



## Unani Aspects of Baras (Vitiligo)- A Review Article

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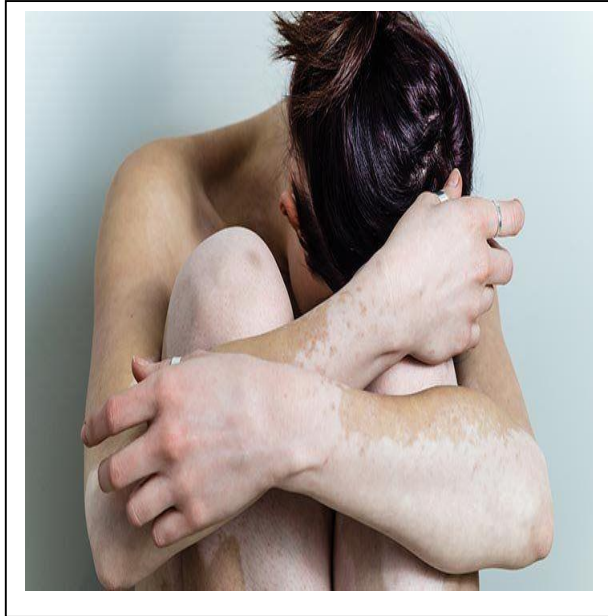
### Abstract

Baras (Vitiligo) is an acquired pigmentary, multifactorial, Polygenic disorder, with a complex pathogenesis. It is a common depigmenting disorder has an estimated prevalence of 0.5-2% of the population worldwide. The disease is characterized by the selective loss of melanocytes which results in typical non scaly, chalky white macules. The main effect of Baras (Vitiligo) is in the form of psychological impact of the disease. In unani system of medicine (USM) Baras is caused due to weakness of Quwat –e- Mughaiyirah wa Mushabbiha (transformative faculty) of the skin and the liver. Besides these Fasad-ud – Dam (impairment of blood) and Burudat –ud-Dam (coldness of blood) also play an important role in aggravating Baras. The role of diet (restrictions and recommendations) are well documented in the classic unani literature in the management of Baras (Vitiligo). The Management of Baras (Vitiligo) involves Tanqiya –e-Badan. It is performed in three steps: administering Munzij –e-Balgham drugs till Nuzj appears followed by three mushily (Purges) and Tabreed (Cooling agents) after every Ishal.

**Keywords:** Baras, vitiligo, USM, Quwat-e- Mughaiyirah wa Mushabbiha, Fasad –e-Dam

## I. Introduction Baras (Vitiligo)

Baras (Vitiligo) is a disorder of pigmentation characterized by the presence of depigmented skin macules due to chronic and progressive loss of melanocytes from the epidermis. Localised depigmentation with a family history of the condition is found in one third of the patients<sup>1</sup>. Large population surveys have shown a worldwide incidence of 0.5-2%, with the disease beginning before the age of 20 in 50% of cases. In India the incidence among dermatology outdoor patients is estimated to be between 3-4 percent. Vitiligo



**Fig. 1 Baras-A Common skin Problems**



**Fig. 2 Baras-Vitiligo-Skin Dieases**

commonly affects the face and extremities and is often immediately visible to others and hence provokes high level of distress associated with appearance concerns<sup>[2, 3, 4]</sup>. Baras (Vitiligo) is clinically characterized by depigmented macules, which are chalky or milky white. Sometimes, pigment loss is partial and occasionally 3 shades are seen in the same lesion (Trichrome).

Macules have scalloped outline and forming geographical pattern on fusion with neighbouring lesion. Linear lesions often seen, due to koebner's phenomenon. Several patterns of Vitiligo recognized<sup>5</sup>:

Localised:-Focal (single or few macules in one anatomic area), Segmental-Lesions arranged linearly in a segment, Mucosal like lips and genitals, Lip-Tip (on the lips and finger tips), Generalised:-Acrofacial, Vitiligo vulgaris (most common) and Universalis<sup>6</sup>. The psychosocial impact of Vitiligo is comparable with other skin disorders like psoriasis and eczema. With the clinical guidelines, the main impact of Vitiligo is the psychological effect of the disease for example high level of emotional responses were reported, such as increased self-consciousness, lower self-esteem, higher level of perceived stigma and disability, anger, poorer quality of life overall and negative impact on sexual relationships<sup>[7, 8, 9, 10, 11]</sup>.

## II. History & Concept of (Baras) Vitiligo in Unan & Other Empire

Vitiligo is a disease that was observed very early in history, and most ancient civilizations and religions had some type of reference about lack of pigmentation. One of the earliest terms was "Kilas" in the Rig Veda, which was meant as similar to a white spotted deer. The Ebers Papyrus in 1550 BC mentioned two forms of depigmentation that could be interpreted as leprosy or depigmentation resembling vitiligo. By 1400 BC white leprosy spots were called Sveta khushtha in the Atharva Veda and in 1200 BC Japanese Shinto prayers described depigmentation in the Amarakosa. Around 600 BC, the Ashtanaga hridaya explained prognostic factors of depigmentation.

