

## Current Science Insights Concerning Agnihotra Technology - A Review

KANCHAN YADAV AND SHILPA KAUSHAL

Chandigarh University Institute of Agricultural Sciences, Chandigarh, Gharuan, Mohali, Punjab - 140 413  
e-Mail : ky242130@gmail.com

### AUTHORS CONTRIBUTION

KANCHAN YADAV :  
Conceptualization ;  
SHILPA KAUSHAL :  
Drafting and editing

### Corresponding Author :

KANCHAN YADAV  
Chandigarh University  
Institute of Agricultural  
Sciences, Chandigarh,  
Gharuan, Mohali, Punjab

Received : November 2022

Accepted : January 2023

### ABSTRACT

Despite the landmark of green revolution, our nation's intensive chemical farming has severely polluted land, food, potable water, and air. When you eat food that was produced in these circumstances, the contaminants are taken into your body. Sustainable agriculture practiced by Agnihotra is the solution to our issues. Agni means 'fire'. According to the Vedas, 'HEAL THE ATMOSPHERE AND IT WILL HEAL YOU', hotra signifies 'going to heal'. The far more important feature of Agnihotra is that it unites the forces of the five variables of earth, air, water, sun and space to bring about tiny differences in biota. It is the vital spark in Homa farming. It is used when all hope is lost and has proven to be useful in raising crop output and minimizing microbial contamination pathogenicity, soil and water decontamination, pest and disease infestation. Regularly incorporating agnihotra will enhance the impact of that activity on the farm.

*Keywords* : Biota, Dawn and dusk, Pathogenicity, Photochemical

AGNIHOTRA is a traditional domestic solemnity, performed to maintain harmony between living beings and nature, without harming and by giving respect. Agnihotra, the simplest form of 'Yajna' performed at sunset/sunrise in which cow dung is burnt in a copper pot by using cow ghee and brown rice as oblations along with chanting of mantras of sun and fire. Agnihotra is mentioned and explained by traditional Vedic literature, *i.e.*, The Grihya-Sutra (Rules of Vedic domestic ceremonies), (1) 1.2, 1.9 and 1.10 of Asvalayana Grihya-Sutra, (2) 1.1 and 1.3 of Gobhila Grihya-Sutra, (3) 1.5 of Khadira Grihya Sutra, (4) some part of Sankhayana Grihya-Sutra [Muller,2004].

Agnihotra is a purifying fire derived from the Ayurvedic system of medicine. It is a daily procedure of cleansing the environment by lighting a carefully prepared fire at sunrise and dusk. As described in the Rigveda, the holy monks of the Ancient Indus civilization (9500 years ago) practiced Agnihotra yagya in order to purify the atmosphere. The phrase is 'Kramishchmiv rastischmiya gnenkalpt ama'.

Chapter 18 of the Yajurveda hymns No. 1 to 29 states that Yajna is the fundamental building block of agricultural, physical, mental and spiritual advancement. It also provides happiness to the kingdom Plantae, boosts metabolism and guards against pollution of the air. Additionally, the Bhagavad Geeta, Krishiparasara Agnipuran and Vriksha Ayurveda have all the reference agnihotra. In the Vedas, it is stated, 'HEAL THE ATMOSPHERE AND IT WILL HEAL YOU'. Any individual from any background is welcome to do agnihotra and improve their home's atmosphere. Millions of persons across the globe have learned that Agnihotra helps in reducing tension, promotes more mental clarity, enhances wellness, boosts vitality and infuses the soul with affection. It is an excellent assistance in the treatment of drug and alcohol addiction. Agnihotra also feeds plant life and protects it from damaging radiation and deadly microorganisms.

Agnihotra is an ancient science that was imparted in sanskrit at the time of creation. Sanskrit was never anyone's native tongue; it is a vibrational language.

