

AYURVEDA PERSPECTIVE TOWARDS PANDEMIC DISEASES W.S.R. TO CURRENT
SCENARIO: A REVIEWDr. Pradeep Kumar Chouhan*¹ and Prof. Sapna Malviya²¹Associate Professor & HOD, Rachana Sharir Dept., Govt. Ashtang Ayurveda College, Indore, India.²Assistant Professor, Dept. of Botany, BLP Govt. PG College, Mhow, India.

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ABSTRACT

Ayurveda is a science which can be applied for both preventive and curative aspects of various diseases. Since ancient time outbreaks, pandemics of *Sankramak Roga* (communicable diseases) were known to the Ayurvedic scholars. They coined the term *Aupasargika Roga* for epidemics, which indicates sudden, outbreaks of a particular disease in a local area. When this outbreak rapidly spreads to the other parts of the country it is termed as *Janapadodhvansa Roga* (Pandemics). Increasing population, change in environment, increased prevalence of drug resistant in microbes and poverty has increased cases of *Sankramak Roga* in 19th and 20th century. HIV, Swine-flu, Ebola virus outbreak and recently world is facing Covid-19 threat. According to Ayurveda *Janapadodhvansa* can be managed through preventive and curative approaches of Ayurveda like; *Shodhana* and *Rasayana*.

KEYWORDS: *Janapadodhvansa, Covid-19, Rasayana, Pandemics.*

INTRODUCTION

The current scenario of global advancement in technology, ease of transport, travel, international trade; people around the world are connecting very easily and all this leads to the quicker and easy transmission of diseases. Transmission can be from animal to humans, humans to humans and this result in development of more virulent strains of microbes. There are various modes of transmission of *Sankramak Roga* such as *Gatrasansparsat* (physical contact), *Sahashaiyanat* (sleeping together), *Nihsvasat* (expired air), *Saha Bhojnat* (sharing of food in same plate) and *Vastramalyanulepanat* (sharing of clothes & garland) etc.

Ayurvedic classics have described different types of *Krimi* (micro-organisms), *Nidana* (etiology), *Sthana* (habitat), *Nama* (nomenclature), *Varna* (colour), *Samsthana* (clinical features), their *Prabhav* (effects) and *Chikitsa* (treatment).

The School of *Charaka*, *Prakruti*, food habits, *Dehbala*, *Satmya*, *Satwa* and many other factors vary from reason to reason. There are four factors which produce similar impact on all the dissimilar reason are *Vayu*, *Jala*, *Desh* and *Kala*, due to vitiation of these four factors, community suffer from a *Janapadodhvansa* disease leading to death of many people at the same time, so they are labeled as *Janapadodhvans*.

According to Ayurveda, vitiated *Vayu* (air), *Jala* (water), *Desha* (habitat) and *Kala* (seasons) are responsible for spread of various diseases and killing of mass population (**Figure 1**). These together are termed as *Janapadodhvansa vimana* chapter.

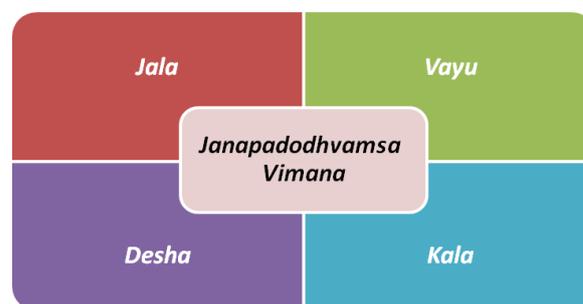


Figure 1: Different factors responsible for spread of *Sankramak Roga*.

