

# First impact data from the Global Research on the Impact of Dermatological Diseases (GRIDD) study: Diagnoses, clinical features and disease burden

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## INTRODUCTION

Over two billion people worldwide live with a dermatological condition, which can have a huge impact on patients' lives. However, the burden of dermatological diseases has been systematically underestimated by health policy-makers.

The GRIDD project is the **first patient-initiated project** using a ground-breaking patient-led methodology to:



develop a **valid and reliable measure** that captures the true impact of dermatological diseases on patients' lives – the Patient-Reported Impact of Dermatological Diseases (PRIDD);

collect **global data** on the patients' perspectives of disease burden in multiple skin diseases.

**OBJECTIVES:** This study aims to describe the clinical profiles of participants in the GRIDD study and analyze first PRIDD data comparatively across clinical groups.

## MATERIALS & METHODS

**Study design:** global online cross-sectional survey, available in 17 different languages, conducted between June 2023 and January 2024

**Patients:** adults (≥ 18 years) with a self-reported dermatological condition, recruited through the International Alliance of Dermatology Patient Organizations' membership network and via social media

### Variables and measures:

Patient-reported primary dermatological condition and comorbidities (à posteriori categorized according to type, communicability and prevalence)

Body map of areas affected by the disease (à posteriori categorized according visibility and sexual sensitivity)

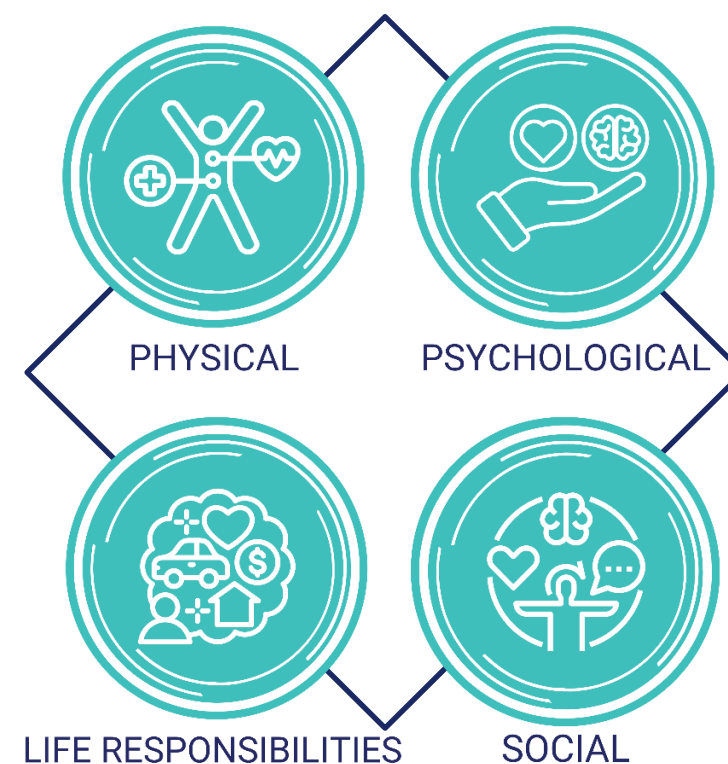
PGA Patient Global Assessment of severity and impact



PRIDD was developed in accordance with the COnsensus-based Standards for the selection of health Measurement INstruments (COSMIN), and is fully validated for use with adult patients with **any dermatological condition**.

PRIDD comprises 16 items that take less than 2 minutes to answer in a rating scale from "never" to "always".

It is a multidimensional measure that provides a total impact score, as well as scores for four impact dimensions:



## RESULTS



**3811/ 4138 PATIENTS**

(327 were excluded because they did not meet the inclusion criteria or had missing data in core variables)



**90 COUNTRIES**

(for a detailed socio-demographic characterization of the participants please see Poster 3423)

**Inflammatory**  
e.g., Psoriasis (12.4%), Hidradenitis suppurativa (8.2%), Atopic dermatitis (7.5%)

**Infectious**  
e.g., Acne (1.9%), HIV-associated skin diseases (0.6%), Leprosy (0.2%)

**Allergic**  
e.g., Allergies and intolerance of the skin (1.2%), Contact dermatitis (0.3%), Allergic vasculitis (0.1%)

**Metabolic, systemic**  
e.g., Androgenetic alopecia (0.3%), Porphyrria cutanea tarda (0.2%), Erythropoietic protoporphyria (0.1%)

