# Medicine Cabinet Matchup: Serums Vs. Oils

by Catherine Atzen



ometimes, serums and oils generate passionate debate. It is important to note that they are two different types of products. They vary in ingredient composition, how they are formulated and manufactured, how they absorb into skin layers, and the results they deliver to the skin. Often, they also vary in look and feel on the skin. To best understand the differences between the two, here is a comparison - from formulation to results delivered.

# RESOURCES

#### **COMPOSITION AND FORMULATION**

Oils: Besides the oils' properties, results depend on the overall formulation of the product. The choice of the ingredients and the synergy between the ingredients all differentiate a good product from an average product. Experienced formulators may develop superior blends, while amateurs may pick a few oils based on individual properties and hope that the oils will work well when blended together. Some blends may not work on the skin and could feel or smell unpleasant.

**Serums:** There is more flexibility in formulating serums because they incorporate numerous actives to achieve the desired changes on the skin. It is not unusual to see over 30 ingredients in a serum. High-end serums may include concentrated plant extracts, algae, vitamins, several peptides, resveratrol, plant stem cells, hyaluronic acid, hydrating polysaccharides, and boosters that make ingredients work better. The more ingredients in high percentages, the more effective the serum is to prevent and repair skin damage.

# **MANUFACTURING**

Oils: Oil blends are easy to make and typically have just a handful of oils in the formula; all oils can get blended together in one single step. The process is less time consuming than making serums. For quality control, FDA-controlled manufacturing labs should be utilized and strict cleanliness should be followed. Oils do not require preservatives, but oils can go bad.

**Serums:** The manufacturing process takes three or four steps, called phases. Phase one incorporates thickeners into

water. Phase two adds actives such as peptides, resveratrol, plant stem cells, and water-soluble plant extracts. In phase three, oils, antioxidants, solubilizers, and preservatives are added. Serums must be made in a clean, FDA-controlled manufacturing setting, using equipment that assures strict Standard Operating Procedures (SOP) are followed. The texture must be consistent from batch to batch and the products must be stable and free of mold, fungus, and bacteria. Serums require preservatives and provide a long shelf life.

### TEXTURE AND PRODUCT ABSORBTION

Oils: In general, oils have larger molecules than the ingredients used in serums and tend to remain on the surface layers of the epidermis. Higher quality oils with smaller molecules that absorb deeper into the epidermis exist, but are not as available.

**Serums:** Serums have smaller molecules that absorb deeper into the skin – some into the dermis. High-end serums incorporate ingredients to penetrate into dermal skin cells to bring much needed moisture to dehydrated cells, correcting chronic dehydration.

#### RESULTS ON THE SKIN

Oils: Their goal is to give a feel of comfort to the skin, make dry and rough skin suppler, and reduce dullness. A few drops massaged all over or only as spot treatment on dryer areas bring an occlusive film that prevents water evaporation and softens skin that has been exposed to dry, cold, or windy



climates. Occlusive oils are not recommended for acneprone skin.

Serums: The goal of a serum is to transform the skin, to brighten, and to correct skin conditions such as signs of aging, acne, pigmentation, and stretchmarks. Effectiveness depends on the quality of the ingredients, a high percentage of actives, the choice of ingredients that work well together, and the quality of the formulation.

## LOOK AND FEEL

Oils: How oils feel depends on how the oils are extracted from plants and how they are refined; two oils by the same name are not necessarily equal. Refined oils feel lighter and absorb better into the skin without leaving a greasy feel. Other oils or oil blends feel sticky or heavy on the skin, especially in warm and humid climates.

Serums: Serums are liquids or gels that absorb very fast into the skin when massaged until no gel or wetness can be felt under the fingers. They work even better when applied over a hydrating toner. They give suppleness and a silky feel. It is best to follow the serum by massaging a moisturizing cream or gel.

#### **COST**

Oils: Generally, oils or blends are reasonably priced because the raw materials are not very expensive. The higher quality oils and organic oils, while a little more expensive, are well worth the cost because they retain more therapeutic qualities and nutrients compared to lower quality oils and do

not introduce pesticides, herbicides, and fertilizers into the skin and body.

Serums: Prices, for the most part, depend on the quality, cost, percentage, and purity of the active ingredients used. Serums developed to deliver good results on the skin contain ingredients such as plant extracts, vitamins, or algae. Costlier ingredients include multiple peptides, resveratrol, stem cells, and highly sophisticated yeast extracts. Some of those ingredients cost many thousands of dollars per pound, so all ingredients are not equal.

Understanding these key differences will help professionals in deciding when to use serums or oils when purchasing and recommending products.



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phMed® device for lymphatic drainage massage. She holds an MBA from the Haas School of Business, UC Berkeley; an MBA from Columbia University, New York; and a CIDESCO diploma. Atzen takes a progressive approach to skin care and product ideation. Her inspiration stems from her upbringing in a green, French, spa town and the creativity of Silicon Valley where she resides. catherine@atzen.com or atzen.com

