WWW.IJRPR.COM

International Journal of Research Publication and Reviews

Journal homepage: www.ijrpr.com ISSN 2582-7421

MARKET RESEARCH ON RICE WASHED WATER CLEANSERS

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ABSTRACT :

Rice ingredients are generally considered safe and hypoallergenic, though patch testing is recommended for sensitive skin. It contains vitamins, minerals, antioxidants, and amino acids beneficial for the skin. Common forms include rice water, rice flour, and rice bran oil, which are incorporated into products like toners, face masks, and moisturizers to soothe the skin, reduce inflammation, and improve texture. Rice water or washed rice water is a starchy liquid that has gained significant popularity as a natural, inexpensive facial cleanser and skincare ingredient, known for its brightening, anti-aging, and soothing properties. The detailed report on the treatment utilizing rice washed water is also provided in this article. Rice-washed water, which is commonly regarded as waste water and discarded, is a rich source of minerals and nutrient .Rice contains carbohydrates (primarily starch) as its main component, along with protein, fiber, and trace amounts of fats. It also includes various vitamins and minerals, with brown rice being richer in certain nutrients like magnesium and thiamine compared to white rice. Rice water is renowned for its gentle and effective skincare properties, making it the ideal base for sensitive skin products. Enriched with vitamins A, B, E, and a host of ceramides, it provides a soft cleansing experience that simultaneously nourishes and rejuvenates the skin surface. Using rice water on your face everyday is safe and can be beneficial for your skin.

Keywords : Rice washed water, Cosmetics, Ayurveda, Plant growth, Food, Waste cleansers.

1.Introduction :

The market for rice water cleansers represents a vibrant and high-growth segment within the global skincare industry, currently valued in the billions of dollars and projected to expand significantly, driven by a Compound Annual Growth Rate (CAGR) of around 6.7% to 7.7% through the end of the decade. This growth is fundamentally rooted in a major consumer shift towards natural, traditional, and clean beauty solutions. Key market drivers include the pervasive influence of e-commerce and digital marketing, which have made niche and specialized Asian-inspired brands globally accessible. Furthermore, product innovation is fueling demand, with manufacturers increasingly developing advanced formulations using fermented rice water to enhance nutrient bioavailability, alongside complementary actives like peptides and Niacinamide. Rice water, a cherished ingredient in traditional Asian beauty rituals (particularly in K-Beauty and J-Beauty), is being widely adopted by global consumers for its scientifically supported benefits. Rich in amino acids, vitamins, and minerals, rice water is sought after for its gentle cleansing action, skin brightening, soothing, and anti-aging properties. This has positioned rice water cleansers—which include foaming washes, powder-to-foam formulas, and clarifying toners—as a favored choice over harsher, chemical-laden alternatives. This market research provides a comprehensive overview of the competitive landscape, consumer demographics (which skew heavily female and prioritize natural ingredients), and the regional dynamics, particularly the strong foundational presence in the Asia-Pacific market and emerging opportunities in North America and Europe. The analysis is crucial for brands seeking to capitalize on the sustained consumer appetite for gentle, efficacious, and heritage-backed skincare solutions.

2. Treatment of rice water to analyze the components :

Component Category - Key Components/ Analytical Technique/ Principle/Purpose

Carbohydrates/Starch: Total Sugars, Glucose, Oligosaccharides Spectrophotometry (e.g., Phenol-Sulfuric Acid Method) Concentrated sulfuric acid and phenol react with carbohydrates to produce a colored product, the absorbance of which is measured at a specific wavelength (e.g., 490 nm).

Minerals/Metals: Iron (Fe), Arsenic (As), Potassium (K), Magnesium (Mg) Inductively Coupled Plasma Optical Emission Spectrometry (ICP-OES) The sample is atomized in a plasma, and the emitted light from excited atoms is measured at characteristic wavelengths to quantify trace elements.

Proteins/Amino Acids : Total Protein, Amino Acids Spectrophotometry (e.g., Bradford or Lowry Assay) Colorimetric assays that use reagents to bind to proteins, producing a quantifiable color change.

Antioxidants : Ferulic Acid, Total Phenolic Content (TPC) Spectrophotometry (e.g., Folin-Ciocalteu Assay for TPC) Measures the reducing capacity of the sample, which is proportional to the concentration of phenolic antioxidants.

Organic Acids : Lactic Acid, Acetic Acid (in Fermented RW) High-Performance Liquid Chromatography (HPLC) Separates and quantifies individual organic acid compounds based on their chemical properties as they pass through a column.

1.Preparation of the Rice Water Sample

The initial preparation method significantly affects the resulting composition:

Washing/Soaking Water: This is the most common form. Rice is typically rinsed or soaked in a specific water-to-rice ratio (e.g., 6:1 or 3:1) for a set time (e.g., 20-30 minutes).

Boiled Water: Rice is boiled in excess water, and the liquid is collected. This typically results in a much higher concentration of starch and other water-soluble components.

