

**GERIATRICS - ADAPTIVE CHANGES IN AGEING THROUGH AYURVEDA****Lavleen Kashyap**

Consultant & Assist. Professor, Department of Kayachikitsa, Bharti Ayurved medical college & Hospital, Durg, Chhattisgarh, India

Email: kashyaplavleen0@gmail.com<https://doi.org/10.46607/iamj08062020>

(Published online: June 2020)

Open Access

© International Ayurvedic Medical Journal, India 2020

Article Received: 10/05/2020 - Peer Reviewed: 03/06/2020 - Accepted for Publication: 06/06/2020

**ABSTRACT**

Ageing is a natural process that begins at conception, progresses throughout the life & ends at death. It is a process of physiological, psychological & social change in multi-dimensional aspect. In 21st century the busy work schedules, stress, lack of physical & mental support, due to nuclear family, unhealthy eating & sleeping habits etc. all are catalyst for accelerating all ageing process. The results are diseased old age or decreased life span. Ageing is one among *Swabhavajavyadhi*. The treatment & management are clearly mentioned in *Ayurveda* which includes preventive & conservative methods like *Rasayana*. *Rasayana* drugs possess strong antioxidant activity. It provides longevity, immunity, improve mental & intellectual competence, increases vitality & complexion of the body. Various single & combination of drugs included *Vayasthapana*, *Jeevaniya*, *Balyadravyas*, *Ahara (Pathya-Apathya)*, *Vihara (Dincharya-Ritucharya)* & *Vichara (sadvritta, Achar rasayan, Satvavajayachikitsa)* are also be included.

“Growing old happens in mind but reshaping of ageing process is within our control.”

Keywords: Ageing, *Ayurveda*, *Rasayana*, *Ahara- Vihara*.**INTRODUCTION**

Ayurveda gives top priority to geriatrics. The term geriatrics is derived Greek word, Geri - old age and atrics -care. It is the branch of medicine concerned with the

care and treatment of elderly. According to *Ayurveda*, human body consists of seven constituents (*Sapthadhathus*) – *Rasa* (lymph), *Raktha* (blood),

Mamsa (flesh), Medas (fat), Asthi (bone), Majja (marrow) and Sukra (sperm). The dhathus get degenerated due to the body's prolonged structural changes. During old age we cannot enhance the capacity of Dhathus, but it can be protected and rejuvenated². Ayurveda, the Indian traditional holistic health science has got the potential for prevention of diseases by promotion of health and management of diseases occurring in old age. Ayurveda has a focused branch called 'Rasayana' which deals primarily with geriatric problems. It is one of the important branches of Asthanga Ayurveda, for Vayasthapana, Ayu-medha-bala-kara and RogaApaharana Samarthyaa. Many herbal formulations are capable to ameliorate the process of ageing and undoubtedly play a noteworthy role in management of Geriatric disorders.

Types Of Jara:

KalajaJara -Jara coming at the proper age is Kalaja-Jara (after 60 yrs.). It occurs at the proper age even after following the daily and seasonal regimen mentioned in Swasthavritta. This is nothing but chronological Ageing. Dhatu kshayajanyajara.

AkalajaJara - The Concept of Premature Ageing: AkalotpannalakshanaAkalaja means that occurs before the proper age due to not taking the proper care of personal

hygiene (Swasthavritta). This Akalaja Jara is of greater intensity, rapidly progressing one if neglected. This is Biological Ageing. Margaavarodhajanyajara.⁹

Etiological Factors:

Related to Dietary Habits –Lavana, Amla, Katu rasapradhana, Kshara, Suskashaka & Mamsa, TilaSamyoga, Pista Anna, Viruddha Anna, Asatmya Anna, Ruksha Anna, Abhisyandi Anna, Klinna& Guru Anna, Puti & Paryushita Anna, Vishamashana, Adhyashana.

Related to Lifestyle–Atimarga Gamana, Diwa Swapna, Nitya StriSevana, Nitya Madya Sevana, VishamaVyayama Sevan.

Related to disturbed Mental Health - Bhaya, Krodha, Shok, Lobha, Moha, RukshaVani, Kalah Priya Bharya, Kuputra¹⁰.

