

## A COMPREHENSIVE REVIEW OF KARNASRAVA (OTORRHEA) WITH EMPHASIS ON AYURVEDIC AND MODERN PERSPECTIVES

Dr. Meenakshi Bhati\*

Assistant Professor, Department of Shalakya Tantra, Mahatma Jyotiba Fule Ayurvedic  
Medical Collge Chomu, Harota Jaipur Rajasthan.

Article Received on 27 March 2026,  
Article Revised on 16 April 2026,  
Article Published on 01 May 2026,

<https://doi.org/10.5281/zenodo.19874159>

### \*Corresponding Author

Dr. Meenakshi Bhati

Assistant Professor, Department of  
Shalakya Tantra, Mahatma Jyotiba  
Fule Ayurvedic Medical Collge  
Chomu, Harota Jaipur Rajasthan.



**How to cite this Article:** Dr. Meenakshi Bhati\*. (2026). A Comprehensive Review of Karnasrava (Otorrhea) with Emphasis on Ayurvedic and Modern Perspectives. World Journal of Pharmaceutical Research, 15(9), 122–126. This work is licensed under Creative Commons Attribution 4.0 International license.

### ABSTRACT

*Karnasrava*, described in Ayurveda as pathological ear discharge, closely corresponds to the clinical entity of otorrhea in contemporary medicine. It is not a standalone disease but a manifestation of underlying pathological processes involving the external or middle ear. In Ayurvedic literature, *Karnasrava* is categorized under *Karnaroga* and is primarily attributed to the derangement of *Kapha* and *Pitta dosha*, often accompanied by *Vata* involvement in chronic stages. This review critically examines both Ayurvedic and modern biomedical perspectives on ear discharge, focusing on etiological factors, pathogenesis, clinical features, diagnostic approaches, and management strategies. The paper also explores the potential of integrative care models combining Ayurvedic procedures such as *Karnapoorana* and *Shodhana karma* with evidence-based

modern treatments. Such an approach may help reduce recurrence, improve mucosal healing, and minimize complications associated with chronic otorrhea.

**KEYWORDS:** *Karnasrava*, Otorrhea, *Karnaroga*, *Dosha*, Chronic suppurative otitis media, Integrative ENT.

### INTRODUCTION

Ear discharge is a frequently encountered complaint in clinical practice and often signifies an underlying inflammatory or infectious pathology. In Ayurveda, *Karnasrava* is described as abnormal secretion from the ear canal and is included among *Karnaroga*. Classical texts

highlight that vitiation of *Kapha* leads to excessive secretion, while *Pitta* contributes to discoloration, suppuration, and foul odor.<sup>[1,2]</sup>

From a biomedical standpoint, otorrhea is considered a symptom rather than a disease entity. It is most commonly associated with otitis externa, acute otitis media with perforation, and chronic suppurative otitis media (CSOM). Globally, CSOM remains a significant contributor to preventable hearing loss, especially in low-resource settings.<sup>[6]</sup>

Despite the availability of antibiotics and surgical interventions, recurrence and chronicity remain major concerns. This necessitates exploration of alternative and complementary therapeutic approaches. Ayurveda, with its individualized and systemic approach, offers potential benefits in managing chronic inflammatory conditions.

## MATERIALS AND METHODS

This review adopts a qualitative and integrative methodology. Classical Ayurvedic literature including *Charaka Samhita*, *Sushruta Samhita*, and *Ashtanga Hridaya* was systematically analyzed to extract descriptions of *Karnasrava*, including *Nidana*, *Samprapti*, *Lakshana*, and *Chikitsa*.

Modern scientific literature was reviewed using databases such as PubMed, Scopus, and Google Scholar. Emphasis was placed on peer-reviewed articles discussing otorrhea, CSOM, microbial etiology, and treatment modalities.

The data were synthesized to identify conceptual parallels and differences between Ayurvedic and modern frameworks.

## RESULTS

### Ayurvedic Conceptual Framework

#### Etiopathogenesis (*Samprapti*)

According to Ayurveda, *Karnasrava* originates from *Dosha prakopa* triggered by factors such as:

- Exposure to cold wind (*Sheeta vayu*)
- Accumulation of dust (*Raja*)
- Trauma (*Abhighata*)
- Poor ear hygiene

These factors vitiate *Kapha* and *Pitta*, leading to increased secretion and inflammation within

the auditory canal. In chronic cases, *Vata* aggravation may result in tissue degeneration and hearing impairment.

