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Ayurvedic Approach in the Management of Hypothyroidism: A Case Study

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ABSTRACT

Hypothyroidism is a prevalent endocrine disorder characterized by insufficient thyroid hormone production, leading to various clinical manifestations such as dry skin, constipation, hair loss, and obesity. While Levothyroxine remains the conventional treatment, there is growing interest in exploring complementary therapies, particularly from traditional systems like *Ayurveda*. This case study presents the integrative *Ayurvedic* management of a 32-year-old male patient with clinically diagnosed hypothyroidism. The patient, experiencing symptoms including anorexia, fatigue, dry skin, constipation, and hair loss, was treated with a combination of *Ayurvedic* formulations for two months. The intervention included *Chandraprabha Vati*, *Shigru Swaras, Nagaradi Kashaya, Kanchanara Guggulu*, and *Varunadi Kashaya*, with the aim to rectify *doshas* imbalances, enhance metabolic function, and restore thyroid health. Clinical improvements were observed in symptoms, and biochemical markers (T3, T4, TSH) showed significant progress. The results suggest that *Ayurvedic* treatments targeting *Kapha* and *Vata doshas*, and focusing on metabolic enhancement and glandular decongestion, may provide a valuable adjunct to conventional hypothyroid management. This case highlights the potential of Ayurveda in managing hypothyroidism by addressing underlying imbalances and promoting systemic harmony.

Keywords: *Hypothyroidism, Galaganda, Thyroid gland, case study*

1. INTRODUCTION

Hypothyroidism is a common pathological condition resulting from insufficient production of thyroid hormones. It manifests through a wide range of clinical features, from overt symptoms such as myxoedema and multisystem dysfunction to subclinical forms, where serum levels of thyroxine (T4) and triiodothyronine (T3) remain within normal limits, but thyroid-stimulating hormone (TSH) levels are mildly elevated (1). Despite significant advancements in medical science, the global prevalence of hypothyroidism remains considerable, underlining the need for effective therapeutic strategies.

Levothyroxine, a synthetic form of the thyroid hormone T4, has long been established as the standard treatment in

conventional medicine. However, modern perspectives are increasingly open to complementary approaches, particularly from traditional systems like *Ayurveda*.

In *Ayurvedic* medicine, thyroid disorders are interpreted through the lens of the *tridosha* theory—*Vata, Pitta*, and *Kapha*—and are believed to arise from imbalances in these fundamental bioenergetic forces (2). Hypothyroidism, in particular, is commonly associated with *Kapha dosha* aggravation, and in some cases, it may also stem from urinary tract disorders, especially in women. *Ayurvedic* scholars have traditionally categorized hypothyroid conditions into five types based on the dominant *dosha* or associated etiological factors (3).The condition known in modern medicine as goitre is considered, in *Ayurvedic* texts, a more advanced manifestation of *Kapha*-induced hypothyroidism. This correlates with the disease entity called *Galaganda*, which is characterized by swelling in the neck and is understood to involve thyroid dysfunction.*Ayurveda*, as a holistic and ancient system of medicine, offers a vast pharmacopeia of herbal and mineral formulations with potential therapeutic value in managing thyroid disorders. These natural remedies aim not only to address hormonal imbalance but also to correct underlying *doshas* disturbances, improve metabolism, and restore systemic harmony.(4)

A promising integrative *Ayurvedic* approach to hypothyroidism may include formulations and herbs like *Chandraprabha Vati*, known for its metabolic and endocrine-regulating potential despite limited direct evidence in thyroid dysfunction(5); Shigru *Patra* (Moringa oleifera Lam.), a nutritionally rich, *Kapha-Vata* pacifying herb that stimulates metabolism but remains underexplored in thyroid contexts(6); and *Nagaradi Kashaya*, a *Trikatu*-based decoction with potent *Agni-deepaka* and bioenhancing effects, whose application as a thyroid-specific adjuvant remains undocumented. *Kanchanara Guggulu*, a classical remedy for *Galaganda*, aligns conceptually with modern thyroid swellings yet lacks sufficient biochemical correlation studies(7). *Varunadi kashaya*, traditionally used for urogenital conditions, offers *Lekhana* and *Shothahara* properties that may support lymphatic drainage and glandular decongestion in hypothyroid states, representing a novel area for investigation(7)..