Process of Ageing:

AcharyaSushruta gives an elaborate and systemic classification of age, where he described old age as above 70 years. AchayaCharaka on the other hand mentioned old age above 60 years. Ayurveda considers ageing as the SwabhavajaVyadhi i.e. It is inherent nature of the living being to get old. Vagbhata and Sharangdhara described the 10-Phasic sequential biological changes taking place during 1st to 10th decades of life.

Table1: Different biological factors during different decades of life-

Decades	Year	Sarangadhara	Vagabhata
First	0-10	Balya (Childhood)	Balya
Second	11-20	Vridhhi (Growth)	Vridhhi
Third	21-30	Chhabi (Complexion)	Prabha
Fourth	31-40	Medha (Intellect)	Medha
Fifth	41-50	Tvaka (Skin texture)	Tvaka
Sixth	51-60	Dristi (Vision)	Sukra
Seventh	61-70	Sukra (Virility)	Dristi
Eight	71-80	Vikrama (Strength)	Srotrendriya
Ninth	81-90	Buddhi (Cognitive power)	Mana
Tenth	91-100	Karmendriya (Locomotive ability)	Sparsendriya

Chief Complaints: TwakParushaka (Dryness of skin), Slathasara (Flabbiness of the body), SlathaMamsa (Decreased muscle tone), Slatha Asthi (Bone weakness), SlathaSandhi (Flaccidjoint), DhatuKshaya (Loss of tissues), Kayasya Avanamanam (Bending of the

body), Vepathu (Tremors), Khalitya (Falling of hairs),Vali (Wrinkling), Palitya (Graying of hairs), Kasa (Coughing), Shwasa (Short breath), Medhahani (Decreased functions of Intellect), Utsahahani (Decreased Enthusiasm), Parakramahani (Decreased

Physical Strength), *Paurushahani* (Decreased Virility), *Prabha hani/ChhaviHras* (Changes in Complexion), *ShukraKshaya, DristiHras* (Diminished Vision),

Karmendriyahani (Decreased Loco motor Activities), *Buddhi hani* (Deterioration in Wisdom)^{9,10}

Disorders In Old Age: ^{6,9}

<p>Cardio-vascular disorders - Hypertension (<i>Vyanabalavaisamyā</i>), Ischemic Heart Disease.</p> <p>Endocrine Disorders - Diabetes mellitus (<i>Madhumeha</i>).</p> <p>Respiratory diseases - Chronic bronchitis (<i>JeernaKasa</i>), Emphysema, Bronchial asthma (<i>Tamakasyasa</i>), Pulmonary tuberculosis.</p> <p>Gastro-intestinal Diseases - Indigestion (<i>Ajeerna</i>), Acid peptic disease (<i>Amlapitta, Parinamashula</i>), Constipation (<i>Vibandha</i>).</p> <p>Musculo-skeletal diseases - Osteoporosis (<i>Asthisau-seerya / Asthi dhatu kshaya</i>), Osteoarthritis (<i>Sandhi-Vata</i>).</p> <p>Genito-urinary diseases - Benign prostate hypertrophy (<i>Ashtheela</i>), Urinary incontinences.</p>	<p>Neurological / Neurodegenerative & Special senses disorders - Complications of Cerebro-vasculars disorders viz. Paraplegia, Hemiplegia (<i>Pakshaghata</i>) etc., Parkinsonism disease (<i>Kampavata/Vepathu</i>)</p> <p>Neuro-psychiatric disorders - Anxiety neurosis (<i>Cit-todvega</i>), Depression (<i>Mano-avasada</i>), Insomnia (<i>Anidra</i> or <i>Nidranasa</i>), Dementia (<i>Smrtinasa</i>) and Alzheimer's disease</p> <p>Surgical problems - Fistula in ano (<i>Bhagandara</i>), Haemorrhoids (<i>Arsha</i>)</p> <p>Woman specific geriatric diseases - Menopausal syndrome.</p> <p>Cataract, Macular degeneration, High cholesterol, certain cancers are some of the common conditions.</p>
---	--

Principles of Treatment⁷

1. **NidanaParivarjana**– Identify the cause of disease and eliminate the same, self-healing may follow spontaneously.
2. **SampraptiVighatanai**.e. Reversal of the pathogenesis of the disease.
3. **Samsamana** or palliative therapy is designed for balancing of *Dosas* and *Dhatu*s through appropriate use of **A**. Planned diet **B**. Drugs and therapeutics **C**. Life-style management.
4. **Adjuncts**- Exercise, rest, recreation, relaxation, yoga, meditation, nutrition, physical rehabilitation, occupation, counseling and supportive therapy etc.
5. **Referrals**– Patients suffering from surgical diseases should be referred to surgical care units as advocated by *Charaka "TatraDhanvantariyanamaadhikarah"* which warrants clinical skill and clinical judgment in time.

