

LETTER TO THE EDITOR

Therapeutic preferences are different in psoriatic and atopic dermatitis patients: A questionnaire-based study

Dear Editor,

Psoriasis and atopic dermatitis (AD) are two major chronic inflammatory skin diseases that seriously disturb the quality of life (QOL) of affected patients.^{1,2} The essential therapeutic strategies for these two diseases are established by guidelines.³ However, it is not always easy for physicians and patients to choose suitable modes in the current wide variety of therapeutic modalities, especially for psoriatic patients. The QOL scores of skin disease patients assessed by the Dermatology Life Quality Index and Skindex-16 comprise one of the guideposts for choosing therapies. However, these scores are not always useful because they do not reflect the preference of each patient. We previously reported that patient adherence is very important in topical therapy for psoriasis.⁴ There has been a report describing the differences between patients with psoriasis and AD.⁵ The objective of this study was to investigate the treatment preferences of patients with AD or psoriasis and examine whether there are disease-specific preferences for the treatments. Adult patients with AD or psoriasis who visited the Department of Dermatology at Fukuoka University Hospital or affiliated clinics between January and October 2008 were enrolled in this study. A questionnaire asking about itching, daily life, treatment habit and preference of treatment were collected at the visits. The responses were given in five grades from 1 ("not at all") to 5 ("agree completely") for each question (Q). A Mann–Whitney *U*-test was used to compare the mean values in the AD and psoriatic groups, and values of *P* < 0.05 were considered significant.

A total of 70 patients (36 AD patients and 34 psoriatic patients) were enrolled and the results are shown in Table 1. The mean age of the AD patients (29.6 ± 8.61 years; range, 5–51) was significantly lower than that of the psoriatic patients (57.9 ± 13.36 years; range, 29–81; *P* < 0.001). For questions about itching, the AD patients showed significantly higher scores in all question items (Table 1). Regarding everyday life, a significant difference was only observed for the AD patients for the item about clothing selection. On preference of treatment, there was an interesting difference between the two groups. The AD patients showed a significantly higher tendency to dislike seeing doctors on a regular basis. On the other hand, the psoriatic patients disliked topical applications at home more than the AD patients. Regarding treatment preference, the psoriatic patients showed significantly higher satisfaction for ultraviolet therapy than the AD patients.

In the AD patients, the disturbance of QOL by itching was more serious than that in the psoriatic patients. Similar to AD, psoriasis is an itchy disease, but the burden may be different. For the treatment habits, the psoriatic patients disliked daily self-topical treatment significantly more than the AD patients (Q9), despite the finding that both groups of patients provided similar responses for the efficacy of topical treatment (Q13). However, more psoriatic patients (11/28, 39%) answered that they strongly preferred (answered "5") topical treatment at clinics compared with the AD patients (7/33, 21%; *P* = 0.0034, Fisher's exact test; Q15). Although we did not assess the areas of the lesions in this study, this difference could possibly arise because psoriatic patients tend to have lesions on their back, which is the most difficult area for self-treatment. In addition, half of the psoriatic patients (11/21, 52%) felt that ultraviolet treatment was effective. These findings suggest that actual topical treatment and ultraviolet therapy at dermatology clinics are useful for improving the satisfaction of psoriatic patients who are reluctant to perform the treatment by themselves, rather than just prescribing the topical reagents. This questionnaire may be useful for judging patients' preferences for the treatment modes of various inflammatory skin diseases, although further studies with larger sizes are needed.

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REFERENCES

- 1 Grozdev I, Kast D, Cao L *et al*. Physical and mental impact of psoriasis severity as measured by the compact short form-12 health survey (SF-12) quality of life tool. *J Invest Dermatol* 2012; **132**: 1111–1116.
- 2 Maksimovic N, Jankovic S, Marinkovic J, Sekulovic LK, Zivkovic Z, Spiric VT. Health-related quality of life in patients with atopic dermatitis. *J Dermatol* 2012; **39**: 42–47.
- 3 Saeki H, Furue M, Furukawa F *et al*. Guidelines for management of atopic dermatitis. *J Dermatol* 2009; **36**: 563–577.
- 4 Imafuku S, Kubota Y, Ito K, Koga M, Takahashi A, Nakayama J. Effects of rotation of topical vitamin D3 in chronic plaque-type psoriasis. *J Dermatol* 2012; **39**: 275–277.
- 5 Takahashi H, Tsuji H, Honma M, Shibaki H, Ishida-Yamamoto A, Iizuka H. Patients with psoriasis and atopic dermatitis show distinct anxiety profiles. *J Dermatol*. 2012; **39**: 955–6.

