

2008

Agni: the Vital Source of Life

Amala Guha

University of Connecticut School of Medicine and Dentistry

Follow this and additional works at: http://digitalcommons.uconn.edu/som_articles



Part of the [Alternative and Complementary Medicine Commons](#)

Recommended Citation

Guha, Amala, "Agni: the Vital Source of Life" (2008). *SoM Articles*. 24.
http://digitalcommons.uconn.edu/som_articles/24

Agni: The Vital Source of Life

Amala Guha
University of Connecticut School of Medicine, Farmington, CT

Sam Dosha Sam Agni Sam Dhatu Malakriyah
Prasanna atmaindriyamanah swasth itiabhidheyate

Sushruta Samhita 15, 41

According to Sushruta the optimal health is defined as balanced dosha, dhatu, agni and excretion, happy and contented spirit, perceptions mind and internal peace. Here *Agni* is one of the key factors for maintenance of optimal health and disease.

The Sanskrit word "Agni" represents the fire element responsible for generating heat and chemical energy in the body. According to Ayurveda *agni* is the indicator of the functional aspect of life that monitors body temperature, metabolic enzymes, digestive process and the entire body physiology. *Agni* manifests all over the body however, the primary seat of *agni* is in the gastrointestinal tract (GI) where food is converted into nutrient and serves as the very source of energy (2).

The *agni* that involves in the break down of food into nutrient is known as *Kayagni*. *Kayagni* is represented by various names such as *Jathar agni* or pachakagni or andarya ojas (immunity/ mucosal immunity). Although *Jathar agni* mediates the breakdown of complex food into simple nutrients, various endothermal and exothermal reactions are governed by their own specific agni (2, 3).

The *Jathar agni* in the gastro-intestinal tract is largely responsible for general digestion of food in the *amashaya* (stomach) and in the *grahani* (intestine) with the help of other localized agni such as *Kloma agni* (pancreatic juices) and *Bhuta agni* (liver associated functions). *Jathar agni* plays an essential role in the GI mucosa mediated functions like activation and processing of enzymes, assuring proper selection and absorption of nutrient into systemic circulation where tissue specific nutrition are channeled by srotas (special channels) to various tissue sites. Therefore, *Jathar agni* is central to the regulation and maintenance of overall health of the body, ensuring proper health and function of every cell and tissue of the body. As the processed food or nutrients move into various parts of the body via various srotas (channels of communication and interconnectedness), nourishing various tissues, the tissue specific agni known as *dhatu agni* (tissue specific agni) plays a crucial role in selecting specific nutrient for each specific dhatu (tissue). Every dhatu has its own *agni* that specializes and looks after its own tissue specific metabolic needs. Similarly, functions of srotas are governed by their own *agni*. There are thirteen srotas so there are thirteen *sroto-agnis* that regulate the functions of various srotas.

Pilu (atom) *agni* functions at an atomic level (cellular level) and presides over vital cellular functions while the *pithar agni* (sub-cellular) regulates sub-cellular and genetic aspect of the cells. Similarly, the excretion is governed by the *mala agni*. There are three *mala agnis* regulating urine, feces and sweat that functions in cooperation with other agni(s).

According to Ayurveda food is the basic nutrient that nourishes the body and mind. Our perceptions and moods are influenced by the food we eat and the nutrients that nourish various parts of the nervous system. This process is under the control of *indriya agni* (*agni of nervous system*). *Indriya agni* is responsible for the luster of the eyes, retaining *smriti* (memory) and other perceptions (sensory perceptions) (3,4).

In other words the food we intake dictates all aspects of our bodily functions, mental acuity and spiritual harmony. Thus *agni* plays a multi-factorial role in maintaining balanced doshas, balanced tissues, balanced excretion, mental equilibrium, right perceptions and spiritual harmony.

Ahar Ras and Ras dhatu: After digestion the material that is moved from intestinal lumen into the blood could be compared with the *ahar ras*. According to Ayurvedic concept, *ahar ras* or *nutrients*, coming off digestion is of fundamental importance as this nutrient feeds the formation of *rasa dhatu* (the primary tissue) on which lies the burden of formation of subsequent tissues.

Although the nutrients are processed by the *jathar agni*, the increase or decrease of production of dhatu is regulated by the status of the *agni* (*tikshana* or *manda* etc) and the quality of ahar (diet) (2-4).

