

# Lubrizol Excipients in Over-the-Counter (OTC) Drug Products

The popularity of over-the-counter (OTC) drug products is growing, partially due to pandemic-related buying shifts and an uptick in certain ailments, among other factors. With this growth comes heavy competition in the OTC space, resulting in the **increased need for product differentiation** and formulations that take consumer lifestyles and preferences into consideration.

**LLS Health offers multiple excipients**, including Carbopol® polymers (carbomers), that address this need and more (see Figure 1) within the OTC space. **Our excipients currently add value to numerous commercial OTC drug products.**

See the tables on this and the next page for oral and topical commercial drug product examples containing carbomers.

**Figure 1**

Unmet Needs / Drivers	LLS Health Excipient Properties
Better Patient Compliance	Extended Release
Swallowability of Oral Medicines	Tablet Size Reduction, Taste Masking, Lubrication
Need for Differentiation	Shear Thinning Rheology, Permanently Stable Suspension
New Formats	Mucoadhesion, Enabling New Formats
Sensory	Sensory Property Optimization

## Topical Gels & Emulsions - Commercial Product Examples Containing Carbomers

Product	Trademark Owner	Dosage Form	Active	Inactive Ingredients as Identified on Product Packaging
BIOFREEZE™ Classic Pain Relieving Gel	Performance Health, LLC	Cream	Menthol	<b>Carbomer</b> , FD&C Blue # 1 Lake, FD&C Yellow # 5, Glycerine, Herbal Extract (Ilex Paraguariensis), Isopropyl Alcohol USP, Methylparaben, Natural Camphor USP, Propylene Glycol, Silicon Dioxide, Triethanolamine, Purified Water USP
Systeme® Overnight Eye Gel	Alcon	Gel	Hypromellose	<b>Carbopol 980</b> , Phosphonic Acid, Purified Water, Sodium Perborate, Sorbitol, May Contain Sodium Hydroxide to Adjust pH
Voltaren® Arthritis Pain Relief Topical Gel	Novartis	Gel	Diclofenac sodium	<b>Carbomer homopolymer Type C</b> , cocoyl caprylocaprate, fragrance, isopropyl alcohol, mineral oil, polyoxyl 20 cetostearyl ether, propylene glycol, purified water, strong ammonia solution
Bengay® Ultra Strength Pain Relief Cream	Johnson & Johnson Consumer Inc.	Cream	Camphor Menthol Methyl Salicylate	<b>Carbomer</b> , disodium EDTA, glyceryl stearate SE, lanolin, polysorbate 80, potassium hydroxide, stearic acid, triethanolamine, water
RepHresh™ Clean Balance Feminine Freshness 2-Step Kit	Church & Dwight Co.	Gel		Purified Water, Glycerin, Polycarbophil, <b>Carbomer Homopolymer Type B</b> , Ethylparaben Sodium, Methylparaben Sodium, Propylparaben Sodium, Sodium Hydroxide

## Oral Solids & Liquids - Commercial Product Examples Containing Carbomers

Product	Trademark Owner	Dosage Form	Active	Inactive Ingredients as Identified on Product Packaging
Mucinex®	Reckitt Benckiser LLC	Tablet (ER bi-layer)	Guaifenesin	<b>Carbomer 934P NF</b> , FD&C blue 1 aluminum lake, Hypromellose USP, Magnesium stearate NF, Microcrystalline cellulose NF, Sodium starch glycolate NF
ElixSure™ IB Oral Suspension	Moberg Pharma	Oral Suspension	Ibuprofen	Butylparaben, <b>Carbomer 934P</b> , FD&C yellow #6, glycerin, natural and artificial flavor, poloxamer 188, propylene glycol, purified water, sodium hydroxide, sorbitol (crystalline), sucralose liquid concentrate
Gaviscon Advance Pfefferminz Suspension	Reckitt Benckiser LLC	Oral Suspension	Sodium alginate Potassium bicarbonate	Calcium carbonate, <b>Carbomer 974P</b> , Methyl-4-hydroxybenzoat (E 218), Propyl-4-hydroxybenzoat (E 216), Saccharin-Natrium, Pfefferminz-Aroma, Natriumhydroxid, ger. Wasser.
Mucinex® Children's Mini Melts	Reckitt Benckiser LLC	Chewable Tablet	Guaifenesin Dextromethorphan	Aspartame, Butylated Methacrylate Copolymer, <b>Carbomer Homopolymer Type A</b> , Creme Flavor, Magnesium Stearate, Microcrystalline Cellulose, Orange Flavor, Povidone, Sodium Bicarbonate, Sodium Carboxymethylcellulose, Sorbitol, Stearic Acid, Talc, Triethyl Citrate.
Oramoist®	DenTek	Buccal Tablet		Xylitol, Polyvinyl pyrrolidone, <b>Carbomer homopolymer type A</b> , Lemon flavor, Citric acid, Calcium carbonate, Hydroxy propyl cellulose, Triglycerides, Sodium chloride, Silicon dioxide, Magnesium stearate, Glucose oxidase, Lysozyme, Lactoferrin, Annatto
GeloRevoice®	Pohl-Boskamp GmbH & Co. KG	Lozenge	Sodium hyaluronate, <b>Carbomer</b> , Xanthan	Mannitol, Natriumhydrogencarbonat, Xylitol, Citronensäure, Macrogol, Aspartam, Aromen, Kaliumhydrogenphosphat, Zinkstearat, Siliciumdioxid

