



Research Article

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Assessment of Self-Care Knowledge among Patients with Psoriasis

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ABSTRACT

Objective(s): To assess self-care knowledge among patients with Psoriasis.

Methods: A descriptive cross-sectional design was utilized at the dermatology center in Al-Najaf Teaching Hospital and Al-Sadr Medical City from October 30th, 2022, to May 2nd, 2023. A validated Psoriasis Knowledge Assessment Questionnaire and patients' knowledge assessment of self-care for psoriasis questionnaire were used and filled by 60 patients who visit the hospital by non-probability purposive sampling for the purpose of data collection. The data were analyzed by using descriptive statistics and SPSS version 24, Descriptive statistics and inferential statistics.

Results: Patients have poor self-care knowledge about psoriasis (Mean: 24.200).

Conclusion: The patients in this study have a lack of self-care knowledge about psoriasis.

Recommendation: An educational program should be provided for patients with psoriasis in the dermatology center to enhance self-care knowledge about psoriasis.

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تقييم معارف الرعاية الذاتية لمرضى الصدفية

المستخلص

الاهداف: هدفت الدراسة إلى تقييم معارف الرعاية الذاتية لمرضى الصدفية. **المنهجية:** تم استخدام دراسة ذو تصميم مقطعي في مركز الأمراض الجلدية في مستشفى النجف التعليمي ومدينة الصدر الطبية للفترة من ٣٠ تشرين الاول ٢٠٢٢ إلى ٢ ايار ٢٠٢٣. تم ملئ الاستبيان من قبل ٦٠ مريضاً يزورون المستشفى حيث اختيروا بطريقة غير احتمالية (هادفة) لغرض جمع البيانات. تم تحليل البيانات باستخدام الحزمة الاحصائية للعلوم الاجتماعية ال وصفي SPSS الاصدار ٢٤ عن طريق تطبيق الاحصاء الوصفي والاحصاء الاستدلالي. **النتائج:** اظهرت الدراسة بأن المرضى المصابين بالصدفية لديهم معرفة ضعيفة حول الرعاية الذاتية للمرض بمتوسط (٢٤,٢٠٠). **الاستنتاجات:** ان المرضى في هذه الدراسة يفتقرون إلى المعرفة الكافية حول الرعاية الذاتية لمرض الصدفية. **التوصيات:** يجب توفير برنامج تعليمي لمرضى الصدفية في وحدة الأمراض الجلدية لتعزيز معارفهم حول الرعاية الذاتية لمرض الصدفية.

الكلمات المفتاحية: الصدفية، الرعاية الذاتية، معارف المرضى، الممرضين.

Introduction

Psoriasis is a skin condition classified as a chronic, autoimmune, and long-lasting disease. According to the International Federation of Psoriasis Associations, 2% to 3% of the world's population (125 million) are affected by psoriasis ⁽¹⁾. Quality of life is greatly affected by psoriasis, especially when the face or hand is affected which makes a huge economic burden on healthcare systems caused by this dermatological disease ⁽²⁾. Self-care is one of the daily activities of individuals, whether they are healthy or with long-term conditions (LTC). The daily activities can be either simple health-promoting activities, such as exercise and eating a healthy diet, or complex health-promoting activities, such as taking medication and rehabilitation activities ⁽³⁾. Modifying one's lifestyle is a science and art to protect health and health promotion by dealing with disease-related problems and helping individuals cope with their problems independency and constancy, and by avoiding triggers and risk factors and following a healthy lifestyle ⁽⁴⁾. The major problem in patients with psoriasis is a poor commitment

to the prescribed treatment, the patient's compliance with treatment and positive lifestyle habits. This can be enhanced by increasing knowledge about the pathogenesis and treatment of psoriasis, which may lead to an increase in the patient's perception of control and attention to aggravating factors ⁽⁵⁾. Patient self-care is one of the duties for nursing staff because to achieving the patient's well-being and improving health ⁽⁶⁾. No studies about self-care education of psoriasis in Iraq although the significant of self-care in treatment of psoriasis and decrease the burden on the healthcare system.

