



Increasing Incidence of Paediatric Allergic Disorders: Ayurvedic Preventive and Therapeutic Perspectives

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Abstract

Background

Pediatric allergic disorders such as allergic rhinitis, bronchial asthma, atopic dermatitis, food allergy, and urticaria are increasing globally, particularly in urban pediatric populations. These disorders significantly affect growth, immunity, school attendance, and quality of life. Conventional therapies mainly provide symptomatic relief and are associated with recurrence and long-term adverse effects. Ayurveda offers preventive and therapeutic strategies through regulation of Agni, correction of Dosha imbalance, immune modulation, and Rasayana therapy.

Objective

To review the increasing incidence of pediatric allergic disorders and critically analyze Ayurvedic preventive and therapeutic approaches based on classical Kaumarbhritya principles and contemporary evidence.

Methods

Classical Ayurvedic texts including Charaka Samhita, Sushruta Samhita, Ashtanga Hridaya, Kashyapa Samhita, and Nighantus were reviewed. A literature search was conducted using PubMed, Google Scholar, DHARA, and AYUSH Research Portal. Conceptual correlation between Ayurvedic pathogenesis and modern immunological mechanisms was performed.

Results

Pediatric allergic disorders correlate with Pratishyaya, Tamaka Shwasa, Vicharchika, Kotha, and Udarda in Ayurveda. These conditions arise due to Kapha-Vata predominance, Mandagni, Aama formation, and Rasavaha-Pranavaha srotodushti. Preventive measures such as Garbhini Paricharya, Lehana, Dinacharya, Ritucharya, and Rasayana play a crucial role. Therapeutic interventions including Shamana, selective Shodhana, and immune-modulatory herbs show promising outcomes.

Conclusion

Ayurvedic preventive and therapeutic strategies offer a holistic, safe, and sustainable approach for managing pediatric allergic disorders. Integration of Ayurveda with modern pediatrics may reduce disease recurrence, drug dependence, and long-term complications.

Keywords

Pediatric allergy, Kaumarbhritya, Ayurveda, Pratishyaya, Tamaka Shwasa, Rasayana, immune modulation, allergic disorders

Introduction

Allergic disorders are among the most common chronic conditions affecting children worldwide. Epidemiological studies suggest that nearly 20–30% of children suffer from one or more allergic diseases,

with a continuously rising trend in developing countries due to urbanization, environmental pollution, altered diet, and reduced microbial exposure [1]. Common pediatric allergic disorders include allergic rhinitis, bronchial asthma, atopic dermatitis, food allergy, and urticaria [2].

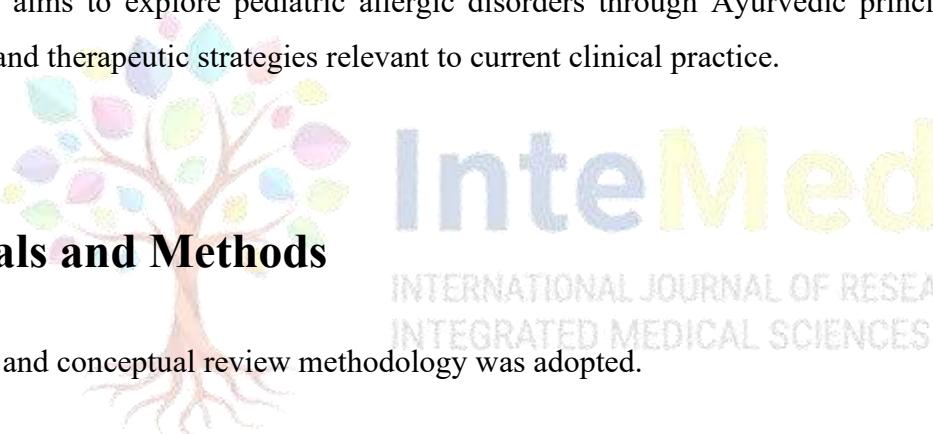
These disorders are characterized by chronicity, recurrence, and progression into adulthood, often resulting in complications such as impaired pulmonary function, recurrent infections, growth retardation, and psychosocial stress [3]. Modern medical management primarily relies on antihistamines, corticosteroids, leukotriene antagonists, and immunotherapy, which often provide temporary relief without addressing the root cause [4].

In Ayurveda, childhood (Bala avastha) is Kapha-dominant, predisposing children to Kapha-related disorders including allergies [5]. Kaumarbhritya emphasizes prevention, immune strengthening (Vyadhikshamatva), Agni regulation, and Rasayana therapy for long-term disease control [6].

