

## AYURVEDIC MANAGEMENT OF *SHWITRA* (VITILIGO): A CASE REPORT

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### ABSTRACT

Vitiligo is the most common pigmentation disorder, resembles the *Shwitra/Kilasa* (Vitiligo Vulgaris) in *Ayurvedic* text due to its characteristic appearance. It is caused by the vitiation of *Vata*, *Pitta*, *Kapha Dosha* (bodily humour), *Rakta* (blood), *Mamsa* (muscle), and *Meda* (fat) *Dhatu* (tissue) called *Dushya* (liable to be spoilt). *Shwitra* does not cause any harm as such but is a very serious cosmetic problem that affects the emotional, psychological, and social well-being of the affected individual. A 23 year-old female diagnosed with Vitiligo Vulgaris (*Shwitra*), presented with complaints of increasing area and number of depigmented patches of skin, was managed by the following *Ayurveda* principles. A treatment protocol was made based on the signs and symptoms observed in this patient. The protocol includes *Shamana* (pacifying) treatment with a combination of powdered herbal drugs, viz., *Panchanimba Churna*, *Bakuchi* (*Psoralea corylifolia*), *Vidanga* (*Embelia Ribes*), *Triphala* powder, and *Arogyavardhini Vati* (tablet) orally along with *Bakuchi Taila* (oil) for local application. The treatment protocol was found to be effective, which may be adopted in future cases, using different combinations of drugs based upon the different *Ayurvedic* parameters for better results.

**Keywords-** Leucoderma, *Shwitra*, *Shweta Kushtha*, Vitiligo, white patches, case report

**INTRODUCTION:** At present time skin problems are increasing day by day. The most probable reason for skin diseases may be radiation, food habits, pollution, physical inactivity etc. The incidence of vitiligo is found about 0.25 - 4% in India<sup>i</sup>.

The skin is the outermost layer of the body that serves as a protective covering for the body<sup>ii</sup>. All types of skin diseases in *Ayurveda* have been classified under the '*Kushtha*'. *Kushtha* as well as *Shwitra*, are considered *Raktaja Vikara* (diseases arising due to the vitiation of blood),<sup>iii</sup> in *Ayurvedic* texts. Again, *Rakta* and *Pitta* are related to each other as per the *Ashraya-Ashrayi Bhava*

(mutual interdependence). The term '*Shwitra*' is derived from its root word *Shweta*, which means white patch. So, *Shwitra* is a disorder where the body develops white patches.<sup>iv</sup> *Acharya Charaka* mentions that *Shwitra* occurs in the third layer of skin.<sup>v</sup> *Acharya Sushruta* mentions it in the fourth layer of skin.<sup>vi</sup>

*Nidana* (causative factors) of *Shwitra* includes bad deeds of the past life, and improper social behaviour like insulting elders<sup>vii</sup>. Other factors of diet are the same as *Kushtha*. Food that vitiates *Pitta* and *Rakta* is responsible for this disease. *Shwitra* is of three varieties, namely *Daruna*, *Charuna*, *Kilasa*. *Shwitra*

is considered as a type of *Kushtha Vikalpa* with the difference that *Shwitra* occurs in *Twak*, *Rakta*, *Mamsa* and *Meda Dhatu* without any form of discharge, and infection, whereas *Kushtha* involves all the *Dhatu*.<sup>viii</sup> Both of them are generally caused by the simultaneous vitiation of all three *Dosha*. In *Shwitra*, if the *Vata* is predominantly vitiated the symptoms are *Aruna Varna* (like morning sun) *Mandala* (patches), which are *Ruksha* (rough). If the *Pitta* is vitiated predominantly the symptoms are *Tamra Varna* (copper colour) patches resembling the *Padmapatra* (petals of lotus), with an extreme burning sensation, *Paridhvansi* (the affected part when rubbed peels off scales of dead skin), and vitiated by *Kapha* dominantly the affected part (skin) seems *Sweta*, *Snigdha* (unctuous), *Bahala* (thick) with itching sensation.<sup>ix</sup>

If *Shwitra* is located in *Rakta Dhatu*, it appears red, and in *Mamsa* it is

*Tamra* (coppery). The *Shwitra* caused by *Meda Dhatu*'s involvement is *Sweta* (white), which is a more serious form than the others.

