



A COMPREHENSIVE REVIEW OF THERAPEUTIC APPLICATIONS AND BENEFITS OF MURDHINI TAILA IN AYURVEDIC PRACTICE.

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ABSTRACT :

The human body, often metaphorically compared to an inverted tree, emphasizes the vital role of head health in preserving overall bodily wellness. In contemporary times, the rise in stress, anxiety, insomnia, scalp issues, and cognitive disorders can be attributed largely to unhealthy lifestyle choices. Ayurveda, a holistic system of medicine, offers profound insights into prevention and healing through regimens such as Dincharya and Ritucharya.

At the heart of these Ayurvedic practices lies Murdhini taila, a fundamental component of dincharya, which involves the application of medicated oil to the head region. This therapeutic technique encompasses a range of treatments including Shiro abhayanga, Shiro seka, Shiro pichu, and Shiro basti, each strategically arranged in increasing order of potency.

Shiro abhayanga involves the massage of the head with oil, while Shiro seka entails the pouring of specialized oils or substances over the forehead in a rhythmic manner. Shiro pichu requires the placement of oil-soaked cloth on the anterior fontanelle, and Shiro basti utilizes a specialized cap filled with medicated oils to nourish the head region.

This paper explores the significance of head health in Ayurveda, highlighting the therapeutic benefits of Murdhini taila and its associated practices in promoting overall well-being, addressing various ailments affecting the mind and body.

KEYWORDS: Dincharya, Murdhini taila, Shiro abhayanga, Shirobasti, Shiro pichu, Shiro seka.

INTRODUCTION :

The human body, akin to an inverted tree, has its roots at the top and branches extending downwards. Just as nurturing the roots ensures the health of a plant, maintaining the well-being of the head is crucial for overall bodily health. By attending to the head, where vital energies and faculties governing both body and mind reside, we can swiftly address any ailments that may afflict the bodyⁱ.

In recent times, ailments such as stress, anxiety, insomnia, ailments of scalp and cognitive disorders have seen a rise, largely attributed to unhealthy lifestyles devoid of a routine. *Ayurveda* employs a unique and comprehensive approach to prevention and healing through various regimen like *Dincharya* and *Ritucharya*.

Murdhini taila, a component of *dincharya*ⁱⁱ, which involves the application of medicated oil to the head region. *Murdha* or *Murdhni* signifies the head, while *Taila* denotes oil. This therapeutic procedure requires the oil to be in contact with the scalp for a specific duration to maximize its benefits.

It has been indicated by *Ayurveda* in various disorders like *Shirashoola* (Headache), *Khalitya* (Baldness of hairs), *Palitya* (Premature graying), *Kesha paat* (Hair fall), It helps hairs to get *Drinmula* (deep rooted), *Deergha* (long), and *Krishna* (Black in colour). *Indriyani praseedati* (keeps the sense organs in a healthy condition), *Sutwak cha aananam* (improves the glow and complexion of the face), *Nidraalabha* (Induces good sleep), *Sukha kara* (Relaxing the mind) are some benefits of practice of *murdhini taila*. It is also beneficial in eye and speech related disordersⁱⁱⁱ.

MATERIAL AND METHODS :

For this study, an extensive review of classical Ayurvedic texts including the Charaka Samhita, Sushruta Samhita, Ashtanga Hridaya, Ashtanga Sangraha, Dharakalpa, and Bhavaprakasha was conducted. A comprehensive search using the keyword "Murdhini Taila" was performed across various databases and journals such as PubMed, the Journal of Ayurveda and Integrative Medicine (JAIM), ResearchGate, and Google Scholar. Relevant articles were identified, and a final database was meticulously reviewed. Conclusions were drawn based on a critical analysis of the findings.

TYPES^{iv} -

- 1)Shiro abhayanga
- 2)Shiro seka
- 3)Shiro pichu
- 4)Shiro basti

Shiro abhayanga < *Shiro seka* < *Shiro pichu* < *Shiro basti*. They are told 'Uttarottara Gunaprada', meaning of higher potency in increasing order.

SHIRO ABHAYANGA- *Shiro abhayanga* involves the application of oil through massage on the head.

