

AYUSCRIPT

International Journal for Empirical Research in Ayurveda

www.ayuscript.com

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“MANAGEMENT OF STHAULYA: AN AYURVEDA REVIEW STUDY.”

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Abstract: In the today's era of modernization due to Scientific and technological progress has made man highly sensitive and critical but it gives rise to different types of health problems. The development of industrialization and communication is contributing towards sedentary life styles, in turn causing chronic non- communicable diseases like diabetes mellitus, hypertension, cancer, ischemic heart disease, cerebro-vascular accidents, atherosclerosis, varicose veins etc. Obesity is a major lifestyle disorders, it is a disease which grows rapidly ranking one of the most common chronic metabolic disorder, Obese people tend to develop insulin resistance and this insulin resistancy is the cause for metabolic syndrome, metabolic syndrome is considered as cluster of conditions that occur together increasing risk of cardiac disease, stroke and type 2 diabetes mellitus and hence prevention of obesity will decrease the chances of such diseases. A recent world health study reports that obesity is included among the top ten selected risks to health. Sedentary lifestyle and inclusion of increased intake of oily and fatty foods in the daily diet result in this disorder. 75% Indian women in the cities are apple-shaped, while 58% men are obese.

Obesity in Ayurveda described under the heading of *Sthaulya*. Charak has described *Sthaulya* as a disease of accumulation of excessive *Meda* and *Mamsa Dhatu*, which result into pendulous appearance of buttocks, belly and breast. *Atisthula* has been classified under *Ashta Ninditiya Purush*. *Sushruta* opined that some of *Upadrava* of *Sthaulya* are *Prameh Pidaka*, *Jwar*, *Bhagandar*, *Vidradhi* and *Vatvikara*. *Vagbhat* explain *Shodhan Chikitsa* for *Sthaulya*. Charak has advised to administer *Guru*, *Atarpana*, *Chestha*, and *Karshana* in *Sthula*.

Keywords: *Sthaulya*, *Medadhatu*, *Shodhana*, Obesity.

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How to cite article: More SS. “Management Of Sthaulya: An Ayurveda Review Study.”AYUSCRIPT 2022;1(3):114-122

Introduction

Charak has described *Sthaulya* in *Sutra Sthana* 21st chapter. He has considered *Sthaulya* as *Kaphaja Nanatmaja Vikara*,^[1] *Sthaulya* has been mentioned in *Santarpana Nimittaja Vikara*.^[2] Charak has explained the list and symptoms of disease in which *Dosha* are dominant, in such disease Charak indicated that *Shodhana* should be administered. *Sthaulya* has been enlisted.^[3] The entire *Nidana - Panchaka* of *Sthaulya* has been described by Charak.^[4] According to Charak consequences of excessive *Brihana* is *Sthaulya*.^[5] With respect to treatment protocol *Svedana*^[6] and *Vamana*^[7] is contraindicated in *Atisthula*. Sushrut has described the *Nidana, Purvarupa, Samprapti, Rupa* etc. of *Sthaulya*.^[8] He describes *Sthaulya* as *Rasa Nimittaja Vyadhi*^[9] and Sushrut highlighted his views that, if excessive nourishment of *Rasa Dhatu* because of different causes produces excessive *Meda Dhatu*, in consequences excessive production of *Apachit* or *Vikrit Meda* causes *Sthaulya*. He considered vitiation of *Meda* as the etiological factor. *Dalhan* termed *Sthaulya* as *Jatharya*.^[10] Vagbhat has classified *Sthaulya* with respect to treatment protocol. Dominant *Dosha* involved are *Kapha* and *Pitta*.^[11] *Bahu Sthaulya, Madhyam Sthaulya* and *Hina Sthaulya* are categorized and are treated respectively by *Shodhan, Pachan, Dipan, Kshudha* and *Trishna Nigraha*. Indu commented that *Bala* of *Sthaulya* patient must be envisaged.^[12] Same opinion has been expressed by Arundatta.^[13] Arundatta referred *Sthaulya* as '*Sthavima*' can be said as synonym which means "*Sthulatvam*."^[14] While describing its management Vagbhat explained that *Karshya* is better than *Sthaulya*.^[15]