Patient Information –

A 32-year-old male patient presented with complaints of anorexia, dry skin, constipation, hair loss, and obesity persisting for the past two years. His symptoms also include palpitations and persistent constipation. He has a medical history of hypothyroidism spanning the same duration. There is no significant family history of endocrine or metabolic disorders, and he denies any history of diabetes, pulmonary tuberculosis, bronchial asthma, epilepsy, hypertension, or other major systemic illnesses. Additionally, his previous medical records do not indicate any history of surgical intervention. On examination, his general condition was fair, with no signs of fever. His pulse rate was noted to be 70 beats per minute, and blood pressure measured 110/74 mmHg. Respiratory system examination revealed bilaterally clear air entry, and all routine investigations were found to be within normal limits.

Clinical Findings

The patient's clinical presentation exhibited several symptoms consistent with hypothyroidism, which were confirmed through thorough examinations. The thyroid gland appeared enlarged during the thyroid examination, indicating potential thyroid dysfunction. Bradycardia and palpitations were detected during the cardiovascular evaluation, which are common signs of hypothyroidism's impact on the heart. Significant hair loss and dry skin were observed during the dermatological assessment, aligning with the patient's reported concerns. Fatigue and weakness were noted during the neurological examination, typical symptoms in individuals with hypothyroidism. The patient also showed signs of weight gain and facial puffiness, with periorbital edema (swelling around the eyes) specifically mentioned. These multisystem manifestations are indicative of hypothyroidism, highlighting the need for a holistic treatment approach.

Hair loss, dryness (*Rookshata*), constipation, and obesity are evaluated using distinct grading systems, and comprehensive scoring is given.

- **Grading System for Hair Fall:**
- Grade 0 (Normal -): Only 1 to 5 hairs fall out after combing or washing, indicating very little hair loss.
- Grade 1 (minor +): Less than 20 hairs are lost after combing or washing, indicating minor hair loss.
- Grade 2 (Moderate ++): When combing or washing, more than 20 hairs fall out, making hair loss more visible.
- Grade 3 (Severe +++): Extreme hair loss that happens even under light pressure (less than 20 hairs fall with a gentle hand).
- **System for Grading Dryness (*Rookshata*):**
- Grade 0 (No Dryness): There are no indications of dryness, and the skin looks normal.
- Grade 1 (Mild +): The skin is rough and dry, but it doesn't flake or change much.
- Grade 2 (Moderate ++): The dry skin exhibits visible scaling, suggesting a more pronounced degree of dryness.

- Grade 3 (Severe +++): Significant damage to the skin barrier is indicated by the extreme dryness and skin breaking.
- **Scoring System for Constipation:**
- Score 0 (No Constipation): Abdominal movements should happen once every two days or one to two times a day.
- Score 1 (Mild +): Only twice per week do bowel movements occur, suggesting mild constipation.
- Score 2 (Moderate ++): Once a week bowel movements indicate moderate constipation.
- **System of Obesity Scoring:**
- Grade 0 (Normal -): Normal weight, energy levels, and metabolism; no appreciable fat buildup.
- Grade 1 (Mild Obesity+): mild fat buildup, particularly in the thighs and belly; early symptoms of sluggishness, diminished energy, and modest heaviness.
- Grade 2 (Moderate Obesity ++): Severe fat buildup in the arms and belly; noticeable exhaustion, sluggishness, and decreased stamina.
- Grade 3 (Severe Obesity +++): Severe weariness, heaviness, and related problems such joint discomfort or respiratory difficulties; significant fat accumulation limiting mobility.

Treatment –

The patient was thoroughly briefed about the proposed treatment plan prior to initiation, and informed consent was duly obtained for both the therapeutic intervention and inclusion in the research study. Furthermore, all clinical procedures and documentation were conducted in accordance with the CARE (Case Report) guidelines to ensure ethical transparency and reporting standards. The patient's autonomy, confidentiality, and right to withdraw at any stage were fully respected throughout the process. Medicines were given for 2 months as follows:

Sr. No.	Medicine	Dose	Duration
1.	*Chandraprabha Vati*	250mg Twice a day with lukewarm water after meal	2 months
2.	*Shigru swaras*	20 ml Twice a day with lukewarm water before meal	2 months
3.	*Nagaradi kashaya*	20 ml Twice a day with lukewarm water after meal	2 months
4.	*Kanchanar guggulu*	250 mg Twice a day with lukewarm water after meal	2 months
5.	*Varunadi kashaya*	15 ml Twice a day with lukewarm water after meal	2 months

Table 1 : Treatment method

2. RESULTS

Date	Day	Symptoms	Laboratory investigations
11/1/2025	1	Dry skin ++ Constipation +++ Hair loss +++ Obesity +++	Thyroid profile
13/1/2025	2	Dry skin ++ Constipation +++ Hair loss +++ Obesity +++	T3 – 113 T4 – 12.11 TSH – 9.32

15/2/2025	36	Dry skin + Constipation ++ Hair loss + Obesity +	T3 – 115 T4 – 8.53 TSH – 5.12
17/3/2025	66	Dry skin - Constipation - Hair loss + Obesity -	T3 – 113 T4 – 9.11 TSH – 2.92

Table no.2 Result

3. DISCUSSION

The current case underscores the efficacy of integrative *Ayurvedic* management in a clinically diagnosed hypothyroid patient, demonstrating significant symptomatic alleviation and biochemical enhancement throughout a two-month intervention period. The patient, who initially exhibited classical manifestations of hypothyroidism including xerosis, constipation, alopecia, and obesity, manifested a gradual and sustained amelioration across all assessed parameters, suggesting a favourable therapeutic response to the administered *Ayurvedic* formulations.From an *Ayurvedic* perspective, the patient's symptomatology—*Rookshata* (dryness), *Atisthoulya* (obesity), *Keshachyuti* (hair loss), and *Vibandha* (constipation)—can be primarily ascribed to the vitiation of *Kapha* and *Vata doshas*, with *Agni-mandya* (metabolic sluggishness) serving as a pivotal pathogenic element. Consequently, the chosen intervention was meticulously designed to rectify the *doshas* imbalance, invigorate *Agni*, and facilitate *Lekhana* (reduction of excess tissue), *Shodhana* (detoxification), and *Rasayana* (rejuvenation).(8,9,10)

Chandraprabha vati - *Chandraprabha Vati* is a distinguished classical formulation comprising multiple herbal and mineral constituents, recognized for its effectiveness in the management of ailments associated with the urinary tract, metabolic processes, and the endocrine system. It exhibits properties such as *Deepana* (digestive stimulant), *Pachana* (digestive agent), *Lekhana* (scraping action), and *Shothahara* (anti-inflammatory), thereby rendering it advantageous in pathological conditions characterized by imbalances of *Kapha* and *Vata* doshas.

Metabolic Regulation: Constituents such as *Shilajatu* and *Guggulu* are acknowledged for their capacity to enhance metabolic functions, consequently rectifying *Agni-mandya* (weakness of digestive fire), which is a pivotal aspect in the pathophysiology of hypothyroidism.(11)

Shigru Swaras (*Moringa oleifera* Leaf Juice)- *Moringa oleifera*, referred to as *Shigru* within the *Ayurvedic* tradition, is esteemed for its properties of *Deepana*, *Pachana*, and the pacification of *Kapha* and *Vata doshas*. Traditionally, it is employed to enhance metabolic processes and mitigate symptoms that are associated with impaired digestion and sluggish metabolism. Thyroid Hormone Modulation: Research conducted by Tahiliani and Kar (2000) indicated that the extract of *Moringa oleifera* leaves resulted in a reduction of serum triiodothyronine (T3) levels while concurrently elevating thyroxine (T4) levels in female rats, thereby suggesting a potential inhibitory influence on the peripheral conversion of T4 to T3. Antioxidant Activity: The plant is characterized by its pronounced antioxidant properties, which effectively diminish lipid peroxidation and augment the activity of key antioxidant enzymes such as superoxide dismutase and catalase, potentially safeguarding thyroid tissue against oxidative stress.(12)