SHIRO SEKA- *Shiro-seka* applies to pouring of suitable oil along with additional substances like *ghee*, buttermilk, sugarcane juice, herbal decoctions, or milk, consistently onto the forehead in a specific pattern, allowing it to flow over the scalp in a rhythmic manner.

SHIRO PICHU- *Shiro-Pichu* involves placing a sterile piece of cloth or gauze folded and soaked in a particular oil onto the *Brahma randhra*, which is the anterior fontanelle region for a specific period of time.

SHIRO BASTI- *Shiro basti* is a technique where a specialized cap, called a *Basti* cap, is fashioned over the individual's head while they are in a seated position. This cap, made of leather, is sealed and attached to the head using a paste made from wet *Masha* (blackgram) flour, and then it is filled with medicated oils.

TYPE	INDICATION	CONTRAINDICATION
SHIRO ABHAYANGA	<ul style="list-style-type: none"> • <i>Rookshata</i> • <i>Kandu</i> • <i>Mala of shiropadesha^v</i> 	<ul style="list-style-type: none"> • <i>Ajeerna</i> • <i>Taruna jwara</i> • <i>Amadosha</i> • <i>Santarpanotha vyadhi^{vi}</i> • <i>Kaphaj vikaras^{vii}</i>
SHIRO SEKA	<ul style="list-style-type: none"> • <i>Arumshika</i> • <i>Shiroshula</i> • <i>Daha</i> • <i>Paka Vrana</i> over shiro pradesha^{viii} • <i>Vata janya Shiro-roga^{ix}</i> • <i>Sankakh Roga^x</i> • <i>Pittaja Shiro roga^{xi}</i> • <i>Pitta & Raktaja shiro roga^{xii}</i> • <i>Vatika Shiro roga^{xiii}</i> 	<ul style="list-style-type: none"> • <i>Shirodhara</i> further increases <i>kapha</i>, which makes the disease difficult to cure hence contra-indicated in <i>kaphaj vikara</i>. • <i>Shirodhara</i> should be avoided in extreme conditions such as very hot or cold weather, rainy days, or windy areas.
SHIRO PICHU	<ul style="list-style-type: none"> • <i>Keshapata</i> • <i>Keshabhumi sphutana</i> • <i>Dhoopane</i> • <i>Netrastambha^{xiv}</i> • <i>Palitya</i> • <i>Vrana</i> • <i>Pakshaghata</i> • <i>Ardita</i> • <i>Anidra</i> 	----
SHIRO BASTI	<ul style="list-style-type: none"> • <i>Prasupti</i> • <i>Ardita</i> • <i>Anidra</i> • <i>Nasa</i> and mukha sosha • <i>Timira</i> • <i>Daruna Shiro roga^{xv}</i> 	-----

METHOD:**SHIRO ABHAYANGA^{xvi}****POORVA KARMA**

The patient is instructed to freshen up after using the restroom. This is often followed by moderate warm-up exercises. Next, the patient is seated on a knee-high chair, and their body is wrapped in a cloth up to the neck. Before beginning the procedure, the therapist should recite the *Swasthivachana* or a prayer. The therapist should ideally position themselves behind the patient to perform the *Shiroabhyanga* procedure

PRADHAN KARMA

Shiro abhayanga, can be practiced any time before bathing, after one has brushed their teeth, washed their face, and attended to natural bodily functions in the early morning. The person should sit comfortably in a chair. During the massage, the masseur should stand slightly higher position behind the individual receiving the treatment. Application of lukewarm oil is done gently to the hair and scalp, in the direction of hair growth using fingertips to avoid damaging the hair. Lightly tapping the head with loosely joined hands can stimulate the fine capillaries of both the circulatory and nervous systems.

PASCHAT KARMA

Patient is then told to take rest for about 10 – 20 minutes and afterwards allowed to take head bath with luke warm water.

