LABORATORY SKIN CARE, INC.
31019 HUNTWOOD AVE | HAYWARD, CA 94544

Hydroxysomes® Retinol Technical Data Sheet

Revision #:	1.2
Date:	8/21/2025
Product Name:	Hydroxysomes® Retinol
Product Catalog #:	200150
INCI Name:	Retinol, Hydroxyapatite
Retinol CAS #:	68-26-8
Hydroxyapatite CAS #:	12167-74-7

Description

Laboratory Skin Care®, Inc. (LSC) has developed a highly stable, next generation Retinol, co-engineered with its patented Hydroxysomes® Dermal Delivery Platform.
Hydroxysomes® Retinol offers enhanced bioavailability, effective skin penetration, sustained release, delivering retinol + calcium without skin irritation.
This new active is non-nano and petroleum-free. Hydroxysomes® Retinol does not require nitrogen or lowered lighting during manufacturing.

Applications

- For use as a retinoid in skin care formulations for various benefits

Key Features - Benefits

- Highly stable (no loss of activity in formulation) – Maintains potency and label claim
- Retinol and Calcium delivery – Retinoid benefits plus barrier recovery acceleration
- Non-irritating – Safe for use by all ages and skin types
- High loading (20% Retinol encapsulated) – Efficient and cost effective
- Petroleum-free; Ethoxylate-free – Clean and sustainable
- BHA-free; BHT-free – No synthetic stabilizeres
- Non-nano technology – Safe and effective dermal delivery without systemic exposure risks
- Increased skin penetration and bioavailability – Highest performance and effectiveness
- Sustained release – Delivering ideal amounts over time for the skin
- Photostability – Resistant to degradation from light exposure
- Ease of formulation/manufacturing – Can be used in all types of formulations

Specifications

Characteristic	Specification
Retinol % load:	20.0% ± 3%
pH (0.5% in aqueous suspension)	6.5 ± 1
Loss on drying (55°C, 2 hour)	≤ 1%
Appearance	Fine powder
Color	Yellow

Recommended Use Level
0.3 – 1% as allowed per various markets' regulatory compliance requirements

Regulatory Status
Compliant in the US, Japan, Canada, EU, and China

Health and Safety Considerations
Safety Data Sheet (SDS) is available from LSC

Handling and Storage
Keep in low humidity conditions, at room temperature. This material is highly hygroscopic. If partially used, before resealing, top off with nitrogen. When formulating, add below 30°C, at pH ≥ 5.5. LSC Hydroxysomes® Retinol particles are insoluble and must be evenly well dispersed. Detailed formulation guideline is available from LSC.

Packaging Size / Type
1 kg - HDPE bottles; smaller packaging is available upon request