AC Flax Seed Oil

BACKGROUND
Beauty oils, convenient and highly customizable ingredients for different skin and hair concerns are in high demand. Natural oils have a plethora of uses in formulations, commonly as emollients and moisturizing agents. Flax oil provides hair and skin care benefits to renew and revitalize. When applied topically, flax oil is known to reduce dull-looking skin and soften the appearance of fine lines and wrinkles. The oil contains anti-inflammatory and omega-3 fatty acids which reduce red skin and irritation. Essential fatty acids increase moisture to keep skin soft and hydrated. Flax seed oil has been used medicinally to treat skin conditions such as acne, psoriasis, rosacea and eczema. Proponents of flax seed oil claim that the ravages of eczema, the annoyance of dry skin and even sunburned skin pain can be alleviated with the natural benefits of the oil. Flax seed is high in fiber and antioxidant properties to protect and rejuvenate skin. Cosmetic and hair care products may benefit from the addition of flax seed oil to revitalize the skin and hair while renewing the overall aesthetic.

SCIENCE
Flax seeds in general contain antioxidants, and also have anti-bacterial and fungicidal properties. It is quite common in the United States for individuals to consume flax seeds to maintain overall health, and it is actually recommended that women regularly eat flax seeds, as they are a good source of Omega-3 fatty acids. Flax seed/ Linseed oil contains high concentrations of the following acids: alpha linolenic acid, omega 3 essential fatty acid and omega 6 essential fatty acids. Linoleic acid also provides anti-inflammatory benefits. It is believed that certain skin disorders such as acne, eczema, psoriasis, hair loss and dandruff are related to a deficiency in omega fatty acids.

BENEFITS
Flax seed or flax seed oil may provide a variety of hair and skin care benefits. AC Flax Seed Oil may be used to nourish and condition the skin, while offering hair care benefits such as hydration and shine. This multifunctional material is a trendy addition to a variety of applications.

BENEFITS

- Nourishing
- Skin and Hair Care Applications
- Revitalizing
**AC Flax Seed Oil**

**Efficacy Data**

A half head study was conducted to determine the comparison of a control shampoo vs. 2.0% AC Flax Seed Oil in the control shampoo. Additionally, a comparison between the control conditioner and 2.0% AC Flax Seed Oil in the control conditioner were reported. Each volunteer’s hair was photographed prior to the treatment and again after the shampoo and conditioner had been applied and the hair was styled. The images of the half head study were used in conjunction with a sensory assessment subjectively rating the parameters - cleansing, smoothing, dry and wet combability, anti-frizz, overall feel, shine and hydration. This assessment was conducted both before and after treatment. Based on the results obtained, AC Flax Seed Oil is capable of enhancing the wet and dry combability, overall feel, shine and hydration making it an ideal ingredient for use in products intended for thick, unruly or ethnic hair types.

![Figure 1. Full head Baseline, Untreated Hair.](image1)

![Figure 2. Half Head Treated.](image2)

![Figure 3. Full head Baseline, Untreated Hair.](image3)

![Figure 4. Half Head Treated.](image4)