Obesity and overweight are the fifth leading risk of global deaths. He expressed his views that at least 3.4 million adults die each year as a result of being overweight or obese. In addition, 44 percent of diabetes burden, 23 percent of ischemic heart disease burden and between 7 to 41 percent burden of certain cancer are attributed to overweight and obesity.^[16] WHO in 2016, published more than 1.9 billion adults, 18 years and older, were overweight, of these over 650 million were obese, Obesity in India has reached epidemic proportion in the 21st century with morbid obesity affecting 5% of countries population.^[17] In spite of advanced technology and researches, the modern medicine is failing to give the best result for obesity, due to its multifactorial nature. There are fewer drugs used for treatment of obesity in modern medicine. the side effect profile has limited the use of many agents, but few drugs are currently licensed but having large side effects, drugs are as like orlistat, sibutramine, amphetamine, rimonabant, fluoxetine, exenatide and metformin, almost all these drugs have different side effects such as, orlistat inhibits pancreatic and gastric lipase, in consequence reducing dietary absorption by 30% of ingested, these causes side effects like loose motion, malabsorption of oil from gut, flatus and malabsorption of soluble vitamins. sibutramine causes excess cardiovascular mortality, others drugs are also not used because of their toxicity.^[18]

The role of surgeries like bariatric surgery, gastric bypass surgery, gastric banding is only restricted to morbid obesity (BMI>40) hence in modern medicine, its management aspect remains symptomatic and restricted use of drugs with serious side effects and greater chances of recurrence. Now the people of this era are looking forward for alternative medicine specially Ayurveda to have beneficial treatment in obesity termed

as *Sthaulya* in Ayurveda which is cost effective, less chances of recurrence and with less side effects.

Discussion:

Chikitsa of *Sthaulya*, Charak has said that it is very difficult to treat *Atisthula Purush* because, *Karshana* therapy leads to further aggravation of already aggravated *Jathragni* and *Vayu*. *Brimhan Chikitsa* is applied it further increase the *Meda*. General principles of management of any disorder include *Shodhanam Shamanam* and *Nidan Varjana*.^[19] Thus, in any disorder management is divided into 3 parts.

1. *Shodhana*
2. *Shamana* and
3. *Nidana Parivarjana*

The *Chikitsa* of *Sthaulya* is also explained in detail as follows-

Bahya Chikitsa: In the management of *Sthaulya Ruksha Udvartana* is indicated as *Bahir- Parimarjana Chikitsa*.^[20] Charak has also mentioned *Ruksha Udavartana*^[21] for *Sthaulya*. *Vagbhata* has mentioned the benefits of *Ruksha Udvartana* in general as *Kaphahara* and *Medahara*.^[22]

Shodhana Therapy: *Prakupita Dosha* are eradicated from body via nearby external route as *Urdhva* or *Adha Marga* with the help of *Shodhan* therapy. *Dosha* are mobilized from *Dhatu* involved to nearest *Koshth* by *Vridhhi*, *Vishyandana*, *Paka* of *Dosha*, *Strotomukha Vishodhana* and *alleviating Vayu*. To serve the purpose *Snehan* and *Svedan* are administered^[23] *Sthaulya*, being a metabolic syndrome, having *Bahudosha Lakshana*, *Shodhana Chikitsa* is recommended by Charak. According to *Vagbhat*, *Atisthaulya* patients having dominance of *Dosha* and more *Bala*, should be treated by *Shodhana* therapy.^[24]

Vamana Karma: Most of the texts have prohibited the use of *Vamana Karma*^[7] in *Sthaulya* due to inability to bear the potency of medicine and therapy causing *Prana-Aparodha*. (life threatening condition)^[7] *Medo Dhatu* and *Kapha Pradhan Dushti* is main part of pathology of *Sthaulya*. Therefore, best *Shodhana Chikitsa* for *Kapha Pradhan Vyadhi* in general is *Vamana Karma*. As on counting Pros and Cons we preferred to give *Vamana Karma* to *Balavan Sthula Rugna* only.^[12]

