number of people, a pilot study was conducted on a few students to ensure the reliability of questionnaire. This questionnaire was distributed among the students and a briefing was given verbally about the nature of study and the procedure of filling the questionnaire was explained. No individual identification was

needed for filling criteria. When they filled up the forms, they were taken back from them for further analysis. An observational analysis was carried out using statistical approach.

Results

As shown in (Table 1) 29 students from BHMS department and (7 male, 22 female) 36 students (6 male, 30 female) from DHMS department were participated in this survey. We aimed to evaluate the different perceptional approaches of students from both groups about homeopathy and homeopathic products.

Parameters	BHMS	DHMS	Total
Age			
<u>≤</u> 21	17(58.6)	22(61.1)	39 (60.0)
> 21	12(41.4)	14(38.9)	26(40.0)
Gender			
Male	7(24.1)	6(16.7)	13(20.0)
Female	22(75.9)	30(83.3)	52(80.0)
House hold income monthly			
<20k	8(27.6)	18(50.0)	26(40.0)
>20K	21(72.4)	18(50.0)	39(60.0)
Area of home town			
Rural	7(24.1)	3(8.3)	10(15.4)
Urban	22(75.9)	33(91.7)	55(84.6)

Table 1: Demographics

BHMS; Bachelor of Homeopathic medicine and science, DHMS; Diploma of Homeopathic medicine and science

The perception of BHMS and DHMS students about homeopathy and homeopathic products were assessed in this survey. After compiling the answers of respondents we observed that BHMS and DHMS had same point of view on some aspects while contradictions on others aspects. As when they were ask that homeopathic medicines should be subjected to more scientific testing before it can accepted by conventional doctors, DHMS were strongly agreed while BHMS were neutrally agreed.(p=0.01). A confliction was seen on the question that. Is homeopathy dangerous that it may prevent people from getting proper treatment? A few of BHMS students were agreed while the majority of BHMS students were disagreed. DHMS were strongly disagreed (p=0.001). When they were asked that conflict with others has no effect on your health? Half of DHMS students were agreed while other half was disagreed. Same trend was seen in BHMS, half of them was agreed, remaining half were disagreed. On another question it was asked that, Is it important to find a balance between work and relaxation in order to stay healthy? Half of BHMS students were strongly agreed while few were disagree. DHMS were strongly agreed with that. As shown in (Table 2).

The second segment of questions was related to the perception about homeo products. When respondents were asked that all homeo products are effective in treating the disease, DHMS were strongly agreed while some of BHMS students were agreed and other disagreed.(p=0.003) Similarly on the question that homeopathy has less side effects, DHMS were strongly agreed, majority of BHMS were agreed few were not agreed.(p=0.005). On the question, are

you confident that homeopathic products are better than synthetic products, DHMS were strongly agreed, and BHMS was neutrally agreed (p=0.04). The next question was about efficacy of homeopathic medicine. When students were asked that is homeopathy effective for every group age, DHMS were strongly agreed BHMS were neutrally agreed (p=0.05). DHMS was strongly agreed that homeopathic medicines are the best alternate of synthetic medicines, BHMS were neutrally agreed. (Table 3)

The next segment was about the price of homeopathic products. When the respondents were asked that is cost of homeopathic products are less than the allopathic products? DHMS was strongly agreed while BHMS was neutrally agreed (p=0.00) and when it was asked that you can afford homeopathic products due to its low prices? DHMS was strongly agreed with this statement while BHMS was neutrally agreed. (Table 4)

Discussion

Homeopathic system of medicine has been used for more than 200 years but still it is claimed to be unscientific.(16) According to critics of homeopathy, there is very little evidence about effectiveness of homeopathy, while the homeopathic practitioners make a convincing picture of its clinical effectiveness.(14, 17) Thus the students from both groups were agreed that it must undergo more scientific testing to get rid of this controversy. Thus basic purpose of this survey was to assess the views of homeopathic student about homeopathy and homeopathic products.