DURATION

Dalhan^{xvii} has specified the duration required for *abhyanga* to allow *sneha* (oil) to penetrate and reach different *dhatu*s (tissues) in the body, with an estimated 5 minutes needed to reach the *majja* dhatu (bone marrow). *Sarvang abhyanga* (full-body massage) should be performed in seven positions, dedicating approximately 5 minutes to each position, resulting in a total duration of about 35 minutes. However, for *Ekanga* abhyanga (partial massage), such as on the head or foot, the massage should be done for at least 15 minutes^{xviii}. In a healthy individual, a daily 5-minute *shiro abhyanga* (head massage) can deliver the noted advantages of shiro abhyanga.

S.No.	Dhatu up to which Sneha penetrates	Time (in matra)	Time in seconds
1.	Romanta	300	65
2.	Twacha	400	133
3.	Rakta	500	160
4.	Mamsa	600	190
5.	Meda	700	228
6.	Asthi	800	240
7.	Majja	900	285

1 matra=19/60 secs^{xix}

MODE OF ACTION^{xx}

The process of oil absorption from the scalp involves several physiological mechanisms that contribute to the effective uptake of oils and their constituents. Here's a breakdown of the key processes involved:

- Permeation through the Stratum Corneum:** The outermost layer of the skin, known as the stratum corneum, acts as a barrier to prevent the entry of foreign substances. However, certain oils, especially those with smaller molecular sizes and lipophilic properties, can permeate through the stratum corneum via diffusion.
- Enhancement by Fatty Vehicles:** Oils used in scalp treatments often serve as carriers for medicinal substances. The fatty nature of these oils can enhance the absorption of both the oil itself and any active compounds it carries. This phenomenon is particularly notable after the *Sneha paka* process, where the oils undergo preparation to enhance their efficacy.
- Massage-Induced Blood Flow:** Massage techniques applied during oil application stimulate blood circulation in the scalp area. Increased blood flow brings more nutrients and oxygen to the scalp tissues, facilitating the absorption of oils and their constituents.
- Lymphatic Drainage:** Massage pressure also aids in the drainage of the lymphatic system. The lymphatic vessels help remove waste products and excess fluids from tissues, potentially aiding in the clearance of absorbed oil components.
- Release of Tryptophan and Neurotransmitters:** The mechanical action of massage can release amino acids like tryptophan from the lymphatic system. Tryptophan is a precursor to serotonin, a neurotransmitter that plays a crucial role in mood regulation. Serotonin synthesis may be facilitated by tryptophan release, potentially influencing mood and relaxation.
- Regulation of Sleep-Wake Cycle:** Additionally, tryptophan can be converted into melatonin, a hormone involved in regulating the sleep-wake cycle. The release of tryptophan during massage may contribute to the production of melatonin, potentially promoting better sleep quality.

TAILA YOGA

Chakra taila-specially described for daily head massage.^{xxi}

Nimbadi taila – *Darunaka*

Brahmi taila – *Murdharuja, Jatrurdhwa roga*

Asanavilwadi taila -*Netra roga*

Triphaladi taila, Shiro roga, Pratisyaya, Khalitya, Palitha

SHIRO SEKA^{xxii}

POORVA KARMA

The patient undergoes a thorough examination to ensure they are fit for the procedure. They should be advised to empty their bowels and bladder beforehand. Next, the patient's pulse, temperature, and blood pressure are recorded. *Abhyanga* should be performed either on the entire body or, at minimum, on the face, neck, shoulders, and chest. Tie a piece of gauze around the patient's head, positioning it just above the eyebrows, with the patient's eyes closed. Similarly, gently place two cotton pads over the eyelids and secure it with another piece of gauze, make sure to insert earplugs too.

PRADHAN KARMA

The patient should lie on the *Droni* (Shirodhara table) in supine position, with a pillow supporting their neck. Position the *Dharapatra* over their forehead, ensuring a gap of 4 *anguli* (1 *anguli* = 1.93 cm) between the end of the wick and the forehead. Then, lukewarm or *sukh-oushna* medicated oil (approximately equal to body temperature), is then poured into the *Dharapatra*.

A consistent stream of oil is sustained, ensuring the entire forehead receives a rhythmic pouring from the oscillating *Dharapatra*. Between the process, a gentle massage can be done over the forehead following the Dhara. The oil collected in the vessel beneath the *Droni*, is reheated and then refill in the *Dharapatra* for continued application.