Kriyakala is a concept of *Ayurveda* which describes the disease cycle. *Ayurveda* basically considers two types of diseases i.e. *Nija* (Endogenous) and *Agantuja* (Exogenous). Loss of natural immunity makes the person susceptible to various infections. Aggravated *Doshas* vitiates *Kosthagni* (metabolic enzymes) which produces *Ama* (toxin) resulting in *Srotodushti* (disturbance in equilibrium of channels). When the impure *Rasadhatu* (plasma and lymph) rich in *Ama* (toxin) and aggravated *Doshas*, gets obstructed into the minute channels of the body, disease occurs. *Ayurveda* considers immunity as a

prime factor in protection from diseases. The progression of disease depends upon types of infection, individual constitution and growth of microbial load. Some described communicable diseases as *Aupsargika Roga* which also has two types *Upadrava* and *Prakkevala*. Some *Ayurvedic* classics described the diseases transmitted through *Vayu* (*Swasa*, *Kasa* and *Pratisyaya* etc.), *Sparash Indriya* as *Sankramaka Roga*. Some stated that *Sankramaka Roga* like *Kushta*, *Jwara*, *Shosha*, (tuberculosis) and *Netrabhishyanda* may occur due to the inhalation of deranged *Vayu* (air), sleeping, sharing clothes and eating together with diseased person. Some emphasized skin disease like *Kushta*, *Upadansha*, etc. as *Sankramaka Roga* which transmit skin contact and sexual contact respectively.

Ayurveda and Current Pandemic Diseases

The current pandemic disease occurs by a novel virus belonging to the Coronavirus family. It is a highly infectious disease. COVID-19 symptoms are similar to those of an *Agantuj Jwara* (leading to the disequilibrium of the body *Doshas*), it is a fever of *Vata-Kapha* origin, *Samprapti* of this *Roga* is described in **Figure 2**. The main site of infection caused by this virus is respiratory system. This disease occurs due to imbalance in all three *Doshas*, predominantly of *Vata-Kapha* imbalance. Some major symptoms of this disease are *Jwara*, *Kasa* and *Swasa*.



Figure 2: Samprapti of Current pandemic Infection.

Ayurveda suggest treatment of such *Roga* by medicines, diet and regimen. Affected person should be kept separated from others. Various medication like *Yukti Vyapashraya* and *Satvavjaya Chikitsa* given to cure the imbalance in *Tri-Doshas*, to counter part *Jwara*, *Swasa* & *Kasa*. *Ayurveda* suggest immune-modulation and immune-booster, *Panchakarma* and symptomatic treatment by some therapies like *Sodhana* and *Rasayana* for *Janapadodhvansa* diseases. *Dosha Prakopa Awastha* (accumulation of toxins) and *Prakriti* (constitution) play a vital role in the management of COVID-19.

Ayurveda also emphasizes on *Yoga* which exerts slow but steady pressure to all the vital organs of the body. This helps to strengthen vital organs and improve immunity. *Pranayama* consist of several types of *Yoga* which are related mainly to respiratory system such as *Bhastrika* (forceful fast breathing), *Anuloma-Viloma* (sequential breathing by alternate closing of each nostril) etc. All these activities help in cleaning of excess mucus which gets accumulated in alveoli of lungs and thus improves the elasticity. Thus we can say *Pranayama* improves the lung capacity. Infection of COVID-19 affects lungs badly thus causing death also. So one can save the life by improving lung capacity as it will give

more chance and enough time to manage the infection by medication and care.

In India, *AYUSH* ministry has suggested medicines like *Chyavanprash*, drinking milk with turmeric powder, *Kwatha* made from *Tulsi*, cinnamon, black pepper & dry ginger etc. These approaches help to improve immunity and internal strength. It also mentioned some therapies for the quarantined people like *Ushnodaka*, *Gandusha*, *Partimarsha Nasya*, etc.

Ayurveda Drugs/Natural Herbs in Current Pandemic Condition

- ***Guduchi (Tinospora cardifolia)*** – It is an herb which has immunomodulating and antioxidant properties. It enhances humoral and cell mediated immunity by increasing IgG antibodies production and also stimulates macrophages to fight against infections.
- ***Shunthi (Zingiber officinale)*** – It is a spice which is used widely for therapeutic benefits. It is rich in volatile oils, alkaloid, phenol and thus possess different properties like antibacterial, antiviral, antifungal, analgesic and antiulcer etc. It is rich in

vitamins, minerals and also possesses antioxidant activity.