Fermented Water: The soaking water is left to ferment at room temperature for a period (e.g., 24 hours to a few days). Fermentation is a crucial treatment as it:

Lowers pH: Lactic acid bacteria (LAB) produce organic acids, lowering the pH to about 4, which is close to the skin's natural pH.

Breaks Down Components: Starches are broken down into simpler sugars (mono-, di-, and oligosaccharides).

Increases Nutrients: It concentrates compounds like the antioxidant Inositol (Vitamin B8).

2. General Pre-Analytical Treatment

Before most instrumental analyses, the sample often requires pre-treatment:

Filtration: Rice water is first filtered (e.g., through cotton gaze or a fine sieve) to remove larger rice particles. For detailed analysis, further micro-filtration may be necessary.

Acidification (For Organic Substances): To precipitate organic substances for isolation, the rice washing water is often acidified, typically to pH 4. This process is reported to achieve a high removal rate of organic material (around 85%).

Extraction (For Lipids/Oils): For analyzing oil-soluble components like gamma-oryzanol or certain fat-soluble vitamins, the sample may undergo a liquid-liquid extraction using organic solvents like ethyl ether and petroleum ether, followed by evaporation to isolate the crude extract.

3. Applications of rice washed water :

Rice-washed water can be used for beauty and home applications, such as skin and hair care, cooking, and gardening. It is used topically to cleanse, tone, and moisturize skin, and to strengthen, smooth, and add shine to hair. Additionally, it can be used to cook grains, make natural cleaning solutions, and fertilize plants. The applications of rice-washed water, or rice water, are extensive and span beauty, health, and household uses, rooted in centuries of traditional practice across Asian cultures. Its versatility comes from being rich in amino acids, vitamins (B and E), minerals, and antioxidants like inositol and ferulic acid.

For skin and hair

Cleanser and toner: Use as a facial wash or toner to cleanse skin, tighten pores, and balance pH levels. Toner and Brightening: It is used as a natural face toner to tighten pores, reduce dullness, and brighten the complexion. It helps to even out skin tone and fade mild hyperpigmentation and dark spots

Anti-aging: Can be applied to reduce signs of aging like wrinkles and sun damage. Rich in antioxidants like ferulic acid, it helps combat free radical damage, which is a major cause of fine lines and wrinkles.

Hair rinse: After shampooing, rinse hair with rice water to nourish follicles, strengthen hair fibers, and increase shine and smoothness.

Strengthening and Shine: The inositol found in rice water penetrates the hair strand and strengthens it, reducing surface friction, breakage, and split ends. It also provides a light coating that enhances shine and elasticity. Detangling: It acts as a natural conditioner, making hair smoother and much easier to detangle. Scalp Health: The anti-inflammatory and antifungal properties can help soothe the scalp and may aid in reducing dandruff.

Moisturizer: The starch can help hydrate the skin

For cooking and cleaning

Cooking: Use it to enhance the flavor and texture of grains like quinoa or vegetables.

Cleaning: Put some in a spray bottle to clean glass and mirrors, as the starch helps attract dirt.

For plants and other uses

Fertilizer: Use as a liquid fertilizer for plants, as it is rich in B vitamins, minerals, and other nutrients.

Probiotics: It can be used in preparing fermented foods like Soidon starters.

Fungi production: It is used as a nutrient-rich medium to cultivate certain types of fungi.

Chicken feed: Can be a potential high-energy feed resource for chickens.

4. 🌾 Market Research:

Rice Water Cleansers (Skincare Market Segment)

The market for rice water-based skincare, which includes cleansers, is experiencing robust growth driven by major consumer trends.

1.Market Size and Growth

Overall Market Health: The global Rice Water Skincare Market is projected for significant expansion. One report indicates it was valued at approximately $6.2 - $7.4 Billion in 2024 and is expected to grow at a Compound Annual Growth Rate (CAGR) ranging from 6.7% to 8.6% through the forecast period (up to 2033).

Key Driver: Cleansers, along with toners and serums, are a primary product category fueling this growth. The segment of Cleansers & Toners is a key focus for product development.

1. Key Market Drivers

The demand for rice water cleansers is fueled by several overarching trends:

Natural and Clean Beauty: Consumers are increasingly seeking products with natural, organic, and plant-based ingredients, avoiding harsh chemicals. Rice water is favored for its minimal processing and naturally derived benefits.

Cultural Influence (K-Beauty & J-Beauty): The global rise of Korean (K-Beauty) and Japanese (J-Beauty) skincare routines has popularized traditional Asian ingredients like rice water, which is revered for its brightening, moisturizing, and anti-aging properties.

Product Benefits: Rice water cleansers are sought after for their multifunctional benefits, including:

Gentle Cleansing: Removing impurities without stripping natural oils.

Hydration Boost: Moisturizing the skin.

Brightening: Reducing dullness and enhancing natural glow.