In 250 BC, Ptolemy II translated the Bible from Hebrew into Greek and in the Leviticus XIII (Old Testament), the word Zara'at used for different skin conditions was translated as "lepros" (scales) that was misinterpreted later on as leprosy and other hypopigmented disorders defined as unclean diseases. In 200 BC, the Indian Manu Smriti described "Sweta Kushtha" meaning "white disease" probably referring to vitiligo. Herodotus (484-425), the Greek historian, claimed that foreigners 'had sinned against the sun' and must leave the country. Years later, the term vitiligo was perhaps derived from the latin word vitelius and used to describe the white flesh of calves, and finally the word vitiligo was attributed to Celsus in his classic Latin book De Medicina in the first Century AD. Many centuries went by and vitiligo continued to be one of the most important depigmentation ailments worldwide provoking discrimination or segregation in certain cultures, where affected individuals were unable to get jobs or even become married most probably based upon ancient religious beliefs. After the middle ages, around 1533, Andreas Vesalius called the attention about the skin having two layers. Several decades later, Jean Riolan the Younger (1580-1657) separated the skin of a black subject into the upper black layer (horny layer) and the lower white layer "as snow" (dermis). In 1665, Marcello Malpighi proposed that skin colour was mainly determined by the granules of stratum mucosum, not those of stratum corneum or dermis. Finally, Giosue Sangiovanni in 1819 was the first to describe melanocytes in the squid, which he termed as 'chromatophores'. In 1837, Friedrich Henle also identified pigment producing cells in human epidermis, as identical to pigment cells of the eye. In 1879, Moritz Kaposi was one of the first to observe lack of pigment granules in the rete pegs of vitiligo. To close this chain of historical events, Bruno Bloch in 1917 described the DOPA reaction demonstrating the melanin synthesizing enzyme tyrosinase within the melanocyte.



**In the early 19th century, the boy George Alexander was exhibited without clothes as “The Beautiful Spotted Negro Boy” in so-called freak shows because of his vitiligo.**

**Fig. 3 Baras-Since Ancient Rome and Greek**

In summary, around 4000 years of known history elapsed from the time man became aware of disturbing white spots on the skin until the melanocyte was finally identified as the responsible actor for depigmentation and other pigmentary disorders.

According to Jalinoos (Galen) as mentioned in the manuscript Moalijat –e-Buqratiya, the cause of Baras is the weakness of quwwat-e- Mughaiyarahwa Mushabbiha (Transformative faculty) in the organs [12]. Rabban Tabri while describing the aetiology of Baras in his famous book Firdous al –Hikmat says: Fasad –ud –dam (impairment of blood) and Burudat-ud –dam (coldness of blood) are the main causes of Baras. If the digestive faculty of the body cannot digest the food properly, the blood of the whole body becomes impure. When this impurity occurs due to Balgham (phlegm) or coldness, it appears as Baras [13]. Zakariya–Al-Razi (Rhazes) has given a comprehensive description of this disease. Here are a few excerpts from his most esteemed work Al Hawi [14]. Sometimes Bahaq Abyaz (Vitiligo Alba) reaches a stage when grayish hairs grow on patches. To examine whether it is curable or not, affected areas are rubbed; if the patches do not turn red then prick the lesion, if whitish fluid comes out, the possibility of recovery is remote and vice versa. Bahaq is like Wazah (leucoderma) and it does not penetrate as deep as does baras. In baras hairs also become grey along with patches, and this greyishness is due to phlegm.

According to Razi if white patches of baras do not turn red on rubbing or when instead of blood white fluid comes out on pricking them, the possibility of recovery is remote. If the white patches are limited and non-extensive and the color of the patches is yellow or reddish early cure can be expected. Conversely, when baras is extensive and widely spreading and where the affected areas become bloodless and the colour of the patches is cloudy, it is incurable. He also adds that the patches on the feet and head do not respond to treatment adequately. Shamoon as quoted in Razi’s Al-Hawi says: Bars occurs due to frequent use of such food articles that contain water in excessive quantity.

**Ibn-e- Sarabiyoon (as quoted in Razis Al Hawi) says:**

If the Baras spreads over a large portion of the body or when it becomes highly chronic or when milky fluid comes out on pricking the baras patch, it is not curable and vice versa.

Al Majusi in his masterpiece Kamil al-Sana'ah says: Baras is whiteness occurring in outer surface of the body. Sometimes it affects few organs and sometimes it affects all organs. Consequently whole body becomes white. The disease occurs due to increase of phlegmatic humor in the blood, and due to weakness in Quwwat-e- Mughaiyarh in the organ. As far as the symptoms are concerned, the organ becomes white, even hairs also turns white. If the skin is punctured with needle, the white fluid oozes instead of blood, there is no chance for cure. When Baras becomes chronic the treatment is difficult. The primary step in treatment of this disorder is to restrict the intake of phlegm forming foods such as milk, fresh fish and cold wet edibles. Besides, this the patient should be given honey, Turbud, Ghariqoon, Shahm-e- Hanzal, Habb –un – Neel etc.

