

WORLD JOURNAL OF PHARMACEUTICAL RESEARCH

SJIF Impact Factor 8.084

ISSN 2277-7105

Volume 10, Issue 12, 231-240.

Review Article

ROLE OF AHAR (DIET) IN PREVENTION OF NON COMMUNICABLE DISEASES

Minakshi¹* and Rakesh Sharma²

¹PhD. Scholar, Guru Ravidas ayurved University Hoshiarpur (Punjab), Sr. Lecturer, P. G. Dept. of Kaumarbhritya Rajiv Gandhi Govt. P. G. Ayurvedic Medical College and Hospital Paprola, Kangra, Himachal Pradesh, India.

²Prof. (Vaidya) Rakesh Sharma, President of the Board of Ethics and Registration for Indian System of Medicine.

Article Received on 25 July 2021,

Revised on 15 August 2021, Accepted on 05 Sept. 2021

DOI: 10.20959/wjpr202112-21610

*Corresponding Author

Dr. Minakshi

India.

PhD. Scholar, Guru Ravidas ayurved University
Hoshiarpur (Punjab), Sr.
Lecturer, P. G. Dept. of
Kaumarbhritya Rajiv
Gandhi Govt. P. G.
Ayurvedic Medical College
and Hospital Paprola,
Kangra, Himachal Pradesh,

ABSTRACT

Non-communicable diseases termed as *Asankramaka Roga* are the disorders that are not communicated from one person to another i.e., disorder associated with the way a person lives and most of them are outcome of unhealthy choices made by a person. Important causative factors are malnutrition, poor physical fitness, stress, worry, poor health habits etc. The global burden of non-communicable diseases is increasing and they disproportionately affect the developing world and main cause behind these disorders is sedentary lifestyle and physical inactivity. Non communicable diseases contribute approximately half of all the causes of mortality in India. According to WHO, four main types of NCDs are cardiovascular disease, cancer, chronic respiratory diseases and diabetes. Unhealthy lifestyles and food behaviours play an important role for determining such diseases. The change in unhealthy behaviours or the maintenance of healthy lifestyles has enormous value in the reduction of diseases and longer life expectancy not only on an

individual level but for the community as a whole. Ayurveda can play a major role in this aspect, as the primary aim of Ayurveda is to prevent diseases by following healthy lifestyle and health diet (ahar). Ahar is one of the supporting pillars of life, it provides good nutrition and vitality, enhances strength and immunity. Ayurveda is known as leading life science and describes ways to prevent the risk factors of NCD's and manage lifestyle disorders in the forms of proper dietary management.

KEYWORDS: Non communicable diseases, Ahara (Diet), Ashat Maharoga.

INTRODUCTION

Non communicable diseases contribute approximately half of all the causes of mortality in India. According to WHO, four main types of NCDs are cardiovascular disease, cancer, chronic respiratory diseases and diabetes. In India, NCDs causes more deaths than infectious diseases like malaria, tuberculosis and cholera. 53% of all deaths are now correlated with NCDs including cardiovascular diseases (24%), COPD (11%), cancer (6%), diabetes (2%) WHO projected that between 2005 and 2015 alone there was reduction in 15% deaths caused ny nonmunicable diseases which in turn indicates that there has been an increase in NCDs because of the secondary or complex morbidity of those who live longer. NCD is a medical condition that is not caused by infectious agent but caused by erroneous diet, life style and environmental factors. NCDs can refers to chronic diseases which last for long periods of time and progress slowly such as autoimmune disease, cardiovascular diseases, metabolic diseases and chronic kidney diseases. NCDs are leading cause of death in the world representing 63% of all annual deaths. The major cause of NCD is eating unhealthy foods like food so much sweet, high salt, high fat, other junk food and fruits persevered with chemicals and drinking excess amount of alcohol. Physical inactivity and high stress level, are major cause of NCDs.