E-commerce and Digital Marketing: The rapid expansion of online retail platforms and targeted marketing campaigns via social media influencers are making these products more accessible and visible globally.

2. Consumer Profile and Preferences

Primary Consumer: The female segment leads the overall rice-based skincare market.

Skin Type Focus: Products for Dry Skin and Oily Skin hold significant market share. Rice water helps dry skin by alleviating flakiness, while for oily skin, it is valued for control and purification benefits.

Efficacy and Ingredients: There is a high interest in fermented rice products due to studies showing their enhanced benefits, including improved moisturizing, antioxidant, and anti-aging effects.

3. Competitive Landscape and Major Players

The market is highly competitive, featuring a mix of global cosmetic giants and specialized beauty brands.

Major Companies: Established players like L'Oréal, Estée Lauder, and Unilever compete alongside specialized Asian-focused brands.

Specialized/Niche Brands: Key players in the rice-based skincare market include Tatcha, The Face Shop, Skinfood, Innisfree, Shiseido, and Beauty of Joseon.

Product Innovation: Companies are investing in R&D to launch new formulations, such as cream-to-oil, gel, and foaming cleansers, often combining rice extract with other popular actives like Niacinamide and Salicylic Acid.

4. Distribution Channels

Leading Channel: Supermarkets and Hypermarkets currently dominate the market share for rice water skincare products due to their extensive reach.

Fastest-Growing Channel: Online retail and e-commerce are experiencing the fastest growth, offering convenience and a wider variety of specialized or nice Product .

5. Rice water Cleansers in market:

• **Nykaa Skin**

Nykaa Naturals Rice Water & Glycolic Acid Face Wash

For Gentle Exfoliation & Glow-For All Skin Types

100ml

• **Mamaearth**

Rice Face Wash With Rice Water & Niacinamide for Glass Skin

150ml

• Rice Whip Facial Cleanser –
Brightening Korean Rice Cleanser, AHA, BHA, Dry & Dull Skin
30ml

• Rice Water Bright
Facial Foaming Cleanser
150ml

• Plum

2% Niacinamide Face Wash With Rice Water For Oily Skin, Brightens and softens skin.
150ml

6.How to use Rice water Cleanser :

Step 1: Clean Hands and Prep the Face

Washing your hands thoroughly with soap and water.

Wet Your Face by Splashing your face with lukewarm water.

Step 2: Apply and Massage the Cleanser

Put a small, coin-sized amount of cleanser into your palm or on your fingertips.

If it's a foaming or gel cleanser, rub your hands together briefly to create a light lather.

Apply the cleanser to your face and neck. Use your fingertips to gently massage the product into your skin using small, circular motions

Step 3: Rinse and Dry

Rinse your face with lukewarm water until all traces of the cleanser are completely removed.

Gently pat your face dry with a clean, soft towel dedicated for your face. Never rub, as this can cause friction, irritation, and premature aging.

7. Benefits :

The core benefits come from the rich composition of rice water, including amino acids, B vitamins (like Niacinamide), Vitamin E, minerals, and potent antioxidants like Inositol and Ferulic Acid. Rice water cleansers are highly valued in modern skincare, particularly within the Korean (K-Beauty) and Japanese (J-Beauty) frameworks, for their gentle yet powerful ability to cleanse while delivering therapeutic nutrients.

Primary Benefits like

1. Gentle Yet Effective Cleansing
2. Brightening and Radiance
3. Hydration and Barrier Support
4. Anti-Aging and Antioxidant Protection .

Rice ingredients are generally considered safe and hypoallergenic.

8. Conclusion:

While beneficial for all skin types, the formulations—often enriched with hydrating agents like ceramides and Niacinamide—are particularly well-suited for normal, combination, and dry skin, offering a deep clean without sacrificing moisture. However, those with very oily skin might still prefer a dedicated balancing cleanser. A rice water cleanser is more than just a passing trend; it is a reliable, dual-action skincare workhorse. It acts as an effective daily purification step while simultaneously delivering the amino acids, antioxidants (like Inositol and Ferulic Acid), and vitamins necessary to achieve a softer, brighter, and more hydrated complexion. The most frequently cited long-term benefit is the brightening and illuminating effect on the skin, which users report seeing quickly. This confirms the ingredient's traditional reputation for improving skin clarity and evening out the complexion. The cleansers are overwhelmingly praised for their creamy, luxurious texture that lathers well (often requiring only a pea-sized amount) and effectively removes dirt, impurities, and light makeup. They cleanse deeply without causing the "tight" or "squeaky clean" feeling that indicates a stripped skin barrier. The rice-washed water is a traditional ingredient which has several beneficial components. The washed rice water which has been discarded off has many magnificent uses and lacks scientific validation. The review article provides a better understanding of this traditional product in terms of its availability and its application and uses in the field of Ayurveda, medicine, plant growth and several other prominent areas. This review article will provide a better understanding about the rice-washed water and the utilization of the same in several other unexplored areas

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