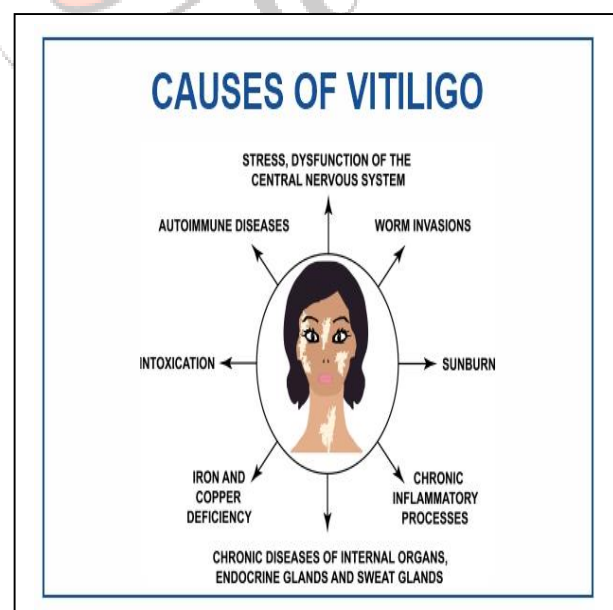
[15]

**Ibn-e-Sina (Avicenna) in his medical encyclopedia says [16]**

The third factor is Tashbeeh, The power which converts the nutrients and gives them the form of tissue. In normal condition, This shape is perfect by all means according to the characteristics of that particular tissue, by its consistency color etc. Sometimes this function of Ghazia is deranged as seen in case of Baras or Bahaq, in both the instances the nutrient material reaches the tissue and is retained there but does not take proper form due to failure of this shaping power. In the above reference, Avicenna says that the defects lie at the tissue level in the function of Quwwat-e- Mushabbaha. Therefore due to failure of this power depigmentation occurs. Daud Antaki in his Tazkira opines about the treatment of Baras in the following words: It is known that the matter responsible for Bars-e-Abyaz (Vitiligo) is Balgham (Phlegm) and for Baras-e- Aswad is Sauda (Black Bile). Therefore it is essential that if the matter is solid or the season is winter, the matter should be dissolved by coctives and expelled out by purgatives.



**Fig. 4 Sign and Symptoms of Baras**



**Fig. 5 Causes of Baras**

### III. Causes of Vitiligo. (Asbab-e-Baras)

It is hard to determine the exact cause of every occurrence of vitiligo. However, some of the identified causes include:

- Autoimmune disorders
- Genetic or inherited factors
- Caused by malfunctioning of nerve endings (neurogenic)
- Disorders with cell death machinery lead to the self-destruction of melanocytes
- Traumatic incidents including cuts and burns

Physical or emotional stress is sometimes known to exacerbate vitiligo.

### IV. Types of Vitiligo (Aqsam-e-Baras)

- Non-segmental vitiligo - This is the most common type affecting almost 90% of the cases. The condition usually presents as patches appearing on both sides of the body symmetrically. This kind of vitiligo is further divided into:
  - Generalized or universal leukoderma - White patches occur anywhere in the body
  - Focal vitiligo - is usually found in children and restricted to one area
  - Acrofacial vitiligo - causes loss of pigment around fingers, lips, and near the orifices like mouth, nostrils, and upper lids.
  - Mucosal leukoderma - occurs only on mucous membranes
- Segmental Vitiligo - This kind of vitiligo is restricted to one side of the body. This is the type of vitiligo seen in about 10% of cases whereas 90% is non-segmental. The appearance is different from the non-segmental variant and the treatment is also different.

