


Review Article
PARALLEL ANALYSIS OF KABAALA IYA AZHAL IN SIDDHA LITERATURE WITH SINUSITIS
R.Saranya

Siddha consultant, No: 88, Kamatchiamman Kovil Street, Tirupur, Tamil Nadu.

ABSTRACT

Siddha system is one of the primordial health sciences with historical, anthropological, archeological and geographical evidences. The medical philosophies of *Siddha* were presented in poetic forms in palm scripts which cannot be easily interpreted by common man. According to this system, the disease classification is based on the concepts of *Tridosha* pathology (*Vatham*, *Pitham* and *Kabham*) that seems poles apart from those of the International Classification of Diseases (ICD) when viewed afar. This review article is an attempt to correlate clinically, the symptoms of "*Kabaala Iya Azhal*", a disease given in the *Siddha* text *Pararasasegaram* with that of the common ailment Sinusitis mentioned in contemporary science. Through meticulous interpretation and parallel analysis of the condition it can be concluded that even the mediocre signs and symptoms of '*Kabaala Iya Azhal*' can be correlated well with that of Sinusitis. This parallel analysis would further pave way for better perceptive, diagnosis and management of the disease "*Kabaala Iya Azhal*" as mentioned in *Siddha* literature.

KEYWORDS: *Kabaala Iya Azhal*, *Sinusitis*, *Siddha*, *Head ache*, *Traditional medicine*, *Kabaala Noi*.

INTRODUCTION

Human race in various parts of globe has its unique system of medicine for maintaining their health and for the prevention and treatment of diseases. The antique *Siddha* system of medicine is patronized extensively and more particularly in Southern peninsula of India. According to this system, the disease classification is based on the humoral concepts of pathology that significantly vary with that of the International Classification of Diseases (ICD) in etiopathological, symptomatological and diagnostic aspects. Present day scientific community demands the need for building a bridge between the unique multimodal approach of traditional medicine with that of the scientific terminology of diseases to maintain health and for the effective treatment of diseases. With the emerging need to hook up the *Siddha* terminologies of diseases with the ICD nomenclature, this review article has attempted to compare clinically, the symptoms of *Kabaala Iya Azhal* with that of the most probable related signs and symptoms of sinusitis which in turn would pave way for better understanding and globalization of *Siddha* system.

Siddhars classified diseases under 4448 heads. According to the *Siddha* philosophy, the five elements earth, water, fire, air and space of this universe also exist in human body and they combine to form *Tridoshas* or humours namely *Vatham* (Air of life), *Pitham* (Fire Humor) and *Kapham* (water Humor). The balance of these three humors is essential for the maintenance of health.^[1] As per the text *Pararasasegaram*, "*Kabaala Iya Azhal*" is one among the 46 types of scalp diseases. The term "*Kabaalam*" means scalp and the term "*Iya Azhal*"

denotes derangements in *Azhal* (Fire) and *Iya* (water) humors.^[2]

It is estimated that 1 to 3% of upper respiratory infections are complicated by Sinusitis^[3]. Adults have approximately 2-3 episodes of upper respiratory infection and children 6-8 episodes per year^[3,4]. The clinical symptoms of "*Kabaala Iya Azhal*" merely correlate with the symptoms of "Sinusitis" in contemporary medical classification than any other condition. Hence this review focuses on the parallel analysis of the commonly existing disease "*Kabaala Iya Azhal*" and sinusitis. Through this study, the diagnosis and treatment of this disease "*Kabaala Iya Azhal*" may be reinforced and well augmented to unravel the facts about the *Siddha* literature.

Methodology

The literature cited here was primarily taken from the *Siddha* text *Pararasasegaram*. For the understanding and scientific correlation of the disease in *Siddha* literature, reputed modern medicine books and databases such as Google scholar, Embase, Pubmed, Index Copernicus, Science direct etc were searched. After the methodological collection of the above information, parallels were drawn leading to a specific conclusion.