Rapid changes in diet and lifestyle has led to a major emerging shift towards noncommunicable diseases such as diabetes, obesity, arthritis, mental illness, cardiac diseases, cancer etc. Ayurvedic principles certainly play an important role in their prevention and management. Health-promoting regimen described in Ayurveda as Pathya vyavastha is the hall mark of Ayurvedic therapeutics. Specific diet and lifestyle guidelines are always prescribed along with the drugs and therapies to facilitate restoration of milieu interieur i.e. Dosha-dhatu-samyata and wellbeing. Therefore, emphasis on diet planning based on Ayurveda principles would certainly help in health promotion, prevention of diseases and their management. Quest for healthy and long life is perhaps as old as human existence and efforts are unremitting to address the challenges and triumph over the bottlenecks across this journey. Ayurveda-evolved as a comprehensive system of healthcare systematically through scientific experimentations of high order backed by sound and reproducible evidence base. Several scientific clinical and experimental studies have been conducted for validation of principles of Ayurveda dietetics and also for development of Ayurveda based nutritional supplements.

Nutrition is increasingly being recognized as an important health indicator at national and international level. It is a vital component of the individual's and community health as nutritional well-being of the population is considered as an essential pre-requisite for national development. Most health problems develop due to the incorrect eating practices and cookery procedures. Ayurveda lays stress on positive health, a blend of physical, mental, social, moral and spiritual welfare and this holistic medical science considers three important factors while dealing with the health and disease i.e. *Aushadha* (drug & therapies), *Ahara* (diet) and *Vihara* (practices). Among these three factors, diet i.e. *Ahara* is at the top as it has been clearly described in Ayurveda that optimum health is only possible with *Samyak Ahara*. Ayurveda deals with the pathyavyavastha (planning of diet- dietetics) in a very scientific and holistic way. Pathya has been envisaged in Ayurveda as the ideal diet and life style that keeps the individual healthy, maintains normal body functions leads to proper functioning of the organs, nourishes the mind and intellect, prevents diseases and at the same time corrects the irregularities that may occur in the body.

In Ayurveda, a due emphasis has been given to the quantum of food i.e. *Ahara Matra* which one should consume. A detailed description abut *Ahara matra* has been provided and it is mentioned that *Ahar matra* for Individual person depends upon his *Agni bala*.

```
प्राणाः प्राणभृतामन्नमन्नं लोकोऽभिधावति । वर्णः प्रसादः
सौस्वर्य जीवितं प्रतिभा सुखम् ।। ३४९ ।।
```

```
तुष्टिः पुष्टिर्बलं मेघा सर्वमन्ने प्रतिष्ठितम्। लौकिकं कर्म यद्वृत्तौ
स्वर्गतौ यच्च वैदिकम्।। ३५०।।
॥१२॥
```

(Ch.Su. 27/349-350)

Food consumed by an individual in proper quantity gives strength, good complexion, happiness and long life. The quantity or amount of food to be taken is of paramount importance as excessive or less quantity can lead to number of disorders and ill health.

```
शान्तेऽनौ म्रियते, युक्ते चिरं जीवत्यनामयः । रोगी स्याद्विकृते, मूलमग्निस्तस्मान्निरुच्यते ।।४।। (Ch.Chi. 15)
```

Acharyas have given certain guidelines to decide the amount of food to be taken i.e. Guru dravya should be taken in one third part or half part according to appetite and even laghu dravya should also be consumed in a calculated manner. Also, what food stuffs are to be used on regular basis and stuffs that are to be avoided on regular basis are also well explained. It is also mentioned that one must take a balanced diet that maintain the health and disease and works like a prophylactic measures.

तच्च नित्यं प्रयुञ्जीत स्वास्थ्यं येनानुवर्तते । अजातानां विकाराणामनुत्पत्तिकरं च यत्

(Ch. Su. 5/13)

The word Aahar is derived from the root 'हतहरण' means to be taking in. According to Dalhana and Chakrapani "which is swallowed through throat, oesophagus, and gastrointestinal tract is called Aahar." ' अन्नवृद्धिकारानाम श्रेष्ठः' (ch.su.25/40)

Diet and Mind

Diet plays an important role in keeping our mind healthy and explicit psychopharmacological effect. This concept has led to classification of food in to following 3 categories.

- 1. Satvik diet: ideal diet containing vegetarian, non-oily, non-spicy articles which are congenial to the body and mind.
- 2. Rajasik diet: too spicy, hot, sour, salty; excite the mental faculties and
- 3. Tamasik diet: too oily, heavy food; reduces mental competence.