Health Care Plan In Ayurveda: Prevention and Management^{5,9}

Dinacarya (Daily regimen):

1. **Time to wake up**- It is advisable to wake up during *Brahma muhurta*.
2. **Cleansing of teeth and mouth**- Cleansing of teeth and mouth should be practiced after every meal in addition to early morning and before going to bed. The soft brushes made out of twigs of *Khadira, Karanja, Nimba, Arka* etc. should be used for this purpose. Tongue and mouth should be cleaned by a long flexible strip of metal or plant material.
3. **Drinking Water**- Drinking water early in the morning according to one's capacity cleanses the body by enhancing the elimination of toxic wastes.
4. **Bowels**- One should attend the nature's calls. Elimination of urine and faeces cleanse the body and cheers up the mind.
5. **Eye Care**- Eyes should be cleaned with fresh water to prevent eye diseases and promote vision. Also wash eyes with *Triphala* water every day.
6. **Betel Chewing**- Chewing of betel leaves with small pieces of *Puga* (Areca nut) and fragrant substances

like cardamom, cloves, refreshes the mouth and enhance digestion.

7. **Abhyanga** (Oil Massage)- It is highly beneficial to massage whole body including scalp with oil every day to prevent dryness of body and stiffness of joints due to ageing in elderly. For massaging, *Tilataila*, *Sarsapataila*, *Narikelataila* or any medicated oils like *Narayana taila* may be used. Oil massage ensures softness and unctuousness of skin, free movement of joints and muscles; renders nourishment & improves peripheral circulation.
8. **Exercise**- Regular exercise gives resistance against disease, clears the *Srotas* and increases the blood circulation and efficiency of vital organs, promotes appetite and digestion and prevents obesity. Daily walking is the best exercise that can be advised to old people.
9. **Bath**- Bathing improves enthusiasm, strength, appetite, span of life and removes sweat and other impurities from the body. After bath, one should wear clean clothes and smear the body with natural perfumes. One should have regular shaving, haircut, clipping of nails etc.
10. **Marital Life** - Person should avoid extra marital sexual relationship and excessive sexual intercourse to prevent *Dhatukshaya* in elderly.

Ritucharya (Seasonal regimen): Seasonal changes bring about diseases and they may be prevented by adopting certain seasonal regimen. According to *Ayurveda*, seasonal variations maintain the climatic homology in form of *Dosasamyas* (equilibrium) in different seasons to promote *Swassthvrutha* (preventive & social medicine) on which *Ayurveda* has laid a great stress since prevention is better than cure. The year according to *Ayurveda* is divided into two *kaals*:

- *Aadaankaal (Uttarayan)* (Northern Solastice).
- *Visarga kaal (Dakshinayaan)* (Southern Solastice).

This division is done according to the position of the sun. *Aadaan* means taking away and *Visarga* means giving. In *Aadankaal*, the sun and wind are powerful. The sun takes away the strength of the people and the cooling qualities of the earth. It is the debilitating period. In *Visargakaal*, the sun releases the strength to the

people. The moon is more powerful, the earth becomes cooled due to the clouds, rain and cold wind.

1,2. HemantaRitu & ShishiraRitu (Winter Season): This is the season of cold, environment becomes chilly and this leads to the disequilibrium of *VataDosa* and *Kaphasanchay*.

Diet - Sweet, sour and salt taste food can be taken. In this season the digestive activity becomes more powerful. Increased *Vata* gets obstructed from spreading out due to cold atmosphere outside which can digest the tissues. More intake of sweet, sour and salt helps reducing the *Vata*. Wine prepared from Jaggery can be taken. Wheat products, milk products, sugarcane products and corn/edible oils can be taken as a part of food.

Lifestyle - Massage with oil, *Udvertan* with fine paste/powder of *Kumkum (kesar)*, Exercise, Clothing-leather, silk and wool, Exposure to sunlight and fire.

