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# SANDHIGATVATA (OSTEO-ARTHRITIS) - AN AYURVEDIC LITERATURE REVIEW

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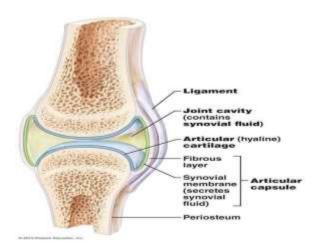
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### ABSTRACT

Janu Sandhigata Vata is one of the commonest Vata Vyadhi characterised by the symptoms of Shotha, which is palpable as air filled bag (Vata Purna Driti Sparsha) and Pain on flexion and extension of the joints (Akunchana Prasarane Vedana), all Dhatus undergo Kshya thus leading to Vata Prakopa and making the individual prone to many Vata Vyadhi. Among them Janu Sandhigata Vata is commonest disease seen in society, due to similarities in sign and symptoms, Osteoarthritis of knee can be very much correlated with Janu Sandhigata Vata. Osteoarthritis is age related, multifactorial degenerative disease of joints. Age, obesity, trauma and genetic factors play an important role in pathogenesis. The whole of the joint is involved in this disease leading to loss of articular cartilage which further leads to joint narrowing, subchondral sclerosis, sub chondral cyst formation and osteophytes formation. Potent analgesics and anti inflammatory drugs are available in the market, which can run the risk of producing side effects like gastric erosion, hepatic and nephro toxicity etc, even surgery also recommended by doctors. It's a limitation in contemporary science to provide a comprehensive effective management, so research work in Ayurveda has evident scope in this condition. This review purposes that the benefits summarizes the literature knowledge of the topic.

**KEYWORDS:** Sandhigatvata, osteoarthritis, ayurvedic literature etc.



# INTRODUCTION

Sandhigata Vata is one of the commonest disease seen in society. It is type of Vata Vyadhi characterised by pain on flexion, extension and swelling in joints in old age, all *Dhatus* undergo Kshaya, thus leading to Vata Prakopa and making the individual prone to many Vata Vyadhi among them Janu Sandhigata Vata is one of the commonest disease seen in society. Ayurveda is the science of life, a healthy and longevity is always desirable from it. These objectives lead to an improved quality of life for all people. Living in the 21<sup>st</sup> century has its own advantages but with fast and stressful lifestyle comes disadvantages also. One disadvantage is having unhealthy diet and faulty lifestyle. Around the world osteoarthritis, osteoporosis obesity and cardiovascular diseases are affecting the health status. The diseases osteoarthritis is a growing public health problem worldwide. Currently it is estimated that over 250 million people worldwide suffer from this disease.

In Ayurveda *Sandhivata* gets its entity in the Chapter of *Vatavyadhi* which is obviously are co related with neuromuscular disorder including disease of the joints. It is a type of degenerative and articular disorder affecting mainly in the weight bearing joints, in advancing age. Ayurveda recommends healthy lifestyle through *aahara*, *vihara*, *Aushadh* different kinds of karmas to prevent all kinds of disease.

Human body is composed of seven *dhatus*. The fifth one is *Asthi dhatu* Sequentially. Whole body resides on *Asthi dhatu*. *Vata* is situated in *Asthi* as *Ashraya-ashrayi* (interrelated) *bhava*. Vitiation of *vata dosha* in joints produces *Sandhigatavata*. It is an abnormal Stage that occurs in the fourth and fifth decade of life due to *Dhatushaya*(progressive decaying in the body structures resulting in various degenerative disorders) and injury, which limits everyday activities such as dressing walking bathing etc. thus making patient disabled, it being a *vatavyadhi*, located in *Marmasthisandhi* and its occurrence in old age makes it *Kashtasadhya*. *Sandhigatavata* is considered to be closely equivalent to OA in modern medical science.

