



Gridhrasi (Sciatica): A Comprehensive Review of Etiopathogenesis and Ayurvedic Management

Dr B. N. Gadve⁽¹⁾ Dr. Yogesh Ganesh Kapse⁽²⁾

1. Professor & H.O.D. Department of Shalyatantra, C.S.M.S.S. Ayurved Mahavidhyalaya, Ch. Sambhajinagar, Maharashtra, 431011.

2. PG Scholar, Department of Shalyatantra, C.S.M.S.S. Ayurved Mahavidhyalaya, Ch. Sambhajinagar, Maharashtra, 431011.

Abstract

Gridhrasi is one of the significant *Nanatmaja Vata Vyadhi* mentioned in Ayurvedic classics. Radiating pain that begins in the hip area and progressively spreads to the lower limb is its primary characteristic. The clinical presentation of *Gridhrasi* closely resembles the condition known as sciatica in modern medicine. Sciatica is frequently brought on by disorders such as degenerative spinal disorders, spinal stenosis, and intervertebral disc prolapse that compress or irritate the sciatic nerve. Low back pain and sciatica have become much more commonplace globally due to the rise in sedentary lifestyles, bad posture, and work-related stress. According to Ayurveda, *Gridhrasi* is a disorder predominantly brought on by *Vata Dosh* vitiation, which is occasionally linked to *Kapha Dosh*.

The etiological factors, pathogenesis, characteristics, and management principles of this condition all of them are thoroughly described in classical Ayurvedic texts. *Gridhrasi* is treated with *Nidana Parivarjana* (avoidance causative factors), *Shamana* therapy using different herbal formulations, and *Shodhana* therapy using *Basti* and *Virechana*. For pain relief and increased mobility, panchakarma techniques such as *Abhyanga*, *Swedana*, *Kati Basti*, and *Patra Pinda Sweda* are also advised. The goal of this review is to critically examine *Gridhrasi's* traditional Ayurvedic concepts and compare them with contemporary knowledge of sciatica. The therapeutic potential of Ayurvedic interventions in the treatment of this condition is also highlighted in the article. Combining lifestyle changes with Ayurvedic treatment principles may offer a comprehensive and successful strategy for managing *Gridhrasi* and enhancing patients' quality of life.

Keywords: Ayurveda, *Gridhrasi*, *Sciatica*, *Vata Vyadhi*, *Panchakarma*.

Introduction

Dosha, *Dhatu*, and *Mala* constitute the foundational elements of the body⁽¹⁾. Ayurvedic principles state that maintaining health is dependent on the balance of *Dosha*, *Dhatu*, *Mala* and *Agni*⁽²⁾. The nervous and musculoskeletal systems are dependent significantly on *Vata Dosh*, among the three *Doshas*. Any disruption in the *Vata Dosh* can result in a number of conditions that impact neurological, sensory, and motor functions⁽³⁾.

Severe radiating pain that starts in the hip area and travels down the posterior aspect of the thigh, knee, leg, and foot is the hallmark of the condition⁽⁴⁾. The name *Gridhrasi* is derived from the word "*Gridhra*," which means vulture, because the gait of the patient resembles that of a vulture due to severe pain and difficulty in walking.

In modern medical practices, *Gridhrasi*'s clinical characteristics are very similar to those of sciatica, a disorder marked by pain that radiates along the sciatic nerve. Sciatica is frequently linked to degenerative disc disease, lumbar disc herniation, spinal stenosis, or nerve root compression. Sciatica is one of the most common causes of disability and decreased quality of life, The prevalence of sciatica ranges between 3.8% in the working population to 7.9% in nonworking population and is one of the most common causes of disability and reduced quality of life⁽⁵⁾.

Through a variety of therapeutic modalities, such as *Panchakarma* therapies and herbal medications, Ayurveda provides a thorough and all-encompassing approach to the management of *Gridhrasi*.

The goal of this review is to examine the traditional Ayurvedic accounts of *Gridhrasi*, including its etiopathogenesis, clinical characteristics, and treatment, and to compared these concepts with the current knowledge of sciatica.

Aim and Objectives:

Aim:

To review *Gridhrasi*, an Ayurvedic concept, and how it relates to the current sciatica condition.

Objectives:

1. To examine how *Gridhrasi* is traditionally described in Ayurvedic literature.
2. To compare *Gridhrasi* to sciatica as it is defined in contemporary medicine.
3. To review Ayurvedic therapeutic approaches for the management of *Gridhrasi*

Materials and Methods:

The current study is a narrative review that draws from both contemporary scientific publications and traditional Ayurvedic literature. *Gridhrasi*-related references were gathered from classical texts and their commentary.

