

QUALITY OF LIFE AMONG ADULT PATIENTS WITH PSORIASIS

A study using data from the Malaysian Psoriasis Registry

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Introduction

- Psoriasis is an immune mediated multisystem disease which runs a chronic debilitating course
- It causes profound physical and psychosocial impact, hence reducing the quality of life (QoL) of patients
- Previous studies showed that the impact on QoL may be affected by various factors in addition to the extent and severity of lesions of psoriasis

Objectives

1. To determine the QoL among adult patients with various clinical types of psoriasis in Malaysia
2. To investigate various sociodemographic and clinical factors affecting the QoL impairment in patients with psoriasis

Methodology

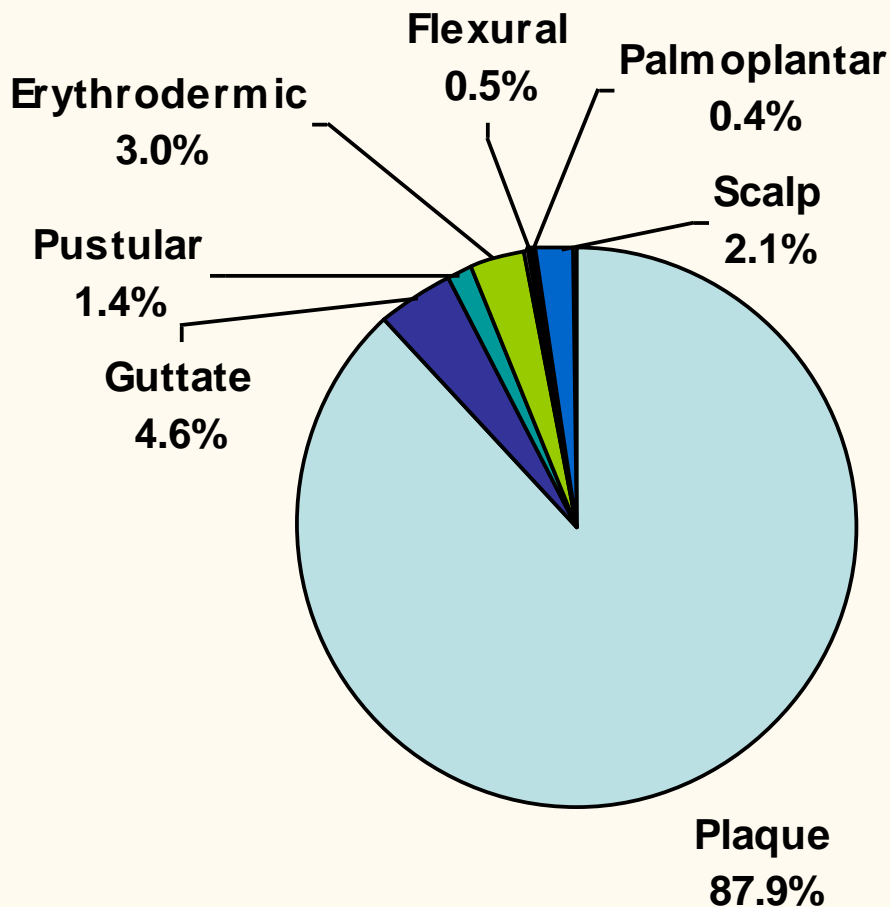
- Cross-sectional analysis
- Data from the Malaysian Psoriasis Registry
- Adult patients aged 18 years and above
- 16 dermatology centres in Malaysia
- Study period: October 2007 to December 2009
- Quality of life was evaluated using the Dermatology Life Quality Index (DLQI)
- Statistical analysis using SPSS[®] v12
 - Independent *t*-test / Mann Whitney U test