With Sanskrit mantras and fire prepared with certain organic compounds and timed to the sunrise/sunset biorhythm, a little copper pyramid of a specified size (2.25 inches \*6 inches) and shape is used to prepare the fire. The items which are required for performing agnihotra are brown rice, dried cow dung, and ghee (clarified unsalted butter). Mantras are chanted at sunrise and dusk and a tiny amount of rice and ghee is added to the fire. The beats and chants produce subtle energies in addition to the energy from the flames. These energies are produced or released into the environment by the use of fire. This, together with the properties of the materials burnt, results in the full effect of this restorative HOMA (healing fire) and also known as havan. The Agnihotra pyramid emits a lot of healing energy.

Throughout Agnihotra period, enormous amounts of energy is focused in the surrounding of the copper pyramid of Agnihotra. It creates a magnetic field that balances off detrimental energy while boosting good energy. As a result, the performance of one who does Agnihotra creates a favourable pattern. Agnihotra removes impurities from the environment and neutralizes dangerous radiation. Plant life benefits from the resulting atmosphere.

The ghee after burning with the other materials in the form of heat or as radiation released into the atmosphere and binds to the soil's molecular structure, letting the soil retain more moisture. Plants growing in the Agnihotra environment are more drought resistant. Agnihotra alters the cellular structure of the plant, directing more nutrients to the fruit and less to the leaves, stem and roots. Many practitioners have discovered that fruits and vegetables produced in Agnihotra environment have greater size, flavour, texture and yield. The use of Agnihotra in the garden minimizes insect issues and Homa (healing fire) practises make organic gardening and farming simpler. In the middle of the twentieth century, the Indian teacher Parama Sadguru Shree Gajanan Maharaj and his student, Shree Vasant V. Paranjpe, found historical information on the Agnihotra pyramid fire. Though it is becoming more common in Western Countries, organic farming is now mostly performed by landowners in USA and India [Shinogi *et al.*, 2016].

Agnihotra's medicinal characteristics include the ability to rejuvenate brain cells, invigorate the skin, and purify the blood. It is a comprehensive attitude to life. Many people who are typically allergic to smoke find that sitting in the Agnihotra environment heals them. The therapeutic properties of Agnihotra are imprinted in the resulting ash. Thousands of individuals throughout the world have reported remarkable healings from Agnihotra ash for a variety of diseases.

### Why was Agnihotra Chosen

Chemical fertilizers and insecticides needed in increasing doses and intensity or changing formulae over time. Then there comes a point when nothing grows unless you utilize them. They contaminate the soil and sub soil water if used. When we eat food cultivated under these circumstances, we consume hazardous toxins. Then, after a few years, nothing grows at all. These are some of the reasons why certain communities began to consider organic farming and biological pest management. This worked for a while, but when the pollution load of the atmosphere rose and things became more complicated, organic farmers faced enormous challenges. So the only solution to all these problems is agnihotra (Vala, 2021).

### Agnihotra Forms

1. *Agnihotrahoma* : This is the most important ritual and ought to be done each day at dawn and sunset.
2. *Vyahruti Homa* : Except for at dusk and dawn, it may be carried out at any point of day or night. Additionally, it is carried out before beginning Om Tryambakam Homa.
3. Om Tryambakam Homa must be performed for a minimum of 4 hours. It needs to be performed for a complete 24 hours on supermoon and non-moon days. Om Tryambakam Homa increased the amount and quality of agricultural crops, as well as their resilience to unfavourable environmental variables and pests (Pathade & Abhang, 2014).