Sandhigatvata is a major social problem affecting the weight bearing joints, after described as "Wear and tear" arthritis. It is described as one of the main Vatavyadhis in Ayurveda. As the Name suggests the Sandhi or joint, are affected all over the body initially starting with main weight bearing joints the knee it Sandhi is the Kapha Sthana. Due to Nidanas Vataprakopa takes place in the Sandhivata aggravates due to its own Vitiating factors occupies all Rikta Strotas & generated various vatavyadhi & Sandhigatvata is one of them.<sup>[11]</sup>

Osteoarthritis can affect any joint, but it most often in weight bearing joints. It is a degenerative, "wear-and-tear" type of arthritis having multifactor aetiology that occurs most often in people 50 years of age and older, but may occur in younger people, too. The prevalence is more common among women esp. menopausal.<sup>[2]</sup>

In osteoarthritis, there is variable degree of inflammation without systemic effect. The cartilage in the joint gradually wears away. As the cartilage wears away, it becomes frayed and rough, and the protective space between the bones decreases. This can result in bone rubbing on bone, and produce painful bone spurs. Causes joint pain, limitation of movement, tenderness, crepitus, and occasionally joint effusion can occur. Knee arthritis can make it hard to do many everyday activities, such as walking or climbing stairs. It is a major cause of lost work time and a serious disability for many people.

**Objective** - to study the literature review of Sandhigatvata through Ayurveda.

# Ayurvedic review of Sandhigatvata

Sandhigata Vata is a condition in which vitiated Vayu gets localized in Sandhi and causes symptoms such as Shotha, Akunchana Prasaranae Vedana, Vata Purna Driti Sparsha.<sup>[1]</sup> Acharya Sushruta.<sup>[2]</sup> added Sandhi Shoola, Atopa, Sandhi Hanti, hence Janu Sandhiagata Vata is a Shool and Shotha Pradhan Vyadhi hampering the daily activities, as Sandhi comes under Madhyama Roga Marga thus Vata Dosha and Dhatu Kshya figures disease Kastha sadhya.<sup>[3]</sup> It is one of the end result of poor eating habits and irregular life style which is responsible for early degenerative changes in body tissue and play a vital role in the manifitation of such degenerative disorder. Going through these symptoms it was found that similar symptoms of Osteoarthritis are described by modern science, *Janu Sandhigata Vata* can be compared with knee Osteoarthritis.

#### Etymology

The term Janu- Sandhigata Vata has its origin from a combination of four words viz – 'janu' 'Sandhi' 'Gata' 'Vata'.

### Janu –

Nirukti -*Uru Janghay* or *Madhya Bhaga* (*Shabda Stoma Mahanidhi*) The word *Janu* mean is the junction that lies between *Uru* and *Jangha*.

#### Sandhi

Nirukti – Asthisanyogosthane (Vaidyaka Shabdh Sindhu)

According to Vachaaspatyama

The word *Sandhi* is derived from the root '*dha*' when prefixed by '*Sam*' and suffixed by '*ki*' gives rise to the word *Sandhi* which means the union or joint.

By view of etymology, the union of many organs to each other is called as *Sandhi*, so here,for a special aim, the *Sandhi* of *Asthis* have been described.

### Gata

The word '*Gata*' gives two meanings. One is related with site hence in case of *Janu Sandhigata Vata*, it denotes the site in which provoked *Vata* is situated.

The term *Gata* is derived from the root '*Gam*' which means gone to, situated in, directed toarrived at.

#### VATA

The term Vata is originated from the root Va - Gatigandhanaya'

When suffixed by '*ktan*' gives rise to word *Vata* which means to blow to go to move tosmell, to strike ,to hurt, to enlighten.

Thus, Sandhigata Vata mainly having two part

- 1. Sandhi-anatomical aspect
- 2. Vat –physiological aspect

# Nidana Panchaka of Sandhigata Vata

The knowledge of disease is obtained by the study of *Nidana, Purvarupa, Rupa, Upashaya, Samprapti* which are termed as *Nidana Panchaka*.

