GLOBAL ACADEMIC RESEARCH INSTITUTE

COLOMBO, SRI LANKA

GARI International Journal of Multidisciplinary Research

ISSN 2659-2193

Volume: 08 | Issue: 02

On 30th June 2022

http://www.research.lk

Author: Dr M. Rajeetha, Dr S. Sailajah

Unit of Siddha Medicine, University of Jaffna, Sri Lanka

GARI Publisher | Siddha Medicine | Volume: 08 | Issue: 02

Article ID: IN/GARI/ICATMSUMP/2021/105 | Pages: 54-59 (06)

ISSN 2659-2193 | Edit: GARI Editorial Team

Received: 22.02.2022 | Publish: 30.06.2022

A DESCRIPTIVE STUDY ON ETIOLOGICAL FACTORS OF KABALA KANAAPU (SINUSITIS) AMONG PATIENTS IN KODIKAMAM-J/327 GS DIVISION, JAFFNA DISTRICT

M.Rajeetha, S.Sailajah

Unit of Siddha Medicine, University of Jaffna

ABSTRACT

Kabalakkanapu (Sinusitis) is one of the common disorder seen by the general practitioners, which are troubling the mankind. Although Kabalakkanapu is create physical and psychological discomfort. Sinusitis can be broadly defined as inflammation of one or more of the para nasal sinuses. The paranasal sinuses are lined with mucous membranes that have tiny hairs on them (ciliated epithelium). These mucous membranes produce a secretion that runs down through the nose and throat. Sinusitis is an inflammation or swelling of the tissue lining the sinuses. Acute sinusitis symptoms are facial pain and pressure, blocked nose, nasal discharge, reduced sense of smell, congestion and post nasal drip. These symptoms are more similar to Kabalakkanapu which is mentioned in the Siddha text book of Parajasekaram-Siroroga nithanam. I made my research involving 50 members diagnosed as Kabalakkanapu patients. Questionnaire was text book. Made on the basis of Siddha concept of etiological factors of Kabalakkanapu said in Siddha text book. At the end of the study, I have really realized that "Prevention is better than cure" because the people who were exposed to the etiological factors of Kabalakkanapu without awareness were gotten the asthmatic episodes. If we make awareness about the etiological factors of Kabalakkanapu, the patient will take care of their own health. From this study results and observation, I found that the patient having H/O, exposure to dust and other allergens was 46 members (92%); H/O, exposures to cool air and intake of cold water was 38 members (76%); H/O, patients with nasal septal deviation was 14 members (28%) & nasal polyps was 12 members (24%); H/O, allergic to cosmetics was 20 members (40%). This study will be essential role of siddha physicians to early diagnosis, prognosis and prevention of the disease. Further literary and clinical studies are necessary in future.

Key Words: Kabalakkanapu, Sinusitis, Descriptive Cross-Sectional Study.

INTRODUCTION

Siddha System of Medicine describes the Healthy way of living in this world. The system is based on five elements, three vital forces, six tastes. They are called as Aymperum boothangal, Muththathukkal and Aru suvaikal. Mann, Neer, Thee, Kaatru and Akayam are the five elements. These five elements combined in different combination to form the Three vital forces (Vatham, Pittham and Kapham) and Six tastes (Sweet, Sour, Astringent, Pungent, Bitter and Salt). The ratio between the three humors exists in the proportion of 4:2:1 in a healthy individual. Any imbalance in this ratio will result in disease because of foods, habits and actions.

Kapalakkanapu (it could be correlated with Sinusitis in allopathic view) is a very

common disease in the society due to increasing exposure to air pollution, dust allergy and western life style often starts in childhood. It is a disease characterized by recurrent attacks of runny nose and sneeezing, which vary in severity and frequency from person to person. Sinusitis is characterized by reversible airway obstruction, mucosal oedema, excessive secretion of mucus, causing mucous plugs. Over 75% of the patients had incidence of sinusitis in the age group of 16 – 45 years.

Etiological factors of sinusitis is easily avoidable one. If we concentrate on making awareness about the precaution of this disease, it will reduce the occurrence of the sinusitis. With my study, I am trying to convey how should we take precaution to prevent Kapalakkanapu occurrence in people. I have wish to make Siddha system is well founded under the basic principles of nature and its elements. Treatment and prevention is the basic aim of the siddha system of medicine .Siddha insists to lead a healthy life both physically and mentally. weakened immunity, due, for example, to a health condition or some kinds of treatment , an allergic reaction to substances such as dust, pollen, and animal hair, structural problems in the nose, for example, a deviated septum. The septum is the bone and cartilage that divides the nose into two nostrils. When this is bent to one side, either through injury or growth, it can lead to repeated infections and inflammation.

Pathophysiology Most commonly a viral upper respiratory infection causes rhinosinusitis secondary to oedema and inflammation of the nasal lining and production of thick mucus that obstructs the paranasal sinuses and allows a secondary bacterial overgrowth. There are frontal, maxillary, sphenoid, and ethmoid sinuses. Allergic rhinitis can lead to sinusitis also due to ostial obstruction. Ciliary immobility can lead to increased mucus viscosity, further blocking drainage. Bacteria are introduced into the sinuses by coughing and nose blowing. Bacterial sinusitis usually occurs after a viral upper respiratory infection and worsening symptoms after 5 days, or persistent symptoms after 10 days.