### Basic Material Required for Agnihotra

1. *Copper pyramid* : Only copper and gold pyramid containers are utilised for agnihotra fire since they work as an antidote to all our troubles.
2. *Dried cow dung* : cow dung is very much auspicious according to scriptures among the animal faeces on the planet. It is antiseptic, anti-thermal and anti-radioactive. When burned, it emits gases that inhibit the growth of hazardous microbes found in contaminated air and purify the atmosphere.
3. *Pure ghee* : Cow ghee is a natural disinfectant that helps to minimize toxicity in the air. When cow's ghee is burnt with rice, it emits gases such as propylene oxide, ethylene oxide and formaldehyde, which limit the growth of dangerous germs (Shinogi *et al.*, 2016)
4. *Brown rice or unbroken and unpolished rice* : Polished rice loses nutritional value, hence brown rice is used. Only unbroken rises may be employed in agnihotra because if they are fractured, the subtle energy structure is disrupted and hence unsuitable for healing.
5. *Mantras* : Mantras should be said clearly and with complete concentration or completely absorbed inside the chanting of mantras. Mantra chanting generates subtle energy in the surroundings and the human consciousness.

### Inverted Copper Pyramid Agnihotra Vessel

The inverted pyramid pot is considered to be a cosmic energy collector. Copper is the finest heat and electromagnetic wave conductor. The Sanskrit Agnihotra mantras produce certain vibrations that are helpful to the mind and the environment. The design of the copper pot allows for better use of incoming air and effective burning of chemicals.

### Ghee from Cows (Clarified butter) :

Cow ghee, known as the 'mother of all remedies' in Ayurveda, functions as a transporter of subtle healing forces. Cow ghee, which is applied on the rice grains before oblation, aids in the quick burning of wood

cellulose and carbohydrates in rice. When all of the volatile compounds in the surrounding atmosphere are dispersed, they are vulnerable to photochemical reactions in the sunlight the fumes, smoke or vapours produced by the burning components soar to great heights in space. The volatile oils produced by the appropriately lit fire disperse into the surrounding environment together with the air particles

It can be emphasized that the goal of agnihotra is to vaporize the contributions made in the form of burnt offerings or they are heated up to conversion into gaseous form, instead of combusting them. As a result, these compounds spread into the surrounding air and improve air quality.

### Cow Dung Cakes

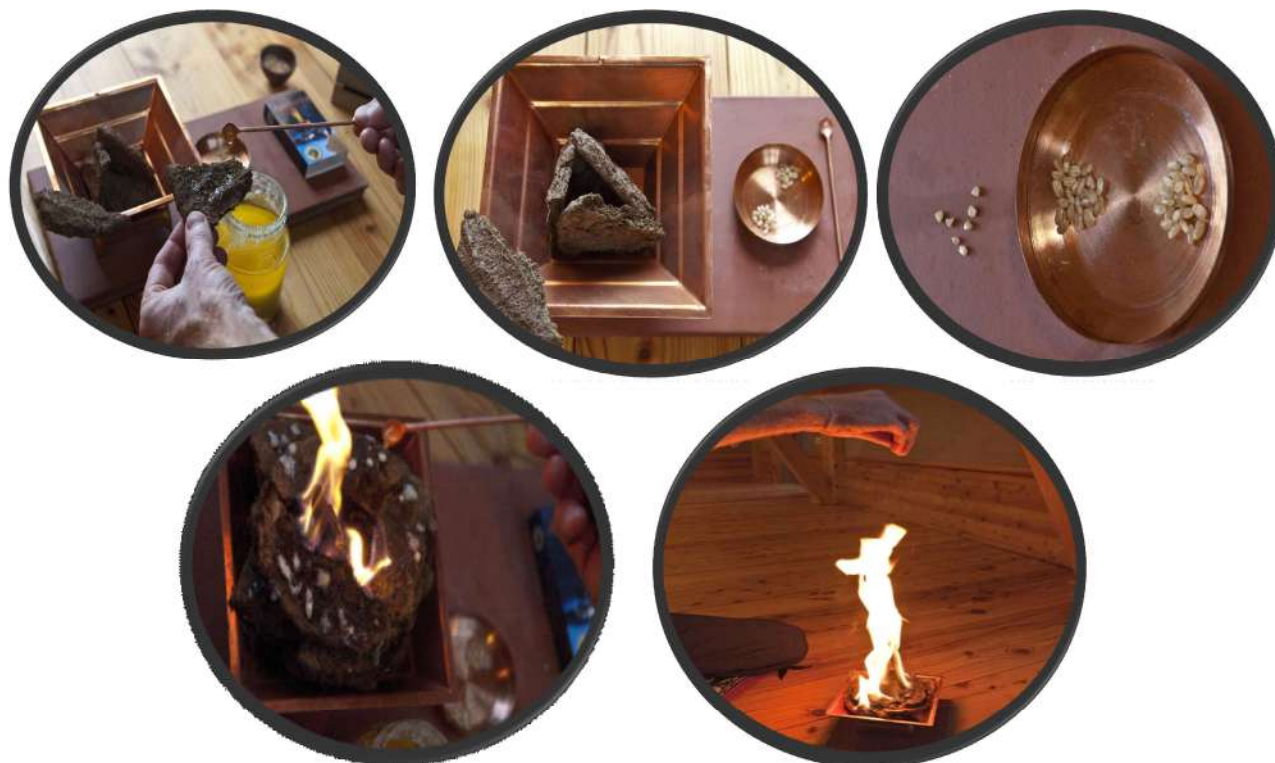
Cow dung cakes extracts have been shown to have antibacterial properties. The fumes generated by Agnihotra have been proved scientifically to possess antibacterial properties as reported earlier. Fumigation by using chemicals like formaldehyde has hazardous effects on the body, but Agnihotra fumes have not only been reported to control microbial load but also to heal the atmosphere and purify the air. The reduction in microbial load may be caused by volatile organic compounds released during the burning of Agnihotra material which is mainly constituted by cow dung cakes (Rajeswari *et al.*, 2016).