STATEMENTS	SA	A	N	D	SD	COURSE#
Positive thinking can help you fight off a minor illness	54(83.1)	10(15.5)	1(1.5)	_	_	0.621
Homeopathic medicine should be subject to more scientific	36(55.4)	26(40.0)	2(3.1)	1(1.5)	_	0.010*
testing before it can be accepted by conventional doctors						
When people are stressed it is important that they are careful	6(9.2)	47(72.3)	12(18.5)	_	_	0.203
about other aspects of their lifestyle as their body already						
nas enough to cope with.						
Homeopathic medicine can be dangerous in that it may	7(10.8)	12(18.5)	11(16.9)	26(40.0)	9(13.5)	0.001*
prevent people getting proper treatment						
The symptoms of an illness can be made worse by	23(35.4)	38(58.5)	2(3.1)	2(3.1)	_	0.244
Depression						
Homeopathic medicine should only be used as a last resort	4(6.2)	6(9.2)	9(13.8)	19(29.2)	26(40.0)	0.994
when conventional medicine has nothing to offer						
If a person experiences a series of stressful life events they	22(33.8)	27(41.5)	6(9.2)	10(15.4)	_	0.197
are more likely to become ill						
It is worthwhile trying homeopathic medicine before going	1(1.5)	9(13.8)	4(6.2)	28(43.1)	23(35.4)	0.642
to the doctor						
Conflict with others has no effect on your health	7(10.8)	13(20.0)	11(16.9)	26(40.0)	8(12.3)	0.000*
Homeopathic medicine should only be used in minor	3(4.6)	5(7.7)	5(7.7)	17(26.2)	35(53.8)	0.124
ailments and not in the treatment of more serious illness						
It is important to find a balance between work and relaxation	30(46.2)	24(36.9)	10(15.4)	1(1.5)	_	0.004*
n order to stay healthy						
Homeopathic medicine builds up the body's own defenses,	46(70.8)	16(24.6)	3(4.62)	_	_	0.164
so leading to a permanent cure						

 Table 2: Perception about Holistic Medicine

STATEMENTS	SA	A	N	D	SD	COURSE#
All Homeopathic products are very effective in treatment of disease	29(44.6)	21(32.3)	8(12.3)	7(10.0)		0.003**
Homeopathic products have less side effects.	10(15.4)	20(30.8)	21(32.3)	13(20.0)	1(1.5)	0.005**
You feel an improvement in your health after using product.	16(24.6)	40(61.5)	8(12.3)	1(1.5)	-	0.590
You have confidence that homeopathic products are better than	33(50.8)	29(44.6)	1(1.5)	2(3.1)	-	0.040*
synthetic drugs.						
Homeopathic products are equally effective for all age groups.	16(24.6)	24(36.9)	16(24.6)	6(9.2)	3(4.6)	0.055*

Homeopathic products are best alternative for synthetic medicines.	24(36.9)	26(40.0)	14(21.5)	1(1.5)	_	0.053*

Table 3: Perception about homeopathic products

STATEMENTS	SA	A	N	D	SD	COURSE#
You are satisfied with prices of homeopathic products.	14(21.5)	34(52.3)	10(15.4)	7(10.8)		0.253
Costs of Homeopathic products are less than ALLOPATHY	23(35.4)	21(32.3)	10(15.4)	6(9.2)	5(7.7)	0.000***
drugs.						
The prices of Homeopathic products are same at all	2(3.1)	17(26.2)	16(24.6)	27(41.5)	3(4.6)	0.114
pharmacies of different areas.						
The prices of all brands of Homeopathic products are nearly	2(3.1)	17(26.2)	13(20.0)	27(41.5)	6(9.2)	0.143
similar.						
You can afford Homeopathic products due to low prices.	7(10.8)	28(43.1)	20(30.8)	8(12.3)	2(3.1)	0.000***
The sale prices of Homeopathic products are same as written	14(21.5)	34(52.3)	5(7.7)	12(18.5)	_	0.210
on label.						