3.VasantaRitu (Spring Season): In this season, increased *Kapha* is liquified by the heat of sun which causes diminished Agni causing diseases.

Diet-Easily digestible food. Barley, honey, mango juice can be taken as food. Beverages such as *Asava*, *Arista*, *Sidhu*, Honey mixed with water. Avoid hard to digest and cold food, sour, sweet and fatty food. Such food increase *Kapha* causing imbalance of *Doshas* and causes disease.

Lifestyle - Physical exercise, Dry massage, Nasal medication can be taken. After massage bath with *Karpura/Chandan/Kumkum*. Avoid sleeping during daytime.

4.GrishmaRitu (Summer Season): In this season, Sunrays become powerful. *Kapha* decreases, *Vata* increases day by day.

Diet - Sweet, light, fatty and liquid food can be taken. Wine should not be taken as it can cause burning sensation and even debility, If necessary take in very little quantity. Boiled rice with meat, cornflour, curd can be taken in food. Drink very cold water. *PanakPanchsara* (syrup prepared with *Draksha*, *Madhuka*, *Kharjura*, *Kashmarya* and *Parshuka* fruits all in equal quantity cold with cardamom powder.

Lifestyle - Anoint body with *Chandan* paste and take bath with cold water. Stay in cool places. Wear light dresses.

5.Varsha Ritu (Rainy Season): In this season the atmosphere is although cool due to rainfall, but the humidity increases, and this causes *VataDoshPrakopa*.

Diet-Easily digestible food to be taken. Pulses, meat juice, soups, old grains and *Mastu* (thin water of yoghurt) can be taken in food.

Lifestyle –*Basti*, avoid sleeping at daytime, exertion and too much exposure to sunlight.

6.SharatRitu (Autumn Season): Sudden exposed to sunlight after cold season aggravates *Pitta*.

Diet - Bitter, astringent and sweet taste can be included in food. Take easily digestible food like rice, green gram, *Amla*, honey and sugar. Avoid heavy food, curd, oil, strong liquors.

Lifestyle –*Udvartan* with *Chandan*. Bath with warm water. Pearls give soothing effect from aggravated *PitaVirehcana*.

Svasthanvritta, Sadvritta, Achara: *Ayurveda* emphasizes on psycho-social factors of good living and describe in detail the ethics and code of conduct

conducive to good mental and social health. they provide comprehensive Psycho-social and spiritual code of conduct which can be suitably tailored and updated to suit the present condition as a social and mental health promotion regimen.⁷

Rasayana³:

Rasayana (*Rasa* = nutrition + *Ayana* = circulation and promotion) specially deals with the science of nutrition, geriatric care and rejuvenation. *Rasayana* signifies not a single drug or medication rather refers to a rejuvenate regimen which of course uses rejuvenative remedies dietetics and overall healthy life-style and positive psychosocial conduct. The use of *Rasayana* produces best qualities of *Dhatus*, i.e. body-tissues by acting through one or all of the following three principal levels of biological system with net result of improved nutritional status.

1. At the level of *Rasa* (Promoting directly the nutrient value of plasma).
2. At the level of *Agni* (Promoting biofire system responsible for digestion and metabolism).
3. At the level of *Srotas* (Promoting microcirculation and tissue perfusion).

Classification of Rasayana⁹

S.N.	Classification	Types of Rasayana		
01	Main division	<i>Dravyabhuta Rasayana</i>	<i>Adravyabhutas Rasayana</i>	
02	As per method of use	<i>KutiPraveshika</i>	<i>Vatatapika</i>	<i>Droni- praveshik</i>
03	As per Scope of use	<i>KamyaRasayana</i> - <i>Prana Kamya</i> - <i>MedhaKamya</i> - <i>Shri Kamya</i>	<i>NaimittikaRasayana</i>	<i>AjasrikaRasayana</i>
04	As per content of Rasayana	<i>AharaRasayana</i> (DietaryRasayana)	<i>Aushadha Rasayana</i> (Medicinal Rasayana)	<i>Achara Rasayana</i> (Conduct of Rasayana)
05	Specific Rasayana drugs & measures	<i>MedhyaRasayana</i>	<i>Achara Rasayana</i> - <i>Buddhi Medha Vardhaka</i> - <i>AyuVardhaka</i>	
06	According to <i>Prabhava</i>	<i>Samshodhana Rasayana</i>	<i>Samshamana Rasayana</i>	
07	According to <i>Satmya</i>	<i>RituSatmya</i> - <i>Aadana Kala</i> - <i>Visarga Kala</i>	<i>DeshSatmya</i> - <i>Sadharana Desha</i> - <i>Jangala Desha</i> - <i>Anupa Desha</i>	
08	Acc. to <i>Sapta Dhatus</i>	<i>(1)Rasa (2) Rakta (3)Mamsa (4)Meda (5)Asthi (6)Majja (7) Shukra</i>		
09	According to Modern Medical Science	To Promote Immunity	To improve Metabolism	To improve Endocrine sand exocrine secretions