#### Hetu

In classics no specific *Nidana* has been mentioned for *Sandhigata Vata*. As *Sandhigata Vata* is a *Vata Vyadhi*, general *Hetu* of *Vata Vyadhi* can be taken as *Hetu* of *Sandhigata Vata*.<sup>[20]</sup>

Aharaja: Atiruksha, Atishita, Atialpa, Atilaghu, Abhojan.

Viharaja: Atiprajagaran, Divasvapna, Ativyavaya, Vegasandharan, Plavana, Atiadhva, Ativyayam, Vichesta, Sigrayangamana, Yanavatansana.

Manas: Atichinta, Atishoka, Atikrodha, Atibhaya.

Others: Langhan, Amad, Vishamad Upacharad, Dhatunam Sankshyad, Doshashruk Sravanad, Rogatikarshanad, Marmaghat

# Purvarupa

*Purvarupa* indicates the disease which is going to occur in the future. It occurs in the *Sthanasanshraya* stage of *Satkriyakala*. Like *Hetus*, no clear *Purvarupa* of the disease *Sandhigata Vata* is mentioned in the classics, hence *Purvarupa* of *Vatavyadhi* can be taken as *Purvarupa* of *Sandhigata Vata*. Acharya Charaka.<sup>[21]</sup> has quoted that *Avyakta Lakshanas* of *Vata Vyadhi* are to be taken as its *Purvarupa*.

Commentator Vijayarakshita explains the term *Avyakta* as the symptoms which are not manifested clearly.Hence mild of occasional *Sandhi Shoola* or *Shotha* prior to the manifestation of disease *Sandhigata Vata*.<sup>[23]</sup>

Roop (Symptoms of Sandhigata Vata)

- Sandhi Shoola In case of Vata situated in Sandhi gives rise to Sandhi Shoola.It is stated that without Vata Shoola does not occur. Shoola is the chief symptoms of Prakupit Vata. It is obvious to experience Shoola in the diseases which are dominatedby Vata.
- 2. Sandhi Shotha: Dosha Sanchaya in specific site is the main causative factor for Sotha. In Sandhigata Vata, Prakupita Vata gets enlodged in Sandhi where Srotoriktata already exists. So there is wide scope of Vata to get accumulated there resulting in Sotha. Here Vatapurna Druti Sparsha type of Sotha has been described by Acharya Charaka. As Sotha is Vatic type, on palpation the swelling is felt like a bag filled with air. (Vatapurna Druti Sparsha) Acharya Madhavakara has given a new name i.e. Atopa
- 3. Hanti Sandhi Gatah: First Sushruta explains this symptom followed by Madhavakar while commenting on this word, Dalhana and Gayadas explain it as inability to flexion and extension. However, this symptom may not to be seen in early stages. When the disease aggravates the vitiated Vata may produce inability of movements. In Commentator Madhukosha Commentary, Vijayarakshita has given two meanings of Hanti Sandhigata. One is Sandhivislesha and the other is Sthambha.<sup>[27]</sup> Here Sandhivislesha occurs due to Prakupita Vata located in Sandhi. Stambha means immobility as defined by Dalhana. Arundatta explained stambha as less or loss of flexion and other movements. Gati is unique feature of Vata and in Sandhigata Vata, this Gati is obstructed because of Sanga type of Srotodusti. This gives rise to

*Stambha Vata* also increased *Shita Guna* of *Vata* is responsible for *Sthambha*.

- 4. Akunchan Prasaranayoh Vedana: Acharya Charaka has shown this symptom. Sandhi is made to perform the function of Akunchana and Prasarana.When Prakupita Vata gets located in Sandhi, it hampers the normal function of Sandhi which results in Vedana during Akunchana and Prasarana.
- 5. Sandhi Sphutana: This symptom is not mentioned in our classics directly. In allopathy texts, it is mentioned clearly as crepitation - Sandhisphutana. Sandhigata Vata is localised Vata Vyadhi in which Prakupita Vata affect Sandhi. This Sthana Sansraya is result of Srotoriktata present at Sandhi. This symptom may occur due to Vatasanga<sup>28</sup> in Sandhi.
- 6. Atopa: This symptom is mentioned by *Madhavakara* only, usually *Atopa* is refered to *Gudagudayana* (borborygmi) heard in *Udara Pradesh*.In the context of *Sandhigata Vata Atopa* may be considered as crepitus on movement of joint.