PASCHAT KARMA

After the *Dhara* procedure is completed, gently wipe and dry the patient's head. Following this, a brief period of relaxation is recommended, along with a gentle massage of the body, including the head, using oil. Finally, the patient should be advised to take a lukewarm bath.

TIME AND DURATION

The duration of the *Shirodhara* treatment typically ranges from 45 to 60 minutes and spans over a period of 3 to 7 days or 14 days, with adjustments made based on the discretion of the physician. *Shirodhara* is best administered in the morning, according to *Dharakalpa*. The treatment should not be conducted during noon or at night. Patients with dryness and *Pitta-dominant Vata*, the recommended duration of *Shirodhara* is two and a half *Prahara* or *Two Prahara*. Conversely, for those with *Kapha-dominant Vata* and oily tendencies, it is one *Prahara*^{xxiii}.

PRECAUTIONS

1. It's important to regulate the flow of Dhara, ensuring it neither runs too slowly nor too swiftly, as either extreme can exacerbate the condition of the illness.
2. Dhara should be poured in a controlled and consistent rhythm over the forehead, moving from one side to the other, with care taken to ensure it remains contained within the area of the head.
3. When employing an automatic shirodhara machine, it's essential to adjust the flow of the *dhara drava* and set the temperature before positioning the patient on the *droni*.
4. The consistency of Dhara should be akin to that of the little finger in thickness.
5. Patients should remain awake throughout the procedure, avoiding sleep.
6. Special precautions must be taken to prevent the oil from coming into contact with the patient's eyes.
7. Ideally, the patient's hair should be shaved or cutting hair short is recommended, prior to the procedure.

MODE OF ACTION^{xxiv}

Ayurvedic Perspective

1. Strengthening *Prana* and *Indriyas*: According to *Ayurveda*, the head (*Uttamanga*) is the primary seat of all sense organs (*Indriyas*). By acting on the head, *Shirodhara* helps in balancing the *Prana* (vital life force) and *Indriyas*, which are often disturbed in psychological disorders. Healthy *Indriyas* lead to a healthy mind, thus promoting overall well-being.

2. Balancing *Doshas*: Imbalances in specific subtypes of *Doshas*—*Sadhaka Pitta*, *Tarpak Kapha*, and *Prana*, *Udana*, *Vyana Vayu* (types of *Vata*), — can lead to stress and tension. *Shirodhara* helps restore the functional harmony among these *Doshas* through its mechanical effect, thus reducing stress.

Therapeutic Effects of Medicaments

1. Drug Absorption: The efficacy of *Shirodhara* also relies on the absorption of medicated oils used during the procedure. The skin on the scalp, being thinner and more permeable than other body parts, allows for faster and more efficient absorption. Oils, which are fat-soluble, penetrate the skin more effectively than water-soluble substances. They pass through the stratum corneum, dermis, capillaries, and eventually enter the bloodstream, thus exerting their therapeutic effects.

Procedural Effects

1. Potential and Kinetic Energy: During *Shirodhara*, the oil falls from a certain height, converting potential energy into kinetic energy, which can stimulate nerve impulses. This process may enhance the conduction of these impulses and potentially modulate brain activity, as recorded by an electroencephalogram (EEG).

2. Temperature Effects: The continuous flow of warm oil on the forehead causes mild vasodilation, improving blood circulation to the brain. This increase in circulation helps regulate the blood supply, potentially normalizing serotonin and catecholamine levels, which are crucial in managing stress and mood.

3. Pressure Effects: The constant pressure and vibration from the flowing oil can affect impulse conduction and nerve stimulation. The hollow sinus in the frontal bone amplifies these vibrations, which are transmitted through the cerebrospinal fluid (CSF). This prolonged pressure and vibration can induce tranquillity, reducing stress by modulating nerve activity and promoting the release of acetylcholine, which lowers blood pressure and central nervous system activity.