Patient characteristics

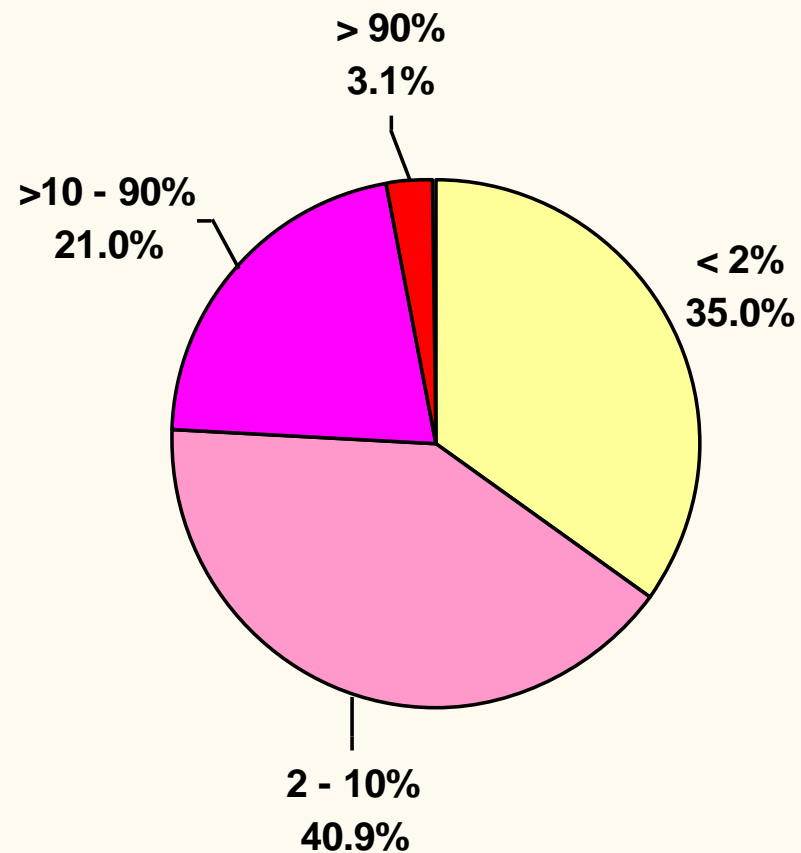
- A total of 3,554 adult psoriasis patients were included
- Gender:
 - Male 57.5%, female 42.5%
- Age:
 - Mean age: 46.1 ± 15.3 years
 - Age range: 18 to 97 years
- Ethnicity:
 - Malay 47.2%, Chinese 25.8%, Indian 17.4%, others 9.4%