Review of Literature

Historical Review

Gridhrasi has been described in various Ayurvedic classics as a disorder caused by vitiation of Vata Dosha affecting the lower limbs. The condition is characterized by pain radiating from the hip region to the foot along with stiffness and difficulty in walking.

Classical texts describe *Gridhrasi* under the category of *Vata Vyadhi*⁽⁶⁾. The condition is explained with detailed descriptions of its etiological factors, symptoms, and treatment modalities.

Nidana (Etiological Factors)

According to the treatment point of view, knowledge of *Nidana* is most important because of the first principle of Ayurvedic treatment is to avoid *Nidana* and then treat according to the disease characters⁽⁷⁾.

Nidanas are classified under the two captions viz. 1) *Samanya* and 2) *Vishesha*.

There is no specific *Nidana (Hetu)*, have been mentioned of *Gridhrasi vyadhi*.

According to Ayurveda, the causative factors responsible for the vitiation of *Vata Dosha* play an important role in the development of *Gridhrasi*.

<i>Aharaja</i>	<i>Viharaaja</i>	<i>Manasika</i>	<i>Agantuja</i>	<i>Anya hetu</i>
<i>Ruksha, Laghu, Sheeta, Vishtambhi Dravya</i>	<i>Ativyayama, Atiprajagarana</i>	<i>Kama, Krodha, Bhaya</i>	<i>Abhighata, Marmaghata</i>	<i>Ati Raktastrava</i>
<i>Excessive Tikta, Katu, Kashaya rasa are vata prakopaka</i>	<i>Atipalavana, Dukhasana,</i>	<i>Shoka, Chinta,</i>	<i>Gaja Apatamasana, Ushtra Aptamasana, Ashwa Apatamasana</i>	<i>Dosha Atistrava</i>
<i>Alpashana, Langhana</i>	<i>Diwaswapa, Hima and Sheeta sevana.</i>			

Table No.1.: Gridhrasi Nidan ⁽⁸⁾

रूक्षशीताल्पलघ्वन्नव्यवायातिप्रजागरैः।

विषमादुपचाराच्च दोषासृक्स्रवणादति ॥१५॥

लङ्घनप्लवनात्यध्वव्यायामातिविचेष्टितैः।

धातूनां सङ्ख्याच्चिन्ताशोकरोगातिकर्षणात्॥१६॥

Common causes are too much physical activity, standing for too long, bad posture, trauma, and eating and living in ways that make Vata worse.

Eating too much dry, cold, and light food may make *Vata Dosha* worse. In the same way, lifestyle choices like not getting enough sleep, traveling too much, and not giving in to natural urges can also make *Vata* worse.

In contemporary medicine, the causative factors of sciatica encompass lumbar disc herniation, spinal stenosis, degenerative disc disease, and compression of the sciatic nerve roots. Occupational factors, including prolonged sitting, heavy lifting, and inadequate ergonomics, significantly contribute to the onset of sciatica.

Samprapti (Pathogenesis)

Samprapti Ghatak ⁽⁹⁾

- **Dosha:** *Vata and Vatanubandhi Kapha*
- **Dushya:** *Rasa, Rakta, Mamsa, Meda, Asthi and Majja, Sira, Kandara, Snayu*
- **Srotasa:** *Rasavaha, Raktavaha, Mamsavaha, Medovaha and Asthivaha, Majjavaha*
- **Srotodushti:** *Sanga, Margavarodha*
- **Agni:** *Jatharagni and Rakta, Mamsa, Meda, Asthi and Majja Dhatvagnimandya*
- **Ama:** *Jatharagni and Dhatvagnimandyajanya*
- **Adhithana:** *Kandaras of Parsani, Pratyanguli and Sphika, Kati, Uru, Jangha, Pada*

Conventionally the *Samprapti* can be categorizes in two types.

1) *Samanya (General) Samprapti:*

This is a common pathogenesis among various types of a single disease.

Consuming *Vatakara Aahara* and *Vihara* vitiates *Vata Dosha*, which lodges in *Rikta Strotasa*, or *Strotas*, where *Shunyata* of *Snehadi Guna* is present and causes diseases related to that *Strotas*. *Dhatukshaya* and other *Samprapti* of *Vata Vyadhi* aggravate *Vata*, which spreads throughout the body and settles in *Rikta Strotas*. According to Acharya Vagbhata, this further vitiates the *Strotas* and causes *Vata Vyadhi* to manifest ⁽¹⁰⁾.