### Unbreakable Fresh Rice

Because rice is the most plentiful food grain on the planet, raw unbroken complete rice grain is ideal for usage. It is a key part of the Agnihotra ceremony. In Agnihotra, the rice grains burn with a sound. Rice burning emits gases such as ethylene oxide, propylene oxide, formaldehyde and vita propyo lactone. These gases aid in the purification of the atmosphere and the destruction of germs.

### Ash of Agnihotra

Certain scientific research have demonstrated the beneficial impact of Agnihotra ash in organic gardening. Phosphorus solubility in soil has been observed to be boosted by Agnihotra ash (Kratz &



Source: homafarming .com

Schnug, 2007). Ash has been demonstrated to have beneficial impacts on rice seed germination and soil fertility (Devi *et al.*, 2004; Sharma *et al.*, 2013).

### Agnihotra Procedure

Perform the following steps for the agnihotra fire's preparation just before morning light and dusk:

1. Place a flat piece of dehydrated cow dung cake in the copper pyramid's base. Set up the stack of hardened cow dung so that air may flow across it.
2. Use a small amount of Ghee to ignite a portion of cow dung. Put this glowing bit of cow dung dried piece in the pyramid's middle. The pyramid's waste will soon spontaneously combust. To avoid damaging it with oral germs, do not blow on the flames though.
3. Put some ghee over a few rice kernels and place them on a dish or in your left palm.
4. Chant the first Sutra at aptly sunrise, then add a few kernels of rice to the bonfire after the syllable

SWAHA. Add some rice to the fire after reciting the second sutra. The morning Agnihotra is now complete.

5. Redo the mantra also with evening sunset. This brings the evening Agnihotra to an end. Aim to devote far more time as you can for concentration after each Agnihotra. As long as the fire goes itself out, you can sit (Pathade & Abhang, 2014).

### What took Place during Agnihotra?

It needs to be underlined that Agnihotra's goal is to vapourize or to heat the contributions given in the type of burnt offerings sufficiently to convert them to vapors, instead of to burn them. The gases and fumes released by the burning parts reach vast altitudes in universe. When all of the volatile compounds in the surrounding atmosphere are dispersed, they are vulnerable to photochemical reactions in the sunshine. When yagya is conducted, the scent may be easily perceived in the surroundings due to the dispersion of compounds such as terpinol, eugenol, ammonia,



(Parkhe Pariwar Trusts, 2020)

indol, formalin and so on. As a result, these compounds spread into the surrounding air and improve air quality (Jani, 2020).