Clinical characteristics

Clinical type of psoriasis



% body surface area involved

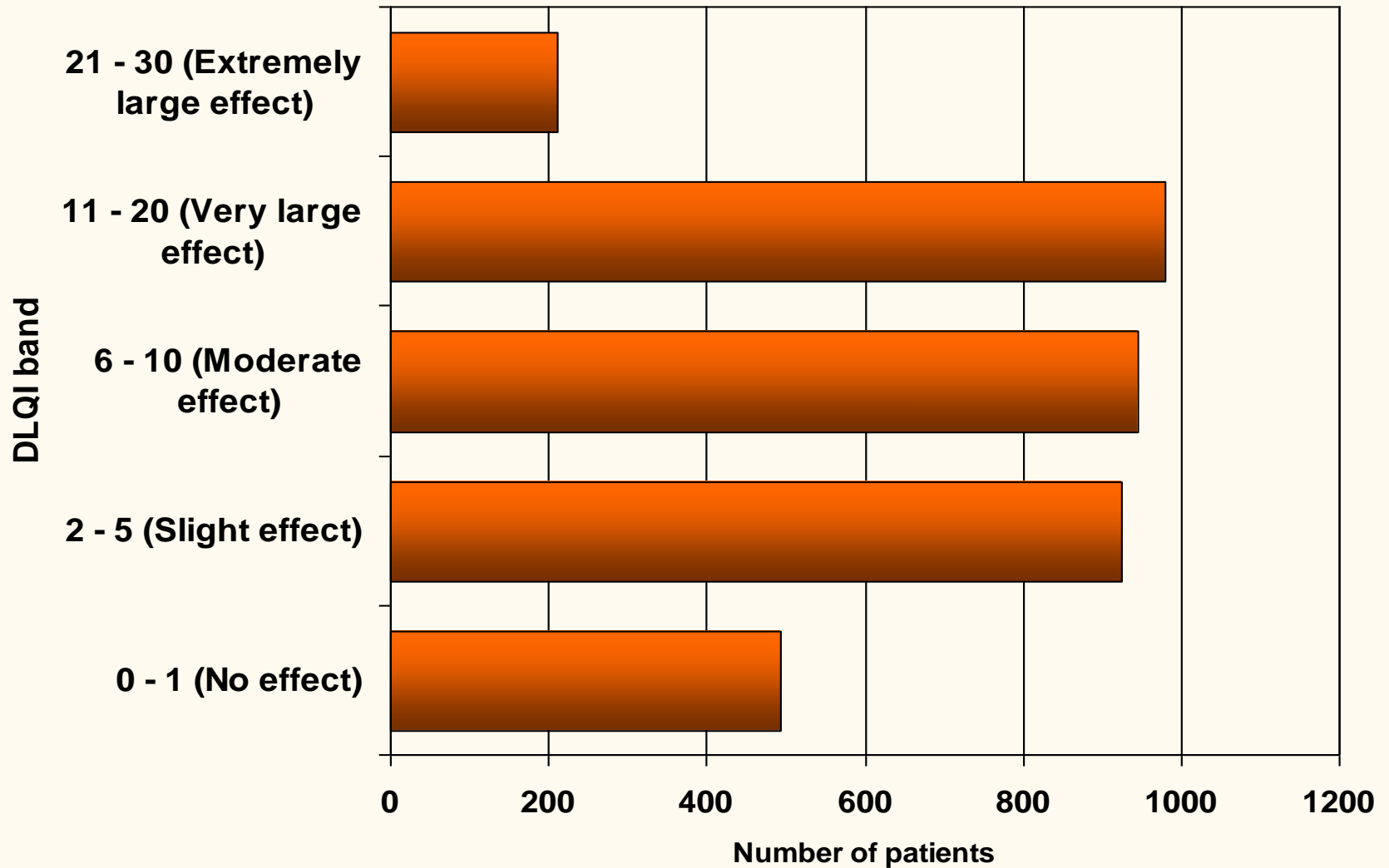


Clinical characteristics

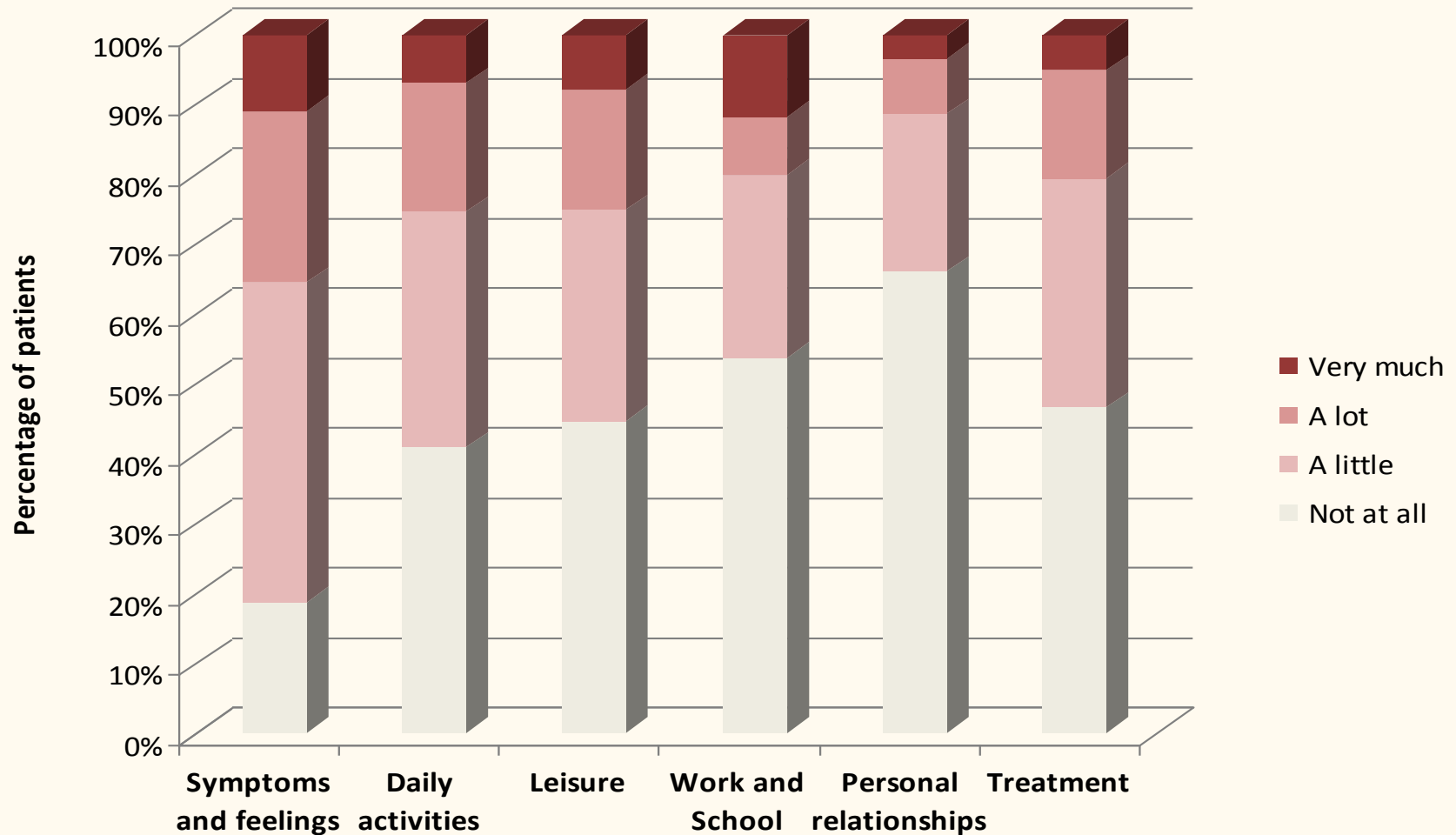
- Age of onset: mean 35.6 years (range 0 to 85)
 - below 40 years (type 1 psoriasis) 63.6%
 - 40 years and above (type 2 psoriasis) 36.4%
- Mean duration of psoriasis: 10.5 ± 9.9 years
- Psoriatic arthropathy present in 17.2%
- Psoriatic nail disease present in 62.5%