2) *Vishesh (Specific) Samprapti:*

This is a specific pathogenesis for a particular subtype.

Vataj Gridhrasi: Charaka states that the symptoms of *Stambha*, *Ruka*, *Toda*, and *Muhu Spandana* are produced independently by *Vata Prakopa* or *Vata Vriddhi*.

Vata Prakopa Ahara Vihara aggravates *Vata* while simultaneously suppressing *Snigdha*, *Guru*, *Mrudu*, *Pichhila*, and *Sandra Guna* of *Kapha* through *Ruksha*, *Khara*, *Laghu*, *Sheeta*, *Daruna*, *Vishada*, and *Chala Guna* of *Vata*. This reduces *Sleshma*.

reduction of *Sleshma* and substitution of vitiated *Vata* in *Prustha*, *Kati*, *Sakthi*, and *Kandara*. Thus, the symptoms of *Stambha*, *Ruka*, *Toda*, *Spandana* in *Kati*, *Prustha*, *Uru*, *Janu*, *Jangha*, and *Pada* are produced by *Vata*, which is located in *Kandara* ⁽¹¹⁾.

Vata Kaphaja Gridhrasi: During the description of *Vata-Kaphaja Gridhrasi*, Acharya Charaka explained the symptoms - *Arochaka*, *Tandra* and *Gaurava* in addition to the *Vataja* symptoms ⁽¹²⁾. In addition to *Vata Prakopaka Nidana*, *Kapha Prakopaka Nidana* produces *Agnimandya*, which frequently results in the accumulation of *Ama*. The *Agni* of *Rasa Dhatu* is also impacted by this condition, which leads to the abundant production of *Kapha* as *Mala* of *Rasa Dhatu*.

According to the *Vataja* type of *Gridhrasi*, *Prakupita Vata* does not repress the *Kapha* in this *Samprapti*. Here, *Agnimandya* is also bound by *Prakupita Vata*, which eventually aids in the accumulation of *Kapha*.

Conversely, *Nidana Sevana* causes *Kha-Vaigunya* in *Kati*, *Prustha*, *Sakthi*, and *Kandara*. As a result, both vitiated *Vata* and *Kapha* spread and become localized at the location of *Kha-Vaigunya* ⁽¹³⁾. *Vata-kaphaja Gridhrasi* symptoms are caused by *Sthansamshraya*, a condition where vitiated *Vata* is cloaked by *Kapha*.

According to modern theory, sciatica is caused by compression or irritation of the sciatic nerve roots in the lumbar spine. Herniated discs, the development of osteophytes, or narrowing of the spinal canal can all cause this compression.

Purva Rupa

The *Purva Rupa* appears in the fourth stage of *Kriyakala* i.e. *Sthana Sanshraya stage* ⁽¹⁴⁾.

पूर्वरूपमेव स्थानसंश्रयलिङ्गं | यदुक्तं “स्थानसंश्रयिणः क्रुद्धा भाविव्याधिप्रबोधकम् दोषाः कुर्वन्ति यल्लिङ्गं पूर्वरूपं तदुच्यते इति | तच्च दोषगमकं भाविव्याधिगमकं च॥

Lakshana (Clinical Features) *Purvarupa* of *Vata Vyadhi* are *Avyakta lakshanas*. *Purvarupas* are unclear because of less serious causative factors, according to Acharya Charak ⁽¹⁵⁾.

Thus, the *Purvarupas* of *Gridhrasi* cannot be evaluated by our Acharyas.

Types of *Gridhrasi* ⁽¹²⁾

Ayurveda describes two main types of *Gridhrasi*:

Vataja Gridhrasi

This type is predominantly caused by *Vata Dosha* and is characterized by severe pain, stiffness, and difficulty in movement.

Vata-Kaphaja Gridhrasi

This type involves both *Vata* and *Kapha Dosha* and is characterized by heaviness, stiffness, and additional symptoms such as drowsiness and loss of appetite.

Rupa:

Generally speaking, one of the main symptoms of *Gridhrasi* is a radiating pain that starts in the lumber area, travels to the buttocks, descends to the foot, and travels along the sciatica nerve.

These symptoms correspond closely with the clinical presentation of sciatica described in modern medicine.

Vataja Gridhrasi

Ruk (pain), *Toda* (prickling sensation), *Stambha* (stiffness), and *Muhuspandana* (twitching) were all mentioned by Charaka in *Sphik* and radiating towards the *Kati*, *Pristha*, *Pada*, *Jangha*, *Uru*, and *Janu*, in that order. These are *Vataja's* cardinal symptoms of *Gridhrasi* ⁽¹⁶⁾.