Marma Stimulation

1. Vital Spots (Marma): Several vital spots (*Marma*) are located in the forehead and head region, including *Sthapni*, *Utshepa*, *Avarta*, *Shankha*, and *Apanga Marma*. Stimulating these spots, especially *Sthapni Marma* (between the eyebrows), can influence the pituitary gland. The pituitary gland, the master gland of the endocrine system, regulates hormones and can be indirectly stimulated through *Shirodhara*, helping to balance the endocrine system and alleviate stress.

SLECTION OF SNEHA

According to *Dharakalpa*, Sneha is taken according to the condition of dosha predominance

DOSHA	SNEHA
Vata	Tila taila
Pitta & Rakta	Ghrita
Kapha	Tila taila
Vata + Pitta + Rakta	Taila & Ghrita in equal quantity
Vata + Kapha + Rakta	1part Taila + ½ part Ghrita

SHIRO PICHU^{xxv}

PURVA KARMA

Perform *abhyanga* on the head, neck, and shoulders.

PRADHAN KARMA

Seat the patient comfortably in an armchair. Secure a cloth band around the forehead just above the ears. A piece of cloth measuring 16*16 cm in length and breadth is to be placed over the crown of the head. Layer additional pieces of cloth on top of each other until you reach a height of approximately 2 cm. Then pour warm oil onto the centre of the cloth soaking it fully with the oil. Typically, the *pichu* therapy is sustained for a duration of about 30 minutes.

PASCHAT KARMA

Gently remove the *pichu* and thoroughly wipe the head with dry cotton. Apply *Rasnadi churna* to the *brahma randhra* (vertex).

DURATION

It should be given upto 30 minutes and can be continued up to 7-14 days.

PRECAUTION

Discontinue the procedure if patient experiences *Peenasa* (rhinitis) during the procedure and treat symptoms accordingly.

MODE OF ACTION^{xxvi}

The placement of *pichu* on the scalp facilitates immediate absorption, while extending the duration enhances transdermal absorption. This process utilizes *Tarpak Kapha*, *Sadhak Pitta*, and *Praan Vayu*. The properties of *Taila*, characterized by *Tikshana*, *Vyavayi*, and *Sukshma*, allow it to penetrate the *Manovaha Srotas*, addressing vitiated *rajas* and *tamas* while also providing *Brimhana*, *Balya*, *Vaat shamana*, and *Medhya* effects to correct mental disturbances. *Shiro pichu* may enhance neuronal and synaptic function in the cerebral cortex through diffusion into the superficial venous drainage, specifically the Dural venous sinuses. The absorption and diffusion mechanism of medicated oil through *pichu* corrects cognitive impairments.

TAILA YOGA

Narayanadi taila – Ardita

Triphaladi taila – Khalitya, Palitya, Vrana

Brahmi taila – Anidra

SHIRO BASTI^{xxvii}

PURVA KARMA

Atura Siddhata encompasses the practices of purification through *Shodhana*. *Sambharasangraha* involves the preparation of *charmapatta* and *mashakalka*, which is then applied to *charmapatta* along with two cloth strips.

PRADHAN KARMA

Seat the patient upright on a chair, then wrapping a strip of cloth coated with *Masha kalka* around their head above the ear. Alongside prepare a leather sheet or rexine, approximately twelve *angulas* in size, by applying *Masha kalka* at the bottom of its inner surface and secured around the head so that the lower part of the leather sheet is attached to the cloth strip. The two ends of the leather sheet are fastened together using *Masha Kalka*. Another strip of cloth, also coated with *Masha kalka*, is then wrapped over the leather sheet. Subsequently, warmed medicated oil is poured slowly and carefully onto the inner surface of the leather cap/ rexine cap, or alternatively onto a coconut leaf to prevent sudden oil spillage onto the head. The quantity of oil should measure two *angulas* above the scalp, approximately one and a half inches above. This process is continued until the appearance of *samyak lakshanas* such as *Vaktrashrava* (watering in the mouth), *Nasikotaklesha* (moisture in the nose), and *Karna Srava*.

PASCHAT KARMA

Post-procedure care involves removing the *sneha* from within the cap using a spoon or sponge once secretions start from the mouth and nose. The head should then be thoroughly dried with a towel, followed by a massage of the shoulders and neck. Cleanse the cap and store it for future use. Apply *Rasnadi churna* to the patient's head. Adhere to the dietary and behavioral guidelines outlined in *sneha vidhi*.