Siddha Literature on Kabaala Iya Azhal Noi

According to *Pararasasegaram*, the symptoms of *Kabaala Iya Azhal* are given as follows in the poem below,

*"Seniyin meethu pitha silerpanam sei gunamkel
Manniya puruvam netri varum uchi ivatrir kuthum*

Munamae vzhli neer payinthu sivanthidu mooku novaam

Than udal vethumbi nenjir salam urainthu irumun thanae^[2]

Analogy Between *Kabala Iya Azhal* and Sinusitis

Symptoms of <i>Kabala Iya Azhal</i>	Symptoms of Sinusitis
<i>Seniyin meethu pitha silerpanam sei gunamkel</i>	Sinusitis may be mainly due to excessive mucus production and edema which obstruct the ostia and impede drainage from the sinuses into the nasal cavity ^[2]
<i>Manniya puruvam netri varum uchi ivatrir kuthum</i>	Throbbing head ache in vertex, eyebrows and forehead ^[5,6,7]
<i>Munamae vzhli neer payinthu sivanthidu mooku novaam</i>	Redness and watering of eyes ^[8,9]
<i>Mooku novaam</i>	Major symptoms in Rhinosinusitis are nasal obstruction or blockage, nasal discharge, hyposmia, anosmia, facial congestion... ^[4]
<i>Than udal vethumbi</i>	Low grade fever and body pain in Sinusitis ^[10]
<i>Nenjir salam urainthu irumun thanae</i>	Accumulation of phlegm in respiratory organs and chronic cough ^[11]

Sinusitis is a common chronic condition with a considerable health care impact. The chief factors contributing to the pathogenesis of sinusitis include anatomic factors, disturbances in mucociliary clearance, microbial pathogens, and inflammatory factors^[12]. "Sinusitis" greatly reduces the daily activities of affected people and thereby reduces the quality of life and accounts for substantial health care expenditures in terms of office visits, antibiotic prescriptions filled, lost work days, and missed school days^[13].

Reading between the lines of Sage Nagamuni the areas affected in the disease *Kabaala* (head) *Iya* (*Kapham*) *Azhal* (*pitham*) are highlighted as eyebrows, forehead and vertex which are the dwelling places of *Kapha* humour. *Kapham* is considered to be the heaviest of the three humors and is responsible for lubrication and production of mucus. Since the first line explains "*Pitha silerpanam sei gunamkel*" it means that the fire humor in combination with *Kapha* humor may cause the drying and accumulation of mucus in the above mentioned areas causing pain in these areas. According to a statement about the importance of patency in sinus by Senior and Kennedy, Sinus health in any patient depends on mucous secretion of normal viscosity, volume, and composition. The mucus stasis and subsequent infection is prevented by normal mucociliary flow. And an open sinus ostia allows adequate drainage and aeration. Alterations in any of these elements can result in ostial blockage resulting in Sinusitis^[14]. Overall, about 40% of patients with chronic sinusitis and normal control subjects had ostiomeatal narrowing in one study^[15]. Hence alteration in *Pitha kapham* humours may provoke the above said mechanisms causing sinusitis.

Siddha literature describes the sinusitis pain as "*Manniya puruvam netri varum uchi ivatrir kuthum*". As per T.V.Sambasivampillai dictionary, "*Kuthum*" means "*pricking or crushing type of Pain*". The nature of pain is

mentioned to be severe and throbbing type. This can be correlated with retro orbital pain in frontal sinusitis: *pain* in the temporal or retro orbital area or upper nose in Ethmoid sinusitis and pain in the temporal or retro orbital area or upper nose due to Sphenoid sinusitis^[3]. Since inflammation is said to play a key role in the pathogenesis of chronic sinusitis due to infectious or non infectious stimuli pain is an inevitable factor of mucopurulent sinusitis resulting in pain^[16,17]. Pain on palpation over the frontal sinuses can indicate inflammation. Maxillary sinus infection can cause toothache with tenderness over the molar region. Ethmoid sinusitis maybe associated with swelling, tenderness and pain around the eyes^[18].

Siddha pathology, relates that food and life style changes cause derangement of *Pitha* humor initially and vitiated *Pitha* humor on reaching the scalp, (hypothetically) leads to accumulation of fluid (*Kapham*) in scalp similar to the formation of vapour in the inner side of pressure cookware lid after heating. This deranged *Pitha* and *Kapha* humours which later affects *Viyanan* (a type of *Vatha* humour responsible for flow of fluids) causing throbbing headache in forehead, vertex and eyebrows. Thus he clearly narrated the location and nature of pain in the second line of this poem.