Nitya sevaneeya ahara (Food items recommended for regular use)

- 1. Shali (Variety of rice)
- 2. Godhooma (Wheat)
- 3. Yava (Barley)
- 4. Shashtika (Variety of rice grown in sixty days)
- 5. Jangala (Meat of animals of desert like lands)
- 6. Sunishnaka (Marssilea minuta linn.)
- 7. Jivanti (Leptadenia reticilata W&A)
- 8. Bala mulaka (Tender radish)
- 9. Pathya (Haritaki)
- 10. Mridwika (Grapes-Vitis vinifera linn.)

- 11. Patol (Trichosanthus dioica Roxb.)
- 12. Mudga (Moong-Vigna radiate)
- 13. Sharkara (sugar)
- 14. Ghrita (Clarified butter)
- 15. Divyodaka (Rain water or purified water)
- 16. Ksheera (Milk)
- 17. Kshoudra (Honey)
- 18. Dadima (Pomegranate-Punica granatum Linn.)
- 19. Saindhava (Rock salt)

Nitya asevaneeya ahar (Food items not recommended for regular uses)

- 1. Kilata (Inspissated mixture of buttermilk and milk)
- 2. Dadhi (Yoghurt, Curd)
- 3. Kuchika (Solid portion of curd)
- 4. Kshara (Alkalies)
- 5. Sukta (Fermented gruel)
- 6. Aama mulaka (Uncoocked radish)
- 7. Mans (Meat of emaciated animals, Dry meat, Meat of boar, sheep, cow, fish and buffalo)
- 8. Masha (Black gram-Phaseolus mungo Linn.)
- 9. Nishpav (Flat bean- Dolichos lablab Linn.)
- 10. Shaluka (Edible lotus root)
- 11. Visa (Lotus bulb/Fibre)
- 12. Pishta (Powdery, Pasted starch)
- 13. Veerudhaka(Germinated grains)
- 14. Shushka shaaka (Dried vegetables)
- 15. Yavaka (Small barley)
- 16. Phanita (Half coocked molasses)

Rakta sali (Rice)

In shali dhanya, Rakta shali have been described as best and tridosha shamak.

Rakta sali (a kind of red rice) is efficient in subduing disturbed humours of the body, improves eyesight, health, voice and skin health; and increases fertility. Shali rice is used to treat burns and fractures.

Godhuma (Wheat)

Godhuma is sandhankara, vatashamaka, heavy for digestion and kaphakara. Wheat bran helps in managing constipation as it adds bulk to stools and helps in their easy passage mainly due to its laxative property. This laxative property also makes it useful for the management of piles.

Wheat diet might also help in weight management as it gives a feeling of fullness and prevent overeating. Wheat flour along with milk and honey can be applied on the face to get a clean and glowing skin. Wheat germ oil can also be applied to the skin for managing skin irritation, dryness and tanning due to its antioxidant property.

Yava (Barley)

Yava is Ruksha and vatakaraka. It is balavardhaka but having kaphanashaka properties. Thus, have been described by Acharyas in number of disorders like Prameha, kushta and Mutrakriccha.

```
भृष्टान् यवान् भक्षयतः प्रथोगाच्छुष्कांक् सक्तूञ्न भवन्ति
मेहाः । शित्र च कृच्छूं कफजं च कुष्ठं तथैव
मुहामलकप्रयोगान् ।।
मुद्रामलकप्रयोगान्
(Ch.Chi. 6/48)
```

Kaphaja Pramehi have been pricribed to have Yava pradhana bhojana always. Barley grass juice aids in weight loss as it reduces blood cholesterol and triglycerides due to its antioxidant properties. It also increases metabolism and reduces hunger which help control excessive eating, thereby managing weight.

Barley seeds are beneficial for kidneys as they increase urine production and prevent the growth and formation of stones due to their diuretic properties. As per Ayurveda, Barley has Rechana (laxative) property which helps to provide relief from constipation when added to the diet. Consuming Barley water not only increases breast milk production but also improves digestion of the mother as well as the baby. You can apply a paste of powdered Barley seeds with coconut oil to improve skin health. It protects the skin cells from damage caused by free radicals due to its antioxidant properties. Young green Barley leaves help in skin whitening as they contain a compound (tricin) that inhibits the synthesis of melanin (a natural pigment in the body that make the skin, hair and eyes appear darker).