PRECAUTIONS

1. Avoid high temperatures. Oil should be poured slowly onto the inner surface of the leather cap, or alternatively onto a coconut leaf, not directly.
2. Instruct the patient to refrain from nodding their head. During the therapy session, they should abstain from talking, laughing, or opening their mouth. If the patient sneezes, the assistant will handle the cap carefully.
3. Take measures to prevent oil leakage.
4. Maintain a consistent temperature of oil throughout the procedure. Periodically replace some of the oil with warm oil to ensure this.

MODE OF ACTION

The retention of *sneha* on the scalp done in *Shiro basti*, acts more or less in a similar way as *Shiro pichu*. The only difference is that *Shiro basti* allows longer contact of *Sneha* with the head, both directly and quantitatively.

TIME AND DURATION

Top of Form

TIVataja Vyadhi – 10,000 matra kala or 53 minutes (1 matra = 19/30 seconds)

Pittaja Vyadhi – 8,000 matra kala or 43 minutes

Kaphaja Vyadhi – 6,000 matra kala or 31 minutes.

Swastha – 1,000 matra kala or 5-6 minutes

Acharya Vagbhata and Sharangdhara have told shirobasti should be conducted for 3, 5, 7 days but maximum is 7 days but Acharya Sushruta has recommended it for up to 21 days.

TAILA YOGA

Ksheer bala taila - Ardita, sirashula condition.

Dhanvantaram taila, Mashabaladi taila - Kampavata

Himasagara taila, Brahmi taila -Anidra.

Nakula taila, Tungadhrumadi taila - Kampavata

DISCUSSION :

Physical pressure promotes fluid movement within the body, making lymphatic drainage the primary effect of *Abhyanga*. Lymph fluid contains a significant amount of the amino acid tryptophan, as well as high levels of albumin (a protein), glucose, and histaminases, which break down histamine. It is hypothesized that blood levels of amino acids like tryptophan increase after a massage. Consequently, an elevation in plasma tryptophan leads to a corresponding rise in neurotransmitters at motor end plates, including serotonin, which is synthesized from tryptophan. Serotonin is known to play a role in various psychiatric conditions, such as depression. A proper diet and massage can boost brain serotonin levels by providing albumin-bound tryptophan. Therefore, *Abhyanga* can alleviate symptoms associated with serotonin deficiency, including anxiety and irritability. When *Abhyanga* is performed for 300 *Matrakala*, the oil penetrates various layers: the skin through hair follicles in 400 *Matrakala*, to rakta (blood) in 500 *Matrakala*, to mamsa (muscle) in 600 *Matrakala*, to medas (fat) in 700 *Matrakala*, to asthi (bone) in 800 *Matrakala*, and to majja (bone marrow) in 900 *Matrakala*.

Shirodhara, which involves a continuous stream of oil on the forehead, stimulates *Sthapani*, *Shankha*, *Utkshepa*, *Adhipati marmas*, and the *Agnya chakra*, improving blood circulation to the brain and enhancing higher intellectual functions. This treatment helps alleviate psychic symptoms and stabilizes the Autonomic Nervous System, which can be disturbed during stress.

Shiropichu balances the circulation of *rakta* (blood) and *pitta*, enhancing blood supply and nutrition to the brain. *Vyana Vayu*, *Ranjaka Pitta*, *Avalambaka Kapha*, and *Udana Vayu* regulate heart functions and circulation. *Shirobasti* helps control vitiated *vata* and *pitta*, supports *marmas*, and influences master glands and endocrine functions.

The medicinal properties of the oil penetrate the skin and reach internal organs through minute capillaries attached to hair roots. *Bhrajaka pitta*, located in the skin, aids in the digestion and utilization of these substances in the skin. The application of *Sneha* on the skin remains in the hair follicles, ensuring effective treatment. Modern science supports these effects, noting that nanoparticles can cross the blood-brain barrier, a significant challenge in neurological drug delivery. The *Snehapaka* process imparts a lipoidal structure to the oil, similar to liposomes, facilitating drug transport across the blood-brain barrier.