Regarding the prognosis of *Shwitra*, it is said that, if the patches of *Shwitra* are matted together, if there are several patches, if the small hairs over the patches are red, and if the disease is chronic then this is an incurable form.<sup>x</sup> The patches which are expanding and overlapping, invading even the soles of the feet, the palms of the hands, and the region around the anus are called incurable. *Kilasa*, which is the outcome of a burn (cicatrix) should be considered incurable.<sup>xi</sup>

If the small hairs over the patches are not red, if the skin is thin and white, if the disease is not chronic, and if the space between two patches is raised, then the disease is curable.<sup>xii</sup>

### **Samprapti Ghataka (etiopathogenesis)**

**Table no. 1 Samprapti Ghataka in disease**

<b>Dosha</b>	<i>Tridosha (Pitta- Vatapradhana)</i>
<b>Dushya</b>	<i>Rasa</i> (plasma), <i>Rakta</i> (blood), <i>Mamsa</i> (muscles), <i>Meda</i> (fatty tissue) and <i>Lasika</i> (lymph)
<b>Adhishtana (location)</b>	<i>Twak</i> (skin)
<b>Strotas (channels)</b>	<i>Rasavaha</i> , <i>Raktavaha</i>
<b>Strotodushti</b>	<i>Sanga</i> (obstruction)
<b>Marga (pathway)</b>	<i>Bahya</i> (outer)
<b>Swabhava (type)</b>	<i>Chirkari</i> (chronic)
<b>Sadhyasadyata (prognosis)</b>	<i>Asadhya</i> (incurable), <i>Krichhsadhya</i> (difficult to cure)

**CASE REPORT:** 23 years old unmarried female patient visited OPD no. 3 of Skin Care Unit, *Sharir Kriya* department, NIA Jaipur presented with signs and symptoms like white spots with itching on back, legs, hands, and hips. Patches distribution was bilaterally asymmetrical and discoloration of body hairs was absent. The patient had

done IgE investigation on 14 September 2019, whose value was 240 IU/ml The patient was diagnosed as *Shwitra* according to *Ayurvedic* method of diagnosis. When the patient came to the OPD, the disease was in the active stage and new spots were increasing gradually.

The patient had the above complaints for the last 8 years. She took allopathic treatment for about 5-6 months in 2014 and got relief. Then again in 2016, the patient took allopathy, and homeopathy treatment but got no relief. The size of the patch gradually increased; new patches also occurred over other body parts. During this period, she experienced white coloured patches with itching all over her body. Patches were asymmetrical and no burning sensation was there over these areas. The patient tried various allopathic local as well as systemic drugs but none could cure the disease. Therefore, the patient came to the OPD for Ayurvedic treatment on 4 November 2020.

On personal examination it was found, the patient was vegetarian with the predominance of *Lavana* (salty) and *Katu* (spicy) *Rasa* (taste), had less appetite, *Madhyam Koshtha*, disturbed sleep, bowel & urine were normal, coated tongue and depressed emotional status. The vital of

the patient was normal. No history was found of any systemic illness.

*Atura Bala Pramana* (strength of individual) was assessed by *Dashavidha Atura Pariksha* (ten-fold examination of patients). *Prakriti* (constitution) of the patient was *Pitta-Kaphaja*; *Vaya* (age), *Sara*, *Samhanana*, *Pramana*, *Ahara*, and *Jarana Shakti* were *Madhyama*; *Satva*, *Vyayama Shakti*, and *Satmya* were *Avara*, *Vikriti* was *Kapha-Pittaja*.

On skin examination, it was revealed that Bilateral irregular white patches with itching and dryness were present on the skin. *Roma Vivaranta* (discolouration of vellus hair) and burning sensation were not observed in lesions.