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Conflict of interest: none.

Table 1. Patient characteristics, questionnaire items and responses of patients with AD or psoriasis

	AD <i>n</i> (%)	Psoriasis <i>n</i> (%)	<i>P</i> -value
Patient's background			
Male	15 (41.6)	19 (55.8)	0.3387
Female	21 (58.3)	15 (44.1)	
Age, years (mean $\pm$ SD)	29.6 $\pm$ 8.61	57.9 $\pm$ 13.36	<0.001
Questionnaire			
Questionnaire items	Mean $\pm$ SE (<i>n</i>)	Mean $\pm$ SE (<i>n</i>)	
Q1			
I have serious itching	3.6 $\pm$ 0.2 (36)	2.8 $\pm$ 0.2 (34)	0.0170*
Q2			
Itching disturbs my sleep	2.5 $\pm$ 0.2 (36)	1.6 $\pm$ 0.2 (34)	0.0063*
Q3			
Itching disturbs my concentration when working or learning	2.6 $\pm$ 0.2 (36)	1.9 $\pm$ 0.2 (34)	0.0162*
Q4			
I scratch when I feel itchy	4.2 $\pm$ 0.1 (36)	3.0 $\pm$ 0.3 (34)	0.0006*
Q5			
My skin symptom limits choosing clothes	3.1 $\pm$ 0.2 (36)	2.8 $\pm$ 0.3 (34)	0.0227*
Q6			
My skin symptom makes me avoid seeing people	1.8 $\pm$ 0.2 (36)	1.7 $\pm$ 0.2 (34)	0.6989
Q7			
My skin symptom makes me depressed	2.7 $\pm$ 0.2 (36)	2.4 $\pm$ 0.2 (34)	0.3293
Q8			
My skin symptom limits foods	2.2 $\pm$ 0.2 (36)	1.7 $\pm$ 0.2 (34)	0.0566
Q9			
Putting ointment on is a nuisance	2.6 $\pm$ 0.2 (36)	3.2 $\pm$ 0.2 (34)	0.0310*
Q10			
Taking pills is a nuisance	2.7 $\pm$ 0.2 (34)	2.1 $\pm$ 0.2 (29)	0.0697
Q11			
Seeing a doctor regularly is a nuisance	2.9 $\pm$ 0.1 (36)	2.4 $\pm$ 0.2 (34)	0.0421*
Q12			
Medical costs for skin disease are a burden	3.0 $\pm$ 0.2 (35)	2.4 $\pm$ 0.2 (34)	0.0553
Q13			
I feel topical agents are doing good for my skin	3.8 $\pm$ 0.2 (36)	3.8 $\pm$ 0.2 (34)	0.9603
Q14			
I feel pills are doing good for my skin	3.4 $\pm$ 0.2 (35)	3.2 $\pm$ 0.3 (27)	0.6072
Q15			
I feel topical treatments at the hospital/clinics are doing good for my skin	3.5 $\pm$ 0.2 (36)	3.5 $\pm$ 0.3 (31)	0.5049
Q16			
I feel UV therapy at the hospital/clinics is doing good for my skin	2.7 $\pm$ 0.2 (31)	3.4 $\pm$ 0.3 (24)	0.0341*
Q17			
I feel infusion/injections# are doing good for my skin	2.7 $\pm$ 0.2 (34)	2.6 $\pm$ 0.3 (17)	0.8740

Responses were given in five grades from 1 ("not at all") to 5 ("agree completely") and the means $\pm$ SE are shown. The *P*-values show the significance of differences between the groups evaluated by a Mann–Whitney *U*-test. **P* < 0.05. #This research was performed before anti-tumor necrosis factor- α antibodies and the anti-IL-12/23 p40 antibody became available for psoriasis treatment in Japan. AD, atopic dermatitis; IL, interleukin; Q, question; SD, standard deviation; SE, standard error; UV, ultraviolet.