Lipid-soluble substances diffuse across the blood-brain barrier more efficiently, and after *Snehapaka*, the oil's components optimize absorption and transport. This ensures effective extraction from the blood during brain passage, enabling targeted therapeutic effects. *Murdhni Taila* thus acts as an efficient transporter of medicinal constituents across the blood-brain barrier, beneficial for treating psychiatric disorders. By facilitating the absorption and transport of therapeutic compounds, *Murdhni Taila* strengthens neuronal connections and synapses, demonstrating significant therapeutic potential due to its lipoidal structure. This underscores the efficacy of *Murdhni Taila* in *Ayurvedic* practice.

CONCLUSION :

The practice of *Murdhni Taila* in *Ayurveda* offers a comprehensive approach to maintaining head health, addressing both physical and psychological ailments. By employing various techniques tailored to individual needs and conditions, *Murdhni Taila* not only promotes hair and scalp health but also

enhances mental well-being, and its centuries long practice in daily routine as well as for treatment, provides with a huge database of evidence of its relevance and efficacy in present times.

ACKNOWLEDGEMENTS

Nil

REFERENCES :

- ⁱ Shastri Ambikadutta, Sushruta Samhita, Uttartantra, Chapter. 24, Verse. 58, Chaukhambha Sanskrit Sansthan; Varanasi; Reprinted 2018. Page 1064.
- ⁱⁱ Shastri Kashinath, Chaturvedi Gorakhnath, Charaka Samhita, Savimarsha vidyotini hindi vyakhya, Sutra sthan, Chapter-5, Verse 81-83, Chaukhambha Bharti Academy, Varanasi Reprint year 2016, Page no.127.
- ⁱⁱⁱ Shastri Kashinath, Chaturvedi Gorakhnath, Charaka Samhita, Savimarsha vidyotini hindi vyakhya, Sutra sthan, Chapter-5, Verse 81-83, Chaukhambha Bharti Academy, Varanasi Reprint year 2016, Page no.127.
- ^{iv} Tripathi B. editor Astanga Hrudayam of Srimad vagbhata, Sutrasthana, Chater 22, Verse. 23, Chaukhamba Sanskrit Pratishthan, Delhi, Reprinted 2017, Page no 260.
- ^v Tripathi B. editor Astanga Hrudayam of Srimad vagbhata, Sutrasthana, Chater 22, Verse. 24, Chaukhamba Sanskrit Pratishthan, Delhi, Reprinted 2017, Page no 260.
- ^{vi} Shastri Ambikadutta, Sushruta Samhita, Chikitsasthana, Chapter. 24, Verse. 35, Chaukhambha Sanskrit Sansthan; Varanasi; Reprinted 2018. Page 133.
- ^{vii} Tripathi B. editor Astanga Hrudayam of Srimad vagbhata, Sutrasthana, Chater 2, Verse. 9, Chaukhamba Sanskrit Pratishthan, Delhi, Reprinted 2017, Page no 260.
- ^{viii} Tripathi B. editor Astanga Hrudayam of Srimad vagbhata, Sutrasthana, Chater 22, Verse. 25, Chaukhamba Sanskrit Pratishthan, Delhi, Reprinted 2017, Page no 260.
- ^{ix} Tripathi B. editor Astanga Hrudayam of Srimad vagbhata, Uttartantra, Chater 24, Verse. 3, Chaukhamba Sanskrit Pratishthan, Delhi, Reprinted 2017, Page no 1057.
- ^x Shastri Kashinath, Chaturvedi Gorakhnath, Charaka Samhita, Savimarsha vidyotini hindi vyakhya, Siddhi sthan, Chapter-9, Verse 73, Chaukhambha Bharti Academy, Varanasi Reprint year 2016, Page no.1067.