Table 4: Prices of homeopathic products

For this purpose, we asked several questions to them and analyzed the answers. It was observed that majority of the students from both BHMS and DHMS department was in favor of the statement that homeopathic medicines should be subjected to more scientific testing before it can be accepted by conventional doctors. Students had different opinion about side effects of homeopathic medicines.

A few students of BHMS department were agreed with the statement that, homeopathy can be dangerous as it can prevent the patient from getting proper treatment, while the majority of BHMS and DHMS students was disagreed. Basically it has proved that homeopathy is effective in clinical cases so majority of the students think that it can't be dangerous The main reason is that homeopathic medicines in high dilutions, prescribed by qualified doctor, are probably safe and unlikely to stimulate severe adverse reactions.(18) That's why students think that it can't be dangerous. On further question it was asked that conflict with others has no effect on your health? Usually conflict is defined as the absence of peace.(19). So it can directly affect one's health but the answer of respondents was in accordance to their personal observation. Here we get interesting results because half of BHMS students was agree with it while other half of students was not agree. Similarly half of DHMS students were agreed while rest of them were not agreed. On further question, it was observed that DHMS students were more likely in favor of the statement that it's important to find a balance between work and relaxation in order to make body healthy, while half of BHMS was agreed and other half was disagreed.

The perceptional approaches of students were also assessed about homeopathy and homeopathic products. The first question was about the efficacy of homeopathic products in treating the disease. Majority of participants agreed with this. A WHO (world health organization) report, suggested the efficacy of homeopathy as a growing scientific evidence profile. Various clinical trials have proven that homeopathy is effective. (20) The next question was about the side effects of homeopathy. It is generally consider that homeopathy do not have any side effects. As homeopathic

treatment is a low risk therapy with less side effects. (22) Homeopathic medicines effectiveness is clinically proven and its application be regarded as safe. (23) Responding to this question DHMS and majority of BHMS students were agreed only a few respondents from BHMS were not agree probably considering homeopathic aggravations as a reason. On the comparison of homeopathic medicines with the other synthetic medicines, DHMS gave their opinion that homeopathy is better than the other synthetic medicines. BHMS was neutrally agreed with it.

DHMS was strongly agreed that the homeopathy is equally effective for all the age groups and it is the best alternate of synthetic drugs, while BHMS was neutrally agreed on both. The next segment was comprised of the questions about price of homeopathic products. When it was asked that the price of homeopathic products is less than the allopathic medicines, DHMS was strongly agreed while BHMS was neutrally agreed. It is indicated by evidences that the price of homeopathic medicines are relatively less, as compared to allopathic medicines (24) and homeopathy improves health with cost saving (25). Furthermore on the question of affordability of homeopathic medicine, DHMS was strongly agreed that they can afford homeopathic products because of its low prices. BHMS was neutrally agreed. Most participants of this survey belongs to low income class but homeopathic products are still affordable for them.

Conclusion

Major findings of this study were that, homeopathic students have positive approach towards complementary and alternative medicine. Both BHMS and DHMS have the same opinion that further scientific testing should be done in homeopathy for its further acceptance. They supported the efficacy of homeopathy with least side effects and adverse reactions. Both groups were in favor of effectiveness of homeopathy in almost every disease. They were satisfied with the quality and prices of homeopathic products as they can afford homeopathic products because these are more convenient as compare to other conventional medicines.

DHMS or BHMS, * Significant difference, SA; strongly agreed, A; Agreed, N; Neutral, D; Disagree, SD; strongly disagree