### How to Make an Agnihotra Fire

Spread ghee over a few cow dung pieces (arrange them in the Agnihotra pot in such a way to permit free passage on air). Begin the fire a few minutes before sunrise/sunset and chant the agnihotra

mantras (after the word SWAHA add a few grains of rice grains coated with ghee to the fire). Agnihotra get finished in 10 minutes and it is best to sit quietly or meditate until the fire is extinguished. The ash residue left after agnihotra is gathered in a cloth on a regular basis. The fine sieved ash is known as 'the miracle powder', and it is used as a fertiliser in homa cultivation as a growth promoter and pesticide (Choudhary *et al.*, 2020).

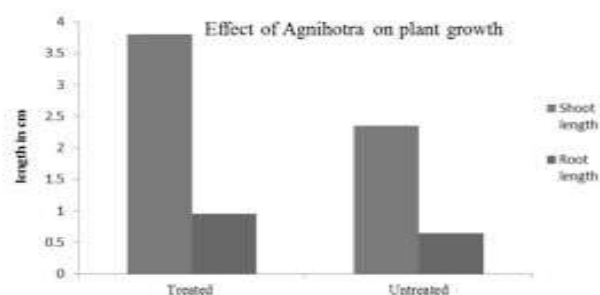
TABLE 1

### Homa farming vs conventional farming

Homa agriculture	Conventional agriculture
The environment is regarded as the most essential source of nourishment in Homa farming since it provides 75 percent of the nutrients in plants.	In normal farming the environmental factors are not considered
Production after harvest per hectare is more	Lesser production in the normal agriculture
The shelf life of various perishable goods like vegetables fruits etc. have more	In case of normal agriculture there is not much longer shelf life. To preserve them they require more inputs while storage

Table 1 contd.

Homa agriculture	Conventional agriculture
The cost of production in homa farming is much lesser than that of other modern techniques	The cost of cultivation in other methods is more than the homa farming (Bhatia et al., 2022).
For example: Homa farming shows a drastic increase in yield of guava with high quality as compared to normal farming and other organic farming systems (Ram and Pathak, 2005)	In a research conducted by (Kumari <i>et al.</i> , 2018) to compare the effectiveness of agnihotra fire and regular fire on bacterial count, one plate containing bacteria was placed in the agnihotra room and the other in the control room next to the agnihotra room at some distance. Bacterial count was greatly decreased when compared to regular fire, and bacterial count was also decreased to some extent in plant placed in control room (near agnihotra room) (Berk and Dubey, 2020).



Source : (Pathade & Abhang, 2014)

Fig. 1 : Comparison in the length of plants treated with agnihotra

### A Case Study from Australia



(Adhikari, 2015)

### Resonance Point

Resonance Technique is a component of HOMA Organic Farming in which basic procedures are utilised to quickly repair huge tracts of unhealthy soil.

A single RESONANCE POINT has the ability to heal up to 200 acres (80 hectares) of land. It heals the same amount of human work is necessary to mend one acre as it is to heal two hundred acres. Ten new copper pyramids must be installed, activated with Mantra, and placed on the farm in a specified configuration by a volunteer for Homa Treatment who is authorised to place resonance places. In addition, two simple dwellings must be built out of readily accessible, inexpensive natural materials such as wood, earthen blocks, carpets, bamboo, stones, cane, *etc.* These dwellings won't be used as homes. They just serve to protect the person conducting the task. [<http://homafarming.com/resonance-point/>].