Virechana Karma: As Charak and *Vagbhat* recommended *Shodhan* as Prime line of Management in *Sthaulya* patients.^[12] *Virechana* is one of the *Shodhana Karma* hence we prefer it for patients of *Sthaulya* as well as *Virechak Dravya* mentioned in Ayurvedic texts like *Haritaki*, *Katuki*, *Aragvadha*, *Trivruta*, *Danti Dravanti* etc., which have *Medonashaka* property and could be applied to the patients of *Sthaulya*. Practically also *Virechana Karma* seems to be fruitful for the management of *Sthaulya*.

Basti Karma: *Ruksha*, *Ushna* and *Tikshna Basti* are suggested by Charak for *Sthaulya Chikitsa*.^[21] A number of *Basti Kalpa* are also mentioned in Ayurvedic texts but *Lekhana Basti* is considered as the best therapy for *Sthaulya*.^[25] *Sharangdhara* has given a clear description regarding the properties of *Lekhana Dravya* and characteristics of *Lekhana Basti*.^[26]

Rakta-Mokshana: *Kashyapa* and *Bhavamishra* have recommended *Rakta Mokshana* for the treatment of *Sthoulya* in *Chikitsasthana*, *Medasvi Dhatri Chikitsa*.^[27] Charak has also mentioned *Raktamokshana* for treatment of *Santarpana Janya Vyadhi* including *Atisthaulya*.^[28]

Nasya: *Sushruta* has recommended the use of *Triphaladi Taila Nasya* in the patients of *Medovridhhi*.^[29]

Shamana Therapy:

Shaman Chikitsa can be defined as the *Chikitsa* which brings the *Visham Dhatu* into *Sama Avastha* without removal of *Dosha* and further balanced state of *Dosha* is not deranged. [30]

All ten types of *Langhana* can be applied for the patients of *Sthaulya* according to *Rogi-Roga Bala*. Charak has given treatment of *Sthaulya* in following words. [21]

**Guru Cha Atarpanam
Cheshtam Sthulanam
Karshanam Prati |
Vatagnanyanaapanani
Sleshma Medo Harani Cha ||**

i.e., Administration of *Guru* and *Atarpana Dravyas* which are heavy to digest and possess additional *Vata*, *Shleshma* and *Medonashaka* properties are considered as ideal for *Shamana* therapy in *Sthaulya*. Chakrapani has explained that *Guru* property is required to suppressing the *Atikshudha*. Along with *Guru Dravya*, *Atarpana Dravya* provides non-nourishment and thus leads to depletion of *Meda Dhatu*. [31]

Gangadhar has interpreted that *Guru* property is suitable to treat *Tikshnagni* and vitiated *Vata* especially *Kosthagata Vata* and thereby *Atikshudha*, and *Atarpana* property is that which does not provide *Tarpana* and cause reduction of *Meda*. [31]

The drugs planned for *Sthaulya* should have *Dipana* and *Pachana* property to augment *Agni (Dhatvagni)*. They should also have properties of *Amapachaka* as obstruction of *Medovaha Strotas* by *Ama* is main factor for *Sthaulya*. Again, it is told that the *Hetus* of *Karshya* i.e. *Ruksha Annapana Sevana*, *Langhana*, *Pramitashana*, *Shoka*, *Nidra Vega Vinigraha*, *Ruksha Udvartana*, *Krodha* etc. can be practiced as line of

treatment for *Sthaulya*. [32]

Some important references about *Shamana Chikitsa* of *Sthaulya* are mentioned as follows:

Some *Samshamana Yogas* which are *Rukshana* and *Pachana* in nature like *Guduchi*, *Musta*, *Triphala*, *Takrarishta*, *Mukshika*, *Vidangadi* *Lauha*, *Bilvadipanchmula* and *Shilajatu* with *Agnimantha Svarasa* are advised for prolonged period. [21]

In Charak Samhita, drugs and preparations like *Karshana Yavagu* of *Gavedhuka*, *Lekhaniya Mahakashaya*, *Bibhitaka*, *Yava* and *Madhudaka* are advocated as *Medonashaka* and *Lekhana* [33][34][35][36], *Akasha* and *Vayu Mahabhuta Pradhan Dravyas* are attributed to have *Laghavakar* action [37], so these can be used for management of *Sthaulya*.

