



Efficacy Of Marma Chikitsa In Treating Gridhrasi (Sciatica): A Case Study

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Abstract

Ayurveda is an ancient health science focused on reducing human suffering and promoting overall wellness. Ayurveda's classification of 107 critical points in the body, known as Marma, as outlined by Acharya Sushruta. Marma is formed by the convergence of Mansa (muscle), Sira (vessels), Snayu (nerves, tendons and ligaments), Asthi (bone), and Sandhi (joints). Marma Chikitsa is a treatment that focuses on specific vital points to redirect Pranna (the body's vital force). Stimulating a Marma point can induce biochemical changes in the body, prompting the production of healing neurochemicals. Low back pain affects 65% to 85% of people during their lifetime, while sciatica is less common, affecting 2% to 5%. Acharya Charaka classifies Gridhrasi into two categories: Vataj and Vatakaphaja. Vataj Gridhrasi is characterized by pain originating in the buttock (Sphik) and extending to the lower back (Kati), back (Prushta), thigh (Uru), knee (Janu), calf (Jangha), and foot (Paada), along with stiffness (Stambha), pain (Ruka), pricking sensation (Toda), and twitching (Spandana). Vatakaphaja Gridhrasi includes symptoms such as anorexia (Aruchi), drowsiness (Tandra), and heaviness (Gaurava). Treatment of Gridhrasi involves manipulating the Marma points Kshipra Marma, Gulpha Marma, Indravasti Marma, Janu Marma, Ani Marma, Urvi Marma, Nitamb Marma, Katiktarun Marma, Kukundar Marma. Each point is stimulated in sync with breathing, approximately 18 times per minute. Marma Chikitsa is administered every other day for a two-week period.

Keywords- Ayurveda, Gridhrasi, Marma chikitsa, sciatica

Introduction

Gridhrasi is classified among the 80 types of Nanatmaja Vyadhi, which involve only Vata Dosha. The term "Gridhrasi" describes a gait resembling that of a vulture. Acharya Charaka classifies Gridhrasi into two categories: Vataj and Vatakaphaja. The main symptoms of Vataj Gridhrasi include pain with a pricking sensation(Toda), stiffness(Stambha), and recurrent twitching(Spandana) in areas such as the buttocks, lower back, thigh, back of the knee, calf, and foot respectively[1]. When Kapha is associated with Vata, additional symptoms may include drowsiness, a sensation of heaviness, and loss of appetite. Low back pain is the fifth most common reason for hospitalization [2].The sciatic nerve, the body's largest nerve, extends from ventral rami of L4 to S3 nerve roots and can reach 2 cm in diameter. The sciatic nerve plays a crucial role in motor functions, directly affecting the hamstrings and lower extremity adductors, and indirectly impacting the calf muscles, anterior lower leg muscles, and some intrinsic foot muscles. Its branches also contribute to sensation in the lower leg's back and sides, and the foot's bottom. Sciatica is a condition characterized by pain or unusual sensations along the sciatic nerve or associated lumbosacral nerve roots. It is often misdiagnosed as general low back or leg pain, but true sciatica specifically involves issues with the sciatic nerve or its roots. Sciatic pain intensifies with activities like lumbar spine flexion, twisting, bending, or coughing. Sciatica primarily results from nerve irritation due to inflammation. Direct nerve compression, which causes more severe motor dysfunction, requires urgent and thorough diagnostic evaluation.[3,4,5] The prevalence of sciatica worldwide ranges from 1.2% to 43%. [6] Lifetime incidence of sciatica varies from 13-40%, while annual incidence of a sciatica episode ranges from 1% to 5% [7]. Marma Chikitsa is a technique that involves manipulating specific vital points to redirect Pranna, the body's vital force. Stimulating a Marma point can alter the body's biochemistry, potentially causing significant chemical changes in one's composition. Activating these internal pharmaceutical pathways prompts the body to generate certain neurochemicals that promote healing of both body and mind[8].

Case study

A 47-year-old woman reported at the Marma OPD of Madan Mohan Malviya Government Ayurvedic College and Hospital, udaipur. She reported lower back pain that radiating to her left lower limb, persisting for six months.

Primary complaints

The patient experienced lower back pain radiating to her left lower limb for six months, difficulty walking for nine days, and complaints of flatulence and constipation.

