

GREENIOV-SENSKIN II
DIPOTASSIUM GLYCYRRHIZATE



COSMOS APPROVED

According to a report, 60-70% of women and 50-60% of men around the world suffers from sensitive skin. For a long time, the prevalence of sensitive skin was underestimated.

Ref: Farage MA. The prevalence of sensitive skin. Front Med 2019; 6:98.





SIGNS OF SENSITIVE SKIN

Prone to Rashes

It happens especially if some product gets left back on your skin

Stings or Burns

Those with sensitive skin have thinner skin barriers, which makes the ingredients of the products sting and burn

Itchy Skin

It is especially likely to happen if you are using cleansing products that contain harsh ingredients

Redness

Most common symptoms sign of sensitive skin



People with skin disorders coming from anxiety, pressures, inflammations from cosmetic products, environment, etc may be associated with increased rates of depression, psychologic and mental challenges to their life.



ADVANTAGE

No. 1 and Exclusive in China and Internationally

Pharma Grade Raw Material

Patented Technology (Patent No.: CN 107722102 B)

GMP Certified Company

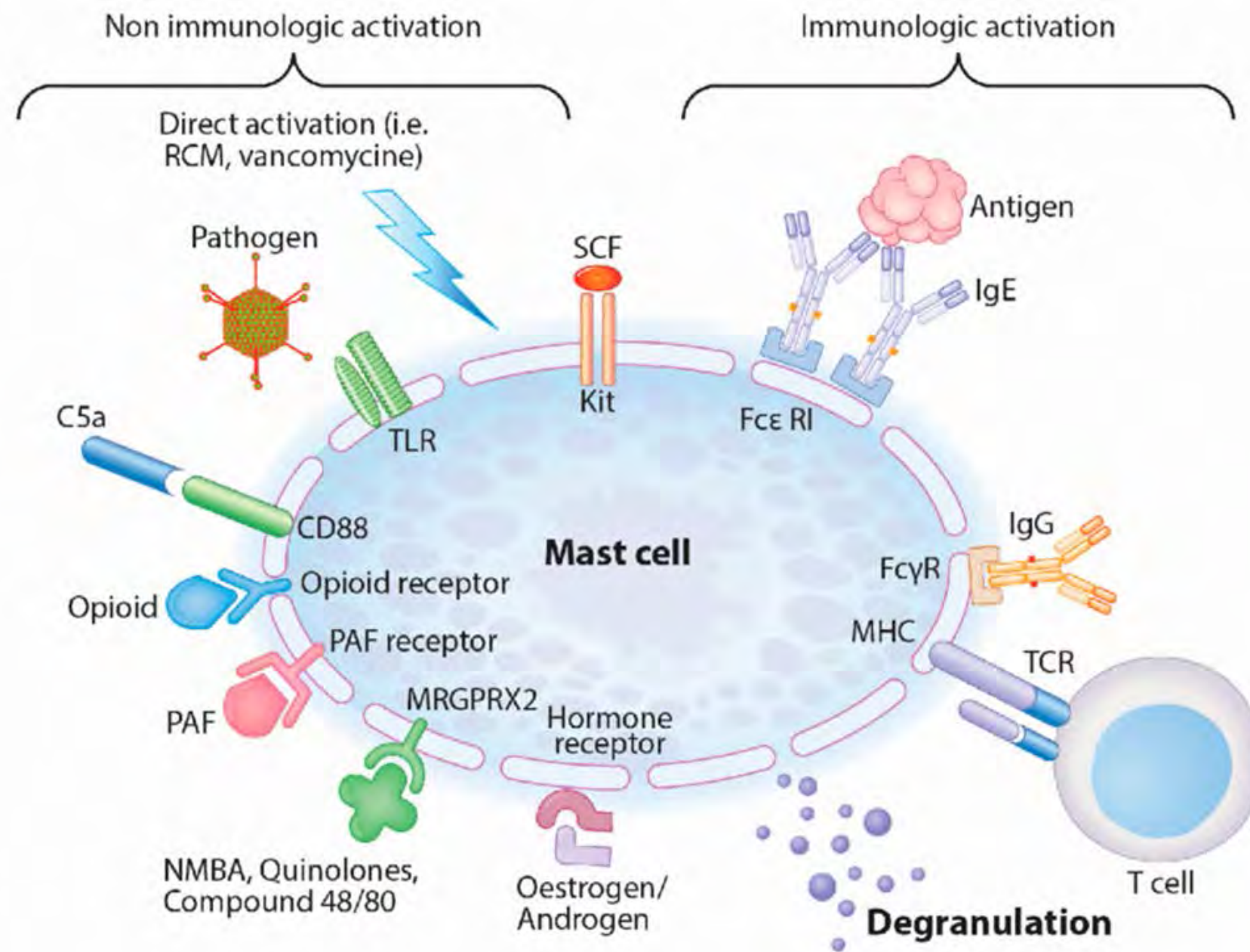
Group Standard Leader

Cosmetic raw material - Dipotassium glycyrrhizinate



A method to produce Dipotassium Glycyrrhizate with low ammonium residue and low ethanol residue





Mast cells are key players in the inflammatory response as they can be activated to release a wide variety of inflammatory mediators, by many different antigens including allergens, pathogens and physiological mediators. The more of activated mass cells, the serious of inflammatory level.

The most constituent of mast cell is tryptase, which is a more selective marker of mast cells and it is actively released when mast cells degranulate.

Degranulation results in the release of inflammatory mediators (e.g., histamine, prostaglandins, leukotrienes, kinins, serotonin, heparin, and serine proteases), and exacerbates of inflammatory symptoms.

Anti-allergic

- Tryptase Inhibition

Tissue: 3D Episkin Model

Samples: GREENIOV-SENSKIN II

Positive Control: 10 µg/L Cromolyn Sodium

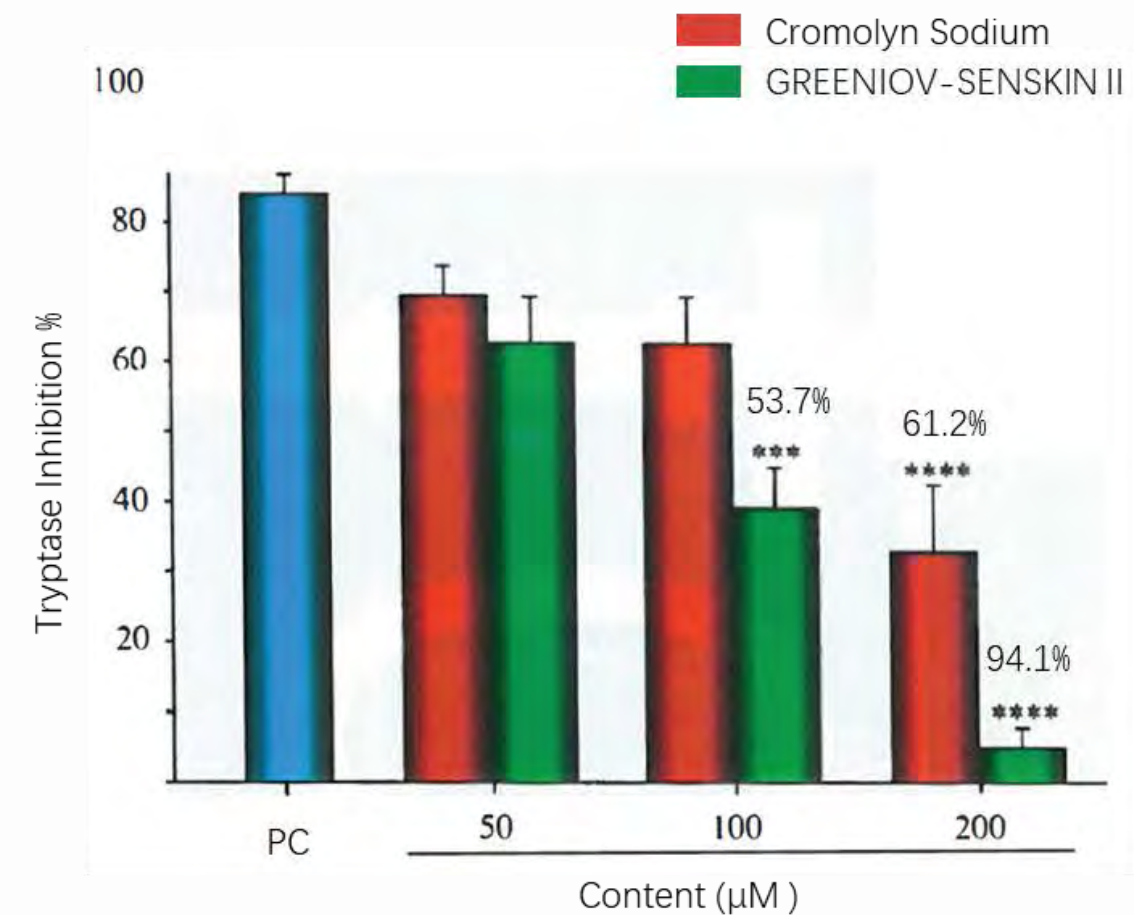
Stimulus: Compound 48/80, to Induce Mast Cell Degranulation