**Consent details-** Informed written consent was taken from the patient.

#### **Treatment schedule-**

After proper examination and arriving at a conclusion of *Dosha*, *Dushya*, following treatment protocol was adopted for the management of the *Shwitra*.

**Table no. 2 treatment schedule**

DATE	MEDICINE & DOSE	DURATION
04/11/2020	<b>BEFORE FOOD</b> Tab. Pigmento 2 tab twice a day with water <i>Arogyavardhini Vati</i> 500 mg twice a day with Syp. <i>Liv-Amritam</i> 20 ml	1 Month
	<b>AFTER FOOD</b> 1. <i>Shashilekha Vati</i> 250 mg with <i>Babachi Rogan</i> 4 drops + 1 teaspoon honey 2. <i>Bakuchi Churna</i> 1 gm + <i>Vidanga Churna</i> 1 gm + <i>Panchnimba Churna</i> 1 gm with syp. <i>Leukoskin</i> 20 ml twice a day	
	<b>AT NIGHT</b> <i>Triphala Churna</i> 3 gm with Luke warm water	
	<b>For local application-</b> leukoskin ointment With sunbath (during sunrise)	
7/12/2020	Continue same treatment (CST)	3 Month
24/03/2021	CST	1 Month
28/04/2021	CST + Cap. <i>Leucoderma</i> 1 + Cap. <i>Neuderm forte</i> 1 with water	3 Month

	twice a day	
26/07/2021	CST	3 Month
27/10/2021	CST + BEFORE FOOD SIVA Drops 4 drops with water twice a day	1 Month
29/11/2021	CST +Tab. <i>Swambhu Guggulu</i> 500 mg With <i>Khadirarishta</i> 20 ml + equal amount of water For Lepa- Reddish seeds, Chakramarda seeds, <i>Bakuchi</i> seeds in equal amount mix with Gomutra apply once a day	1 Month

### Follow-up and outcome

The patient was examined and assessed for about 13 months during each follow-up to note the changes in skin pigmentation during the *Shamana* treatment.

**Table no. 3 Follow-up and outcome**

S. No.	Follow-up	Date	Status of patient	Medicine
1.	1 <sup>st</sup> visit (0 day)	4/11/2020	-	
2.	2 <sup>nd</sup> visit (34 days)	7/12/2020	Relief in symptoms like <i>Mandagni</i> , and bowel habits, and stopped producing new patches.	CST (Continue same treatment)
3.	3 <sup>rd</sup> visit (108 days)	24/03/2021	Depigmented patches gradually started to become pink and itchy	CST
4.	4 <sup>th</sup> visit (36 days)	28/04/2021	Redness increased in the area of Patches and relief in itching.	CST + Cap. Leucoderma + Cap. Neuderm forte
5.	5 <sup>th</sup> visit (91 days)	26/07/2021	Normally pigmented spots started to appear in the affected areas. Pigmentation over the legs started early followed by pigmentation over the chest and back.	CST
6.	6 <sup>th</sup> visit (95 days)	27/10/2021	Re-pigmentation continued and changes in patches all over the body were observed.	CST+ SIVA Drops with water
7.	7 <sup>th</sup> visit (33 days)	29/11/2021	Most of the skin became normally pigmented and relieved in psychological symptoms.	CST + Tab. <i>Swambhu Guggulu</i> with <i>Khadirarishta</i> L/A- Reddish seeds+ Chakramarda seeds+ <i>Bakuchi</i> seeds+ <i>Gomutra</i>