### Clinical Manifestations (*Lakshana*)

- Persistent or intermittent discharge (*Srava*)
- Ear pain (*Karnashoola*)
- Reduced hearing (*Badhirya*)
- Itching (*Kandu*)
- Foul odor in *Pitta-dominant* conditions

### Therapeutic Approaches (*Chikitsa*)

Management focuses on restoring *Dosha* balance:

- *Karnapoorana*: Instillation of medicated oils to lubricate and heal tissues
- Herbal formulations such as *Nimba*, *Triphala*, and *Haridra*
- *Shodhana karma* (bio-cleansing procedures)
- Local therapies like *Dhoopana* (medicated fumigation)

### Modern Medical Understanding

#### Etiology and Classification

Otorrhea can be broadly classified into:

#### 1. External ear origin

- Otitis externa (often bacterial or fungal)

#### 2. Middle ear origin

- Acute otitis media with tympanic membrane perforation
- CSOM (safe and unsafe types)

#### 3. Other causes

- Cholesteatoma
- Neoplasms (rare)

### Pathophysiology

Microbial infection plays a central role, with common pathogens including *Pseudomonas aeruginosa* and *Staphylococcus aureus*. Biofilm formation is increasingly recognized as a key factor in chronic and recurrent infections.<sup>[17]</sup>

### Clinical Features

- Continuous or episodic ear discharge
- Conductive hearing loss
- Ear pain (more prominent in acute cases)
- Fever in systemic infection

### Diagnostic Modalities

- Otoscopic examination
- Audiological assessment
- Microbiological culture
- Imaging (CT/MRI in complications)

### Management

- Topical and systemic antibiotics
- Aural toileting
- Surgical procedures such as tympanoplasty

## DISCUSSION

The comparison between *Karnasrava* and otorrhea reveals a remarkable overlap in clinical features despite differences in theoretical frameworks. Ayurveda interprets the disease through the lens of *Dosha imbalance*, whereas modern medicine focuses on microbial infection and anatomical pathology.

An important strength of Ayurvedic management lies in its emphasis on tissue healing and recurrence prevention. Procedures like *Karnapoorana* may improve local immunity and maintain ear canal moisture, thereby reducing susceptibility to infections.

On the other hand, modern medicine provides rapid symptom control and is indispensable in acute and complicated cases. However, issues such as antibiotic resistance and biofilm-associated persistence highlight limitations of conventional therapy.<sup>[7,17]</sup>

An integrative model combining precise diagnosis and acute care from modern medicine with the restorative and preventive principles of Ayurveda may offer superior outcomes. Such an approach could be particularly beneficial in chronic conditions like CSOM.

## CONCLUSION

*Karnasrava* (otorrhea) represents a multifaceted clinical condition requiring a comprehensive treatment strategy. While modern medicine effectively addresses acute infections, Ayurveda contributes valuable insights into chronic disease management and prevention. Integrating both systems may enhance therapeutic efficacy, reduce recurrence, and improve overall patient well-being.

#### REFERENCES (VANCOUVER STYLE WITH DOI)

1. Agnivesha. *Charaka Samhita*. Varanasi: Chaukhambha Orientalia, 2014.
2. Sushruta. *Sushruta Samhita*. Varanasi: Chaukhambha Publications, 2015.
3. Dhingra PL, Dhingra S. *Diseases of Ear, Nose and Throat*. 7th ed. Elsevier, 2018.
4. Acuin J. Chronic suppurative otitis media. *BMJ Clin Evid.*, 2007; 2007: 0507.
5. Schilder AGM, et al. Otitis media. *Nat Rev Dis Primers*, 2016; 2: 16063. doi:10.1038/nrdp.2016.63
6. Monasta L, et al. Burden of disease caused by otitis media. *PLoS One*, 2012; 7(4): e36226. doi:10.1371/journal.pone.0036226
7. Qureishi A, et al. Update on otitis media. *Infect Drug Resist*, 2014; 7: 15–24. doi:10.2147/IDR.S39637
8. Lee KJ. *Essential Otolaryngology*. 11th ed. McGraw Hill, 2016.
9. Browning GG, et al. *Scott-Brown's Otorhinolaryngology*. 8th ed. CRC Press, 2019.
10. World Health Organization. *Chronic suppurative otitis media*, 2004.
11. Verhoeff M, et al. *Int J Pediatr Otorhinolaryngol*, 2006; 70(1): 1–12. doi:10.1016/j.ijporl.2005.08.021
12. Bluestone CD, Klein JO. *Otitis Media*. 4th ed., 2007.
13. Sharma PV. *Charaka Samhita (Translation)*, 2014.
14. Murthy KR. *Sushruta Samhita (Translation)*, 2015.
15. Vagbhata. *Ashtanga Hridaya*, 2016.
16. Homøe P, et al. *Lancet Infect Dis.*, 2013; 13(7): 541–542. doi:10.1016/S1473-3099(13)70118-7
17. Mittal R, et al. *Front Cell Infect Microbiol*, 2015; 5: 41. doi:10.3389/fcimb.2015.00041
18. Kaur R, et al. *J Laryngol Otol.*, 2017; 131(6): 479–486. doi:10.1017/S0022215117000485