Vata-Kaphaja Gridhrasi

In addition to the previously discussed symptoms, the *Vatakaphaja* type of *Gridhrasi* also exhibits *Tandra* (Torpor), *Gaurava* (Heaviness), and *Arochaka* (Anorexia) ⁽¹⁷⁾.

Madhava also explains the *Dehasya*, forward bending of the body *Pravakrata* (bending the body forward), quivering sensation and stiffness in *Janu*, *Kati* and *Uru Sandhi* (*Spuranam* and *Stabdhat*) in *Vatika Gridhrasi* ⁽¹⁸⁾ and *Vata Sleshma Gridhrasi* may associated with *Tandra*, *Agnimandya* (loss of appetite), (slumber), *Mukha Praseka* (too much salivation) and *Bhaktadweshha* (dislike of food) ⁽¹⁹⁾.

Differential Diagnosis

1. *Gridhrasi* causes a noticeable radiating pain that starts in the buttocks and travels down the sciatic nerve to the feet. which is absent in other disease like *Urustambha*. (*Gridhrasi* is a sensory loss and *Urustambha* is motor loss), *Khalli* etc.

स्फिक्पूर्वा कटिपृष्ठोरुजानुजङ्घापदं क्रमात् ।

गृध्रसी स्तम्भरुक्तोदैर्गृह्णाति स्पन्दते मुहुः ॥ (ch.chi 28/57)

वाताद्वातकफात्तन्द्रागौरवारोचकान्विता ।

खल्ली तु पादजङ्घोरुकरमूलावमोटनी ॥

2. *Sakthikshepa* is restricted in *Gridhrasi*, while patients in *Urustambha* experience thigh heaviness and difficulty walking ⁽²⁰⁾.

3. *Jwara*, *Chhardi*, *Aruchi*, *Agnimandya*, and others that are not typically found in *Gridhrasi* are linked to *Urustambha* ⁽²⁰⁾.

4. Pain in *Khalli* is typically proximal in nature and will be more severe than in *Gridhrasi*.

5. The primary symptom in *Khanja* and *Pangu* is paralysis, which may only occur as a late complication in sciatica. *Khanja* and *Pangu* may not have a history of pain.

Ayurvedic Management

The management of *Gridhrasi* in Ayurveda focuses on pacifying *Vata Dosha* and removing obstruction in the channels.

Nidana Parivarjana

According to Sushruta, *Nidana Parivarjana* is the primary treatment for all illnesses ⁽²¹⁾. Excessive indulgence in causative factors (*Nidana Sevana*) causes *Mandagni* and aggravates *Vata Dosha* in *Gridhrasi*. Therefore, avoidance of causative factors is the first step in the management of *Gridhrasi*. Patients are advised to avoid excessive physical exertion, improper posture, and *Vata*-aggravating diet and lifestyle practices.

Chikitsa Sutra (treatment principle) of *Gridhrasi* involves *Basti Karma*, *Siravedha*, and *Agnikarma Chikitsa* ⁽²²⁾.

अन्तराकण्डरागुल्फं [१] सिरा बस्त्यग्निकर्म च ।
गृध्रसीषु प्रयुञ्जीत खल्ल्यां तूष्णोपनाहनम् ॥१०१॥

Secondly the intensity of the *Dosha Prakopa* should be considered before deciding the line of treatment. If the *Dosha Prakopa* is minimum *Langhana* Chikitsa is enough, if the intensity of *Dosha Prakopa* is moderate then *Langhana* and *Pachana* treatment should be given. If, *Doshas* are in *Prakopa Avastha*, *Shodhana* treatment should be decided ⁽²³⁾.

- **Basti Chikitsa in *Gridhrasi***

Pakwashaya is thought to be the main seat of *Vata Dosha*. Even though *Vyana Vata* is mostly vitiated in *Gridhrasi*, *Basti Chikitsa* is a good way to control *Vata* throughout the body. Classical texts refer to *Basti* as “*Ardha Chikitsa*” for *Vata* disorders, which shows how important it is ⁽²⁴⁾. Thus, *Basti* is the most important *Panchakarma* therapy for treating *Gridhrasi* because it can calm and balance aggravated *Vata Dosha* in a way that no other therapy can.

Niruha Basti (Asthapana Basti): Decoction-based *Basti* like *Erandamuladi Niruha Basti* and *Dashamuladi Niruha Basti* work very well to get rid of bad *Doshas* and ease symptoms.