- Mean DLQI score: 8.50 ± 6.47

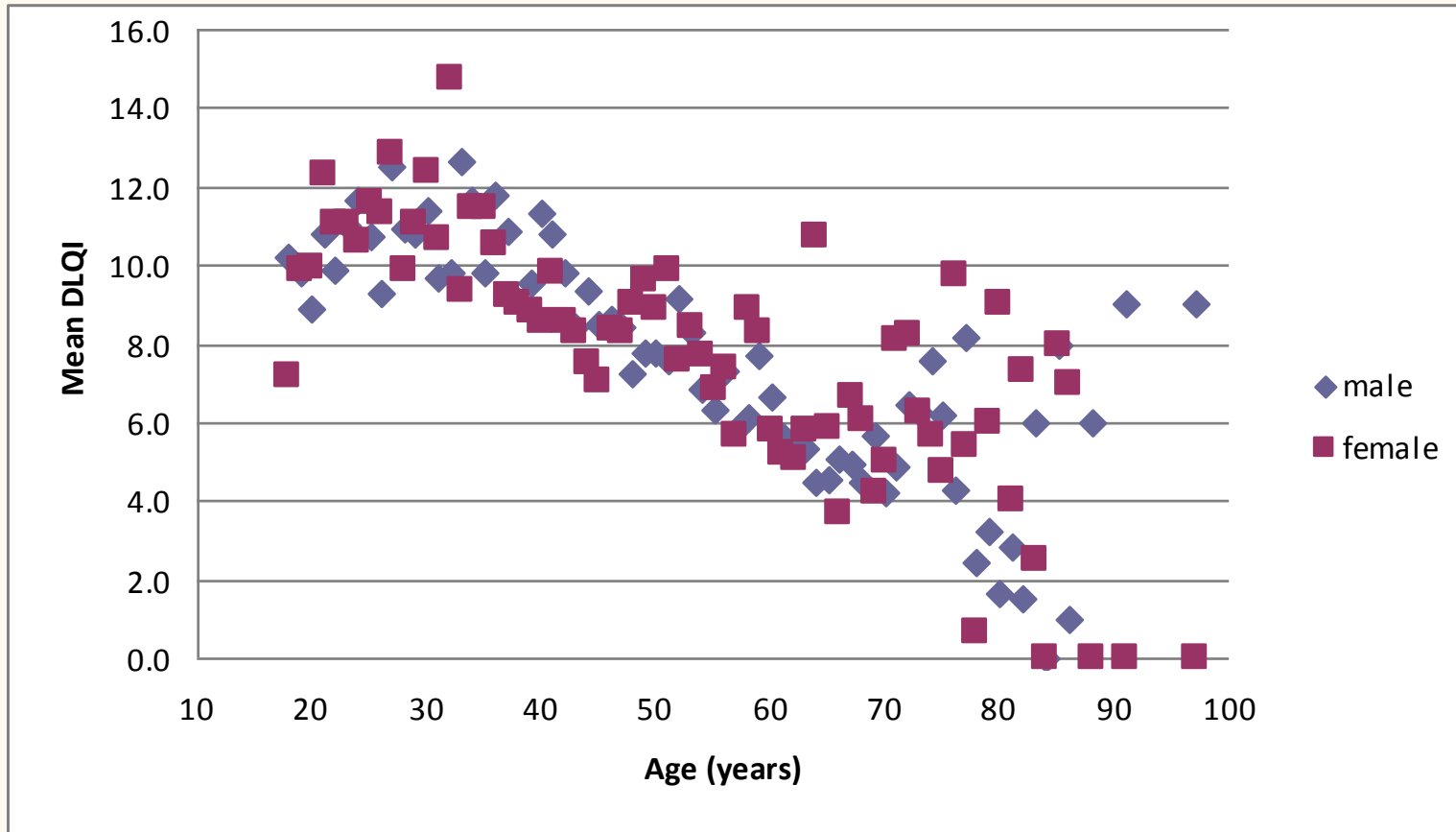
Degree of QoL impairment due to psoriasis