Treatment: Co-culture Compound 48/80 and GREENIOV-SENSKIN II for 1h

Test Method: OD405

Result Evaluation: Tryptase

Conclusion: GREENIOV-SENSKIN II can obviously and dose independently inhibit the secretion of Tryptase induced by Compound 48/80. It has potent anti-allergic efficacy.



Safety Test

- SIRC Cell Eye Irritation Model

Cells: SIRC (Statens Seruminstitut Rabbit Cornea) cell

Samples: GREENIOV-SENSKIN II

Treatment: Co-culture SIRC cell with Dipotassium Glycyrrhizinate for 5 min

Test Method: MTT

Result Evaluation: Cell viability

BC: Blank Control

NC: Negative Control, 0.9% NaCl

PC: Positive Control, SLS (Sodium lauryl sulfat)

Conclusion: GREENIOV-SENSKIN II has no irritation.

Evaluation of SIRC Cell Irritation

	Treatment	Cell Viability	Irritation
BC	/	110.32	No
NC	0.9 NaCl	105.46	No
PC	1% SLS	8.56	Strong
	0.1% SLS	8.61	Strong
GREENIOV-SENSKIN II	50%	105.28	No
	20%	106.35	No
	10%	107.27	No
	5%	107.49	No
	3%	108.10	No
	1%	108.21	No

Safety Test

- Clinical Skin Irritation

Subjects: 30 volunteers

Samples: Dipotassium Glycyrrhizinate and purified water

Treatment: Apply 0.5g GREENIOV-SENSKIN II for each volunteer at one forearm, and another with purified water for comparison, with once a day and for 14 consecutive days.

Result Evaluation: Irritation grade

Conclusion: GREENIOV-SENSKIN II has no irritation to skin for long time and multiple times contact.

Skin Irritation Score

Irritation	Score
Erythema or Scars	
No	0
Slight	1
Obvious	2
Medium to Serious	3
Serious	4
Swelling	
No	0
Slight	1
Obvious	2
Medium (Swelling area about 1mm)	3
Serious (Swelling area exceeds 1mm)	4

Skin Irritation Grade

Avg Score	Irritation Grade
0~ < 0.5	No Irritation
0.5~ < 2.0	Slight Irritation
2.0~ < 6.0	Medium Irritation
6.0~8.0	Strong Irritation

CAS No.: 68797-35-3
Mol. Formula: $C_{42}H_{60}K_2O_{16}$
Mol. Weight: 899.13



Appearance: White or light yellow crystalline powder

Assay: $\geq 98\%$ (UV)

Solubility: Soluble in water

Patent:

Low Ammonium Residue $\leq 0.004\%$

Low Ethanol Residue $\leq 0.3\%$

Dosage: 0.1%~1.0%

Application: Prepare the solution of 5%~10% in advance, then mix with other ingredients. Recommend use in the phase of pH above 4.



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