Sinusitis symptoms are more similar to some other Siddha diseases like Siddha classical text books Yoogi vaithiya sinthamani mentioned Netisoolai vatham & Nethra pavuthra vatham, Sarabenthira vaithiya muraigal Nasirogam mentined Muukuneerpaichal, Akathiyar gunavakadam mentioned Neerkovai and Pararajasekaram Siroroganithanam mentioned Kabala Peenisam & Kabalakanapu.

MATERIALS AND METHODS

Proposed Methods Study Population: The research work is carried out in patients with complaints of Kapalakkanapu.

Inclusion Criteria:

- Sex :Both sex • Age : Age between 16 - 45 years (Both Sex) • Sneezing • Headache • Peri orbital pain • Running nose • Ear pain/fullness • Nasal blockage • Eye irritation/swollen/watery
- Postnasal drip

Exclusion Criteria

- Age below 16 and above 45 years • Bronchial Asthma • Tuberculosis • Patients who are not willing for the study

Study design: Descriptive Study

Study type: Cross sectional study.

Study period: 4 months. Operational definitions: In this research, defined key feature of sample is patients with symptoms of Kapalakkanapu.

Sample size: 50 patients.

Sampling procedure: Convenient sampling.

Data collection Procedure: The information will be collected via In-depth interview by using questionnaire.

Ethical issues:

- There will be no infringement on the rights of the patient.
- The data collected from the patient will be kept strictly confidential. The patient will be informed about the study.
- After obtaining the written consent of the patient (through consent form in s their understandable language) they will be enrolled in the study.

Ethical Review

- Institutional Ethical Committee (IEC) of the University of Jaffna gave the clearance certificate before the community medicine project is initiated.
- Patient's information sheet and informed consent form was submitted along with project proposal for approval by IEC.

RESULTS

1. SEX

sex	no of members	percentage
male	18	36%
female	32	64%

2. AGE

age	no of patients	percentage
16-25	15	30%
26-35	26	52 %
36 -45	9	18%

3. OCCUPATION

occupation	no of patients	percentage
air & dust	27	54%
others	9	18%
non workers	14	28 %

4. DIET PATTERN

Diet Pattern	N of Patients	Percentage
Vegetarian	5	10%
Non Vegetarian	1	2 %
Mixed Diet	44	88%

5. H/O DISEASE

Disease	N of patients	Percentage
Separate	40	80%
With other diseases	10	20%

6. H/O DISEASE DURATION

Duration	N of patients	percentage
Acute	22	44%
Chronic	28	56%

7. FAMILY HISTORY

History	N of patients	percentage
Yes	11	22 %
No	39	78%

8. MEDICATION

Medication	N of patients	percentage
Allopathy medicine	21	42%
Siddha medicine	20	40%
Both	9	18%

9. DISEASE PREVALENCE (DAY/NIGHT)

Disease prevalence	N patients	Percentage
Day	24	48%
Night	16	32%
Both	10	20%

10. ETIOLOGICAL FACTORS OF SINUSITIS

10.1 EXPOSURE OF COOL AIR AND INTAKE OF COLD WATER

Exposure	No of patients	percentage
Yes	38	76%
No	12	24%

10.2. EXPOSURE OF DUST AND OTHER ALLERGENS

Exposure	N of patients	Percentage
Yes	46	92%
No	4	8%

10.3. POLLUTION IN LIVING AREA

Pollution	No of patients	percentage
Yes	21	42%
No	29	58%

10.4. SMOKING

Smoking	No of patients	Percentage
Yes	14	28%
No	36	72%

10.5. DISEASE PREVALENCE DURING LONG TRAVEL

Long travel	No of patients	percentage
Yes	26	52%
No	24	48%

10.6. ALLERGIC TO COSMETICS

Allergy	No of patients	percentage
Yes	20	40%
No	30	60%

10.7 DISEASE PREVALENCE DURING SWIMMING/ TREKKING

Swimming/trekking	patients	percentage
Yes	12	24%
No	38	76%

10.8 DISEASE PREVALENCE ACCORDING TO SEASONS

Seasons	No of patients	Percentage
Rain & winter season	21	42%
Winter season	18	36%
All seasons	11	22%