Aspects of QoL affected by psoriasis

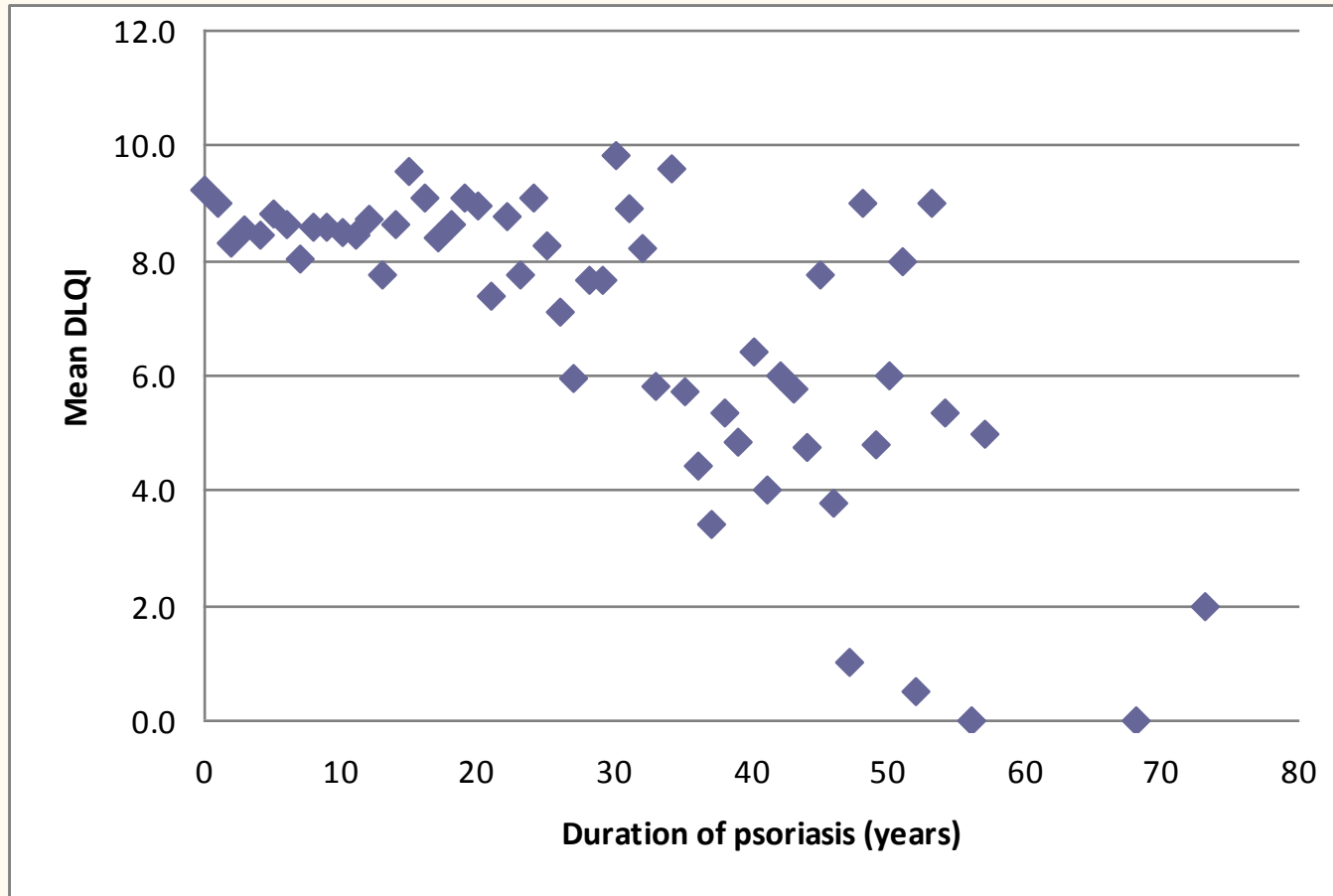


Relationship between DLQI score and age



Weak inverse correlation between DLQI score and the age of patient (Spearman's rho $r=-0.306$, $p<0.001$)