Current illness history

The patient stated that she was in good health until six months prior. Then she developed lower back pain that gradually spread to her left leg. Walking became challenging nine days ago, and she also experienced flatulence with constipation. She came to the hospital for further treatment.

Medical history

No relevant past illnesses or injuries were reported. The patient had been diagnosed with hypothyroidism 22 years ago.

Previous treatments

The patient had consulted several local physicians and used over-the-counter medications but did not experience satisfactory relief.

Personal information

The patient had a good appetite but suffered from constipation. She reported sleeping soundly.

Physical examination

The patient's blood pressure was 130/80 mm Hg, pulse rate 78 bpm, and respiratory rate 20 bpm.

No signs of pallor, icterus, lymphadenopathy, cyanosis, clubbing, oedema, or dehydration were observed. Height/Weight: 5 feet 1 inch / 65 kg.

Systemic examination of patient

The results of per abdominal, cardiovascular, respiratory and CNS examinations were all normal.

Local Examination Inspection

No any swelling or scar mark present Palpation – No loss of curvature, tenderness (grade 3) present at L4-L5 level

SLR - Rt >90 degree and Lt 50 degree

Braggard's test - Rt >90 degree and Lt 50 degree

Xray LS spine A-P & Oblique – S/o degenerative changes in spine specially at L4-L5 level.

Diagnosis

Gridhrasi (Sciatica).

Treatment

The Marma Chikitsa was performed in which following Marmas were manipulated[9].

| S.no | MARMA NAME | STIMULATION TIME FOR MARMA | SITTINGS | Total dayes |
|------|------------------|----------------------------|---------------|-------------|
| 1 | Kshipra Marma | 0.8 sec | 2 Times a day | 14 days |
| 2 | Talhrdaya Marma | 0.8 sec | 2 Times a day | 14 days |
| 3 | Gulpha Marma | 0.8 sec | 2 Times a day | 14 days |
| 4 | Indravasti Marma | 0.8 sec | 2 Times a day | 14 days |
| 5 | Indravasti Marma | 0.8 sec | 2 Times a day | 14 days |
| 6 | Ani Marma | 0.8 sec | 2 Times a day | 14 days |
| 7 | Urvi Marma | 0.8 sec | 2 Times a day | 14 days |
| 8 | Urvi Marma | 0.8 sec | 2 Times a day | 14 days |
| 9 | Katiktarun Marma | 0.8 sec | 2 Times a day | 14 days |
| 10 | Kukundar Marma | 0.8 sec | 2 Times a day | 14 days |

Assessment Criteria

Subjective: Stambha (stiffness), Ruja (pain), Toda (pricking sensation), Spandana (twitching), Tenderness.

Objective: SLR Test, Braggard's Test, Walking time.

Parameters were categorized into four grade:-

0- No pain 1- Mild 2- Moderate 3- Severe

| SYMPTOMS | GRADE 0 | GRADE 1 | GRADE 2 | GRADE 3 |
|---------------------------|-----------------------|---|----------------------------|--------------------------------|
| Ruja (pain) | No pain | Mild | Moderate | Severe |
| Stambha (stiffness) | No stiffness | Mild | Moderate | Severe |
| Toda (pricking sensation) | No pricking sensation | Daily 10-20 min | Daily 21-60 min | >1 hr |
| Spandana (twitching) | No tingling sensation | Daily 10-20 min | Daily 21-60 min | >1 hr |
| Tenderness | No tenderness | Tenderness with grimace and flinch to palpation | Tenderness with withdrawal | Withdrawal non noxious stimuli |
| SLR Test | Test >90 degree | >75 - <60 degree | >60 -<45 degree | <30degree |
| Braggard's Test | Test >90 degree | >75 - <60 degree | >60 -<45 degree | <30degree |
| Walking time | Up to 20 sec | 21-40 sec | 41-60 sec | Above 60 |