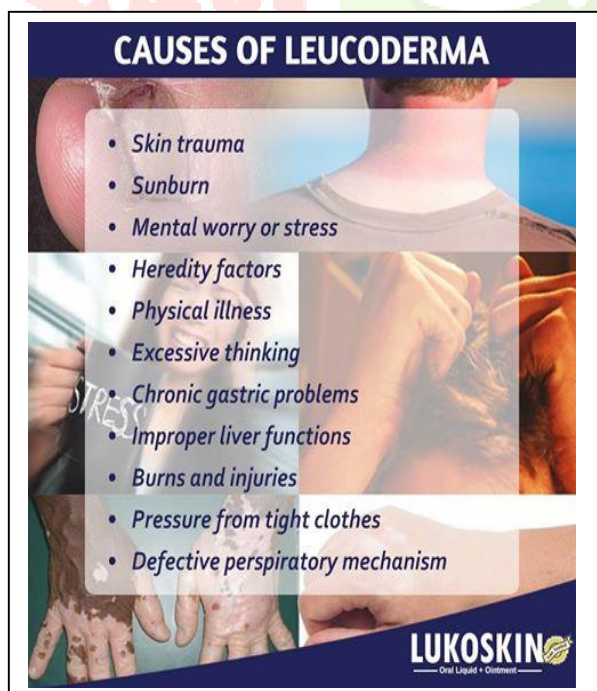


Fig. 6 Causes of Baras

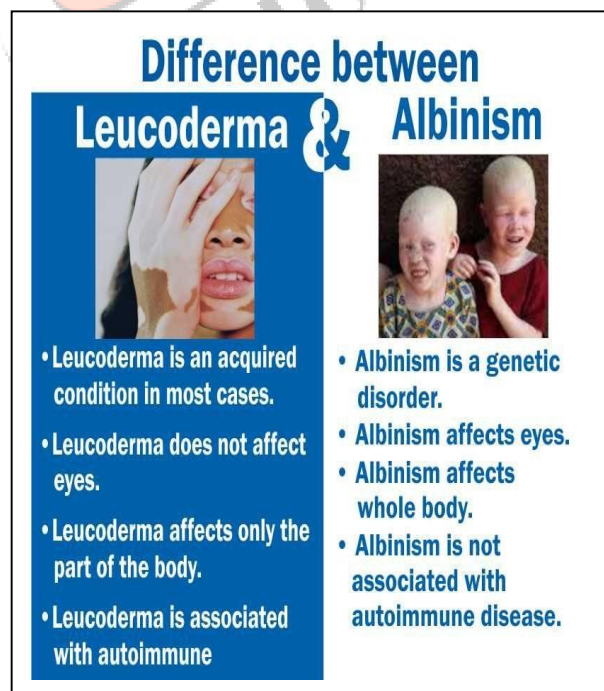


Fig. 7 Difference between Baras & Albinism

## V. Sign and Symptoms of Vitiligo (Alamat-e-Baras)

- Loss of pigment, especially in areas exposed to the sun
- Spreading of white patches after injury
- Itchy feeling over white patches on exposure to sun or sweat
- Spreading prominent patches
- Grey hair
- Change in color of eye

## VI. Role of Diet in Baras (Vitiligo)

The role of diet (restrictions and recommendations) is well documented in the classical unani literature in the management of various diseases. Baras being a metabolic derangement is influenced by many factors, such as; social, psychological, metabolic, diet and several other predisposing factors. Based on the clinical experience Unani physician have documented the guidelines for diet (restrictions and recommendation). The diet with hot properties should be used. Cold and moist foods such as fish, milk, and milk products have to be avoided. Baras occurs due to continuous use of such food articles which contain water in excessive quantity. Hippocrates had restricted milk and its products and has recommended use of meat and birds flesh. He was of the opinion that the patient of baras should not take food unless there is need. Ibne Sarabiyoona has restricted the cold diet and moist foods like fish, milk, moist vegetables and fruits. He also advised to eat such food which produces hot and dry temperament. Majusi was of the opinion that patients of baras should not give diet which produces Buroodat in the body [12, 14, 15].

## VII. Diagnosis of Vitiligo [5, 6]

- The diagnosis of the Vitiligo is usually based on clinical examination.
- However, in the early stage or in fair skinned patients Woods lamp, a portable ultraviolet device which emits long wave ultra violet A (365nm) can help to diagnose Vitiligo.
- Presence of leucotrichia.
- Presence of Koebner's Phenomenon.
- Prediction for the sites of trauma.

## VIII. Treatment of Baras.

The choice of treatment depends on your age, how much skin is involved and where, how quickly the disease is progressing, and how it's affecting your life. Medications and light-based therapies are available to help restore skin color or even out skin tone, though results vary and are unpredictable. And some treatments have serious side effects. So your health care provider might suggest that you first try changing the appearance of your skin by applying a self-tanning product or makeup. If you and your health care provider decide to treat your condition with a drug, surgery or therapy, the process may take many months to judge its effectiveness. And you may have to try more than one approach or a combination of approaches before you find the treatment that works best for you. Even if treatment is successful for a while, the results may not last or new patches may appear. Your health care provider might recommend a medication applied to the skin as maintenance therapy to help prevent relapse.

## A. Medications

No drug can stop the process of vitiligo -the loss of pigment cells (melanocytes). But some drugs, used alone, in combination or with light therapy, can help restore some color.

- **Drugs that control inflammation.** Applying a corticosteroid cream to affected skin might return color. This is most effective when vitiligo is still in its early stages. This type of cream is effective and easy to use, but you might not see changes in your skin's color for several months. Possible side effects include skin thinning or the appearance of streaks or lines on your skin. Milder forms of the drug may be prescribed for children and for people who have large areas of discolored skin. Corticosteroid pills or injections might be an option for people whose condition is progressing rapidly.
- **Medications that affect the immune system.** Calcineurin inhibitor ointments, such as tacrolimus (Protopic) or pimecrolimus (Elidel) might be effective for people with small areas of depigmentation, especially on the face and neck. The U.S. Food and Drug Administration (FDA) has warned about a possible link between these drugs and lymphoma and skin cancer.

## B. Therapies

- **Light therapy.** Phototherapy with narrow band ultraviolet B (UVB) has been shown to stop or slow the progression of active vitiligo. It might be more effective when used with corticosteroids or calcineurin inhibitors. You'll need therapy two to three times a week. It could take 1 to 3 months before you notice any change, and it could take 6 months or longer to get the full effect. Given the FDA warning regarding possible risk of skin cancer with use of calcineurin inhibitors, talk with your health care provider about the risks and benefits of using these drugs with phototherapy. For people who can't go to a clinic for treatment, smaller portable or handheld devices for narrow band ultraviolet B therapy are available for home use. Talk with your health care provider about this option as well if needed. Possible side effects of narrow band ultraviolet B therapy include redness, itching and burning. These side effects usually clear up within a few hours after treatment.
- **Combining psoralen and light therapy.** This treatment combines a plant-derived substance called psoralen with light therapy (photo-chemotherapy) to return color to the light patches. After you take psoralen by mouth or apply it to the affected skin, you're exposed to ultraviolet A (UVA) light. This approach, while effective, is more difficult to administer and has been replaced in many practices by narrow band UVB therapy.
- **Removing the remaining color (depigmentation).** This therapy may be an option if your vitiligo is widespread and other treatments haven't worked. A depigmenting agent is applied to unaffected areas of skin. This gradually lightens the skin so that it blends with the discolored areas. The therapy is done once or twice a day for nine months or longer. Side effects can include redness, swelling, itching and very dry skin. Depigmentation is permanent.