Methods

Study Design and Setting

A cross-sectional study design was used in this study to assess self-care knowledge among patients with Psoriasis. The study was conducted at the Dermatology center at Al-Najaf Teaching Hospital and Al-Sadr Medical City for the period from October 30th, 2022 to May 2nd, 2023

Study Sample and Sampling

A non-probability (purposive) sampling of 60 participants with psoriasis who visited the dermatology unit at Al-Najaf Teaching Hospital and Al-Sadr Medical City from males and females, adult age, and different educational levels.

Data Collection and Study Instruments

Data was collected using self-report method gathered by constructed questionnaire designed to answer the study questions.

The instrument consists of three parts: Part I: socio-demographic and this part consists of (10) items such as: age, sex, marital status, educational level, occupation, residence, income, body mass index, and smoking. Another (4) items related to Patients' Clinical characteristics, Duration of psoriasis, Medical history, the presence of psychological disorders, and type of treatment is currently being used. Part II: Psoriasis Knowledge Assessment Questionnaire: this questionnaire was developed by Nagarajan and Thappa ⁽⁷⁾, and contains 25 questions about psoriasis knowledge. This questionnaire was translation by (bilingual) and also modified according to the opinions of the experts' committee. The questionnaire was answer as "true" or "false", 8 questions from 25 that were ranked negative questions.

Part III: patients' knowledge assessment about self-care of psoriasis questionnaire. This part of the questionnaire, was a developed by Elzehiri et al ⁽⁸⁾. Modifications were made after getting permission from the authors by taking nursing experts' opinions to fit with the purposes of our study. To assess patients' knowledge about psoriasis self-care participants were answered 18 questions of self-care knowledge steps. Self-care knowledge scored 2 points for correct answers and 1 for incorrect answers. Van yuale ⁽⁹⁾ method was used to describe the Knowledge of patients to three grades (levels)

that are (poor, Fair, and good) as the following:

knowledge domain was calculated as following:

$$\text{Cut-off point} = \frac{\text{rating of scale sum}}{\text{No of sclae}} = \frac{1+2}{2} = 1.5$$

Poor patients' Knowledge (< 1.5)

Fair patients' Knowledge (1.5 – 1.75)

High patients' Knowledge (> 1.75)

Validity and reliability of the Instruments

The face validity and content validity of the study tool was evaluated by an expert committee consisting of experts in community health, adult nursing, a doctor in the dermatology department, psychiatry, and psychology. The stability of the study tool was evaluated using Cron-Bach's alpha coefficient, and the results showed very good internal consistency and reliability was ranged (0.80 -0.86) ⁽⁷⁾⁽⁸⁾.

Ethical Consideration

Before giving a questionnaire take official permission from the sample to contribute to the study, where data was collected voluntarily from the participants, with assurances to them that the data will be for the benefit of scientific research only, their names or information will not be mentioned, and patient privacy is fully protected without causing inconvenience to the participant.

Statistical data analysis

The following statistical data analysis approaches were used in order to analyze and assess the results of the study using the application of the statistical package (SPSS) ver. (24): Descriptive analysis was performed to assess the frequency, mean, standard deviation (SD), and Inferential data analysis.

Results

Table 1. Socio-demographic characteristics of patients with Psoriasis (N=60)

Age groups		F	%
	18 – 27 years	23	38.3
	28 – 37 years	18	30.0
	38 – 47 years	9	15.0
	48 – 57 years	3	5.0
	58 – 67 years	7	11.7
Mean age: $M \pm SD = 33.66 \pm 13.89$			
Level of Education		F	%
	Read and write	10	16.7
	Primary school	16	26.7
	Intermediate School	13	21.7
	Preparatory school	7	11.7
	Bachelor's	14	23.3
Accommodation		F	%
	Rent	25	41.7
	Own a house	35	58.3
Income		F	%
	Enough	9	15
	Almost enough	27	45
	Not enough	24	40
Smoking		F	%
	Yes	14	23.3
	No	45	75
	Quit smoking	1	1.7

No.= Number, F= frequency, %= percentage.

Table (1) demonstrates that the highest percentage (38.3%) of the patients was at age group (18-27 years) with the mean age ($M \pm SD = 33.66 + 13.89$). A 58.3 % of the study participants have their own house and approximately a half (45%) of them have their monthly income almost enough. Concerning the smoking, the results shows that 75% of them were non-smokers.