**Table no. 4 Mode of action of formulations**

S. No.	MEDICINE	INGREDIENTS	MODE OF ACTION
1.	Pigmento tab. <sup>xiii</sup>	<i>Bakuchi</i> is the main ingredient of it. other ingredients include <i>Punarnava</i> and <i>Vindanga</i> , <i>Vacha</i> , <i>Neem</i> , <i>Kutki</i> , <i>Sharpunkha</i> .	It has multiple actions in vitiligo- melanogenic, immunomodulator, Anti-inflammatory, Anxiolytic and Antioxidant.
2.	<i>Arogyavardhini Vatika</i> <sup>xiv</sup>	<i>Shuddha Para</i> , <i>Shuddha Gandhaka</i> , <i>Lauha Bhasma</i> , <i>Abhraka Bhasma</i> , <i>Tamra Bhasma</i> , <i>Triphala</i> , <i>Shuddha Shilajatu</i> , <i>Shuddha Guggulu</i> , Bark of <i>Chitrakmool</i> , <i>Kutki</i> .	The <i>Arogyavardhini Vatika</i> has pharmacological action like <i>Kushthanasaka</i> , <i>Tridosha Jwaranashaka</i> . Also, the drug has the properties like- <i>Deepana</i> , <i>Pachana</i> , <i>Pathya</i> , <i>Hridya</i> , <i>Medonashaka</i> , <i>Malashuddhikari</i> , increase <i>Kshudha</i> , and <i>Sarvaroga Prashamani</i> .
3.	<i>Vidanga Churna</i> <sup>xv</sup>	<i>Vidanga</i>	It is one of the powerful anti-parasitic drugs mentioned in <i>Ayurveda</i> texts. It is widely used in intestinal worm infestation. <i>Acharya Charaka</i> includes <i>Vidanga</i> in <i>Krimigna</i> and <i>Kushtaghna</i> groups.
4.	<i>Panchnimba Churna</i> <sup>xvi</sup>	<i>Nimba Panchanga</i>	<i>Panchanimba Churna</i> is used for all types of skin diseases like <i>Kushtha</i> , <i>Visharpa</i> , <i>Arsha</i> , <i>Nadivrana</i> , <i>Dushtavrana</i> , <i>Kamla</i> etc.
5.	<i>Shashilekha Vati</i> <sup>xvii</sup>	<i>Shuddha Parada Suddha Gandhak</i> and <i>Tamra Bhasma</i> and <i>Bakuchi</i> seeds.	It acts on <i>Dosha</i> , <i>Dhatu</i> by properties of <i>Sukshma</i> , <i>Tikshna Guna</i> , and <i>Ushna Veerya</i> . Psorelin present in <i>Bakuchi</i> oil acts on the mucosal layer of skin and irritates it. Due to irritation blood supply and melanocytes in the skin increased. They further exude and diffuse into the decolorized area and pigmentation take place.
6.	<i>Khadirarishta</i> <sup>xviii</sup>	contains mainly <i>Khadira</i> , <i>Devdaru</i> , <i>Bakuchi</i> ,	it purifies the blood, improves digestion, and shows some

		<i>Daruharidra, Triphala</i> etc.	laxative effects. <i>Khadirarishta</i> has a special effect on blood, skin, and GIT. It removes toxins and pathogens from the body, purifies the blood, and clears skin and lymph.
7.	Tab. Nuderm forte	Contains <i>Bakuchi, Shirisha, Bramhi, Nagdamni, Khadira Punarnava Nimba, Amalaki, Haridra, Vidanga, Krouncha, Saribaha, Chitraka, Manjishtha, Maricham, Swarnamakshika Bhasma</i>	All these ingredients are used in <i>Twak Roga</i> .
8.	Syp. Livamritam	Consists of <i>Bhumi Amla, Punarnava, Bhringraj, Makoya, Arjuna, Triphala, Sharpunkha, Giloya, Mulethi, Kasani, Kutki, Daruharidra, Amalatas.</i>	All these ingredients effect on the liver, improve metabolism and remove <i>Dosha</i> from the body.
9.	SIVA drops	contains <i>Vembu (Indigofera aspalathoides), Malkangani (Celastrus paniculatus), Karpur (Cinnamomum camphora)</i> etc.	These ingredients are immune modulators, which cure autoimmune skin disorders like Psoriasis, vitiligo and protect from chronic and recurrent infections.
10.	Seeds of <i>Chakramarda</i> <sup>xix</sup>	<i>Chakramarda</i>	effects on skin and cure skin disorders like <i>Dadru, Kushtha, Sidhma, Pama, Kandu Krami</i> etc.
11.	<i>Swayambhuva Guggulu</i>	<i>Bakuchi</i> ( <i>Psoralea corylifolia</i> Linn.)	It contains psoralens which cause erythematic and residual pigmentation over hypopigmented skin. In Leukoderma melanoblasts cells are not functioning properly and their stimulation by oil leads to the form of an exude pigment which gradually diffuses into the decolorized areas. <sup>xx</sup>

