

## Soft Hands Liquid Soap

Add 100% bio-based Itaconix® VELASOFT™ to liquid hand soaps for light yet luxurious hydration and creamy lather from a milder formulation with excellent cleansing that delivers soft, nourished skin feel.

#	INCI Name, Trade Name	Purpose	%W/W
1	DI Water	Diluent	53.35
2	Hydroxyacetophenone <i>Symsave® H</i>	Preservative	0.50
3	Phenoxyethanol	Preservative	0.50
4	<b>Sodium Polyitaconate</b> <b>Itaconix® VELASOFT™</b>	<b>Skin Conditioner</b>	<b>1.50</b>
5	Sodium Laureth Sulfate <i>Calfoam® ES-302</i>	Surfactant	29.50
6	Decyl Glucoside <i>Plantaren® 2000 N UP</i>	Surfactant	4.00
7	Cocamidopropyl Betaine <i>Caltaine® C-35</i>	Surfactant	7.50
8	Cocamide MIPA <i>Ninol® M10</i>	Surfactant	2.50
9	Sodium Chloride	Viscosity Adjuster	0.65
10	Citric Acid	pH Adjuster	q.s

### Product Properties:

Appearance	Transparent gel
pH	5.5
Viscosity	5,100 cps

### Procedure:

1. Heat water to 60°C and mix to create a vortex.
2. Add Symsave® (2) and Phenoxyethanol (3) and allow to dissolve.
3. Add Itaconix® VELASOFT™ (4) and mix until dissolved.
4. Remove heat and add Calfoam® (5), Plantaren® (6), Caltaine® (7), and Ninol®(8) with moderate mixing.
5. Adjust to target viscosity with Sodium Chloride (9).
6. Measure pH and adjust to target with Citric Acid (10).

### Supplier References:

Itaconix Corporation (4)	Symrise (2)	Harcros (5, 7)
BASF (6)	Stepan (8)	