The third line, "*Munamae vzhli neer payinthu sivanthidu mooku novaam*" Sage Nagamuni mentioned the word "*munamae*" which in Tamil usually means "*Early*" about the affection of eyes in this disease followed by nasal diseases. Hence it can be taken in the precise sense that watering and redness of eyes are the initial presenting symptoms of this disease. Also while mentioning about lacrimation, the word "*Paainthu*" in the song clearly explain the effusion of fluid and distension of eyes causing increased lacrimation. This increase in lacrimation is probably due to obstruction of the lacrimal duct. Sage Naagamuni thus splendidly

made an implication on the involvement of eye in this disease. Rhinitis and sinusitis usually coexist resulting in rhinosinusitis. The very symptoms given in the song probably correlates with allergic type of rhinitis that can be frequently associated with conjunctival redness, itching, swelling and excess lacrimation.”^[7] and conjunctival infection”^[8]. Sinusitis from the modern text that especially in allergic type of rhinosinusitis, there will be “smarting and watering of the eyes and conjunctival infection”^[8]. Scientifically, watering of sinusitis may be probably due to obstruction of lacrimal duct by excessive mucus production and edema which obstruct the ostia and impede drainage from the lacrimal duct into the nasal cavity. *Siddha* pathology, infers that redness of eyes is a typical sign of alleviated *Pitha* humor. This is evident from *Therayar vagadam*, that the deranged *Pitham* produces fever, heaviness of head, hardening of muscles and joints, giddiness, burning sensation of eyes, etc.

Besides, “*Mookunovam*” is a broad term of nasal diseases mentioned in the above said poem. The suffering can be probably correlated with rhinosinusitis including nasal polyps. It is defined as inflammation of the nose and the paranasal sinuses characterised by two or more symptoms, of either nasal blockage, obstruction, congestion or nasal discharge (anterior/posterior nasal drip), mucopurulent discharge primarily from middle meatus, purulence, hyposmia/anosmia, facial congestion. ^[9,19] According to the *Siddha* concept, nasal diseases in *Kabaala Iya Azhal* may be mainly due to deranged *Kapha* humour causing Nasal symptoms and also. Due to the alterations in *Kirukaran vayu* which is responsible for nasal secretions and *Prana vayu* which is responsible for respiration that are affected thereby produce the symptoms of Nasal disease.

According to research study from Georgetown University Medical Center Sinusitis, was reported to be a condition that can mimic body aches and pains like those associated with arthritis, depression, fibromyalgia, or chronic fatigue syndrome^[10]. Also “fever is specific to acute rhinosinusitis which is of a low grade nature ^[5]. In Sinusitis, withering may be related to reduced oxygen in blood or may be due to activation of inflammatory network in the body^[4]. Therefore the line “*Udalvethumbi*” mentioned in the lines of Sage *Naagamuni* lies in parallel with low grade fever and body pains mainly due to the derangement of *Kapham* humour. Since the pathogenesis of sinusitis and viral URI are almost similar, the clinical manifestations of these two diseases greatly overlap resulting in low grade fever, increasing nasal discharge, congestion or daytime cough.^[20]

Also in sinusitis, chronic cough may be present due to post nasal drip and also due to the inflammation of the respiratory tract ^[8]. Approximately 0.5% of all upper respiratory tract infections are complicated by sinusitis ^[21]. Also, post nasal drip may cause hoarseness, a sore throat besides cough. Because mucus trickles

down the wind pipe and bronchial tubes while sleeping, cough will probably be worse at night and early in the morning”^[11]. Thus the disease initially affecting the structures of head, later descends down and affects the lung. In this disease, cough is produced mainly due to derangement in *Kapha* humour that causes accumulation of Phlegm in lungs as said in the last line “*nenjil salam urainthu irumun thanae*”.

CONCLUSION

Through this literature analysis it can be concluded that the condition ‘*Kabaala Iya Azhal*’ described in *Pararasasegaram* text well correlates with the clinical diagnostic features of Sinusitis than any other disease under modern disease classification. Hence similar such correlation between various other *Siddha* disease terminologies and the ICD nomenclature may be essential in future in order to globalize the traditional *Siddha* System of medicine.

ACKNOWLEDGEMENT

I would like to express my deep sense of gratitude to my guide, M.Logamanian.M.D.(S), Ph.D., Dr. G.J.Christian. M.D(S), Associate Professor, Dr.S.Elansekaran.M.D(S), Lecturer, Dr.M.Ramamoorthy.M.D(S), Lecturer, Department of Noi Naadal, National Institute of Siddha, for their moral support and valuable guidance.