Rasa Sevana particularly *Katu* and *Kashaya Rasa* are having *Karshana*, *Upachayahara* properties, while *Tikta Rasa* is having *Lekhana* and *Medo Upshoshana Karma* [38], hence *Katu*, *Tikta* and *Kashaya Rasa* dominant drugs can be used for treatment of *Sthaulya*.

In Sushrut Samhita, administration of *Virukshana* and *Chhedaniya Dravya* especially *Shilajatu*, *Guggulu*, *Gomutra*, *Triphala*, *LohaRaja*, *Rasanjana* and *Madhu* in proper dose and duration are advised. [39] Here, Dalhan has clarified that *Virukshana* property helps to reduce *Meda* and *Chhedaniya* property helps to remove obstruction from body channel, particularly from *Medovaha Strotas* by its *Strotovishodhana* property.

In Sushrut Sutrasthana 38th chapter various groups of drugs like *Varunadi Gana*, *Salasaradi Gana*, *Rodhradi Gana*, *Arkadi Gana*, *Mushkadi Gana*, *Trayushnadi Gana* etc. are mentioned as *Medonashaka*. [40]

Haritaki is advised for the treatment of *Santarpana Janya Roga* and *Amalaki* is

mentioned as *Medopaham*. So, *Haritaki* and *Amalaki* can be used for treatment of *Sthaulya*.^[41]

In Ashtanga Sangraha, *Madanphaladi Churna*, *Kutajadi Churna*, *Hingvadi Churna* and *Vidangadi Mantha* are added in line of treatment of *Sthaulya*. *Krishna Lauha*, *Shankha* and *Samudraphena*, *Tuttha*, *Manahsila*, *Anjana* and *Silajatu* are *Dhatu* described as *Lekhana* and *Medonashaka*.^{[42][43][44]}

Rasanjana is mentioned as the best for the treatment of *Sthaulya* while *Guggulu* is mentioned as the best for the disorders of *Meda* and *Vata*^[45], so *Guggulu* can be used for the treatment of *Sthaulya*.

In Ashtanga Hridaya, *Gomutrakapi Haritaki*^[46], *Rodhrasava*^[47], *Vardhamana Bhallataka Rasayana*^[48] etc. are the various preparations added for the management of *Sthaulya*.

Navaka Guggulu, *Amrutadyaguggulu* are indicated in management of *Sthaulya* in *Bhaishajya Ratnawali*.^[49]

Bhavaprakash^[50] has mentioned the remedies for *Medohara* purpose like *Chavyadi Saktu* (39/15), *Triphaladya Churna* (39/16), *Erandpatra Kshara* (39/23), *Badaripatra Peya* (39/25), *Amritadi Guggulu* (39/27), *Dashanga Guggulu* (39/28), *Trayusnadi Guggulu* (39/29), *Lauha Rasayana* (39/30-40), *Lauharishta* (39/41-48) etc. (B.P. 39/15,16, 23, 25, 27, 29, 40, 41-42). Besides these, various type of *Churna*, *Kvatha* and herbal as well as herbo-mineral *Yoga* are mentioned.

Aushadha Sevana Kala:

According to Ashtanga Sangraha, the *Pragbhakta Kala* i.e., administration of medicine before meal is insisted for doing *Karshana*^[51]. It has been further elaborated by *Sharangadhara*, and he advised to take *Lekhana* drug on empty stomach in early

morning and before a meal^[52].

