

# FAQs

## 1: Write about old stone carvings in Egypt contain images of the aloe vera plant?

6000 year old stone carvings in Egypt contain images of the plant, which they referred to as the "plant of immortality". Aloe vera is used in traditional medicine as a multipurpose skin treatment. In Ayurvedic medicine it is called *kathalai*. Aloe vera juice is marketed to support the health of the digestive system.

Aloe vera, has been documented in ancient Egypt, now many homes contain aloe vera plants in their garden. The commercially available aloe vera is in products such as creams, soaps, gel, face wash and lotions, etc.

## **2:Aloe vera used as a folk medicine?**

While traditional medicine has been using aloe as part of some drugs or cosmetic products for decades, folk medicine has been using aloe for a few thousand years and has built up an impressive collection of home remedies for many ailments.

Aloe vera gel used externally helps with acne, sunburns, thermal and radiation burns, boils, dandruff, gum sores, dermatitis, edemas, hemorrhoids, inflammation in the eyes, insect bites and stings, psoriasis, skin rashes and irritations, ulcers, varicose veins, warts, wounds and wrinkles.

## **3: What are the two major hormones Aloe vera gel contains?**

*Aloe vera gel* contains two hormones: Auxin and Gibberellins. These two hormones provide wound healing and anti-inflammatory properties.

## **4: What are the major roles Natural phenolic compounds are playing?:**

Natural *phenolic compounds* play an important role in cancer prevention and treatment. *Phenolic compounds* from medicinal herbs and dietary plants include *phenolic acids*, flavonoids, tannins, stilbenes, curcuminoids, coumarins, lignans, quinones, and others.

## **5: What are Aloe vera gel used for external application?**

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## **6:What are the Phenolic compounds found exclusively in the plant sap?**

**Anthraquinones**, there are twelve of these Phenolic compounds which are found exclusively in the plant sap. In small quantities, when they do not exert their purgative effect, they aid absorption from the gastro-intestinal tract and have anti-microbial and pain killing effects. The important ones, Aloin and Emodin, act as painkillers. They also function as anti-bacterials and anti-virals.

#### **7: What are the Sugars present in the gel?**

These are derived from the mucilage layer of the plant which surrounds the inner gel. and are known as mucopolysaccharides, which enhance the immune system and help to detoxify. Aloe Vera contains both mono and polysaccharides, but the most important are the long chain sugars involving glucose and mannose or the gluco-mannans. These sugars are ingested whole from the gut, not broken down like other sugars, and appear in the bloodstream in exactly the same form.

#### **8: Explain how aloe Vera working as Detoxifying agent?**

Aloe vera juice is crammed full of amino acids, vitamins and minerals making it one of nature's most effective cleansers. 'It can help strengthen digestion and rid the body of any nasty waste, thus detoxifying the body naturally,' says Sebastian. 'Its main property is to be soothing, cooling and moistening which helps to clear inflammatory and irritating heat, such as in menopause, plus inflammatory skin and digestive problems, such as acne, rosacea and IBS.

#### **9: Write notes on aloe vera leaf structure?**

**The Aloe leaf structure is made up of four layers:**

**Rind** - the outer protective layer;

**Sap** - a layer of bitter fluid which helps protect the plant from animals;

**Mucilage Gel** - the inner part of the leaf that is filleted out to make Aloe Vera gel.

**Aloe Vera** (inner gel) contains the 8 essential Amino Acids that the human body needs but cannot manufacture.

#### **10: What are major medicinal ingredients: Aloe Vera juice contains?**

Aloe Vera juice contains about 240 nutritional and medicinal ingredients: Vitamins A, B1, B2, B3, B6, B9, B12, C, E, folic acid, minerals, calcium, potassium, magnesium, iron, amino acids, enzymes, saponins.

**11: Write notes on mucopolysaccharides ?** Mucopolysaccharides are long unbranched polysaccharides consisting of a repeating disaccharide unit. The repeating unit (except for keratan) consists of an amino sugar (N-acetylglucosamine or N-acetylgalactosamine)

along with a uronic sugar (glucuronic acid or iduronic acid) or galactose. While traditional medicine has been using aloe as part of some drugs or cosmetic products for decades, folk medicine has been using aloe for a few thousand years and has built up an impressive collection of home remedies for many ailments.

### **12: Define the following ?**

1. **Saponins:**
2. **Fatty Acids**
3. **Salicylic acid**

**Saponins:** These soapy substances form about 3% of the Aloe Vera gel and are capable of cleansing, having antiseptic properties. These act powerfully as anti-microbials against bacteria, viruses, fungi and yeasts.

**Fatty Acids:** Cholesterol, Campesterol, b. Sisosterol and Lupeol.

These four plant steroids are important anti-inflammatory agents.

**Salicylic acid:** An aspirin-like compound possessing anti-inflammatory and anti-bacterial properties.

### **13: Write in brief about aloe vera juice?**

Aloe Vera juice contains about 240 nutritional and medicinal ingredients: Vitamins A, B1, B2, B3, B6, B9, B12, C, E, folic acid, minerals, calcium, potassium, magnesium, iron, amino acids, enzymes, saponins.eg,

1. Helps with colitis, diarrhea, constipation and irritable bowel syndrome,
2. Regulates digestion and stomach acidity, helps with heartburn and abdominal pain,
3. Cleanses the blood and removes harmful toxins from the body,
4. Regulates blood sugar levels,
5. Speeds up the metabolism and helps with weight loss,

### **14: Explain in detail about vitamin deficiency?**

**Vitamin A deficiency (VAD)** is a lack of vitamin A in humans. It is common in poorer countries but rarely seen in more developed countries. Nyctalopia, is one of the first signs of VAD. Vitamin A deficiency is the leading cause of preventable childhood blindness.

Approximately 250,000 to 500,000 malnourished children in the developing world go blind each year from a deficiency of vitamin A, approximately half of whom die within a year of becoming blind.

**15: Define the following?**

1. *Nyctalopia*
2. Mucilage Gel
3. *Pinocytosis*

**Mucilage Gel** - the inner part of the leaf that is filleted out to make Aloe Vera gel.

*Nyctalopia* Night blindness, impaired vision in dim light and in the dark, due to impaired function of certain specialized vision cells (the rods) in the retina

*Pinocytosis* is one type of endocytosis, the general process by which cells engulf external substances, gathering them into special membrane-bound vesicles contained within the cell.