Table 2: Level of Knowledge of patients with Psoriasis

No.	Statements	P	F	M	Level
1.	Psoriasis is contagious	58	2	1.97	Good
2.	Psoriasis may begin at any age	45	15	1.75	Fair
3.	Psoriasis can affect the entire skin	45	15	1.75	Fair
4.	Psoriasis affects both men and women	18	42	1.3	Poor
5.	Psoriasis is a curable disease	35	25	1.58	Fair
6.	The exact cause of psoriasis is known	36	24	1.6	Fair
7.	Psoriasis can be associated with joint pain	18	42	1.3	Poor
8.	Specific food intake or restrictions may cure psoriasis	4	56	1.06	Poor
9.	In Psoriasis skin cells are multiplying too slowly	29	31	1.48	Poor
10.	Injury to the skin may cause psoriasis to appear at that site in persons already having psoriasis	21	39	1.35	Poor
11.	Psoriasis never occurs in the nails	12	48	1.2	Poor
12.	Certain drugs may increase the severity of psoriasis in persons already having psoriasis	11	49	1.18	Poor
13.	Certain infections may increase the severity of psoriasis in persons already having psoriasis	46	14	1.77	Good
14.	Stress plays no role in Psoriasis	45	15	1.75	Fair
15.	Psoriasis increases in winter	48	12	1.80	Good
16.	Having close blood relatives affected with psoriasis determines to great extent whether a person will have psoriasis or not	39	21	1.65	Fair
17.	Psoriasis never occurs in the palms and soles	34	26	1.56	Fair
18.	Psoriasis damage brain	34	26	1.56	Fair
19.	Psoriasis is transmitted through sharing food	53	7	1.81	Good
20.	Psoriasis is transmitted among sexual partners	49	11	1.81	Good
21.	Photo/ light therapy is useful in treating psoriasis	42	18	1.70	Fair
22.	Oral medications are useful in Psoriasis	54	6	1.90	Good
23.	Certain drugs which are used to treat Psoriasis may have side effects	26	34	1.43	Poor
24.	Psoriasis is seen all over the world	58	2	1.96	Good
25.	Treatment of Psoriasis can include moisturizers	7	53	1.11	Poor

P= Pass, F= Fail, M= Mean, poor= (< 1.5), Fair= (1.5-1.75), Good= (>1.75).

Table (2) demonstrates that the highest percentage of participants have poor knowledge concerning psoriasis treatment, triggers, locations, and impacts.

Table 3: Level of Self-Care Knowledge of patients with Psoriasis

Items	P	F	M	Level
Commitment to showering with warm water daily, and the duration of the shower is 5- 15 minutes	1	59	1.01	Poor
Using a soft towel to dry the Skin	41	19	1.68	Fair
Following the tack method when drying the skin	10	50	1.16	Poor
Commitment to daily moisturizing the skin 1-3 times a day	7	53	1.11	Poor

Exposing to the sun for 15-20 minutes to benefit from the ultraviolet rays	32	82	1.53	Fair
Avoid prolonged exposure to Sun to avoid dryness and irritation of the skin	16	44	1.26	Poor
-Wear light, soft, cotton Clothes	53	7	1.88	Good
Applying psoriasis ointments and creams under the supervision of a doctor	58	2	1.96	Good
Avoid getting scratches or cuts on the skin	7	53	1.11	Poor
Avoid using alcohol-containing products that may irritate the skin without Consulting a doctor	22	38	1.36	Poor
Getting enough rest	8	52	1.13	Poor
Daily Walking / Deep Breathing	6	54	1.10	Poor
Drinking adequate amounts of water 6-8 glasses daily	17	43	1.28	Poor
Eating balanced meals rich iomega-3 fish (salmon) -olive oil / whole grains	24	36	1.40	Poor
Eating vegetables like spinach and carrots, and fruits like berries and mangoes	34	26	1.56	Fair
Avoid eating red meat and dairy products in abundance	10	50	1.16	Poor
Trying to reduce/quit/exposure to smoking	8	52	1.13	Poor
Avoid using detergents and washing powders	18	42	1.30	Poor

P= pass, F= Fail, M= Mean, poor= (< 1.5), Fair= (1.5-1.75), Good= (>1.75).