## C. Surgery

If light therapy and medications haven't worked, some people with stable disease may be candidates for surgery. The following techniques are intended to even out skin tone by restoring color:

- **Skin grafting.** In this procedure, your doctor transfers very small sections of your healthy, pigmented skin to areas that have lost pigment. This procedure is sometimes used if you have small patches of vitiligo. Possible risks include infection, scarring, a cobblestone appearance, spotty color and failure of the area to recolor.
- **Blister grafting.** In this procedure, your doctor creates blisters on your pigmented skin, usually with suction, and then transplants the tops of the blisters to discolored skin. Possible risks include scarring, a cobblestone appearance and failure of the area to recolor. And the skin damage caused by suctioning may trigger another patch of vitiligo.
- **Cellular suspension transplant.** In this procedure, your doctor takes some tissue on your pigmented skin, puts the cells into a solution and then transplants them onto the prepared affected area. The results of this repigmentation procedure start showing up within four weeks. Possible risks include scarring, infection and uneven skin tone.

## Potential future treatments

Treatments being studied include:

- **A drug to stimulate color-producing cells (melanocytes).** Called afamelanotide, this potential treatment is implanted under the skin to promote the growth of melanocytes.
- **A drug that helps control melanocytes.** Prostaglandin E2 is being tested as a way to restore skin color in people with vitiligo that isn't widespread or spreading. It's applied to the skin as a gel.

## IX. Precaution in Baras.

If you have vitiligo, the following self-care tactics may help you care for your skin and improve its appearance:

- **Protect your skin from the sun and artificial sources of UV light.** Use a broad-spectrum, water-resistant sunscreen with an SPF of at least 30. Apply sunscreen generously and reapply every two hours or more often if you're swimming or sweating. You can also seek shade and wear clothing that shields your skin from the sun. Don't use tanning beds and sunlamps. Protecting your skin from the sun helps prevent sunburn of the discolored skin. Sunscreen also minimizes tanning, which accentuates the vitiligo patches.
- **Conceal affected skin.** Makeup and self-tanning products can help minimize the differences in skin color. You may need to try several brands of makeup or self-tanners to find one that blends well with your normal skin tone. The coloring of self-tanning products doesn't wash off, but it gradually fades over several days. If you use a self-tanner, select one that contains dihydroxyacetone, as it is approved by the U.S. Food and Drug Administration.

**Don't get a tattoo.** Damage to your skin, such as that caused by a tattoo, may cause new patches of vitiligo within two weeks.

## X. Usool –e-Ilaj (Principles of Treatment)

There is a vast description of the management of Baras in the classical unani literature, and the principles of treatment of Baras are based on Ilaj bil Tadbeer, Ilaj bil Ghidha and Ilaj bil Dawa. In Ilaj bil Tadbeer, Psychotherapy is given to assure the patient for its non-contagious character and building self-confidence in patient. In pharmacotherapy, most of the unani physician advised initially the treatment with Tanqiya –i-Badan (Removal of harmful material from the body) Baras is a chronic disease and usually caused by excessive accumulation of Balgham e Ghaleez therefore, all the unani physicians are of the opinion that its treatment should be started with Tanqiyae Badan (Removal of morbid material from the body) through munzij and mushil-e-balgham. It is achieved by three steps:

- Use of Munzijat –e-Balgham like Beekh –e-Badyan (root of *Foeniculum vulgare* Mill), Beekh –e-Karafs (root of *Apium graveolens*), Maveez Munaqqa (*Vitis vinifera* Linn), Anjeer Zard (*Ficus carica* Linn) etc.
- Use of Mushilat –e- balgham like Zanjabeel (*Zinjiber officinalis*), Barg-e- Sana Makki (leaves of *cassia angustifolia* vahl), Turbud mujawwaf (*Operculina turpthem* Linn).
- Tabreed –e-badan by the use of Mubarridat like Laub –e-Bahidana (mucilage of *Cydonia oblonga* Mill), Sheerae Unaab (juice of *zizyphus vulgaris*) etc.

An appropriate dose of Munzij –e-Balgham is administered till Nuzj appears (usually for 2-3 weeks), then three Mushils (purges) alternated with three Tabreeds (cooling agents) should be given.

Hakeem Azam Khan in his book *Ikseer-e- Azam* have quoted the references of various physicians those have advocated the Munzij and Mushil therapy in the management of Baras (Vitaligo) <sup>[17]</sup>.