10.9. DISEASE AMONG NASAL SEPTAL DEVIATION/ NASAL POLYPS

Nsd/nasal polyps	No of patients	Percentage
Yes	26	52%
No	24	48%

DISCUSSION

Over all Distribution of Etiological Factors of in Kabalakkanapu Patients

1.Exposure of dust and other allergens 46-92%

2.Exposure of cool air and usage of cold water 38-76%

3.Nasal septal deviation/nasal polyps 26- 52%

4.Disease prevalence during long travel 24- 48%

5.Allergic to cosmetics 20- 40%

6.Pollution in Living area 21- 42%

7.Smoking 14- 28%

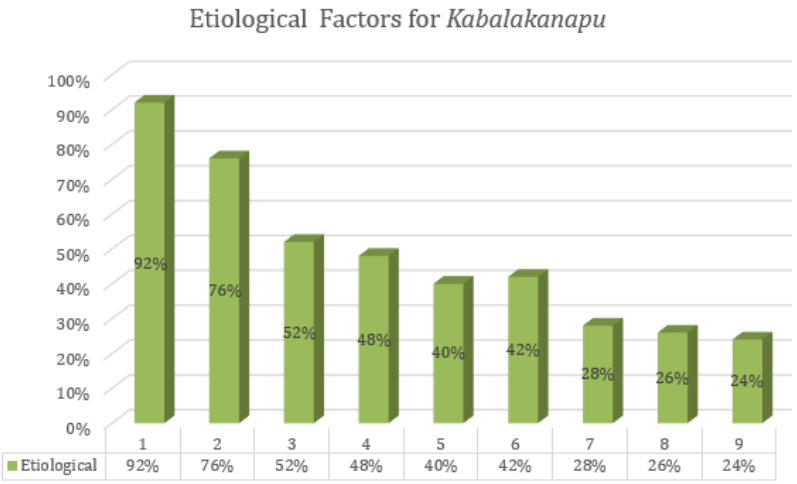
8.Family history 13- 26%

9. disease prevalence during swimming/trekking 12- 24%

According to this study, the majority of the people who are working in the dust and polluted area are mostly affected by sinusitis 92% of the people are affected due to the dusty jobs and 76% of the people are affected due to the exposure of cool air and intake of cold water.

Sinusitis is inflammation of the sinuses, which are air-filled cavities in the skull.

The etiology can be infectious (bacterial, viral, or fungal) or noninfectious (allergic) triggers.



This inflammation leads to blockade of the normal sinus drainage pathways, which in turn leads to mucus retention, hypoxia, decreased mucociliary clearance, and predisposition to bacterial growth.

- A wide range of biologically active agents (eg, histamine, tumor necrosis factor-alpha, interleukins, cell adhesion molecules) and cell types contribute to inflammation, which can manifest as venous engorgement, increased nasal secretions and tissue swelling/edema, ultimately leading to impaired airflow and the sensation of nasal congestion.
- Some facts about sinusitis, In today's modern, urbanized living conditions we are in constant touch with different kinds of pollutants. This ultimately leads to allergic conditions, some of which become chronic due to various factors like sinusitis. They interfere with day to day living.
- Over the past few years many research studies have been done on 'sinusitis' and still much research is going on. So, there are many studies proved that sinusitis main causes are dusty jobs, polluted area, high exposure to cold air and intake of cold water etc.

CONCLUSION

The results and observation were analyzed to various aspects showed that patients with H/O exposures to dust and other allergens, exposure to cool air and intake of cold water were caused Kapalakkanapu commonly. So, we should make awareness of various etiological factors of Kapalakkanapu to the patients first then only management of Kapalakkanapu can be easily avoided. From this study observations and analysis, we will create the knowledge about prevention and management Kapalakkanapu to the patients

REFERENCES

Mohammad Maqbool, and SahilMaqbool, Text book of ear, and throat disease. 11th edition, New Delhi: CBS Publishers & Distributors, p 3-130

Snell.s., clinical aatomyb y regions., Lippincott Williams &Wilkns., 8th edition., p 707.719

Perer Bull., and Ray Clarke., Lecture notes Diseases of the ear, nose, and throat. p 3.75

Keith L.Moore., and Anne M.R.Agur., Lippinctt Williams &Willkins., 402,408

Thibodeau.A, and Patton.T., Anatomy &Physiolog., Mosby 379-384

Parveen Kumar., and Michael Clark., Kumar and Clark clinical medicine., 7 th edition., p 1079,1080

Guyton.C.,andjohn.E.Hall., Text book of medical physiology., Saunders Publication., p 640- 662

KN Kuppusamymuthaliyar, SiddharPothuMaruthuvam, Directorate of Indian Medicine and Homeopathy Publications Chennai, India, 2004

Shanmugavelu M. Siddha maruthuva Noinaadal Noimudhalnaadalthiratu, part II, Directorate of Indian Medicine and Homeopathy Publications Chennai, India, 2003, 498.

Dr.S.P.Sami, Akathiyar Gunavakadam, Sivagana Yogikal S.K.Kumarasamipillai Publication, Palani(1973)

Sarabenthiravaithiya Muraigal, Dr.Venkadrajan,Thanjai Saraswathy Mahal Veliyeedu, p 61(1991)

Yugi maa muni. Yugivaithiyasinthamani, Chennai: Dept of homeopathy publication; 2005, p233 -335.

Ponnaiyah I. Pararasasegaram Kerppa roga n i t h a n a m , 4 t h e d . J a f f n a : Saivapragasayanthirasalai; 1935, p37-38.