Table (3) recorded that most patients have a lack of knowledge concerning self-care of psoriasis

Table 4. Overall Knowledge Assessment Using Questionnaire (KAQ) concerning Psoriasis

Knowledge	Frequency	Percent
Poor (< 1.5)	9	36
Fair (1.5-1.75)	9	36
Good (>1.75)	7	28
Total	25	100

poor= (< 1.5), Fair= (1.5-1.75), Good= (>1.75).

Table (4) show the final assessment of patients' knowledge about psoriasis that most of participants have fair to poor knowledge about psoriasis in general

Table 5: Overall Assessment of Patients' Self-Care knowledge concerning psoriasis

Knowledge	Frequency	Percent
Poor (< 1.5)	13	72
Fair (1.5-1.75)	3	17
Good (>1.75)	2	11
Total	18	100

poor= (< 1.5), Fair= (1.5-1.75), Good= (>1.75).

Table (5) shows that the overall level of knowledge about self-care of patients with psoriasis was poor demonstrating that most patients have poor knowledge about self-care of psoriasis.

Discussion

Self-care is the individuals, families, and communities' ability to health promotion, disease prevention, health maintenance, illness and disability coping with or without healthcare providers' support⁽¹⁰⁾.

Concerning to the demographics information of patients, the study results showed most of the participants in the study group were at age group (18-27 years). This result agreed with a previous study found that the highest percentage (46.2%) of patients, as age group (18-28)⁽¹¹⁾. This may indicate that the younger age groups are more interested in participating in the study and accessing information about their health condition.

Approximately half of participants have a monthly income almost enough for their living. This result is supported by a previous study conducted in Egypt in the dermatology outpatient clinic shows that 64 of 125 subjects have a middle income⁽¹²⁾. This may refer to that people with middle income may be keener to constantly visit health institutions look for treatment, and interested to participating in the study to increase awareness about psoriasis that may promote their health status and decrease disease aggravation

The results show that the highest percentage of the patients have low level of knowledge about self-care of psoriasis. This result is almost similar to a study finding that the level of knowledge of the study sample before any intervention was poor, and the knowledge significantly improved after three months due to effect of the educational program⁽⁷⁾. Another knowledge results showed that many patients have limited information of underlying causes and triggers of psoriasis⁽¹³⁾. The current study finding showed that most participants had poor level of knowledge about self-care of psoriasis. There is an agreement with another study results found unsatisfactory level of knowledge among

patients regarding self-care of psoriasis before educational program⁽¹⁴⁾. Several aspects were revealed from the lack of knowledge about the causes of psoriasis, including increased patients' anxiety, unnecessary investigation, and incorrect treatment, wherefore treatment of psoriasis emphasis on the lifestyle and risk factors, not only on skin symptoms⁽¹⁵⁾. The lack of knowledge among psoriasis patients' may indicates the neglect of important role of self-care for psoriasis and focusing on medical management only, despite the importance of self-care in controlling the exacerbation of the disease and improving patients' condition. Many limitations faced the researcher, including patients' refusal to continue filling out the questionnaire, patients' refusal to participate in the study, and the study time short and insufficient to include a larger number of study participants and obtain more accurate results.

Conclusion

The participants in this study have a lack of knowledge about psoriasis self-care. This intensifies the importance of improving patients' knowledge about self-care practices of psoriasis by arrange the educational programs and another educational means in the health institutions.

Recommendations

It's necessary of conducting further research on ways to increase patients' knowledge about psoriasis self-care and integrate self-care into the disease care plan. This study suggests to educate patients about psoriasis in general and self-care in specific, and adopt a booklet that contains the most important instructions about self-care practices of psoriasis, given for patients visiting the dermatology department in the hospital.

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Conflict of interest

None to declare.

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Data availability

The data supporting the findings of this study are not publicly available due to ethical and privacy considerations but may be made available from the corresponding author upon reasonable request and with appropriate approval.