Dawood Antaki wrote in his book *Tazkira* that treatment of Baras has to be started by combination and expulsion of diseased material by using Munzij and Mushil therapy followed by treatment with food and medicine of hot temperament <sup>[22]</sup>.

Abu Sahal Masihi was of opinion that treatment of Baras should be initiated by drugs of hot and dry temperament and by concoction of diseased material and expel it out by using Mushil advia.

Avicenna and ibne–e- Ilyas has also advocated Munzij and Mushil therapy in the management of Baras <sup>[16]</sup>.

Raban Tabri not only advocated the Munzij and mushil therapy to expel out the diseased material from the body, he had further emphasized to nourish and change the local temperament of the depigmented macule <sup>[12]</sup>. Even today it is experimentally evident that many factors play pivotal role in the causation of disease activity or in makes the lesion more resistant to therapy, autoimmunity or oxidative stress. Overcoming oxidative stress and local immune suppression are the two major breakthrough in the management of Vitaligo, which is possible by systemic and topical application of medicine. Zakariya Razi has advocated several means of external procedure that are beneficial for the ailment. According to him, application of sunlight exposure to the patch in early stages Baras and bahaq or multiple pricks by needle on patches, use of diuretics (reduces the plasma of blood) cures the Baras <sup>[14]</sup>.

## XI. Prevention of Vitiligo

While vitiligo usually can't be fully prevented, there are some ways that you can prevent it from getting worse. Usually, these methods are focused on boosting your immune system. This may help restore healthy melanocytes to the skin or prevent white patches from spreading. Vitiligo prevention strategies may include diet, supplements, and skin protection.

### A. Diet

Research on whether vitiligo can be prevented or reversed with diet is limited. There is no hard evidence that a particular "vitiligo diet" can stop you from developing the condition. However, because vitiligo is believed to be an autoimmune disorder, it may be helpful to eat nutrient-dense foods that can help to boost your immune system. Here are some of the foods you should consider including in your diet for better vitiligo management and prevention.

### B. Foods to Eat

Some researchers believe that vitiligo symptoms are exacerbated by oxidative stress—an imbalance that causes cell damage and slows down the regrowth of healthy tissues in the body. A plant-based diet rich in antioxidants, phytochemicals, beta-carotene, omega-3 fatty acids, and vitamin D may help to boost your immune system and prevent your white patches from spreading.

Some of the vitamins, minerals, and nutrients you should incorporate into your diet if you have vitiligo are:

- **Antioxidants:** Antioxidants, such as vitamins C and E, are naturally occurring compounds that combat oxidative stress and prevent cell damage. Antioxidant-rich foods include fruits (especially berries), green leafy vegetables (such as kale), nuts, chocolate, herbs, and spices.
- **Phytochemicals:** Phytochemicals, such as beta-carotene, are compounds found in plants that may have a protective effect against cell damage. Brightly colored fruits and vegetables, such as carrots, broccoli, tomatoes, sweet potatoes, and spinach, are rich in phytochemicals.
- **Omega-3 fatty acids:** Oily fish (such as salmon), nuts, seeds, and other foods that contain omega-3 fatty acids may help to boost your immune function and promote cell repair.
- **Vitamin D:** Research suggests that vitiligo is often associated with vitamin D deficiency. Foods that contain a high amount of vitamin D include oily fish, egg yolks, and fortified dairy products such as milk and yogurt.

### C. Foods to Avoid

Evidence about the best foods to avoid to prevent vitiligo is limited. However, early research suggests that limiting your intake of high-fat foods, foods that can promote inflammation, and foods that contain gluten may help to prevent depigmentation in the following ways:

- **High-fat foods:** High-fat foods may play a role in the development or worsening of vitiligo symptoms. In one 2019 study, a higher total fat intake was associated with a higher risk of vitiligo. Limit your intake of fried foods, processed meat products, full-fat cheese, and butter.
- **Inflammation-promoting foods:** Because vitiligo is possibly related to the body's inflammatory processes, many people with vitiligo steer clear of foods that can prompt an inflammatory

response. Examples include processed snacks, processed meat, fried foods, white bread, alcohol, and sugary desserts.

- **Foods that contain gluten:** A couple of case reports indicate that eliminating foods containing gluten (such as breads and pastas) may help some people with vitiligo, especially if they also have celiac disease, an autoimmune disease triggered by gluten. Some people with vitiligo adopt a gluten-free diet in hopes of improving their condition.

## XII. Ilaj (Treatment)

Following single and compound drugs can be used for the treatment of Vitiligo:

**D. Panwar (Cassia tora):** A small plant growing on dry soil in Bengal and throughout the tropical part of the India mainly leaves, seeds and roots are used. Both leaves and roots contain a glucoside resembling chrysophanic acid. Leaves contain a principle similar to cathartin and a red colouring matter and mineral matters "Emodin glucoside". Both leaves and seeds constitute a valuable remedy in skin disorders like in tumours, leprosy, psoriasis, Vitiligo and fungal infections. Therapeutically it is used as Fasa –ud- Dam, Juzam, Bars, Qoba, Bawaseer. The Temperament of the drug is Hot<sup>2</sup> Dry<sup>2</sup>, Action –Mushil –e-Balgham, Mushil –e-Sauda, Jali, Musaffi –e-Dam. It is one of the main ingredient of sufoof-e-Bars. The dosage of the drug is 1.7- 3.6g.