Rasayana groups¹ (According to *Acharya Charak*)

- **JivaniyaMahakasayaVarga:** *Jivaka, Risibhaka, Meda, Mahameda, Kakoli, Kshirakakoli, Mudgaparni, Mamsaparni, Jivanti, Madhuka.*
- **BalyaVarga:** *Aindri, Risabhi, Atirasa (Satavari or Riddhi), Risyaprokta (Masaparni), Payasya (KshiraVidariorKakoli), Aswagandha, Sthira, Rohini, Bala, Atibala.*
- **Vayahsthapana:** *Amrita, Abhaya, Dhatri, Mukha (Rasna), Sweta (RasnaBheda), Jiwanti, Atirasa(Satawari), Mandukparni, Sthira, Punarnava.*

Popular formulations and Kalpa Rasayanas¹

Chyavanaprasa, Brahma Rasayana, Amalaka Rasayana, Amrta Bhallataka, Bhallataka Kshirapaka, Haridra Khanda, BalaRasayana, AmritaRasayana, Punarnava Rasayana, Louhadi Rasayana, Aindra Rasayana, Triphala Rasayana, Silajatu Rasayana, Ritu-Haritaki Kalpa, Pippali Vardhamana Kalpa, Bhallataka Kalpa, Panchamrta Parpati Kalpa etc.

Rasa Preparations:

Makardhwaja Rasayana, Siddhamakardhwaja, Mahalaxmivilasa Rasa, Vasantkusumakar, Purnachandrodaya Rasa⁹.

Single & Compound Herbo-Mineral Formulations⁸

Plant Based Formulations-

SingleRasayana drugs for some specific Disease conditions

- **Diseases of Eye:** *Jyotishmati (Celastruspaniculata), Triphala (Three myrobalans), Satavari (Asparagus racemosus), Yastimadhu (Glycyrrhiza glabra) and Amlaki (Emblia officinalis).*
- **Diseases of Heart:**
Salaparni (Desmodiumgangaticum), Arjuna (Terminalia arjuna), Guggulu (Commiphoramukul), Pushkaramula (Inularacemosa).
- **Skin diseases:** *Bhallataka (Semecarpus anacardium), Vidanga (Embelia ribes) and Bakuchi (Psoraliacorylifolia)*
- **Rasayana for overall Health:** *Guduchi (Tinosporacordifolia), Amlaki (Embliaofficinalis), Aswagandha (Withaniasomnifera), Cow's milk and Takra.*

- **Asthma:** *Sirisha (Albezialebbeck), Agastya (Sesbania grandiflora), Haridra (Curcuma longa), Haritaki (Terminaliachebula).*
- **Arthritis:** *Rasona (Allium sativum), Sallaki (Boswellia serrata), Guggulu (Commiphoramukul), Aswagandha (Withaniasomnifera) and Sunthi (Zinziberofficinale).*
- **Neuropathies:** *Rasona (Allium sativum), Guggulu (Commiphora mukul), Bala (Sida cordifolia), Aswagandha (Withania somnifera).*
- **Diabetes:** *Silajitu (Black bitumen), Amlaki (Emblia officinalis), Haridra (Curcuma longa), Tejptri (Cinnamomumtamala) Methika (Trigonellafoenum graecum).*
- **Lipid disorders:** *Guggulu (Commiphoramukul), Haritaki (Terminalia chebula), Pushkaramoola (Inularacemosa), Vacha (Acorus calamus).*
- **Hypertension:** *Rasona (Allium sativum), Sarpagandha (Rauwolfia serpentina), Aswagandha (Withaniasomnifera), Jatamansi (Nardostachysjatamansi).*
- **Brain and Memory Disorders:** *-Brahmi (Becopamonnieri), Mandookaparani (Centelaasiatica), Jyotishmati (Celastruspanicula) Kapikachhu (Mecunapuriens), Tagara (Valeriana wallichii).*