# Samprapti

Charaka explains Sandhigatavata occurs due to accumulation of vata in strotas results in rukshata, parushta and kharata which is typical lakshana of Dhatukshayjanya Sandhigatavata.

### Samprapti Ghataka

Nidana<sup>[38]</sup> – Vata Prakopaka Nidana Dosha – Vata esp. Vyanavayu, Shleshaka Kapha Dushya – Asthi, Majja, Meda Srotas – Asthivaha, Majjavaha and / or Medovaha Srotodusti – Sanga Agni – Manda Dosha Marga – Marmasthi Sandhi Roga Marga – Madhyam Udbhavasthana – Pakvashaya Vyaktisthana – Asthi-Sandhi

#### Prognosis (Sadhya-Asadhyata)

*Rogas* are classified included *Sadhya* and *Asadhya* basically. The *Sadhya* group again is divided into *Sukha Sadhya* and *Krichhrasadhya*.<sup>[39]</sup> *Sandhigata Vata* is one of the *Vata Vyadhi* described in all *Samhita* and *Sangraha Grantha. Acharya Vagbhata*,<sup>[40]</sup> and *Sushruta* have considered *Vata Vyadhi* as *Mahagada. Dhatukshya* is the chief cause of *Vatavyadhi. Dhatukshya* is difficult to treat as *Acharya Vagbhatta* has elaborated that since body is accustomed to *Mala, Dhatukshya* is more troublesome than *Dhatu Vriddhi. Sandhigata Vata* is one of the *Vata Vyadhi*, therefore it is *Kastasadhya*.

# Chikitsa

Withdrawl from the primary causative factor is considered as the most basic approach in the management of the disease,by the *Nidana Parivarjana Pravriddha Dosha's* may not be increased by *Prakriti* itself, *Vikara* will get subside, secondaly,the intensity of

Specific *Pathya* and *Apathy* of *Sandhigata Vata* are not mentioned but as being a *vata Vyadhi*, we should adopt

the same of general Vata Vyadhi. The list of some

the *Dosha Prakopa* should be considered before deciding the line of treatment.

The elimination of the disease can be achieved by

- Nidana Parivarjanam
- Samshaman
- Samshodhana

### Pathya-Ahara described for Vata Vyadhi in Ayurvedic text.

Varga	Dravya
Annavarga	Godhuma ,masha,raktashali,kulattha
Dugdhavarga	Gaudugdha,aja dugdha,ghrita
Phalavarga	Draksha,badara,amra.madhuka
Jalavarga	Ushna jala, shritashita jala
Madyavarga	Sura,madira,surasava,amalakanjika
Mamsavarga	Kukkuta,mayura,chataka,nakra,matsya,varaha
Mutravarga	Go(cow),aavika,ashva,hasti mutra
Rasavarga	Madhura,amal,lavana
Shakavarga	Patola,shigru,rasona,jivanti
snehavarga	Taila,vasa,majja,ghrita

Pathya-Apathya

Pathya- Apathy is as below

### Pathya Vihara

Atapa Sevana, Mridushayya, Ushnodaka Snana etc

#### Pathya Aushadha

- Rasna, Shunti, Bilva, Gokshira, Agnimantha, Rasona, P alandu etc
- Brimhana, Samshamana, Abhyanga, Mardana, Avagahana, Upanaha, Nasya, Basti,Agnikarma etc.

#### Apathya Vihara

Chinta, Jagarana, Vega, Sandharana, Shrama, Anashana, Vyavaya, Vyayama, Pravata, Chankramana, Kathina Shayya, Yana Gamana etc.

#### Apathya Aushadha

Vamana and Raktamokshana.

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