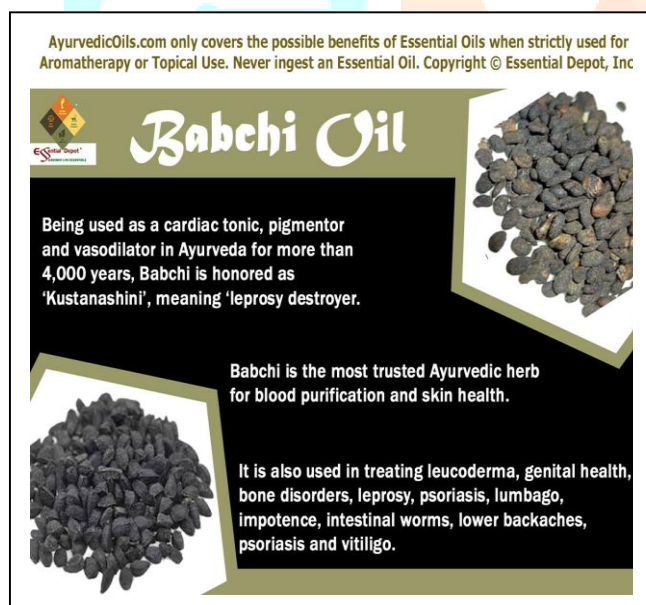


Fig. 8 Babachi oil used in Baras



Fig. 9 Aroma Therapy in Baras

**E. Anjeer (Ficus carica Linn):** It is cultivated in north India and fresh figs are to be found there. Dried fresh receptacles are used. It constituted Protease, amino acid, tyrosin, enzyme cravin, Lipase, Protease. The fleshy receptacle fig contains grape sugar, gum, fat and salts. The temperament of the drug is Hot<sup>1</sup> Moist<sup>2</sup>. Its main action are Mulatif, Mohalil-e- Waram, Munzij, Mulaiyin. It is therapeutically used as Warm–e-Tihal, Sara, Zeeq–un-Nafas. The daily requirement of the drug is 10-12 number (dry).

**F. Chaksu (*Cassia absus* Linn):** The drug consists of dried seeds. An erect annual herb found throughout the India from Himalaya to south coast and everywhere in the tropics of old world. It contains Proteins, alkaloids, fat, sugars, tannins, and mucilage. Its temperament is Hot 2<sup>0</sup>Dry 2<sup>0</sup>.The main action are Habbis –ud-Dam, Mohalil, Qabiz,Jali, Musaffi –e- Dam. The drug is therapeutically used as Ramad, Nuzool-ul Ma, Baras, Juzam. Its daily requirement is 2-3 g.

**G. Babchi (*Psoralea corylifolia*):** The drug consists of dry ripe fruits. It is an erect 0.3-1.8 m high annual herb distributed throughout the India, found commonly in uttar pradesh and Maharashtra. It consists of essential oil, fixed oil, psoralin, psoralidin, isopsoralen and bukuchiol. Its main action are Mussafi –e- Dam, Mohammir-e–Jild, Muqawwi-e- Meda, Qatil-e- Deedan-e- Ama, Mulaiyin. The drug is therapeutically used in Fasad –ud- Dam, Juzam, Baras, Bahaq Abyaz.The daily dosage of the drug is 3-5g.



**Fig. 10 Safoof Baras for Baras**



**Fig. 11 Vitiligo Ointment for Baras**

**H. Zanjabeel (*Zingiber officinalis*):** Drug consists of dried rhizome of zingiberacea family. Zanjabeel yielding is widely cultivated in India. It consists of essential oil, pungent constituents (gingerol and shogaol) resinous matter and starch. The drug's main action are Kasir –e- Riyah, Hazim, Munaffis-e- Balgham,Jali.It is therapeutically used as Nafkh –e- Shikam,Waj-ul- Mufasil,Waj-ul- Meda,Zof –e- Isteha, Waj –ul- Qatan, Saul, Zeequn nafas, Sailan –ur- Reham. The dosage of the drug is 1-2 g

**I. Majoon Atrilaal:** It consists of following drugs:-Atrilaal (Ammi majus),Aqraqqrha(Anacyclus pyrethrum), Turbud safaid(Operaculina pyrethrum), Sonth (*Zingiber officinalis*),Shehad(Honey).Majoon Atrilaal is precisely mentioned in qarabadeen –e-Azam and Alqarabadeen for the treatment of (Baras)Vitiligo.The chief ingredient of Majoon Atrilaal is Atrilaal,which grows throughout the valley as a weed. Ibne –e-Baitar in his book

Mufaridat –ul-Adwiya described the treatment of Baras with the seeds of Atrilaal and sunlight [23, 28].

The commonly used compound unani formulation for the treatment of Baras (Vitiligo) are Roghane Babchi, Roghane Kameela for topical application and sharbate unnab, Majoon ushba, Itrephal shahitra, Sofoofe Baras for oral administration [29, 30].