- ^{xi} Shastri Kashinath, Chaturvedi Gorakhnath, Charaka Samhita, Savimarsha vidyotini hindi vyakhya, Chikitsa sthan, Chapter-26, Verse 177, Chaukhambha Bharti Academy, Varanasi Reprint year 2016, Page no.750.
- ^{xii} Shastri Ambikadutta, Sushruta Samhita, Uttartantra, Chapter. 26, Verse. 12, Chaukhambha Sanskrit Sansthan; Varanasi; Reprinted 2018. Page 175.
- ^{xiii} Shastri Ambikadutta, Sushruta Samhita, Uttartantra, Chapter. 26, Verse. 3, Chaukhambha Sanskrit Sansthan; Varanasi; Reprinted 2018. Page 173.
- ^{xiv} Tripathi B. editor Astanga Hrudayam of Srimad vagbhata, Sutrasthana, Chater 22, Verse. 25, Chaukhamba Sanskrit Pratishthan, Delhi, Reprinted 2017, Page no 260.
- ^{xv} Tripathi B. editor Astanga Hrudayam of Srimad vagbhata, Sutrasthana, Chater 22, Verse. 26, Chaukhamba Sanskrit Pratishthan, Delhi, Reprinted 2017, Page no 260.
- ^{xvi} Panchakarma, a practical guide to external treatment procedures, by Dr. S.G. Prasanna Aithal & Dr. Om Prakash Sharma, Dr. Aithal's Ayurveda Publication, Ujjire, Karnataka, Edition: first: September 2010, Page no. 101, Page No :43.
- ^{xvii} Thakral k, Dalhanacharya and gayadas virachita vistrir hindi vyakhya, Dalhan commentary on Sushruta Samhita, Chikitsa Sthan, Chapter 24, Verse 30, Chaukhambha Orientalia, Varanasi, Vol -2, Reprint year 2022, Page no 422.
- ^{xviii} Vaidya Haridas Sridhar Kasture, Ayurvediya panchakarma vigyana, Publication Sree Vaidyanath, Ayurveda bhavan limited, Naini, Allahabad, Reprint 2022, Page n: 85.
- ^{xix} Vaidya Haridas Sridhar Kasture, Ayurvediya panchakarma vigyana, Publication Sree Vaidyanath, Ayurveda bhavan limited, Naini, Allahabad, Reprint 2022, Page no: 85.
- ^{xx} ROLE OF ABHYANGA IN JARA – A REVIEW Rashmi G. Dike, Sumit R. Patil Ayurlog: National Journal of Research in Ayurved Science- 2018; (6)(6) :1-7
- ^{xxi} Shastri Ambikadutta, Sushruta Samhita, Chikitsasthan, Chapter. 24, Verse. 27-28, Chaukhambha Sanskrit Sansthan; Varanasi; Reprinted 2018. Page 133.
- ^{xxii} Vaidya Haridas Sridhar Kasture, Ayurvediya panchakarma vigyana, Publication Sree Vaidyanath, Ayurveda bhavan limited, Naini, Allahabad, Reprint 2022, Page no: 94.
- ^{xxiii} Sharma S, Sharma H L, Dharakalpa-Pracheena Keraliya Panchkarma Chikitsa Vigyana), Chapter 3, Verse 18, Chaukhambha Orientalia, Delhi, First Editon, Page no 25.
- ^{xxiv} Dr. Sony Singh, Dr. Rachna Nigam and Dr. Ravi Kumar Shukla, PROBABLE MODE OF ACTION OF SHIRODHARA- AN OVERVIEW, ISSN 2455-3301 Wjpmr, Vol 7, Issue 9, 2021.
- ^{xxv} Patil C Vasant, Principles and practice of panchakarma, Chaukhambha publications, New Delhi, Edition: 5th, 2015, Pp: 716, Page No 158
- ^{xxvi} A Critical Review on The Effect of *Murdhni Taila* In Manasaroga. International Ayurvedic Medical Journal {online} 2022 {cited February 2022} Available from: http://www.iamj.in/posts/images/upload/502_505.pdf.
- ^{xxvii} Tripathi B. editor Astanga Hrudayam of Srimad vagbhata, Sutrasthana, Chater 22, Verse. 27-30, Chaukhamba Sanskrit Pratishthan, Delhi, Reprinted 2017, Page no 261.