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FORMULATION AND EVALUATION OF VITAMIN-E COLD CREAM

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ABSTRACT

Cosmetics are the widely used by both men and women to import enhances and ornament their appearance in order to nourish and moisturize the skin demand for herbal cosmetics in new a day become greeting because they are less side effects. herbal cosmetics are preparation in many forms like cold cream preparation containing natural ingredients like bees wax liquid paraffin borax rose water distilled water almond oil etc. The various benefits are obtained by the use of herbal cold cream are moisturize reduce acne and skin irritation reduce skin disease like eczema dry skin etc.

KEYWORDS: Cold cream, semisolid preparation, topical delivers, evaluation and preparation.

INTRODUCTION

Cosmetics are products that are generally used to beautify or cleanse the skin. The word "cosmetics" comes from the Greek word "kosmesticos," which means "to decorate." Cold cream is a water-in-oil emulsion. Cold creams have a longer contact time at the application site compared to other semi-solid dosage forms or formulations. It gives elegance to the skin and is not sticky. Since it is an oil phase, it gives firmness to the skin. The role of cold cream is to moisturize dry skin, remove waste products from pores, and cool the body. Easy to water and easy to wash. Doesn't Couse any irritation after applied on skin. The aqueous phase provides additional protection for the skin. It liquefies at body temperature. Penetrates into the epidermis of the skin through natural pores. These days, anti-aging creams are being produced that can keep your skin looking youthful for years. The best cleaning

products are cleansing cream, soap, and water. Semi-solid emulsions of the oil-in-water (O/W) or water-in-oil (W/O) type are considered creams. These semi-solid emulsions are intended for external use. Creams are classified into oil-in-water emulsions and water-in-oil emulsions. It is applied to theexternal or superficial part of the skin, and its main function is to remain at the site of application fora long time. The role of skin cream is to protect the skin from various environmental and weather influences, and to have a soothing effect on the skin. There are different types of creams such as cleansing, cold, priming, evaporative, night, massage, hand cream, and body cream. The main goal of our research is to develop herbal creams with various effects. As a moisturizer, it reduces acne and skin inflammation, and relieves skin diseases such as eczema, psoriasis, dry skin, wrinkles, and rashes. She used two of her herbal ingredients in the preparation: almonds. Aloevera gel is used as amoisturizer, to soothe pimples and acne, and to treat burns.

Cold creams

For the remove makeup and smooth skin the Cold cream is used. Cold cream an emulsion of water and certain fats it usually contains beeswax and other flavoring agents. The European Pharmacopoeiadescribes it as a fatty cream. Any type of cold cream combines. The water in the cream evaporates asyou apply it to your skin, giving you a cooling sensation none. Most likely; it is this cooling effect that gives it its name. Moisturizer or moisturizing cream are other names for cold cream. Cold creammust have a softening effect. It feels cool when used and does not leave an oily film on the skin. Although it is an emulsion with a high oil and fat content, the water in the emulsion is slowly drainedout, so it has a cooling effect when applied to the skin.

Classification of cold cream

1. **Bees-wax borax emulsion type cold cream**

- It is water/oil (W/O) type of emulsion.
- It is white, emulsified and cold cream type.
- It is opaque and high lusture in nature.
- It spreads easily on skin.
- After application on skin much of the water evaporates.
- Use of almond oil still limits shelf life of cold cream.

Ingredients used in the formulation of bees-wax emulsion type cold cream

- Beeswax

- Lanolin
- Mineral Oil, Mineral oil 65/75
- Isopropyl myristate
- Acetoglyceride
- Petroleum jelly
- Borax
- Water

2. Mixture of hydrocarbon Oil and Wax containing cold cream

- It is translucent,

Benefits of vitamin-ECold cream

1. Prevents skin aging and dehydration.
2. Cold cream contains enough moisture and oil to protect your skin from harsh environmentalconditions.
3. It also keeps your skin moisturized and safe
4. Cold creams are used to remove makeup and smooth the skin.
5. Medicated bloodless lotions are generally used as topical pharmaceutical dosage paperwork todeal with the skin.

Ideal properties of vitamin-E Cold cream

1. Generally should not be diluted
2. The optimal pH value for cold cream should be between 4.6 and 6.0.
3. Its consistency should be optimal so that it can be easily removed from the container and applied.

Disadvantages of Vitamin-E cold cream

1) However, cold cream contains petroleum that prevents water from evaporating, which often clogspores and causes breakouts.
2) Overuse may also darken your complexion.
3) Cold Cream has a fairly heavy consistency, feels very "sticky" when applied.

Aim

Formulation and Evaluation of vitamin-E Cold Cream.

Objective

- To evaluate the safety, effectiveness, and quality of herbal cold cream.
- Explore various aspects of India's rich traditional herbal medicine.
- Apply the knowledge gained in the course in evaluating the usefulness of herbal prescriptions.
- Formulation and evaluation of cosmetic herbal cold cream for glowing skin using naturalherbal ingredients.
- To synthesize a cold cream suitable for all skin types.

Ingredients used in formulation

All natural materials used in this study, namely H. Almond oil, in the form of dry powder from local market. Details of the botanical materials used in the formulation of cold cream like Almond oil, Borax, Beeswax, Rose water, Vitamin-E.

Table no. 1: Ingredients used in cold cream.