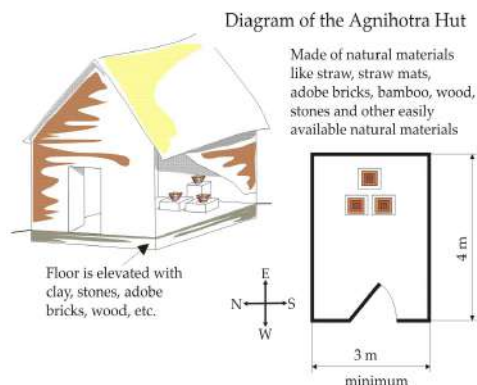
### Applications of Homa Farming in Agriculture

*In water purification* : One of the primary benefits of doing Yajnya is the use of Agnihotra for water purification. Water is purified only when Agnihotra

Parameters for oil seed crop	Average seed weight per 1000 seeds	Protein content % in seed	Oil content %in seeds	Urease activity* [in average]
Conventional agriculture	103.66g	39.15g	19.54g	7.94g
Homa organic farming	142.60g	39.50g	19.62g	7.86

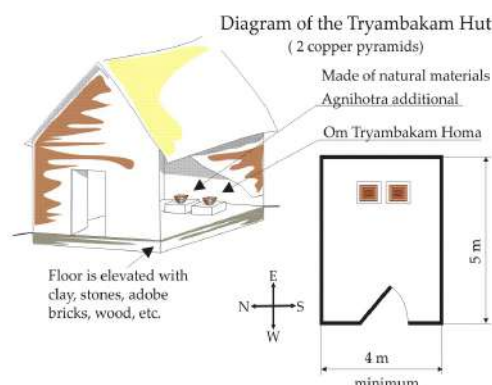
Agnihotra

hut



Trymbkam

hut



Every day at dawn and dusk, the AGNIHOTRA bonfire is conducted in the main hut, also known as the Agnihotra hut.

The Agnihotra Hut will be somewhat bigger than the OM TRYAMBAKAM Hut (approximately 4x5m).

If feasible, it would be excellent to construct this cottage in the middle of the farmland.

The HEALING HUT is another name for it. Persons who are ill can sit around and undergo treatment

The dimension must be around 3 × 4 metres, with the larger side pointing in the EAST/WEST direction. To perform the flames, one must enter from the WEST and lid down facing the EAST.

The fire itself is the healer. The region becomes a healing spot for sick people, animals, and plants even if we are lighting the flames for agricultural purposes.

A hole that is 30 cm x 30 cm and around 50 cm deep should be excavated close to and parallel to the EAST wall.

Face EAST while doing HOMA.

Just after primary pyramid has been triggered, it is covered, a stack of sand is erected on top of it, about 50 cm above ground, and a second active pyramid is positioned right above it, perfectly oriented to the east.

Two pyramids—one on the right for OM TRYAMBAKAM HOMA and the other on the left for AGNIHOTRA—are to be erected in this HEALING hut on tiny muddy foundations.

In this position, the individual seated on the floor ahead of the column is at chest level with the pyramid on the column. The pyramid on the column serves as a resonating pyramid.

Om Trymbakam Homa must be conducted for four hours each day and for twenty-four hours on whole and no moon days in order to have the most impact.

Then, on the right and left sides in front of the main column, two more of the triggered pyramids are positioned on small mud slabs. Daily AGNIHOTRA is performed on the left, and other sporadic Homa fires are performed on the right. In this hut, there are a total of four pyramids.

It is preferable to build this hut close to the farm's entry so that visitors may enter and exit without interfering with the secrecy of individuals who live and/or work there.

(Bhatia *et al.*, 2022)

In this hut, Agnihotra must be performed beginning at dusk. It is similar to turning this point on at sunset.

The Agnihotra hut is a sanctuary of stillness, where only the designated Mantras are chanted. In this manner, the tiny healing forces are not obstructed.