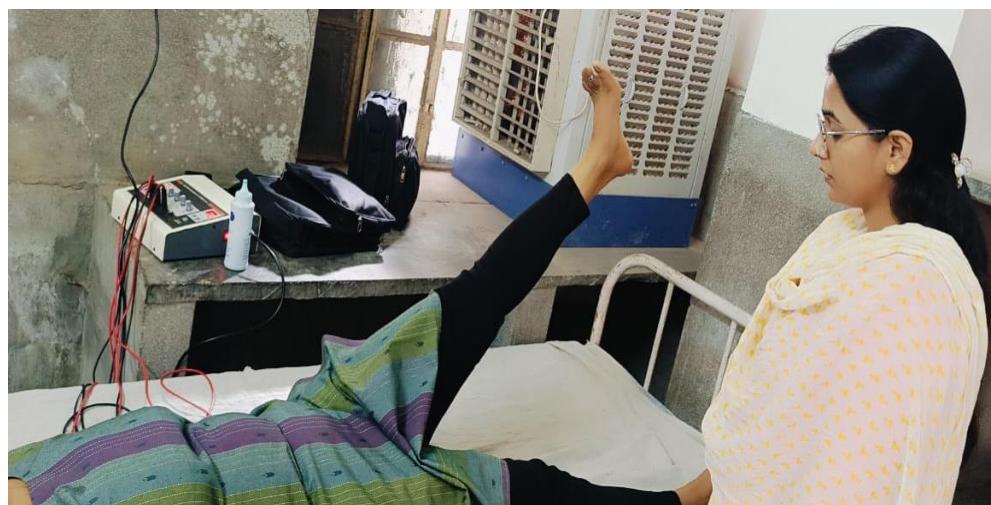
Result

Patient was clinically improved after treatment and assess on the basis of following parameters

| SYMPTOMS | Before treatment | After treatment |
|---------------------------|------------------|-----------------|
| Ruja (pain) | Grade2 | Grade1 |
| Stambha(stiffness) | Grade2 | Grade0 |
| Toda (pricking sensation) | Grade2 | Grade0 |
| Spandana (twitching) | Grade2 | Grade1 |
| Tenderness | Grade2 | Grade0 |
| SLR Test | Grade3 | Grade1 |
| Braggard's Test | Grade2 | Grade0 |
| Walking time | Grade2 | Grade1 |



BEFORE TREATMENT



AFTER TREATMENT

Discussion

Gridhrasi is a Vatavyadhi characterized by pain, primarily originating in the buttock (Sphik) and extending to the lower back (Kati), back (Prushta), thigh (Uru), knee (Janu), calf (Jangha), and foot (Paada). Symptoms include stiffness (Stambha), pain (Ruka), pricking sensations (Toda), and twitching (Spandana). Vataj Gridhrasi presents these symptoms, while Vatakaphaja Gridhrasi also includes anorexia (Aruchi), drowsiness (Tandra), and a feeling of heaviness (Gaurava). A 47-year-old female patient reported at the Marma OPD of Madan Mohan Malviya Government Ayurvedic College and Hospital, Udaipur suffering from low back pain radiating to her left lower limb for the past six months, with walking difficulties for the last 9 days, and experiencing flatulence with constipation. She underwent Marma Chikitsa, with manipulation of specific Marma points (Kshipra Marma, Gulpha Marma, Indravasti Marma, Janu Marma, Ani Marma, Urvi Marma, Nitamb Marma, Katiktarun Marma, Kukundar Marma) every other day for two weeks. The treatment resulted in significant improvements: 92% reduction in pain (Ruja), 80% improvement in stiffness (Stambha), 75% reduction in pricking sensations (Toda), and 95% improvement in both the straight leg raise (SLR) test and Braggard's test.

Mode of action of Marma Chikitsa

Marma points, vital areas on the body connected to Prana and Vata, are essential in treatment. Applying appropriate pressure to these points can induce biochemical changes in the body, restoring Vata to its normal state and reducing symptoms such as pain, pricking sensations, and stiffness. This method can be an alternative to surgical intervention. In sciatica, Marma Chikitsa works through restoring energy flow, promoting pain relief and reducing inflammation in the affected areas. Marma therapy helps to balance the vata dosha, which can relieve these uncomfortable symptoms by restoring harmony between the body and mind. Release tension in muscles, improving flexibility and reducing the pressure on the sciatic nerve. By promoting better function of the nervous system, it supports the healing of nerve-related conditions.

Conclusion

In conclusion, Marma therapy offers a holistic and effective approach to managing and treating sciatica. By targeting specific Marma points, this ancient Ayurvedic practice works to restore balance to the body's energy flow, alleviate pain, reduce inflammation, and improve circulation. The therapy addresses the underlying causes of sciatica, such as vata dosha imbalance and muscle tension, by stimulating vital energy points that promote healing and relaxation.

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