Nidana Parivarjana:

Ancient Acharyas have laid great emphasis on the principle of *Nidana Parivarjana*. *Sushrut* in particular has recommended *Nidana Parivarjana* as an essential component in the management of any disorder. *Charak* elaborated about *Nidan Parivarjan* as prohibition of indulgence in *Visham Hetu* and indulgence in *Sama Hetu* will lead to equilibrium of *Dhatu*. It will lead to *Svastha Purush*.^[53]

This can be well interpreted by following *Sutra*,

“Sankshepta Kriyayoga Nidana Parivarjanam.” (Su.U. 1/25)^[54]

Nidana Parivarjana Chikitsa means avoiding all the *Aharatmaka*, *Viharatmaka Manasika* and *Anya Nidana* responsible for the manifestation of a disease. All the *Nidana* mentioned earlier, such as *Ati Madhura*, *Guru Snigdha Ahara Sevana*, *Divaswapna*, *Atiharsha* etc. should be avoided in case of *Sthaulya*.

Pathya-Apathya of Sthaulya

Ancient Ayurvedic classics had given much more importance on *Pathya Apathya* in the management of a disease. Without obeying the rules of *Pathya Apathya*, a patient will never get satisfactory result; rather a disease may aggravate by *Apathya Sevana*. All those dietary items and physical activities that are best for *Strotas* and are also liked by *Mana* or in other words are beneficial (*Hitakaraka*) for both *Sharira* (body) and *Mana* (mind) are called *Pathya* and those with opposite qualities are called *Apathya*. *Charak* (C.S.21/25-28)^[55] *Ashtanga Hridaya* (A.H.S. 14/36)^[56]

Yogratnakar (Y.R. *Medorog*.13)^[57]

Table-1
Showing Aharaj Pathya-Apathya of Sthaulya

Ahara Varga	Pathya	Apathya
1. Shuka Dhanya (Cerealgrain)	Puran Shali, Kodrava, Shyamak, Yava, Priyangu, Laja, Nivara, Koradushaka, Jurna, Prashatika, Kanguni	Godhum, Navee n Dhanya(Shali)
2. Shami Dhanya (Pulses)	Mudga, Rajamasha, Kulatha, Chanaka, Masur, Adhaki, Makusthaka	Masha, Til
3. Shaka Varga (Vegetables)	Patol, Patrashaka, Shigru, Vrutaka, Vastuka, Trapusha Vartaka, Evaruka, Ardraka, Mulaka, Surasa	Kanda Shaka, Madhura Rasatmaka
4. Phala Varga (Fruits)	Kapittha, Jambu, Amalaki, Ela, Bibhitaki, Haritaki, Maricha, Pippali, Erand Karkati, Ankola, Narang, Bilvaphala.	Madhura Phala
5. Drava Varga	Madhu, Takra, Ushnajala, Tila & Sarshapa Tail, Ashava Arista, Sura, Jeerna Madya	Milk Products, (Dugdha, Dhadh i, Sarpi), Ikshuvikaa
6. Mamsa Varga	Rohita Matsya	Aanupa, Audak a, Gramya Mamsa Sevana

Table-2
Showing Viharaj Pathya-Apathya of Sthaulya

Pathya	Apathya
Shrama, Upavasa	Sheetal Jala Sevan
Pra-Jagarana	Divasvapna
Nitya Bhramana	Avyavaya
Ashva Rohana	Avyayama
Hasty Rohana	Ati-Ashana
Vyavaya,	Sukha Shaiya

Table -11
Showing Manasik Pathya-Apathya of Sthaulya

Pathya	Apathya
Chinta	Nitya Harsha
Shoka	Achintana
Krodha, Bhaya	Manso-Nivrutti

CONCLUSION

Sthaulya is predominant metabolic disorder, which is described in Ayurvedic *Samhitas*. Sedentary lifestyle, lack of exercise, fatty food habits, urbanization, psychological factors along with genetic predisposition play a major role in aetiopathogenesis of *Sthaulya*. In Ayurveda some herbal drugs, classical preparations *Panchakarma* procedures and *Adravya Chikitsa* are mentioned in the management of *Sthaulya*. By adopting the simple life style and healthy food habits (*Pathya-Apathya*) anyone can enjoy the life optimally without having lifestyle diseases. Excessive accumulation of *Kapha* and *Meda* with other factors eventually leads to *Sthaulya Roga*, so specific diet management as discussed above should be followed to combat *Sthaulya Roga*.

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