

Poly-Pore® 450 SA Salicylic Acid Delivery System

Description: A multi-functional delivery system useful in a wide variety of cosmetic and personal care products and formulations. Supplied as a free flowing white powder, Poly-Pore 450SA contains no preservatives or surfactants.

Improve Formulation Simplicity and Elegance

Poly-Pore 450SA contains a 50 % loading of Salicylic Acid, inside the matrix of the Poly-Pore polymer. Because of the unique multifunctional characteristics of the system, when using Poly-Pore P450SA dispersion of salicylic acid requires only mixing rather than use alcohols or other solvents as typically required. This allows the formulator a range of alternates to use as the base without concerns over buffering the system.

Controlled Delivery of Functional Ingredients

The matrix of the Poly-Pore delivery system provides a ready "reservoir" for active ingredients. The release of these ingredients occurs through a combination of friction and diffusion, providing a substantially slowed release of the active. The slowing of the release of salicylic acid helps minimize irritation, while providing material available for extended effectiveness.

Typical Properties

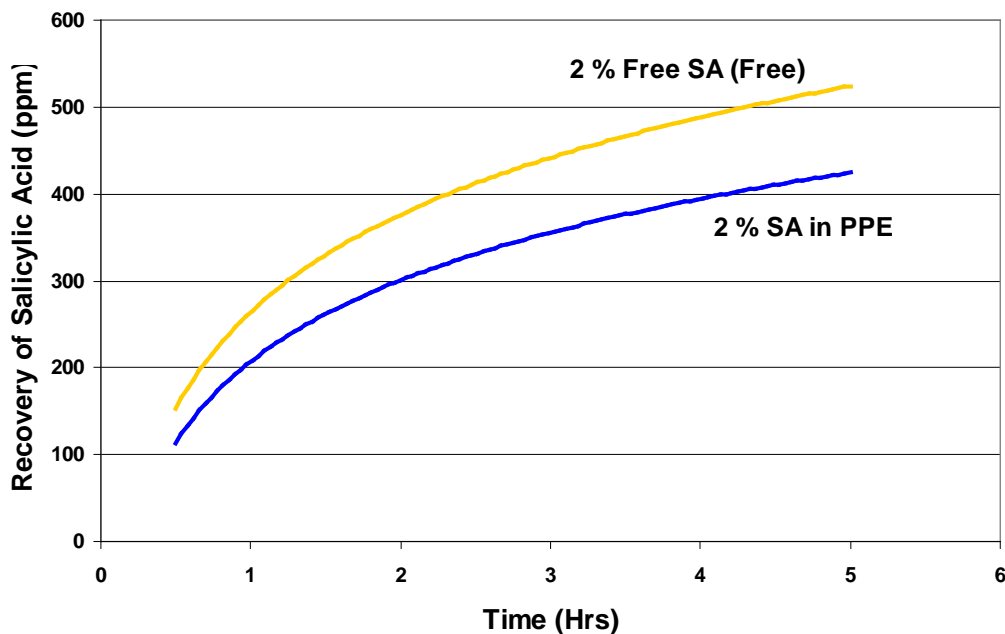
Composition:	Allyl Methacrylates Crosspolymer and Salicylic Acid
Appearance:	White, free flowing powder
Salicylic Acid Level:	50 ± 2.0%

Benefits

- ❖ Enables, simple, solvent free, alcohol free incorporation of Salicylic Acid in all types of personal care products, including gels, emulsions, creams, and loose and pressed powders.
- ❖ Extended release of salicylic acid results in reduced irritation and long-lasting availability at the site of action
- ❖ Provides sebum control reducing shine and extending wear in color cosmetics
- ❖ Enhances emulsion stability
- ❖ Improves stability of formulations typically destabilized by acids – such as carbomer gels
- ❖ Provides secondary thickening in gels and emulsions

Sustained Release of Salicylic Acid: The figure below shows the sustained release of salicylic acid from a formulation that contains Poly-Pore 450SA in comparison to the same formulation that only contains salicylic acid. The formulation that has “free”, i.e., non-entrapped salicylic acid, releases the active faster than when all the salicylic acid is contained in Poly-Pore. This can lead to formulations with reduced irritation and thereby improved consumer use.

Release of Salicylic Acid From Poly-Pore E200 in a Franz Diffusion Cell



Typical Applications

- Facial treatments and skin care products including gels, emulsions, and anhydrous products
- Make-ups and Foundations incorporating skin-care benefits
- Daily use moisturizers and lotions
- Exfoliating gels and treatments
- Loose and pressed powders

Storage Recommendations and Shelf-Life: Storage under normal warehouse conditions, ranging from 40 – 100 F, in a tightly sealed drum.