REFERENCES

1. Shanmugavelu M. Noi naadal noi mudhal naadal Thiratu. Part I, Chennai; Indian Medicine and Homeopathy Department; 2003, p 1-30.
2. Uthamarayan KS. Siddhar Aruvai Maruthuvam. 1st Edition Chennai; Department of Indian Medicine and Homeopathy; 2005. p.132.
3. Isselbacher, Braunwald, Wilson, Martin, Fauci, Kasper, Harrison’s principles of Internal Medicine, vol- I. United States Of America; Thirteenth edition; 1994.p. 516-517.
4. Stucker F. J, De Souza C, Kenyon G.S, Lian T.S, Draf W, Schick B, Rhinology and Facial Plastic Surgery. London; Springer New York Heidelberg Dordrecht; 2009. p.190.
5. Sambasivampillai TV, Tamil- English dictionary of medicine. 2nd edition, Department of Indian Medicine and Homeopathy; 1998.
6. Kennedy, Bolger, Zinreich. Diseases of the Sinuses: Diagnosis and Management. Hamilton; B.C. Decker Inc, 20 Hughson Street south, P.O. Box 620, Ontario L8N 3k7; 2001.p.151.
7. Schreiber C, Hutchinson S, Webster C, Ames M, Richardson M, Powers C. Prevalence of migraine in patients with a history of self-reported or physician-diagnosed "sinus" headache". Arch. Intern. Med. 2004; 164 (16): 1769-72.
8. Christopher C. Chang, Gary A. Incaudo, Eric Gershwin M. Diseases of the Sinuses. Second edition. London;

- Springer New York Heidelberg Dordrecht; 2014. p.133.
9. John A.A.Hunter, Davidson's Principles and Practice of Medicine. United States of America; Elsevier's Health Sciences Rights Department, 1600 John F. Kennedy Boulevard, Philadelphia; 20th Edition; 2006. p.729.
 10. Purdy, Rapoport, Sheftell, Tepper. Advanced Therapy of Headache. Second edition. Hamilton; B.C.Decker Inc, 20 Hughson Street south, P.O. Box 620, Ontario L8N 3k7; 2005. p.136.
 11. Diagnosing Chronic Fatigue? Check For Sinusitis. Georgetown University Medical Center. Science Daily, 14 August 2003. Available from: www.sciencedaily.com/releases/2003/08/03081407284.htm
 12. Daniel L. Hamilos, Chronic sinusitis. J Allergy Clin Immunol, 2000; 106:213-27.
 13. Settipane GA. Epidemiology of nasal polyps. Allergy Asthma Proc 1996; 17:231-6.
 14. Senior BA, Kennedy DW. Management of sinusitis in the asthmatic patient. Ann Allergy Asthma Immunol. 1996; 77:6-19.
 15. Jones NS, Strobl A, Holland I. A study of the CT findings in 100 patients with rhinosinusitis and 100 controls. Clin Otolaryngol 1997; 22:47-51.
 16. Hamilos DL. Noninfectious sinusitis. Allergy Clin Immunol Int 2000. Inpress.
 17. Hamilos DL. Corticosteroids in the treatment of sinusitis and nasal polyps. Immunol Allergy Clin North Am 1999 ;(19):799-817.
 18. Masood A, Moumoulidis I, Panesar J. Acute rhinosinusitis in adults: an update on current management. Postgraduate Medical Journal. 2007; 83 (980):402-408. doi:10.1136/pgmj.2006.054767.
 19. Fokkens W, Lund V, Mullol J. European Position Paper on Rhinosinusitis and Nasal Polyps group. Rhinology. Supplement; 2007,(20):1-136.
 20. Murtaza Mustafa, P.Patawari, HM, Iftikhar SC.Shimmi, SS.Hussain, MM.Sien. Acute and Chronic Rhino sinusitis, Pathophysiology and Treatment. International Journal of Pharmaceutical Science Invention. 2015; 4 (2), 30-36.
 21. Graham Worrall. Acute sinusitis. Can Fam Physician. 2011; 57(5): 565-567.

Cite this article as:

R.Saranya. Parallel Analysis of Kabaala Iya Azhal in Siddha Literature with Sinusitis. International Journal of Ayurveda and Pharma Research. 2017;5(11):66-69.

Source of support: Nil, Conflict of interest: None Declared

***Address for correspondence**

Dr R.Saranya

Siddha Consultant

No: 88, Kamatchiamman Kovil Street
Tirupur, Tamil Nadu

Pincode - 641 604

Email: drsaranyamd@gmail.com

Contact: 07305580004

Disclaimer: IJAPR is solely owned by Mahadev Publications - A non-profit publications, dedicated to publish quality research, while every effort has been taken to verify the accuracy of the content published in our Journal. IJAPR cannot accept any responsibility or liability for the articles content which are published. The views expressed in articles by our contributing authors are not necessarily those of IJAPR editor or editorial board members.