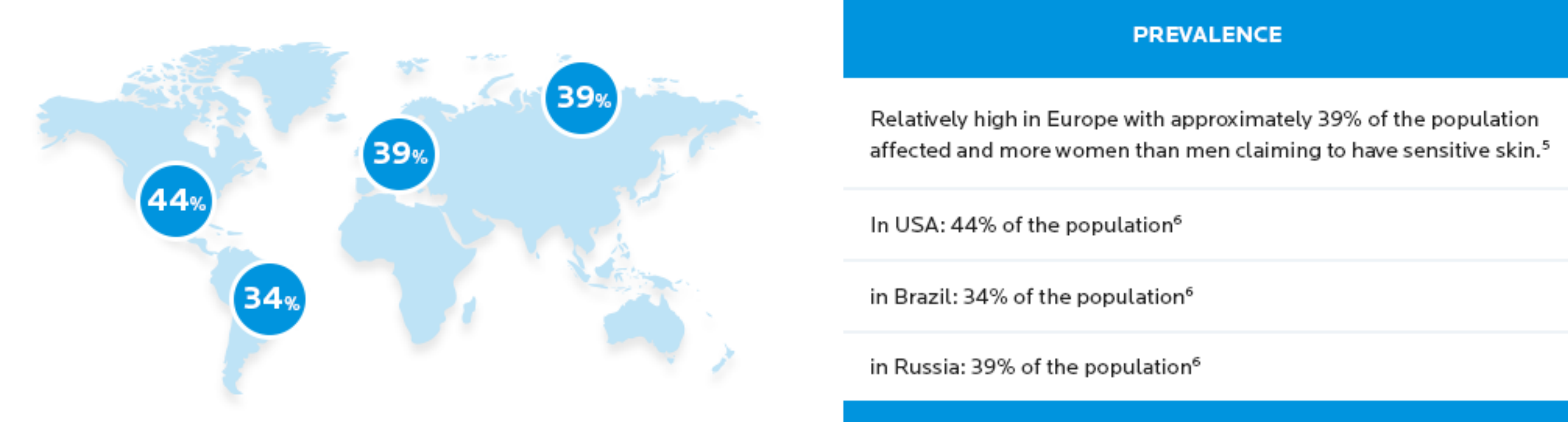


How can we measure the severity of sensitive skin?

ALLERGIES BASIC

Sensitive skin is a clinical condition defined by the self-reported presence of various sensory perceptions on the face, including tightness, stinging, burning, tingling, pain and pruritus.^{1,2,3} Many individuals with sensitive skin report worsening symptoms due to environmental factors. They may be attributed to barrier disruptions, cutaneous nerve fibers and neuronal, epidermal and thermochannels...⁴



Since its prevalence increases during the summer, it has been suggested that exposure to UV radiation could be implicated in the development of sensitive skin. Alongside UV radiation, other environmental factors have been reported to induce or worsen the symptoms of sensitive skin:^{7,2}

- Air pollution
- Heat
- Cold and wind
- Lifestyle factors such as cosmetic usage
- Diet and alcohol consumption
- Physiological factors such as stress or endogenous hormones

The high incidence and complex nature of sensitive skin present a challenge for practitioners, who are increasingly encountering the condition. The symptoms of skin sensitivity are mainly subjective and permanent, so their description by affected subjects is the best method to identify them. It is necessary to use standardized patient questionnaires, which provide reproducible scores and make it possible to monitor the condition.⁷

Which tools measure sensitive skin?

The diagnosis and assessment of sensitive skin can be assisted by several sensory testing methods, from stinging tests with lactic acid (or capsaicin), occlusion tests, behind-the-knee tests, washing and exaggerated immersion tests, to the evaluation of itching and quantitative sensory testing (QST).⁷ However, there is still no international consensus on the preferred method. In all cases, there is a need to assess patients' subjective opinions. Because sensitive skin is defined as a subjective symptom with abnormal sensations in response to a variety of factors, the best diagnosis method uses patient-reported scales.²

It is essential to question the patient about personal, family and occupational history, as well as habits and use of cosmetic products. Complete physical examination should exclude signs of inflammation and the presence of other dermatitis, such as contact and atopic dermatitis.⁶

Due to the frequent absence of objective physical signs, self-assessment questionnaires are valid tools for identifying individuals with sensitive skin. Jourdain has proposed a possible questionnaire in 2005.⁷

- Patients who meet one of the following criteria are considered compatible with sensitive skin :
- Positive answer in 2 of questions 1-3 ► [sensitive, reactive and irritative skin](#);
 - Positive answer in 3 of questions 4-7 ► [reaction to cosmetics](#);
 - Positive answer in 3 of questions 8-13 ► [reaction to the environment](#).⁷



What is the Sensitive Scale?