### XIII. House hold remedies for Vitiligo

#### A. Papaya

Papaya is a delicious fruit and beneficial for health. Along with that, papaya has also been shown to be effective against vitiligo. To use papaya to treat vitiligo, rub pieces of papaya on the patches of skin affected by vitiligo. Wash it when dry. Drink papaya juice regularly to replenish the body of melanin cells lost due to vitiligo.



**Fig. 12 Papaya for Baras**



**Fig. 13 Stress causes Baras**

#### B. Reduction of stress

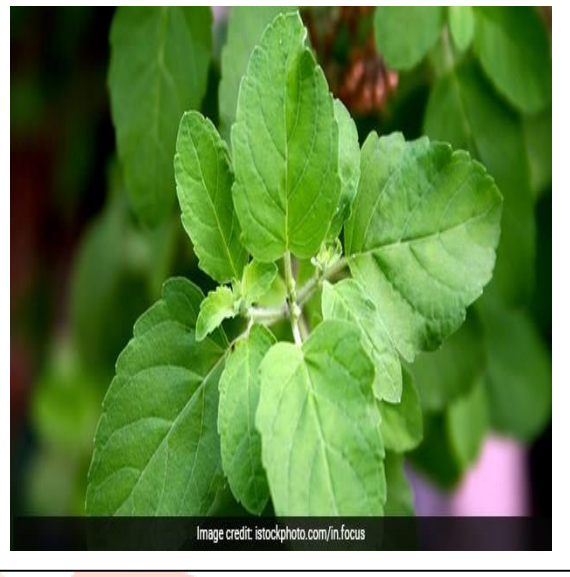
Too much stress can be harmful for the body with any condition. Stress may not cause vitiligo, but excess stress can lead to the growth of patches caused by vitiligo. Apart from vitiligo, stress may harm the mind and body and hamper the day to day functioning of a person. Take less stress in order to prevent vitiligo from worsening.

### C. Sunscreen

Since vitiligo is observed in areas of skin that is regularly exposed to the sun, it can be said that vitiligo is affected by harmful UV rays of the sun. Therefore, as a preventive measure, apply sunscreen to the parts of the body exposed to the sun. Wear long dresses to cover all exposed parts of your body to prevent any harm caused by UV rays that inhibit growth of vitiligo.



**Fig. 14 Sunscreen for Baras**



**Fig. 15 Basil leaf for Baras**

### D. Drink water from a copper vessel

Staying hydrated always can help your body stay fit and away from diseases. A way to red rid of vitiligo is to drink water from a copper vessel. Drinking water stored in a copper vessel will help you increase melanin in your body and reduce whiteness of patches caused by vitiligo.

### E. Basil leaves

Basil leaves are known to have anti-aging and anti-viral properties. These properties of basil are important for dealing with vitiligo. Mixing basil leaves with lime juice will stimulate the production of melanin on your skin. Apply the mixture of basil juice and lime juice to your skin everyday for better results against vitiligo.

### F. Walnuts

Walnuts are those dry fruits that have innumerable health benefits. One of those benefits of walnuts are that they treat the body against vitiligo. Eating at least 5 walnuts everyday can help you deal with vitiligo. For even better results, crush walnut powder and add water to make a paste. Apply the paste to the affected areas of the skin at least 3-4 times every day for 15-20 minutes. This can help in reduction of the white patches caused by vitiligo.



**Fig. 16 Walnuts for Baras**



**Fig. 17 Lemon used for Baras**

### **G. Foods high in zinc**

While suffering with vitiligo it is extremely important to have a well-balanced diet. A balanced diet can help in boosting your immune system. Along with that make sure to include zinc in your regular diet. Amounts of zinc in the body is low with patients with vitiligo. Zinc supplementation in the body can stimulate the healing process of the skin against vitiligo. Meat-based food items contain high amounts of zinc.

### **H. Foods high in Vitamin C**

Along with zinc, Vitamin C too is important for the treatment of vitiligo. Vitamin C deficiency is common with many patients suffering with vitiligo. Citrus fruits like orange, lemons and grapefruits contain Vitamin C. Vitamin C is also found in strawberries, kiwi, bell peppers and broccoli.

### **I. Turmeric**

Turmeric is an effective home remedy for vitiligo. Turmeric along with mustard oil and stimulate the pigmentation of the skin. Apply a mixture of turmeric powder and mustard oil for 20 minutes to the affected area. Do this twice a day for positive results.

## **Conclusion**

Baras is an acquired skin disorder characterized by well- defined areas of complete epidermal depigmentation. Although not life threatening, it has considerable effects on the psychological well-being of patients. It has been suggested that Vitiligo patients suffer from low esteem and poor body image which may cause a lower quality of life. Unani physicians claimed and practiced safe and effective management in various dermatological disorders like Baras. Treatment is based on the holistic approach of munzij wa mushil therapy along with topical application of jali, Muhammir, Muhalil, and Musakkhin drugs. Thus Unani medicine is preferred over contemporary medicine in the treatment of these refractory ailments. Single and compound drugs are such pharmacological preparations which has been reported to be effective in Bars. Role of Diet also plays a vital role in the prevention and management of Vitiligo.



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