## RESULT

### Before treatment (0 day)



[Figure 1]



[Figure 2]

### After treatment (At 13 month)



[Figure 3]



[Figure 4]

**DISCUSSION:** The progression of vitiligo is rapid, so the management should be taken in proper time to arrest the pathogenesis<sup>xxi</sup>. According to modern review, the signs, and symptoms of *Shwitra* are similar to vitiligo. Vitiligo is an acquired, idiopathic, and common depigmentation disorder which is progressive, well-circumscribed, and presents as depigmented patches over skin or mucosa that appear after birth and are characterized histologically reduction of dopa-positive melanocytes in the lesion. According to *Ayurveda Shwitra* is *Pitta (Bhrajaka Pitta)* dominant *Tridoshaja*

*Vyadhi*, which vitiates *Twak (Rasa Dhatu)*, *Rakta*, *Mamsa*, and *Lasika* i.e., *Kushtha Dravya Samgraha*.<sup>xxii</sup> Consumption of causative factors of *Shwitra* causes *Dosha* vitiation and *Shaithilyata* (looseness) in the *Dhatu (Twak, Rakta, Mamsa, Lasika)* simultaneously.

In the present case report, the patient was a student having more stress and belonged to middle age. At this age, students live stressful life due to carrier and future goals. In addition, vitiligo patients experience severe psychological effects and exhibit anxiety, depression, social stigma, and impaired quality of life. Stress

increases the levels of catecholamines, neuropeptides, and cortisol that are higher in vitiligo patients suggesting their role in the pathogenesis of vitiligo.<sup>xxiii</sup> The patient had *Kaphaja & Medodhatugata Shwitra*, which was assessed according to clinical signs & symptoms, and patient belonged to *Kapha-Pitta Prakriti*. The drugs used in the patient mainly consist of *Tikta*, and *Kashaya Rasa*, which have *Kapha-Pitta Shamaka* effects. The disease *Shwitra* has involved *Bhrajaka Pitta* dominancy, so these drugs are effective. Also, in the disease *Shwitra Kapha Dosha* and *Medo Dhatu* are involved, and most of the drugs given are *Laghu*, *Ruksha* in *Guna*, and *Lekhaniya* in *Karma*. which has brought causative factors to *Samya* state. According to *Prabhava*, most drugs have the *Kushthagna* effect and *Shwitra* is also a type of *Kushtha*. For external application, *Lepa* of *Bakuchi*, *Chkramarda* and *Muli* seeds, was applied with *Gomutra*. *Bakuchi* is *Kapha-Vatanashaka*, *Chkramarda* is *Pitta-Vatanashaka* and both are indicated for skin disease<sup>xxiv</sup>, *Muli* has *Tridoshanashaka* effect. *Gomutra* has *Katu*, *Tikta*, *Kashaya Rasa* and *Kilasanashaka* (type of *Shwitra*) *Guna*<sup>xxv</sup>. Due to all these properties, the treatment was effective in *Shwitra*.

## CONCLUSION:

The patient suffering from chronic *Shwitra* was treated with Ayurvedic medicine along with *Nidana Parivarjana*. From the above discussion, it is concluded that *Ayurvedic Shamana Chikitsa* using combination of powdered Ayurvedic drugs, like *Panchanimba Churna*, *Bakuchi (Psoralea corylifolia)*, *Vidanga (Embelia Ribes)*, *Triphla Churna* and *Arogyavardhini Vati* orally along with the local application of *Bakuchi Taila* and *Leukoskin* ointment is effective in the management of *Shwitra*. Chronicity is also a factor that affects the prognosis of the disease so, the duration of treatment should be increased for complete remission/relief.

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