- **Bhumiamalki (*Phyllanthus niruri*)**- It is a shrub whose extracts possess antiviral, antibacterial, hepatoprotective, hypoglycaemic, analgesic and anti-inflammatory properties. It is rich in flavanoids, phenols and tannins which gives antioxidant and antiviral properties. Phyto-chemicals such as rutin, glucosides and gallic acid provide antimicrobial and anti-protozoal properties.
- **Yashtimadhu (*Glycyrrhiza glabra*)**- The roots of this plant contains many phenolic compounds such as coumarin and cinnamic acid derivatives which helps in treating throat and upper-respiratory tract infections. Its active compounds like Glycyrrhizic acid, Triterpene and Saponins provide anti-viral property.
- **Haritaki (*Terminalia chebula*)** – It is a medicinal plant which is rich in ethanolic extracts. Gallic acid provides antimicrobial properties, Tannins provide antiviral properties. It is considered as king of medicine due to its antibacterial, antifungal, antiviral, anti-inflammatory and wound-healing activities.
- **Pippali (*Piper longum*)** - It has higher amount of alkaloids, lignans and esters which provides antimicrobial properties especially in case of respiratory tract infections. Piperine as its main constituent considered responsible for its anti-inflammatory property.
- **Maricha (*Piper nigrum*)** - It is an herb which aggravates *Pitta* and is rich in chemicals like ascorbic acid, serine and carotene, etc. It possesses anti-inflammatory, anti-diarrheal, anti-oxidant, antimicrobial, analgesic, anti-diabetic and antipyretic activities. It provides relief from cold and cough.

CONCLUSION

Ayurvedic literatures have described both epidemics and pandemics clearly with what preventive measures need to be taken. *Janapadodhvansa* means annihilation of society, thus *Nidan parivarjana* (avoiding the causative factors), *Apakarshanam* (removing microbe from affected site) and *Prakriti Vighata* (improving environment) are suggested to manage such conditions. Keeping distance from the affected individuals is the necessary step. Different medication should be given to treat the etio-pathogenesis of such disease. As India has rich science of *Ayurveda*, we can use this knowledge to control current pandemic situations.

REFERENCES

1. Central Council for Research in *Ayurveda* and *Siddha*. Management of Chikungunya through *Ayurveda and Siddha*. New Delhi, 2009. <http://www.ccras>.
2. Shukla N. *Ayurvedic* approach to communicable disease – An overview. Open Access Scientific Reports, 2010.

3. Shastri Pandit Kashinath, Chaturvedi Dr. Gorakhnath. Hindi Commentary: *Charak Samhita Chikitsasthan*, 3/110. 111. Chaukhambha Bharati Academy Publication, Varanashi, Reprint Edition, 2007.
4. Rawat N, Roushan R. *Guduchi*- A potential drug in *Ayurveda*. World J Pharm Res, 2018; 7: 355-61.
5. Sushruta Samhita (Sushrut Samhita, Su. Su. 24/7). Mumbai: Niransagar Publication, 1941.
6. Samal J. The concept of public health in *Ayurveda*. Int *Ayurvedic* Med J, 2013; 1: 1-5.
7. M. T. Murray, The Healing Power of Herbs: The Enlightened Person's Guide to the Wonders of Medicinal Plants, vol. 25, Prima, Rocklin, Calif, USA, 1995.
8. Patwardhan B, Payyappalli U. *Ayurveda* and antimicrobial resistance. J *Ayurveda* Integr. Med, 2018; 9(2): 85–86.
9. Coronavirus Disease 2019 (COVID-19) – Symptoms. Centers for Disease Control and Prevention, 2020.
10. Vaidya Yadavji Trikamji, *Charak Samhita* of Agnivesa Elaborated by Charaka and Dridhbala with the *Ayurved* Dipika Commentary by Chakrapani, edition, Varanasi, Chaukhamba Surbharti Prakashan, 2014.