The Sensitive Scale is a new ten-item scale published in 2014, tested in eleven countries in different languages on 2,966 participants.

Using the ten-item version seemed preferable because it was quicker and easier to complete with the same internal consistency, and the four removed items (scaling, swelling, oozing and scabs) are very rarely observed in patients or in the literature.⁸

The Sensitive Scale was devised by a group of four sensitive skin researchers (three dermatologists and one methodologist) using a standardized six-step method⁹ for creating and developing self-assessment questionnaires. Patients with a confirmed sensitive skin diagnosis from private practice were included in the study. A dermatological examination assessing skin type, phototype and skin sensitivity was performed. The DLQI and the Sensitive Scale were scored.⁸

DEGREE OF OVERALL SKIN IRRITATION DURING THE PAST 3 DAYS

Using a vertical line, indicate the symptoms felt during the past 3 days on the horizontal line.
(0 = absence of irritation, 10 = intolerable irritation)

Skin irritation ► 0 min. 10 max.

SEVERITY OF SKIN CONDITION DURING THE PAST 3 DAYS

Please indicate the intensity of each of the following symptoms during the past 3 days.
0 = zero intensity, 10 = intolerable intensity: darken one number between 0 and 10.

Skin condition felt ►	0	1	2	3	4	5	6	7	8	9	10
Tingling	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Burning	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Sensations of heat	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Tautness	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Itching	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Pain	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
General discomfort	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Hot flashes	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

Visible skin conditions ►	0	1	2	3	4	5	6	7	8	9	10
Redness	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

Important. To be completed by the patient.

The strong correlation between the Sensitive Scale and DLQI scores is very interesting because it enables the Sensitive Scale to be associated with a very well-known tool for measuring quality of life (QoL) in dermatology. It also underlines that skin sensitivity has negative effects on QoL.⁸

How can we use the Sensitive Scale in current practice ?

The Sensitive Scale is useful in measuring sensitive skin severity at a given time, as scored by patients, and correlating it with QoL. It is also well suited to monitoring the efficacy of treatment and has proven value in different geographical settings. In the Sensitive Scale study, people with sensitive skin were identified with scores from 20 to 100. The correlation with dry skin type, higher age, female gender and fair phototypes in clinical examination is an indirect confirmation of the scale's validity because these factors are known to be associated with a higher severity of sensitive skin.⁸

This scale might therefore be a useful tool for diagnosis and assessment of skin sensitivity severity and treatment efficacy.⁸

GOING FURTHER

Jourdain's questionnaire:⁷

- Do you consider having sensitive facial skin?
- Do you think you have sensitive facial skin that is prone to irritation?
- Do you think you have reactive facial skin (which has a pungency, burning or itching, with or without redness)?
- Do you avoid some cosmetics, which you think may cause reactive facial skin (which presents pungency, burning or itching, with or without redness)?
- Do you consider your facial skin to be reactive (exhibiting pungency, burning or itching, with or without redness) as soon as you contact with cosmetics and toiletries?
- Does any cosmetic or toiletry make your facial skin appear pungent, burning or itching?
- Have you ever had any adverse reactions on the face due to the use of cosmetics or toiletries?
- Does the expression "does not tolerate cold weather or cold environment" apply to your facial skin?
- Does the expression "does not tolerate warm weather or warm environment" apply to your facial skin?
- Does the expression "does not tolerate sudden changes in temperature" (e.g. leaving from a warm, indoor environment to a cold, outdoor environment) apply to your facial skin?
- When coming into contact with the wind, does your facial skin show pungency, burning or itching?
- When coming into contact with the sun, does your facial skin show pungency, burning or itching?
- Is your facial skin reactive (pungency, burning or itching, with or without redness) to air pollution?

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