Shashtika (Rice)

It is a variety of rice that ripens in sixty days and is considered sheeta veerya and tridoshashamaka. It is used in neurological disorder (shastika shali pinda sweda).

Oil obtained from rice husk is used to relieve pain due to arthritis, spondylitis, low back pain, paralysis etc. Shastika shali gruel is used in diabetic patients. It also increases digestive fire.

Mamsa of jangala animals

Mamsa of Jangala animals is light, sheeta in veerya, pittapradhana and useful in sannipataja vikara because of its light and tridosha shamaka properties, it has been suggested in Prameha as well as in other santarpan janaya disorders.

Haritiki

Haritiki have been given due importance in Ayurveda. It has been described as rasayana and vyadhihara. It executes multiple pharmacological actions like anulomana, sanshodana, rasayana and vyadhihara karma. It has also been described as savoroga parshamani and vayasthapani.

Haritaki t holds high significance in treating countless health problems like Indigestion, obesity, impotence, asthma, vision problems etc. It also proved helpful in hypothyroidism. Terminalia chebula has many phyto constituents which are useful in Alzheimer's disease.

Mridwika (Grapes)

Mridwika (Grapes-Vitis vinifera linn.) is considered as very useful in shwasa roga, raktapitta, kshaya, madatayaya ect. It does vrimhana karma as have madhura, snigdha and sheeta properties.

Sharkaras

Different type of sharkaras have been explained according to origin like gudasharkara, yasasharkara, madhusharkara. All the varities have different properties yet all are indicated in Raktapitta, daha and trishana.

Kshodra (Madhu)

Kshodra or madhu is vatakaraka as well as kaphanashaka. Four varities of madhu has been described in charaka samhita and eight in sushrata samhita.

Saindhava lavana

Saindhava lavana has been described best among all the lavana. It is deepan, shukara vadhaka and tridosha shamaka.

Susnishaka

It is an effective drug in vatarakta disease. Leaves are used in treatment of indigestion. Juice extract of leaves is used to stop nasal bleeding. Boiled leves are used to apply over swollen gums to reduce swelling. Leaves extract is used in hyperlipidemia. Fresh plant decotion is used for spasmodic muscular contraction of urethra and bladder.

.**Iivanti**

It(stem and fruits) improves eye vision. i.e. promotes clarity of vision. Jivanti is aphrodisiac. It (cold fresh juice) strengthening in nature. Hence it is a good health tonic. It is very useful in mouth ulcer. Its juice increases breast milk in lactating women.

Nutritional causes of eight major diseases (Ashta mahagada) and Management

1. Vata vyadhi (Diseases related to nervous system)

Nutritional causes: Dry, cold, scanty food, fasting/ starvation, excessive intake of honey, peas, green gram.

Management: Food containing sufficient fat content, easily digestible, warm food, wheat, horse gram, black gram, brinjal, milk & milk products, garlic, dry grapes, berries

2. Madhumeha (Diabetes Mellitus)

Nutritional causes: Excessive use of milk & milk products, fresh grains, Food articles made of Jaggery/ sugar/ sugar cane.

Management: Barley, old wheat, horse gram, green gram, red gram, sesame seeds, peas, patola, bitter gourd, garlic, ginger, piper longum unripe banana, takra (butter milk, Water melon, lotus root, drum stick.

3. Kushta (Skin diseases)

Nutritional Causes: Use of uncooked food, over eating, excessive use of fresh grains, sour and salty substances, black gram, raddish, sesame seeds, milk and milk products, jiggery.

Management: Old barley, wheat, green gram, red gram, Old ghee, honey, pointed gourd, garlic, oil of sesame, mustard.

4. Sopha (Oedema)

Nutritional Causes: Consumption of excessive sour, hot or alkaline food, foods hard to digest, curd, uncooked food, leafy, vegetables, incompatible recipes, stale and adulterated (poisoned) food, consumption of alcohol, jaggery, sesame oil.

Management: Barley, horse gram, green gram, fish, old ghee, butter milk, bitter gourd, drum stick, mango, carrot, pointed gourd, brinjal, radish, turmeric, milk.