Sr. no.	Name.	Biological source.	Family.	Uses.
1.	Almond oil.	The seeds of Prunus amygdalus (Rosaceae) var. dulcis (Sweetalmonds) or P. amygdalus var.amara (Bitter almonds).	Rosacea.	1. Antioxidants. 2. Stretch Mark Prevention. 3. Increased Heart Health.
2.	Orange oil.	Orange fruit (Citrus sinensis fruit.)	Rutaceae.	1. It can help prevent fine linesand wrinkles.
3.	Borax.	Turkey; Boron,California; andSearles Lake, California.	Boron.	1. Fungicide. 2. Herbicide.
4.	Bee wax.	Honeybees, mellifera.	Apidae.	1. Thickeners, emulsifiers.
5.	Rose water.	Sepals and petalsof Rosadamascenathrough steam distillation.	Rosacea.	1. Antibacterial, 2. Soothing nature.
6.	Vitamin E.	Various foods andoils.	Four tocopherols.	1. Moisturizing skin.

Method of Preparation of vitamin-E cold cream

Formulation of cream

1. Take required quantity of Beeswax and Liquid paraffin in porcelain dish.
2. Heat this mixture in water bath for melting purpose.
3. Remove dish from water bath.
4. Take Borax and distilled water in beaker.

5. Heat this solution in water bath for about 750C.
6. This Borax solution added dropwise in porcelain dish with continuous stirring.
7. Add Methyl paraben in porcelain dish dissolved it.
8. Add orange oil and Almond oil in this solution
9. Add perfume for fragrance.
10. Add Vitamin E Oil.
11. Vitamin-E cold cream was obtained.

Table 2: Composition of herbal cold cream.

Sr. no.	Name of ingredient.	Scientific name.	Quality(for 100gm.	Uses.
1.	Methyl paraben.	Methyl hydroxybenzoicacid.	0.010gm.	Antibacterial.
2.	Borax.	Sodium tetraboratedecahydrat.	0.7gm.	Stability.
3.	Bees wax.	Apiccerana, Apis Mel, Apismellifera.	15 gm.	Emulsifying agent, stabilizer.
4.	Liquid Paraffin.	Petrolatum.	50 gm.	Prevents skin Itching and lubricating agent.
5.	Almond oil.	Prunusdulcis var. dulcis.	25gm.	Protective layer skin.
6.	Orange oil.	Citrus sinensis	10gm.	Promating clarity, smoothness. Etc.
7.	Vitamin E oil.	Alpha-tocophenylacetate. (ATA)	2gm.	Anti- inflammatory.
8.	Rose water.	Rosa damascena.	QS.	Anti-bacterial.

Evaluation of vitamin-e cold cream

Morphological evaluation

Physical properties: The cream was observed for the color, sent, and appearance or we can say thatlook.

Physicochemical evaluation

Wash ability

I applied the cream to my hands and observed it under running water.

PH

PH meter is the best instrument for measuring PH as compared to the other system like PH paper, etc.By using standard operating procedure.

Viscosity

The viscosity of the cream was measured using a Brookfield viscometer and spindle no 100 rpm.

Spread ability test

The cream sample was applied between two glass slides and compressed to a uniform thickness by placing 100 g between the two glass slides. Leave the weight on for 5 minutes, then place the weighton the weighing pan. The time for the top glass carrier to move over the bottom glass carrier was usedas a measure of diffusion capacity**.**

$$\text{Spread ability} = \frac{M \times L}{T}$$

Where

M = Weight tight to upper slide.

L = Length moved on the glass slide.

T = Time take.

Irritancy test

Mark the left dorsal area (1 cm2). The cream was applied to the designated area and the time was recorded. Irritation, erythema, and edema were monitored at regular intervals up to 24 hours as needed. Microbial growth test: An agar medium was prepared, and the blended cream was inoculated onto the agar medium of a plate using the steak plate method to prepare a control sample in which the cream was omitted. Plates were placed in an incubator and incubated at 370°C for 24 hours. After the incubation period, the plates were removed and checked for microbial growth and compared to controls.

Dye test

Mix the scarlet dye into the cream. Place a drop of cream on a microscope slide, cover with a coverslip, and examine under the microscope. If the dispersed beads appear red, the soil is colorless. The cream is O/W type. The opposite situation occurs with W/O creams. That is, H. Dispersed globules appear colorless.

Stability

Changes in color, odor, texture, or smoothness were observed under the described stability parameters. Stability studies of showed this to be true even at ambient temperatures.

RESULT

- Colour: Whitish green
- PH.: 6.65
- Odor: Pleasant.
- Texture: Smooth.
- Viscosity: Adequate viscosity.
- Stability test: The stability results No change in colour, smell, texture, or smoothness was noticed under the stability parameters. The stability research indicated that at normal temperature.
- Wash ability: Wash ability test was carried out by applying a small amount of cream on the hand and the washing it with tap water
- Irritancy: This formulation is skin safe for usage.

DISCUSSION

As name indicate this are the types of cream used in cold season or we can say that during winter. Aswe can see that during winter season our skin become rash or we can also call it as a dryness in skin,due to the loss of water content in skin. This leads to xerosis if not treated time to time bleeding may occur. So to overcome these problem cold cream is the best solution. Their main feature is to provide smoothness, glaringness and mainly moisturizing property to the skin. Due to its lipid nature it provide moisturizing property to the Horney layer of the skin.

CONCLUSION

From the above results, it can be concluded that the formulated cream had good consistency and spreadability, homogeneity, pH, was non-sticky and there was no phase separation during the study period. From the above studies, we can conclude that cold cream is safe to use because it is made from herbal extracts. Natural remedies are considered safer and have fewer side effects than synthetictreatments and are therefore more accepted. Therefore, the value of cosmetic herbs in personal care systems has increased significantly and there is a great demand for herbal cosmetics today. Herbal creams that are non-toxic, safe and effective and improve patient compliance through the use of herbal extracts will be highly acceptable compared to synthetic creams.

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