This hut is the Generator of Healing Energies.

is performed in an enclosed space, without any physical contact between water and ash or fumes of Agnihotra. Experiments done in Agnihotra environment with water samples stored in Faraday cages (steel, aluminium and copper) reveal less progress in water purification than those not kept in Faraday cages. This is due to variations in the amount of dissolved oxygen caused by the absorption of infrared rays from Agnihotra and the increase in temperature within Faraday cages.

### Applications of Agnihotra

*Control air pollution* : Fumes of Agnihotra are of medicinal use, they control pollution of an ambient air. An Agnihotra fume shows antimicrobial properties by killing or decreasing the growth of microbes which resulted in the reduction of microbial load in the surrounding environment.

### Agnihotra Applications for Mitigating Microbial Pathogenicity

Agnihotra's performance demonstrates a reduction in Microbial load in the surrounding environment. Microbes are reduced by direct killing or by inhibiting their growth; this may be due to the production of antimicrobial compounds from burning material or diffusion of microbes with fumes in upper strata in such a way that residual population is kept within nature's tolerable limit. In vitro investigations on the bioenergetics system of *S. aureus* demonstrate that Agnihotra does not kill harmful bacteria but decreases their pathogenicity by decreasing coagulase synthesis. Experiments were carried out on albino mice in vivo demonstrated that when a virus treated with Agnihotra is injected into a mouse, it does not cause any harm. Diseases will not be created as a result of a lesion or an abscess.

Homa farming is a reliable technique to producing plants in a clean and healthy environment. Plants produced in a homa environment germinate quicker, develop earlier, have a longer shelf life and production or yield much higher because when we conduct homa, we make the plants joyful and use all of their energy to boost their output. Homa farming is

an efficient agricultural method that increases output by 25-30 per cent. It minimises microbial burden in air and water, lowers SOX (sulphur oxides) and NOx (nitrogen oxides) levels in the atmosphere and is environmentally friendly. Organic farming is a long-term process. Agnihotra ash, it acts as a miracle powder. The raw material reduces the conductivity, hardness, microbial population and biological oxygen requirement of the row water.

Agnihotra ash functions as an antifungal agent, inhibiting the development of fungal hyphae and soil-borne diseases. Agnihotra fumes not only regulate microbial activity, but also cure and purify the air. It is suggested that homa farming be tested in multilocational trials so that this practise may be advocated as a technology and a wide number of farmers become aware of this approach and incorporate it into their everyday farm practises in order to achieve substantial outcomes. It must be spread around the world in order to assist the national economy and farmers.

### REFERENCES

- ABHANG, P., PATIL, M. AND MOGHE, P., 2015, Beneficial effects of agnihotra on environment and agriculture. *International Journal of Agricultural Science and Research (IJASR)*, **5** : 111 - 119.
- ABHANG, P., PATIL, M. AND MOGHE, P., 2015, Beneficial effects of agnihotra on environment and agriculture, *Int. J. Agr. Sci. Res.*, **5** (2) : 111 - 120.
- ADHIKARI, T., 2015, Agnihotra farming. <https://www.slideshare.net/TapanAdhikari/agnihotra-farming>
- BERK, U. AND DUBEY, A. K., 2020, Global covid 19 and agnihotra. *International Journal of global science Research*, **7** (1) : 1243 - 1255.
- BERK, U. AND SHARMA, S., 2015, Effect of agnihotra energy field on water purification. *Indian J. Tradit Knowle.*, **1** (1) : 63 - 68.
- BHATIA, S., ROHILLA, A. AND KAUSHAL, S., 2022, A review on homa farming - A vedic touch to modern agriculture. *International Journal of Advances in Agricultural*