This article aims to explore pediatric allergic disorders through Ayurvedic principles and to highlight preventive and therapeutic strategies relevant to current clinical practice.

Materials and Methods

A narrative and conceptual review methodology was adopted.



Literature Search

Databases searched included PubMed, Google Scholar, DHARA, and AYUSH Research Portal using keywords such as “pediatric allergy,” “Ayurveda,” “Kaumarbhritya,” “Pratishyaya,” “Tamaka Shwasa,” and “Rasayana.”

Inclusion Criteria

- Classical Ayurvedic texts and commentaries
- Peer-reviewed journals related to Ayurveda and pediatric allergy
- Experimental and clinical studies on immunomodulatory Ayurvedic drugs

Exclusion Criteria

- Non-peer-reviewed literature

- Studies exclusively on adult allergic disorders

Results / Review Findings

Ayurvedic Correlation of Pediatric Allergic Disorders

Modern allergic conditions can be correlated with the following Ayurvedic entities:

Modern Disorder	Ayurvedic Correlation
Allergic rhinitis	Pratishyaya
Bronchial asthma	Tamaka Shwasa
Atopic dermatitis	Vicharchika
Urticaria	Kotha, Udarda
Food allergy	Ajeerna-janya Vyadhi

These conditions are predominantly Kapha-Vata disorders with Pitta association in chronic stages [7].

Nidana (Etiological Factors)

Ayurvedic texts describe the following causative factors:

- Guru, Snigdha, Abhishyandi Ahara
- Viruddha Ahara and Adhyashana
- Intake of cold, processed, and packaged foods
- Exposure to dust, smoke, pollen, and pollutants
- Mandagni leading to Aama formation
- Genetic susceptibility (Beeja Dosha) [8]

Samprapti (Pathogenesis)

The pathogenesis involves:

- Kapha-Vata vitiation
- Agnimandya → Aama utpatti
- Rasavaha and Pranavaha srotodushti
- Altered Vyadhikshamatva resulting in hypersensitivity reactions

This can be conceptually correlated with immune dysregulation and exaggerated Th2-mediated responses in modern immunology [9].

Ayurvedic Preventive Strategies

Garbhini and Sutika Paricharya

Proper antenatal and postnatal regimens help prevent Beeja-dushti and improve immune resilience in offspring [10].



Lehana and Balya Measures

- Suvarna Prashana
- Medhya and Balya formulations to enhance immunity and tolerance [11]

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Dinacharya and Ritucharya

Seasonal adaptation and avoidance of Kapha-provoking regimens reduce disease exacerbation [12].

Therapeutic Approaches

Shamana Chikitsa

- Haridra, Yashtimadhu, Guduchi
- Sitopaladi Churna, Talisadi Churna
- Dashamoola preparations

Shodhana (Age-Appropriate)

- Mridu Virechana

- Pratimarsha Nasya

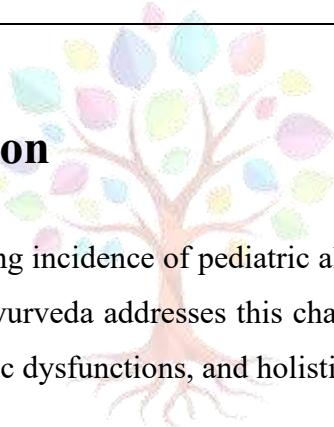
Rasayana Therapy

- Chyawanprasha (pediatric dose)
- Guduchi Rasayana
- Ashwagandha Rasayana [13]

Modern Pharmacological Correlation

Ayurvedic Action	Modern Interpretation
Rasayana	Immunomodulatory
Agni Deepana	Improved gut-immune axis
Shothahara	Anti-inflammatory
Krimighna	Anti-allergic and antimicrobial

Discussion



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The increasing incidence of pediatric allergic disorders reflects a shift in lifestyle, diet, and environmental exposure. Ayurveda addresses this challenge through early immune conditioning, correction of digestive and metabolic dysfunctions, and holistic lifestyle regulation [14].

Unlike conventional therapy, Ayurvedic management aims to restore immune tolerance rather than suppress immune responses. Integrative use of Ayurveda alongside modern pediatrics may reduce recurrence, steroid dependence, and long-term complications [15]. However, large-scale randomized clinical trials and standardization of pediatric formulations remain future research priorities.

Conclusion

Pediatric allergic disorders represent a growing public health concern. Ayurvedic principles of Kaumarbhritya provide a comprehensive framework for prevention, immune modulation, and long-term management of allergic diseases in children. Integrative pediatric healthcare incorporating Ayurveda has significant potential to reduce disease burden and improve quality of life.

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