Suggested package³: A suggested package of Geriatric care The *Ayurveda*-based package of geriatric care may consist of:

1. Recording of the *Prakrti, Vaya, Agni & Ojas status, Desa-Kala, Vyadhi* and overall health status to help in planning the geriatric care.
2. *Swasthavritta & Sadvritta* i.e. codes of personal and social hygiene.
3. Dietary care avoiding too much of fat and heavy proteins preferring easily digestible nourishing *Satvika* diet.
4. Regular exercise according to *Vyayama-Sakti*.
5. Regulated rest and relaxation.
6. Yoga and meditation.
7. *Rasayana* therapy prescribed in consideration of individual needs considering the findings recorded under item 1 mentioned above.
8. Medical management of associated age-related diseases if any.

9. Supportive therapy and socio-economic support and care of social and spiritual health.

CONCLUSION

Increased life expectancy, rapid urbanization and lifestyle changes have led to an emergence of varied problems for the elderly in India. So, Geriatric health care must be made a part of the primary health care services. It must be remembered that complete health care to the elderly is possible only by comprehensive and multi-disciplinary approach. It is obvious that the process of ageing was elaborately described in *Ayurvedic* texts and a separate medical discipline called *Rasayana-Tantra* was developed which described a variety of methods and measures to promote healthy longevity. Combining *Ayurvedic Rasayana*, *Pathya-apathya* (dietetics), *Swasthavrutta*, *Sadvrutta*, *Ayurvedic* medicines & lifestyle. It is possible to develop an effective package for geriatric care today for global use. These measures are for preventing and curating the diseases as well as for promoting the health in old age. Proper observance of these principles leads to the perfect physical, mental and spiritual wellbeing.

REFERENCES

1. Agnivesh, Charaka; Charaka Samhita. Charaka Chandrika Hindi Byaksha, Edited by BramhanandaTripathy, 4th edition, chikitsa sthan-1-4, Caukhamba Subharti Prakashana, Varanasi
2. Rai Amit Kumar. Geriatrics: A Ray of Hope Through Ayurveda. World Journal of Pharmaceutical Research. 2014, 03(9): 335-351.
3. Singh Reeta. Geriatric Health Care by Use of Rasayan. International Ayurvedic Medical Journal. 2015, 03(11): 2364-2368.
4. Singh Ram Harsh. The Contemporary Strength of Ayurvedic Geriatrics. Annals of Ayurvedic Medicine. 2012, 01(1&2): 22-30.
5. Ujjwala Vamanrao Pawar. Lifestyle Modification Plan as Per Ayurveda In Geriatric. International Research Journal of Pharmacy. 2013, 04(10): 7-11.
6. Chavan Shital O. Approach towards Lifestyle Modification Plan as Per Ayurveda and Modern Technique for Prevention of Geriatrics. International Research Journal of Pharmacy. 2013, 04(10): 12-15.

7. Singh Ram Harsh. Manual on Geriatric Health Care. Department Of AYUSH, Ministry of Health and Family Welfare, Govt. Of India, New Delhi, India and Faculty of Ayurveda, Banaras Hindu University, Varanasi, 2009.
8. Srikanth Narayanam. Ayurveda& Siddha for Geriatric Care. Researchgate. 2008.
9. Babu S. Suresh. Geriatrics in Ayurveda. Chaukhamba Orientalia Varanasi. 1st Edition 2001.
10. ChapalJagruti. Prevention Health Care in Geriatrics. Unique Journal of Ayurveda & Herbal Medicine. 2013, 01(3): 21-25.

Source of Support: Nil

Conflict of Interest: None Declared

How to cite this URL: Lavleen Kashyap: Geriatrics - Adaptive Changes In Ageing Through Ayurveda. International Ayurvedic Medical Journal {online} 2020 {cited June, 2020} Available from: http://www.iamj.in/posts/images/upload/3734_3740.pdf