Relationship between DLQI score and duration of psoriasis



Correlation between DLQI score and the duration of psoriasis:
Spearman's rho $r = -0.063$, $p < 0.001$

Factors affecting QoL impairment

Factor		Mean DLQI score	P value
Gender	Male	8.15	p<0.001
	Female	8.97	
Age of onset of psoriasis	Below 40 years	9.56	p<0.001
	40 years and above	6.64	
Clinical type	Plaque	8.47	Erythrodermic vs non-erythrodermic p<0.001
	Guttate	9.33	
	Pustular	9.25	
	Erythrodermic	11.45	
	Palmoplantar	5.53	
	Flexural	5.00	
	Scalp only	6.11	
Extent of psoriasis (% of body surface area involved)	≤ 10%	7.29	p<0.001
	> 10%	11.40	

Factors affecting QoL impairment

Factor		Mean DLQI score	P value
Scalp lesions	Mild	7.06	p<0.001
	Moderate to severe	8.89	
Face lesions	Mild	7.13	p<0.001
	Moderate to severe	10.03	
Psoriatic arthropathy	No	8.14	p<0.001
	Yes	10.19	
Psoriatic nail disease	No	8.12	p=0.011
	Yes	8.70	
Any comorbidities	No	9.17	p<0.001
	Yes	7.54	

Discussion

- Assessment of QoL is a patient-oriented means of measuring disease severity and impact
- QoL measure is increasingly being used in guiding clinical management decisions and evaluating efficacy of treatment
- Dermatology Life Quality Index (DLQI) which consists of a patient-administered 10-item questionnaire, is a well validated, practical and easy to use dermatology-specific instrument

Discussion

- Mean DLQI score of psoriasis patients in this study was similar to those reported in previous studies in other countries

Studies of QoL in psoriasis	N	Mean DLQI score
This study (Malaysia)	3,554	8.5 ± 6.5
Schoffski, 2007 (Germany)	184	10.6
Azzotti, 2003 (Italy)	758	8.7 ± 6.0
Finlay, 1994 (Cardiff, UK)	52	8.9 ± 6.3

- QoL impairment due to psoriasis is comparable to other common chronic skin diseases

Skin Disease	Mean DLQI score
Atopic eczema*	11.0
Psoriasis (this study)	8.5
Chronic urticaria*	8.4
Acne vulgaris#	4.1
Vitiligo*	3.5

*Chee S & Murrell D, J Am Acad Dermatol 2009; 60 (3 Suppl 1): AB94

#Yap FBB 2010 (Unpublished)

Discussion

- In this study, 60% of patients had DLQI score of >5 indicating moderate to severe QoL impairment
- The most severely affected aspect of DLQI was “symptoms and feelings”, followed by “daily activities”, “leisure” and “treatment”
- Similar to most previous studies, female patients had slightly higher impact of QoL
- Older patients and those who had longer duration of disease had less QoL impairment probably due to improved coping skills and greater acceptance

Discussion

- Patients who had earlier disease onset (type 1 psoriasis) tend to have more severe disease and greater QoL impairment
- Significantly worse QoL was found in patients who had erythrodermic psoriasis, larger extent of body surface involvement (>10%), psoriatic arthropathy or nail disease
- Pustular psoriasis, though often acutely severe, did not seem to cause much more QoL impairment
- Having moderate to severe lesions on the scalp or face was also associated with a worse QoL most likely linked to cosmetic disfigurement
- Presence of comorbidities did not seem to have additional impact on QoL

Conclusion

- The impact of psoriasis on QoL among adult Malaysian psoriasis patients is affected by various demographic and clinical factors
- Hence, in addition to disease severity measure, assessment of QoL is essential in providing individualised optimal therapy for patients with psoriasis

Strengths & Limitations

Strengths:

- Large sample size
- Registry data include entire range of patients
- Less selection bias

Limitations:

- Potential confounders and interactions among variables were not studied
- Some important factors might not have been included
- Limitations of QoL instrument used: DLQI may not capture certain aspects of QoL

Acknowledgement

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Conflict of interest: None declared