References

- 1. Dixon T. What is Homeopathy? Special Delivery. 1995;18(2):13.
- 2. New IH. What is homeopathy?
- 3. Fisher P. 1. Abstract 2. Introduction 2.1. Homeopathy and Allopathy 2.2. Homeopathic Pathogenetic Trials 3. Development of homeopathy 3.1. Homeopathy Worldwide 4. Contemporary Homeopathic Practice 4.1. Individualised Homeopathy. Frontiers in Bioscience. 2012; 4: 1669-82.
- Fleisher MA (2015) Homeopathy or isopathy? Journal of Family Practice.51 (11):984-6.
- 5. Gasparin J. What is homeopathy? Revista de enfermeria (Barcelona, Spain). 2005;28(3):9-15.
- Shaikh BT, Hatcher J. Health seeking behavior and health services utilization trends in national health survey of Pakistan: what needs to be done. JPMA. 2007;57(8):411-4.
- 7. Van Wijk R, Wiegant F. Postconditioning hormesis and the homeopathic Similia principle: molecular aspects. Human & experimental toxicology. 2010;29(7):561-5.
- 8. Gosavi T, Ghosh P, Kandhare A, Bodhankar S. Unwrapping homeopathic principles in the wake of research: serendipity, placebo or true therapeutic milestones. Pharmacologyonline. 2011;1:894-906.
- del Carmen Macías-Cortés E, Llanes-González L, Aguilar-Faisal L, Asbun-Bojalil J. Individualized homeopathic treatment and fluoxetine for moderate to severe depression in peri-and postmenopausal women (HOMDEP-MENOP study): a randomized, double-dummy, double-blind, placebo-controlled trial. PLoS One. 2015;10(3):e0118440.
- Almirantis Y. Homeopathy-between tradition and modern science: remedies as carriers of significance. Homeopathy. 2013;102(2):114-22.
- 11. Eskinazi D. Homeopathy re-revisited: is homeopathy compatible with biomedical observations? Archives of internal medicine. 1999;159(17):1981-7.
- Ashraf S, Rahman AJ, Satwani H, Naz F, Abbas K, Hassan A. Trend of complementary therapies in paediatric age group. JPMA-Journal of the Pakistan Medical Association. 2010;60(12):1015.
- 13. Rothstein W. Physicians in the Nineteenth Century. Baltimore: Johns Hopkins University Press; 1972.
- 14. Riley D, Fischer M, Singh B, Haidvogl M, Heger M. Homeopathy and conventional medicine: an outcomes study comparing effectiveness in a primary care setting. The Journal of Alternative & Complementary Medicine. 2001;7(2):149-59.
- Tan M, Uzun O, Akçay F. Trends in complementary and alternative medicine in Eastern Turkey. Journal of Alternative & Complementary Medicine. 2004;10(5):861-5.
- Milgrom LR. Homeopathy and the new fundamentalism: a critique of the critics. The Journal of Alternative and Complementary Medicine. 2008;14(5):589-94.
- 17. Mathie R. The research evidence base for homeopathy: a fresh assessment of the literature. Homeopathy. 2003;92(2):84-91.
- Dantas F, Rampes H. Do homeopathic medicines provoke adverse effects? A systematic review. British Homoeopathic Journal. 2000:89:S35-S8.
- Beru MK, Kylelo H, Rotich KJ. OCCUPATIONAL STRESS AND CONFLICT MANAGEMENT IN ORGANIZATIONS: UNDERSTANDING THE ORGANIZATIONAL BEHAVIOUR. International Journal of Economics, Commerce and Management. 2015;3(7):938-58.
- 20. Mathie RT. Controlled clinical studies of homeopathy. Homeopathy. 2015;104(4):328-32.
- 21. Ullman D. The homeopathic revolution: why famous people and cultural heroes choose homeopathy: North Atlantic Books; 2007.
- 22. Marian F, Joost K, Saini KD, von Ammon K, Thurneysen A, Busato A. Patient satisfaction and side effects in primary care: an observational study comparing homeopathy and conventional

- medicine. BMC complementary and alternative medicine. 2008;8(1):52.
- Bornhöft G, Wolf U, von Ammon K, Righetti M, Maxion-Bergemann S, Baumgartner S, et al. Effectiveness, safety and cost-effectiveness of homeopathy in general practice-summarized health technology assessment. Complementary Medicine Research. 2006;13(2):19-29.
- Debas HT, Laxminarayan R, Straus SE. Complementary and alternative medicine. 2006.
- Viksveen P, Dymitr Z, Simoens S. Economic evaluations of homeopathy: a review. The European Journal of Health Economics. 2014;15(2):157-74