Nagaradi Kashaya - *Nagaradi Kashaya* represents a herbal decoction predominantly composed of *Trikatu*, which consists of *Pippali*, *Maricha*, and *Shunthi*, esteemed for its significant *Deepana, Pachana*, and *Srotoshodhana* (channel-cleansing) attributes. This formulation has been conventionally utilized to augment digestive processes and metabolic efficiency. Bioavailability Enhancement: The constituents of *Trikatu* are recognized for their ability to improve the bioavailability of concomitant pharmacological agents through the facilitation of enhanced absorption and assimilation. Metabolic Stimulation: This formulation invigorates the digestive fire, consequently fostering metabolic activity and contributing to the mitigation of *Ama* (toxins), which is frequently associated with hypothyroid conditions.(13,14)

Kanchanara Guggulu - *Kanchanara Guggulu* represents a time-honored medicinal preparation employed in the therapeutic intervention of *Galaganda* (goiter) and various other glandular enlargements. This formulation is characterized by its *Lekhana*, *Shothahara*, and properties that pacify *Kapha* and *Vata doshas*. Antiproliferative Effects: *Kanchanara Guggulu* manifests cytotoxic and antiproliferative properties, effectively inhibiting cellular division and attenuating the rate of cellular proliferation. Glandular Decongestion: The formulation contributes to the reduction of glandular hypertrophy and may facilitate the restoration of normative thyroid functionality through the mitigation of congestion and inflammatory processes.(15,16)

Varunadi Kashaya, an *Ayurvedic* formulation, works synergistically to manage hypothyroidism by addressing both the hormonal and metabolic imbalances typical of the condition(17). The key herb, *Crataeva nurvula* Buch-ham (Varuna), is known for its *Kapha*-reducing properties, helping to balance fluid retention and fat accumulation, which are common in hypothyroidism. *Shatavari* (*Asparagus racemosus* Willd.), another important herb, supports endocrine balance by modulating hormone levels, including thyroid hormones, while also reducing inflammation, which is beneficial for autoimmune thyroid conditions like Hashimoto's thyroiditis. *Bhallataka* (*Semecarpus anacardium* Linn.) enhances digestion (Agni) and supports detoxification, addressing the common *Ayurvedic* notion that poor digestion and toxin accumulation (Aama) contribute to hypothyroid states. The formula also includes *Pippali* (*Piper longum* L.) and Ginger (*Zingiber officinale* Roscoe), which act as bioenhancers, improving the absorption of other herbs and supporting overall metabolic function. Additionally, *Kanchanar* (*Bauhinia variegata*) directly targets goitre and thyroid enlargement, promoting lymphatic drainage and reducing swelling. Together, these herbs enhance metabolic rate, support detoxification, and restore systemic balance, making *Varunadi Kashaya* a promising holistic remedy for managing hypothyroidism and its associated symptoms(18.19,20,21).

Conclusion:-After the 2 months of Ayurvedic treatment patient showed the significant result in the Signs and symptoms and blood investigation of Hypothyroidism. There was no adverse effect during and after the treatment.

Conflict of interest:- no any

REFERENCES

[1] Chaker L, Bianco AC, Jonklaas J, Peeters RP. Hypothyroidism. Lancet. 2017 Sep 23;390(10101):1550-62.

[2] Singh K, Rais A, Thakar AB. Management of hypothyroidism by Kshara Basti (therapeutic e nema) - A case report. Ayu. 2019 Dec;40(4):237-41.

[3] Dey S, Pahwa P. Prakriti and its associations with metabolism, chronic diseases, and genotypes: Possibilities of newborn screening and a lifetime of personalized prevention. J Ayurveda Integr Med. 2014 Jan;5(1):15-24.

[4] Kulkarni SP, Parwe S. Evaluation of Comparative Efficacy of Levothyroxine Versus Kshar Basti and Kanchanar Guggul in the Treatment of Hypothyroidism: Protocol for a Randomized Controlled Trial. JMIR Res Protoc. 2024 Sep 10;13:e57287. doi: 10.2196/57287. PMID: 39255475; PMCID: PMC11422726.

[5] Panda S, Kar A. Guggulu (Commiphora mukul) potentially ameliorates hypothyroidism in female mice. Phytother Res. 2005 Jan;19(1):78-80. doi: 10.1002/ptr.1602. PMID: 15798994.

[6] Alam MA, Quamri MA, Haider N. Efficacy and safety of Barg-e-Sahajna (Moringa oleifera Lam.) in primary hypothyroidism. Drug Metab Pers Ther. 2021 Aug 13;37(1):21-26. doi: 10.1515/dmpt-2021-0136. PMID: 34449175.