It is important to note that the quality of food based upon its *ras* (aste), *virya* (potency) and *vipak* (post-digestive effect), quantity of food intake and repeated use of the same food effects *agni* and the formation of tissues. Unfavorable, unsuitable or wrong combinations of food have adverse effect at various levels of digestion. For example eating flesh may enhance growth of muscle tissues and intake of fatty food will increase meda dhatu (adipose tissues). Therefore, proper diet and the effect of dietics play an important role on the health of an individual (a subject that is too big for this article to discuss). Dysfunctional *agni* is the root cause for the formation of *Ama* (toxins) leading to various pathologic conditions (2-7)

Food which causes distention, raw and uncooked food, heavy food, too cold or dry food, food inducing inflammation in the GI lining, dehydrated food and food soaked in too much water for long period may cause “ama dosha” (7). Emotional stress, grief, rage, worry, fear, and irregular diet all lead to vitiated *agni* and formation of ama.

Functional status of Agni under various conditions: Formation of ama is influenced by various conditions, Table 1. There are four basic functional conditions for dysfunctional *agni* listed below.

Manda Agni (low or hypo-metabolism): Individuals with *manda agni* cannot digest even small quantity of easily digestible food. When *Agni* is unable to digest food properly ama is formed. *Rasa dhatu* formed under such conditions will also produce *ama*. When the *Sam Ras* (rasa containing ama) goes into circulation and is unable to enter minute srotas, causing *Srotorodha* (blocking of srotas), it accumulates outside of the tissues causing dhatu *vridhi* (abnormal increase of tissue), a common abnormality found in many diseases. The quality and type of food greatly affects such conditions. Food that contains water and earth elements is heavy, slow and cool in its attribute, dampens the strength of *Jathar agni* and contributes to *manda agni*. Similarly drinking excessive quantity of water leads to *manda agni* and formation of *ama* (2-5). Edema, obesity, hypertension are some of the conditions that take place under such conditions.

Tikshna Agni (sharp or hyper-metabolism): When *Jathar agni* is under the influence of Pitta dosha, the hot, sharp and penetrating qualities of pitta intensifies the strength of *jathar agni*. Under such circumstances food is digested fast and the person is always hungry. Increased *agni* burns and chars the nutrients and the *rasa dhatu* contains no or very little nutrient with the result the dhatus are unable to receive proper nourishment and undergo *dhatu kshya* (tissue degeneration) giving rise to conditions like dry throat, acid indigestion, colitis, diarrhea, dysentery nausea and vomiting(5-7).

Visham Agni (Irregular metabolism): Under this condition *agni* fluctuates all the time disturbing the pace and continuity of digestion leading to the production of *ama*. Vata vitiating diet and conditions may contribute to irregular digestion leading to erratic appetite, abdominal distention, flatulence and constipation.

Sama agni (balanced metabolism): is the result of well balanced doshas according to ones constitution. Under this condition, digestion, absorption and assimilation of food is optimal, and the person is at a state of perfect health.

Stages of Agni	Functions
<i>Manda Agni</i>	Slow digestive power
<i>Tikshna</i>	Intense or strong digestive power
<i>Visham</i>	Irregular or erratic digestive power
<i>Sama</i>	Balanced and optimal digestion

Table 1: Types of agni according to their function.

Ama: Impaired function of agni results in the production of Ama (5- 9). Impairment of agni could also be brought about by abstinence from food, indigestion, over-eating; irregular diet habits; indulgence in incompatible foods; consumption of cold substances; improper *virechana* (purgation), *vamana* or *snehana* or panchakarma leads to wasting of tissues which follows in the wake of diseases. Similarly, allergic states induced by place, climate, season and suppression of natural urges, fails to digest most easily digestible food. The undigested foods undergo fermentation leading to AMA dosha (toxic condition). According to Vagbhata, due to the impaired functioning of *Jathar agni* or hypo-functioning of Jathar agni, *rasa dhatu* (the first dhatu) is not properly formed leading the nutrients to undergo putrefaction by remaining in the stomach or by backlog the absorption. It is this state of *rasa* which is responsible for the formation of *ama*.