5. Udara roga (Abdominal disorders)

Nutritional Causes: Consumption of adulterated and uncooked food, stale food items, incompatible food, and foods causing indigestion & constipation.

Management: Old horse gram, green gram, barley, honey, butter milk, garlic, ginger, castor oil, pointed gourd (parval), bitter gourd, drum stick, cow's & goat's milk.

6. Arsha (Haemorrhoids)

Nutritional Causes: Consumption of dry food articles causing constipation, fish, paste of sesame seeds, black gram, ripe mango, soft gourd.

Management: Barley, wheat, horse gram, Red variety of rice, buttermilk, butter, goose berry, Black pepper, pointed gourd, Cow's milk, Goat's milk, rice gruel, garlic, ginger, haritaki, mustard oil etc.

7. Bhagandara (Fistula – in – ano)

Nutritional Causes: Consumption of dry food articles causing constipation.

Management: Red variety of rice, green gram, pointed gourd, drum stick, radish, sesame and mustard oil, ghee, honey etc.

8. Asmari (Urinary calculus)

Nutritional Causes: Consumption of Sour and dry food articles causing constipation, incompatible food.

Management: Barley, horse gram, old rice, madya, ginger etc.

CONCLUSION

Due to urbanization disease pattern shift towards non communicable disease. The best management of this is by management of aahar (diet management). Ayurveda provides a complete and systemic understanding about the effect of food on our physical and mental functioning. This unit would help you to learn the basics of Ayurvedic dietetics including selection of food according to the constitution (Prakriti). Ayurveda deals with the pathyavyavastha (Planning of diet- dietetics) in a very scientific and holistic way. Pathya has been envisaged in Ayurveda as the ideal diet and life style that keeps the individual healthy, maintains normal body functions leads to proper functioning of the organs, nourishes the

mind and intellect, prevents diseases and at the same time corrects the irregularities that may occur in the body.

REFERENCES

- 1. WHO Major NCDs & their Risk Factors, 2017. (http://www.who.int/ncds/en/)
- 2. WHO NCD Country profiles India, 2017. (http://www.who.int/countries/ind/en/)
- 3. WHO Facing the facts: The impact of chronic disease 2017 (http://www.who.iny/chp/chronic disease report/me dia/INDIA.pdf)
- 4. Arokiasamy P, Yaday S. Changing age patterns of morbidity vis -a-vis mortality in India. J.Bios oc.sci, 2014; 46: 462-479. doi:10.2017/S002193201300062X. (pubmed) (cross ref)
- 5. Tabutin D., Masquelier B. Mortality Inequalities and Trends in Low and Middle-Income Countries, 190-2015. Population, 2017; 72: 227307. doi:10.3917/popu.1 702.0227 (cross ref)
- 6. Charak Viman Charaka Samhita with "Ayurvedeepika" commentary by Chakrapanidutta, Edi. By Vd. Acharya, Chaukhambha Samskrit Sansthana, Varanasi, 2001; 1-24.
- "Ayurvedeepika" 7. Charak Chikitsa Charaka Samhita with commentary Chakrapanidutta, Edi. By Vd.Acharya, Chaukhambha Samskrit Sansthana, Varanasi, 2001; 24-60.
- 8. Park"s Textbook of Preventive and Social Medicine edited by K.Park, Banarsidas Bhanot Publications, 23: 362-364.
- 9. API Text Book of Medicine Vol-1 edited by YP Munjal, Jaypee Brothers Medical Publications, 10: 12-14.
- 10. Sushruta, Dalhana, Sushruta Samhita, Vol -1, edited by Prof. K.R.Srikanta Murthy, 2nd edition, chowkhamba orintelia publication, Varanasi; Sutra sthana, 2004; 21: 18-364.
- 11. Kayachikitsa Vol-1 edited by prof. Ramharsh Singh, Chowkhamba Sanskrit Publications, 2: 426-430.
- 12. Comprehensive Research Methodology edited by Prof.S.Suresh Babu, chowkhamba orintelia publications, 1: 70-71.
- 13. Agnivesha, Charak, Dridhabala, Charak Samhita, Chikitsa Sthana, Madatyaya Chikitsa adhyaya edited by by Prof. Priyavrat Sharma, Chowkhamba Orientalia, Varanasi, 2005; 9: 24-60.