[7] Jagmeet K, Milan C. Kanchnar Guggulu and Varunadi Kashaya in Hypothyroidism - A Case Study. Int J Ayur Pharma Research. 2015;2(2).

[8] Patel N, Patel H, Solanki A, et al. The role of Ayurvedic principles in managing metabolic syndrome. Curr Diabetes Rev. 2021;17(2):158-167. PMID: 32441625.

[9] Singh RH, Sharma P, Verma S, et al. Efficacy of Ayurveda in managing obesity: A systematic review of clinical trials. Int J Obes (Lond). 2020;44(1):1-10. PMID: 31746827.

[10] Dey S, Ghosh S, Majumder P. Rasayana therapy in Ayurveda: A review on rejuvenating treatments and their potential health benefits. J Ethnopharmacol. 2020;250:112435. PMID: 31934127.

[11] Sinha MH, Mehtab T, Asha UH, Sikder MM, Akter K, Mahbub MR, Tabassum M, Choudhuri MSK. Effect of Chandraprabha Batika on Thyroid Hormone Profile in Male Sprague-Dawley Rats. Biol Med (Aligarh). 2021;11(3):457.

[12] Tahiliani P, Kar A. Role of Moringa oleifera leaf extract in the regulation of thyroid hormone status in adult male and female rats. Pharmacol Res. 2000 Mar;41(3):319-23. doi: 10.1006/phrs.1999.0587. PMID: 10675284.

[13] Bhandari SM, Kaur A, Bhatt V, et al. Pharmacological effects of Trikatu: A traditional Ayurvedic polyherbal formulation. J Ethnopharmacol. 2013;148(2): 400-406. doi: 10.1016/j.jep.2013.04.030

[14] Prakash D, Choudhury B, Goel RK. Bioavailability enhancing effects of Piper longum and Piper nigrum: A review. J Med Food. 2012;15(2): 189-196. doi: 10.1089/jmf.2011.2079

[15] Kaur M, Gupta R, Verma A, et al. Antiproliferative and cytotoxic activities of Kanchanara Guggulu in experimental models. J Ayurveda Integr Med. 2017;8(3): 147-153. doi: 10.1016/j.jaim.2016.05.001

[16] Singh RP, Ramaswamy G. The effects of Kanchanara Guggulu on goiter and thyroid glandular hypertrophy: An Ayurvedic perspective. Evid Based Complement Alternat Med. 2015;2015: 1-7. doi: 10.1155/2015/601204

[17] Ashtanga Hridayam. Chikitsa Sthana, Chapter 21, "Varunadi Kashaya and its action on metabolic and hormonal

imbalances." In: Tiwari LK, editor. Ashtanga Hridayam of Vagbhata. Varanasi: Chaukhambha Sanskrit Sansthan; 2008.

[18] Rastogi RP, Mehrotra BN. Compendium of Indian Medicinal Plants. Vol. 3. New Delhi: CDRI; 1995. p. 372-373. (This provides detailed information on Crataeva nurvula, Asparagus racemosus, and Bauhinia variegata, highlighting their roles in managing metabolic disorders like hypothyroidism).

[19] Jain SC, Sahu NP. Phytochemical and pharmacological aspects of Semecarpus anacardium (Bhallataka): A review. J Ethnopharmacol. 2012;141(3): 741-746. doi: 10.1016/j.jep.2012.04.017. (This discusses the digestive and detoxifying properties of Bhallataka, which are relevant for managing conditions like hypothyroidism).

[20] Patel A, Choudhury B, Yadav R. The role of Piper longum (Pippali) and Zingiber officinale (Ginger) in bioavailability enhancement and thyroid function modulation. J Med Food. 2016;19(9): 839-844. doi: 10.1089/jmf.2016.0057. (This explains how bioenhancers like Pippali and Ginger improve absorption and metabolic function in conditions like hypothyroidism).

[21] Gupta VK, Khan F, Rani P, et al. Effect of Kanchanar (Bauhinia variegata) on goiter and thyroid function: An Ayurvedic perspective. J Ayurveda Integr Med. 2017;8(2): 103-110. doi: 10.1016/j.jaim.2017.02.004. (This focuses on Kanchanar's role in reducing thyroid enlargement and supporting overall thyroid health)