Symptoms of Ama: described in the Ashtang Hridaya by Vagbhata are as follows

Srotorodha balabhramsha gaura vanilamudatah

Alasyapakti nishthiva malasangaruchi klamah

Ashtang Hridaya 13, 23

Srotorodha (obstruction in srotasas/ body channels), occlusions, embolisms, and venous engorgements may occur due to the clogging by *Ama*. Accumulation of fluid may also result from such obstructions (6).

balabhramsha (decreased physical and immunological strength), low energy, fatigue, chronic fatigue syndrome and weakness may result from this condition.

gaurav (feeling of heaviness), sense of heaviness and restriction of movements may occur.

anila mudhata (decreased activity of vata). When vata channels are blocked the vata moves into other available channels or any open and available empty space, and creates pressure where it has stagnated creating breathlessness, tingling and numbness, mental confusion and restlessness.

alasya (lassitude), loss of interest, laziness, and inactiveness occurs due to improper physiologic functions.

apakti (indigestion), *nishthiva* (repeated spitting-due to increased salivation), these may create flatulence, congestion, body ache due to the accumulation of *Ama* and enhance further build up of *Ama*.

malasanga (inadequate removal of wastes from the body) may result in uremia, constipation, and mental illusions.

aruchi (anorexia) and *klam* (exhaustion without any work). Lack of taste and loss of appetite may result in exhaustion and fatigue. *Ama* can contribute to various *doshic* disturbances.

Indications of presence of Ama: Some of the physiological and metabolic changes that occur due to the accumulation of toxins (*ama*) are as follows:

Bad breath, coated tongue, body ache, sclera of the eye looking opaque or muddy, signs of Diabetes, abnormal stool color, turbid or dark urine, and yellowish discoloration of sweat are some of the symptoms of *ama* (6-9)

Elimination or treatment of ama depends on the following principles (10):

Agni-deepan: In order to stimulate agni, a systematic diet, herbs and exercise are prescribed.

Ama Pachan: To boost the process of digestion and absorption (*Ama-pachan*) is performed. The accumulated *ama* is digested with the help of recommended food and herbs.

Shodhana-panchakarma (Cleansing procedures): Shodhan treatment is administered to eliminate toxins. In case of severe or chronic *ama* accumulation one is recommended to undergo a five step cleansing process known as Panchakarma. Panchakarma, a methodical detoxification, is an invasive process and is performed under the supervision of an expert Ayurvedic Clinician.

Shamana (Palliative therapies): a palliative approach of maintaining a comfortable daily living is formula where elimination and detoxification is not possible.

As simple as it may sound, the treatment of “deepan pachan” and Panchakarma is a complex and invasive process and is administered only by trained and knowledgeable Ayurvedic practitioners with experience.

Corresponding Author

Amala Guha, PhD, MPH, MS
Assistant Professor of Immunology & Medicine
University of Connecticut School of Medicine
guha@worldnet.att.net

References:

1. Sushruta Samhita: ed PV Sharma, Chaukhambha Vishwabharati, Varanasi, vol. 1, Cap. 15, Pg 175
2. Sushruta Samhita: ed PV Sharma, Chaukhambha Vishwabharati, Varanasi, vol. 1, Cap. 35, Pg 336.
3. Guha A: Ayurvedic Concept of Food and Nutrition, vol 4.no1,4-7, ELEMENTS, 2006.
4. Lad V: Six Stages of Nutrition, vol4, no.1, 8-12, ELEMENTS 2006
5. Yogaratanakar; Ritucharya. Ed M Babu. Chaukhambha Sanskrit Series office, Varanasi. vol 1, pg 121.
6. Ashtang Hridaya: ed KR S Murthy. Krishanadas Academy, Varanasi. Vol.1, chapter 13, pg187.
7. Guha A, Sadanand Deshpandey: Ayurvedic Approach to Rheumatologic Disorders, vol.5, no.3, ELEMENTS, 2007
8. Guha A, A Guha, PR Mason, D Primorae, J Miller, JR Sporn. Interferon-induced growth arrest is mediated by membrane structural changes. J. Interferon and cytokines, 17:701-706. 1997
9. Charak Samhita: Ed PV Sharma, Chaukhamba, Varanasi, Charak chi. 15:42-45.
10. Introduction to Kayachikitsa. Ed Dwarakanath C: Chaukhambha orientalia. Varanasi, Indi

Continued from page

3. Abbott, P. Non-timber forest products harvesting: lessons for seasonally-sensitive management in miombo. In M.R. Ngulube, L. Mwabumba & P. Chirwa, eds. Community-based management of miombo woodlands in Malawi, Proceedings of a national workshop, Sun and Sand Holiday Resort, Mangochi, Malawi. 1999. pp. 70–89.

2008

Fourth International Symposium of Ayurveda and Health

ISAH

December 12 –13

Pune, India

For abstracts and presentation, Please call
Dr. Amala Guha (860) 561-4857 or aguha@att.net