References

1-George Y, Aldeen M, Garnavi R. Automatic psoriasis lesion segmentation in two-dimensional skin images using multiscale superpixel clustering. *Journal of Medical Imaging*. 2017 Oct 1;4(4):044004-. doi: 10.1117/1.JMI.4.4.04400

2- Ko SH, Chi CC, Yeh ML, Wang SH, Tsai YS, Hsu MY. Lifestyle changes for treating psoriasis. *Cochrane Database of Systematic Reviews*. 2019(7). DOI:[10.1002/14651858.CD011972.pub2](https://doi.org/10.1002/14651858.CD011972.pub2)

3- Ogunbayo OJ, Schafheutle EI, Cutts C, Noyce PR. Self-care of long-term conditions: patients' perspectives and their (limited) use of community pharmacies. *International journal of clinical pharmacy*. 2017 Apr;39:433-42.

4- Shawwat MA, Atiyah HH. Nutritional Behavior and Medication Adherence among Patients Undergoing Hemodialysis. *Pakistan Journal of Medical & Health Sciences*. 2022 Apr 28;16(03):899-. Doi: <https://doi.org/10.53350/pjmhs22163899>

5- Nagarajan P, Karunagari K, Thappa D. A questionnaire-based survey of patients' knowledge regarding psoriasis. *Arch Psychiatr Nurs*. 2016;2(1):18-23. DOI Number: 10.5958/2395-180X.2016.00004.9

6- Kadhim, A.J. and Khudur, K.M.,2021. Effectiveness of an Instructional Program on

Nurses' Performance toward Unconscious Patients' Personal Hygiene in Intensive Care Unit at Teaching Neurosurgical Hospital at Baghdad City. *Drugs and Cell Therapies in Haematology*, 10(1). pp. 1522-1528.

7- Nagarajan P, Thappa DM. Effect of an educational and psychological intervention on knowledge and quality of life among patients with psoriasis. *Indian dermatology online journal*. 2018 Jan;9(1):27. doi: [10.4103/idoj.IDOJ_111_17](https://doi.org/10.4103/idoj.IDOJ_111_17)

8- Elzehiri DA, Srouf OA, Salime RA. Effect of Individualized Guidance on Knowledge and Self-Care Practices of Psoriasis Patients. *Tanta Scientific Nursing Journal*. 2022 Feb 1;24(1):293-328. DOI: [10.21608/tsnj.2022.218011](https://doi.org/10.21608/tsnj.2022.218011)

9-Groebner DF, Shannon PW, Fry PC. *Business statistics: A decision-making approach*. Pearson; 2018.

10- Aqeeli MA, Hassan H. The Impact of An Instructional Program on Hypothyroidism Patients' Knowledge Toward Physical Exercise and Activity Daily Livings. *Kufa Journal for Nursing Sciences*. 2022 Jun 14;12(1). DOI: https://doi.org/10.36321/kjns/2022/1201_08

11- AL-Abedi HM, Al-Tameemi HM, Alshibil MM, Al-Zeyadi AA. Impact of Psoriasis on Patients Psychological Aspect at Out Clinical Consultation. *International Research Journal of Pharmacy and Medical Sciences*. 2023;6 (2):7-12.

12- Aladl S, El-Gilany AH, Ghanem B, Fayed H. Quality of life of psoriatic patients and their acceptance of the disease. *Iranian Journal of Dermatology*. 2020 Oct 1;23(3):91-7. <https://doi.org/10.22034/ijd.2020.111545>

13- Tian J, Zhang L, Zhao X, Yang L. Knowledge, attitude, and practice of psoriasis patients toward their diseases: a web-based, cross-sectional study. *Frontiers in Medicine*. 2024 Apr 10;11:1288423. doi.org/10.3389/fmed.2024.1288423

14- Mohammed Ibrahim W, Mostafa Ragheb M, Hamed Mahmoud M, Ali Ibrahim R. Effectiveness of an Educational Program on Self-care practices and Functional Status among Patients with Psoriasis. Journal of Nursing Science Benha University. 2023 Jan1;4(1):617-31.

Doi: [10.21608/JNSBU.2023.278841](https://doi.org/10.21608/JNSBU.2023.278841)

15- Cingöz K, Gündüz K, İnanır I. Patients' knowledge about psoriasis and comorbidities; their participation in treatment decisions. Journal of Dermatological Treatment. 2021 Feb 17;32(2):212-4.

<https://doi.org/10.1080/09546634.2019.1638880>