**114 DERMATOLOGICAL CONDITIONS**



**Auto-immune**  
e.g., Lichen sclerosus (12.6%), Vitiligo (6.9%), Pemphigus vulgaris (3.1%)

**Geno-dermatosis**  
e.g., Ichthyoses (4.0%), Albinism (2.4%), Epidermolysis bullosa (1.2%)

**Malignant tumor**  
e.g., Mycosis fungoides (1.1%), Cutaneous lymphoma (1.1%), Malignant melanoma (0.2%)

**Benign tumor**  
e.g., Melanocytic naevus (0.7%), Seborrheic keratosis (0.1%), Acrochordons (0.1%)

**Wounds, scars, trauma**  
e.g., Keloid (0.4%), Burn injuries (0.3%), Leg ulcer (0.3%)

Comparison analyses (Table 1) showed higher overall disease burden among those with dermatological conditions related to wounds, scars or trauma, allergic diseases or geno-dermatosis, and lower disease burden among patients with tumors. In addition, higher disease burden was reported by patients with rare diseases, affected in visible or sexually-sensitive body areas, with severe diseases, or with dermatological or other comorbidities.

Table 1 | Comparison of PRIDD scores across clinical groups.

Type of disease	n	PRIDD total score		F	p	Post-hoc comparisons with Bonferroni correction
		M	SD			
<b>Inflammatory (INFL)</b>	1679	29.17	8.07			
<b>Auto-immune (AI)</b>	1284	27.46	7.90			
<b>Tumor, malignant (Tmal)</b>	112	25.12	8.72			INFL > AI, Tmal, Tben
<b>Tumor, benign (Tben)</b>	33	21.89	6.92			AI > Tben
<b>Infectious (INFECT)</b>	135	27.87	8.22			INFECT > Tben
<b>Allergic (ALLG)</b>	65	31.51	8.80	13.47	<0.001	ALLG > AI, Tmal, Tben
<b>Geno-dermatosis (GEN)</b>	374	30.36	8.51			GEN > AI, Tmal, Tben
<b>Wounds, scars, trauma (WST)</b>	55	32.98	10.93			WST > INFL, AI, Tmal, Tben, INFECT
<b>Metabolic, systemic (MSYS)</b>	29	29.36	8.91			MSYS > Tben
<b>Other (OTH)</b>	45	30.11	7.68			
<b>Communicable disease</b>						
Yes	61	30.05	8.19			
No	3746	28.57	8.26	1.93	0.165	-
<b>Rare disease</b>						
Yes	917	29.21	9.05			
No	2890	28.40	7.98	6.66	0.010	-
<b>Visible body areas affected (i.e., scalp, face, neck, décolleté, hands, fingernails)</b>						
Yes	2464	28.77	8.14			
No	1295	28.13	8.45	5.06	0.025	-
<b>Sexually-sensitive body areas affected (i.e., genital, anal, groins, buttocks, chest)</b>						
Yes	2201	29.73	7.85			
No	1558	26.88	8.51	112.00	<0.001	-
<b>Patient Global Assessment – Severity<sup>a</sup></b>						
Severe/ Very severe	1022	33.68	7.66			
Clear/ Mild/ Moderate	2663	26.66	7.66	619.30	<0.001	-
<b>Patient Global Assessment – Impact<sup>b</sup></b>						
A large amount/ A very large amount	989	35.15	7.01			
None at all/ Only a little amount/ A moderate amount	2697	26.21	7.36	1096.64	<0.001	-
<b>Dermatological comorbidities</b>						
Yes	893	29.66	7.44			
No	2918	28.26	8.47	19.63	<0.001	-
<b>Other comorbid diseases</b>						
Yes	1880	29.99	8.10			
No	1865	27.22	8.14	109.18	<0.001	-

<sup>a</sup> How bad has your dermatological condition been over the last month? <sup>b</sup> How much difficulty has your dermatological condition caused overall over the last month?  
n – number of participants; M – Mean; SD – Standard-deviation; F – analysis of variance (ANOVA).

## DISCUSSION

This is the first study in dermatology presenting global-level data on the patient-reported impact of dermatological conditions on their lives. By identifying the **clinical characteristics imposing higher burden on the patients** (e.g., diagnosis of a rare condition, involvement of sexually-sensitive body areas), using the newly-developed, reliable and valid PRIDD questionnaire, this study contributed to raise awareness for the broad impact of dermatological conditions and their signs and symptoms that are often neglected by policymakers and by the global healthcare system.

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