Profile of late onset vitiligo in Korea: an analysis of 132 patents

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Background

Vitiligo

- Acquired depigmenting disorder that occurs when melanocytes are destroyed.

Epidemiology

- The global prevalence of vitiligo is reported to be 0.5-2%.
- The prevalence rate in Korea is 0.12-0.13%.
- Lerner stated that over 50% of vitiligo cases begin before the age of 20, and only 5% occur after the age of 40.
- Levai reported that the average age of onset for vitiligo is in the 20s

Objective

 There have been few clinical studies on vitiligo that occurs after middle age, and little is known about its clinical characteristics.

 The aim of this study is to retrospectively analyze the epidemiology and clinical characteristics of vitiligo that occurs after the age of 50 by examining medical records of patients who visited our dermatology department over the past 14 years. This study aims to provide useful information for the diagnosis and treatment of vitiligo in elderly patients in the future

Methods_Study subjects

 This single center retrospective study included 132 patients with late onset (≥50yrs) vitiligo, from January 1, 2009 to November 30, 2022.

- Collected data
 - Gender
 - Age of onset
 - Initial site of onset
 - Duration of illness
 - Follow-up period
 - Affected Body surface area
 - Mucosal involvement, Koebner phenomenon
 - Associated disease
 - Family history
 - Triggering facter

Methods_Clinical features of Vitiligo

- Distribution of the lesions
 - Head and neck, Trunk, Upper exts (except hands), Lower exts (except feet), hands, feet, genital areas (excluding mucous membranes), and mucous membranes
- Treatment methods
- Treatment progress: VASI(Vitiligo Area Severity Index)
- Reasons for discontinuing treatment.

Results _ Characteristics of study population

Characteristic	Value
Number of patients	132 (100)
Sex (%)	
M	49 (37.1)
F	83 (62.9)
Age (yr)	60.9±7.4
Duration of disease before presentation(month)	15.0±27.3
M	23.5±39.0
F	10.0±15.3
Follow-up period (month)	35.0±23.1
M	29.3±22.0
F	38.4±23.2
Family history (%)	8 (6.1)
1 st degree	4 (3)
2 nd degree	4 (3)

Results _ Comorbidities of study population(1)

Characteristic	Value
Comorbidity (%)	84 (63.6)
HTN	51 (38.6)
Dyslipidemia	23 (17.4)
Diabetes mellitus	11 (8.3)
Cardiovascular disease	9 (6.8)
Osteoporosis	6 (4.5)
Cerebrovascular disease	5 (3.8)
Psychological disease	5 (3.8)
Associated autoimmune disease	7 (5.3)
Thyroid disease	4 (3.0)
Rheumatic arthritis	2 (1.5)
Alopecia areata	2 (1.5)

Results _ Comorbidities of study population(2)

Characteristic	Value
Skin disease	33(21.7)
Eczema	11 (8.3)
Fungal infection	10 (7.6)
Urticaria	4 (3.0)
Seborrheic dermatitis	3 (2.3)
Pigmented disorder	3 (2.3)
Herpes simplex virus	3 (2.3)
Cutaneous vasculitis	1 (0.8)

Results _Vitiligo classification

Characteristic	Value
Classification	130 (100)
Segmental	7 (5.4)
Nonsegmental	123 (94.6)
Acrofacial	56 (43.1)
Generalized	50 (38.5)
Unuversal	1 (0.8)
Focal	16 (12.3)

Results _Vitiligo treatment modality.

Modality	Value
Treatment	131 (99.2)
Topical agent	111 (84.1)
Excimer laser	32 (24.2)
Narrow band UVB	32 (24.2)
No treatment	1 (0.76)

Results _VASI score at the initial & last visit

	Initial visit	Last visit	difference
VASI	1.78±3.49	0.93±1.97	0.86
			(0.50-1.21, 95% CI)
			(p<0.001)

Conclusion

• The reason for the difference between duration of disease and follow-up period according to gender is thought to be because women pay more attention to their appearance.

 Late onset vitiligo tends to be of the acrofacial vitiligo subtype in Korea population.

 The most common site of initial lesion involvement was the head and neck region.



Conclusion

 Koebner phenomenon was observed in 7 (5.3%) patients, and chemical-induced vitiligo was suspected in 3 (2.27%) patients.

- 5 patients with accompanying psychiatric disorders
 - 3 were diagnosed with depression
- 9 patients with psychological stress
 - The main source of stress was related to social interactions and relationships, as their lesions on exposed areas caused them to feel uncomfortable and frustrated with the slow treatment

Conclusion

- Patients showed strong will to treat vitiligo, and treatment response was promising
 - 41 (31.3%) discontinued treatment, and the reasons for discontinuation were investigated.
 - one patient (0.8%) achieved complete recovery
 - 20 patients (15.3%) reported subjective improvement and were satisfied with the treatment.
 - unsatisfactory treatment effects (9 patients, 6.9%)
 - lack of time to visit the hospital (9 patients, 6.9%)
 - economic burden (1 patient, 0.8%)
 - concerns about pigmentation of the skin around the lesion (1 patient, 0.8%)

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