- Science and Technology*, **9** : 14 - 25. <https://doi.org/10.47856/ijaast.2022.v09i05.003>.
- CHOUHARY, M., CHOUHARY, S. AND GARG, K., 2020, Homa farming - A vedic touch to morden agriculture, pp. : 4.
- DEVI, H. J., SWAMY, N. V. C. AND NAGENDRA, H., 2004, Effect of agnihotra on the germination of rice seeds. Vol. 3(3), July 2004, pp. 231-239.
- GOLECHHA, G. R., SETHI, I. G. AND DESHPANDE, U. R., 1991, AGNIHOTRAV in the treatment of alcoholism. *Indian J. Psychiatry*, **33** (1) : 20 - 26.
- JANI, C., 2020, Agnihotra : Homa organic farming. *Agrinenv. Com.*, pp. : 67.
- KRATZ, S. AND SCHNUG, E., 2007, Homa farming - A vedic fire for agriculture : Influence of agnihotra ash on water solubility of soil P. *Land baufors chung Völkenrode*, **57** : 207 - 211.
- KUMARI, A., SHARMA, P. M., YADAV, J. AND VAID, P. K., 2018, An urgent need for sustainable agricultural practices : A review of natural, organic ayurvedic and homa farming over chemical farming. *Asian Journal of research in Crop science*, **1** (3) : 1 - 20.
- MULLER, F. M., 2004, The grihya - sutras part I : The sacred books of the east part twenty-nine, (Kessinger Publishing, USA), pp. : 115-172.
- PATHADE, G. R. AND ABHANG, P., 2014, Scientific study of vedic knowledge agnihotra.
- RAM, R. A. AND PATHAK, R. K., 2005, Integration of organic farming practices for sustainable production of guava: A case study. *Int. Guava Sym.*, pp. : 357 - 363.
- RAJESWARI, S., POONGOTHAI, E. AND HEMALATHA, N., 2016, Antimicrobial activites of cow dung extracts against human pathogens. *International Journal of Current Pharmaceutical Research*, **8**,9. <https://doi.org/10.22159/ijcpr.2016v8i4.15268>
- SHARMA, S. K., SENGUPTA, T., SUNAR, K. K., BERK, U., DAVE, V. B. M., GANDHI, T. S. AND CHAURASIA, R., 2013, Ash amended with yellow soil as the growth regulator for *Zea mays*.
- SHINOBI, K. C., SRIVASTAVA, S., RASHMI, K. G., ROSIN, 2016, Homa organic farming : Science behind concepts and methodologies. *Indian farmer*, **3** (12) : 850 - 853.
- <https://www.speakingtree.in/blog/vedic-combustion-science>
- [http://shodhganga.inflibnet.ac.in/bitstream/10603/2491/12/12\\_chapter%206.pdf](http://shodhganga.inflibnet.ac.in/bitstream/10603/2491/12/12_chapter%206.pdf)
- <http://homafarming.com/resonance-point/>
- TRUSTS, P. P., 2020, *Agnihotra Disciplines* Retrieved 2022/12/15 from [https://scontent.fixc4-1.fna.fbcdn.net/v/t1.6435-9119980233\\_4372529206155000\\_3507769672311787884\\_n.jpg?\\_nc\\_cat=110&ccb=1-7&\\_nc\\_sid=9267fe&\\_nc\\_ohc=qRvucSYIFd4AX8MjBRI&\\_nc\\_ht=scontent.fixc4-1.fna&oh=00\\_AfBMqYvp8xxOWP8iEOzLM9p2uZVbQZoioGwFrDX-00R9Ng&oe=63C231B9](https://scontent.fixc4-1.fna.fbcdn.net/v/t1.6435-9119980233_4372529206155000_3507769672311787884_n.jpg?_nc_cat=110&ccb=1-7&_nc_sid=9267fe&_nc_ohc=qRvucSYIFd4AX8MjBRI&_nc_ht=scontent.fixc4-1.fna&oh=00_AfBMqYvp8xxOWP8iEOzLM9p2uZVbQZoioGwFrDX-00R9Ng&oe=63C231B9)
- VALA, Y. B., 2021, Agnihotra : A vedic touch to modern agriculture. *Just Agriculture*, **1** (8).