Anuvasana Basti: Oil-based *Basti* using *Vatahara Tailas* like *Bala Taila*, *Ksheerabala Taila*, *Prasarani Taila*, and *Mulaka Taila* provides nourishment, lubrication, and sustained pacification of *Vata*.

- ***Snehan***

People use *Sneha* on the outside for things like *Abhyanga*, *Pariseka*, and *Avagaha*. *Sparsanendriya* is the place in which *Vata* lives. *Abhyanga* is good for *Vata* because it is done on the skin. *Abhyanga* stops the process of getting older. So, it can slow down the process of degeneration that is happening in different *Dhatus* (especially the spine, the sciatic nerve, and the muscles of the lower extremities in *Gridhrasi*).

Taila is said to be the best for *Vata* because *Vata* is *Ruksha*, *Sheeta*, *Laghu*, and *Khara*, while *Taila* has the opposite qualities, such as *Snigdha*, *Ushna*, *Guru*, and *Pichila*. So, *Taila* helps *Vata* without making *Kapha* worse because it is *Ushna* ⁽²⁵⁾.

- ***Swedan***

Charaka says that *Snehana* and *Swedana* make dry wood soft and flexible ⁽²⁶⁾. The same thing happens to the human body. *Gridhrasi* (sciatica) is suitable for *Swedana* therapy as it manifests symptoms such as pain (*Shoola*), stiffness (*Stambha*), contraction (*Sankocha*), and numbness (*Supti*).

Gridhrasi is mostly a *Vata* disorder, but it can also be a *Kapha* disorder. *Swedana* is helpful because it helps with both *Vata* and *Vata-Kapha* conditions ⁽²⁷⁾. It works especially well to ease pain, which is the main sign.

Nirgundi Patra Pinda Sweda is especially helpful because it has both oleation (*Snehana*) and sudation (*Swedana*) effects, which can help with pain and stiffness.

Siravedha and Agnikarma

In Charaka Samhita *Siravedha* and *Agnikarma* (between *Antar Kandara* and *Gulpha*) has been advised ⁽²⁸⁾. Sushruta has advised *Siravedha* at *Janu* after flexion ⁽²⁹⁾. Astanga Sangraha and Astanga Hridaya have also advised *Siravedha* four *Angula* above the *Janu* ⁽³⁰⁾.

Agnikarma: Sushruta and Vagbhata assert that in the treatment of *Sira*, *Snayu*, *Asthi*, and *Sandhigata Vyadhi*, *Agnikarma* is prescribed, with *Gridhrasi* being one of the associated diseases.

Discussion

Gridhrasi is a *Shoola Pradhana Vyadhi* predominantly caused by *Vata Dosha* vitiation due to improper diet and lifestyle. The aggravated *Vata* hampers the nourishment of *Majja* and *Meda Dhatus*, leading to involvement of *Rasa*, *Rakta*, *Asthi*, and *Majja*. Among these, *Asthi Dhātu* is mainly affected, resulting in its weakness, especially in the *Kati*, *Sphik*, and *Janu* regions. Localization of vitiated *Vata* in the *Kati Pradesh* leads to vitiation of *Nadi*, *Snayu*, and *Kandara*, producing classical symptoms like *Ruk* (Pain), *Toda* (Pricking), and *Stambha* (Stiffness).

Agnimandya contributes to *Ama* formation, causing *Srotorodha* and obstruction of *Vata* movement, which further aggravates the disease.

Clinically, *Gridhrasi* can be correlated with sciatica, where pain radiates along the sciatic nerve due to nerve compression or irritation, commonly associated with lumbar disc pathology.

Ayurveda recommends both *Shodhana* and *Shamana Chikitsa* for management. Therapies like *Snehana*, *Swedana*, *Virechana*, and especially *Basti* play a key role in pacifying *Vata* and relieving symptoms. Thus, a combined therapeutic approach effectively breaks the pathogenesis and improves patient quality of life.

Conclusion:

Gridhrasi has grown more common in recent times because people are less active and eat more *Vata-Prakopaka Ahara* and *Vihara*. The disease is primarily based on *Vata Vaigunya*, which is an important part of its cause and development. So, management should work to fix this underlying imbalance.

Ayurvedic treatment focuses on both *Shodhana* and *Shamana Chikitsa*. *Shodhana* therapy helps get rid of the bad *Doshas* through the right channels, which treats the disease at its source. *Shamana* therapy, on the other hand, helps calm down the remaining *Doshas* and gives symptomatic relief.

In order to effectively treat *Gridhrasi*, it is important to use both *Shodhana* and *Shamana* therapies together. This will help restore *Dosha* balance, keep it from coming back, and improve the patient's overall quality of life.

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