



## A Literature review on Pugai (Fumigation) in Siddha System of Medicine.

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### ABSTRACT

Pugai – Fumigation is the practice of inhaling process followed in Siddha System of medicine. The application of fumes can be on different parts of the body apart from inhalation. According to **Therayar Tharu**, Pugai is placed in eighth place at 32 external therapies series.

To review on therapeutic application of Pugai (Fumigation) in siddha system of medicine. To collect the literary data documents about Pugai available in siddha classical literatures. To classify Pugai in basis of disease aspect respectively in siddha system and to document the types of medicine used in Pugai.

Literature review was conducted with the descriptive design from library of Government Siddha Medical College, Palayamkottai. In our siddha System there are 32 types of aga marunthugal and 32 types of pura marunthugal. In 32 types of pura marunthugal, Pugai is one of the vital technique. Fumigation controls the infection upto the deeper area of the organs.

### Keywords:

Siddha medicine, Pugai, *Fumigation*, External therapy.

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## INTRODUCTION

Pugai is defined as a method of fumigation in which the medicated fumem is generated by burning the drugs directly or putting the drugs into the fire.

Puramaruthuvam Pugai is the best procedure employed for disinfection and sterilization methodology for the treatment of sinusitis, constricted respiratory pathways, chronic ulcers, fistula, ano-rectal diseases, dysmenorrhoea, headache, toothache, dental cavity, halitosis, fever, arthritis, dandruff and few chronic skin diseases.

This procedure involves the artificial impregnation by purification of the environment and possessing local healing, disinfecting and sterilizing actions on the local or inner areas in the form of medicated smoke. It is given to the patient in the form of medicated fume using any plant parts like pepper, cumin, turmeric, sandal wood, neem bark or vegetable oil like castor oil, neem oil or aromatic substances like Sambirani (*Boswellia Serrata*), Kungiliyam (*Shorea robusta*) or animals slough, horns and nails and few prepared medicines like Vidakuzhambu, Agathiyar Kuzhambu, Kousigar Kuzhambu for fumigation.

### Purpose:

1. To make the patient comfortable and fresh.
2. To improve circulation
3. To control inflammation of skin for redness, injuries, swelling, rashes for other infections
4. To prevent the oozing
5. To disinfect and sterile the area
6. To prevent pressure sores
7. To cure peripheral neuritis
8. To avoid sepsis
9. To discard unwanted odour

### Types:

According to the physical nature and administration, it is classified into three types.

1. Fume inhalation through nostrils

It is performed by burning medicated cotton wick.

2. Fume inhalation through mouth

It is performed by burning the drugs rolled in a dry leaf or by medicated cotton wick. The fume inhalation through nostrils or mouth is generally performed by burning a medicated stick using a smoke pipe.

3. Fumigation on the site or the environment

It is performed by generating smoke by putting drugs in the coal fire or exposing fume on the septic wound by burning a medicated wick.

### Common Preparations

#### Aankuri putru:

Figure 8. 3 - Cancer in Penis The root bark powder of *Kozhingi* (*Tephrosia purpurea*) and powder of *Lingam* (*Mercuric sulphide*) and again the powder of *Kozhingi* are kept one by one in the smoke pipe and burnt. The smoke is

applied over the affected area for three times in a day for three days continuously to treat cancer in male genital area. It is also used to treat non healing ulcers including tuberculous ulcers, bubo, scrofula, carbuncle, painful suppurative eye diseases and lymphadenitis

#### Abasmaram

The feathers of *Kookai aandhai* (barn owl) and *Kazhugu* (Vulture) are burnt and the fume is exposed to ostrils and face of fainted persons to treat abasmaram

#### Akkaram

The root bark powder of *Kozhingi* (*Tephrosia purpurea*) and powder of *Lingam* (*Mercuric sulphide*) and again the powder of *Kozhingi* are kept one by one in the smoke pipe and burnt. The smoke is hale through mouth to treat twice in a day for 3 days to cure chronic oral ulcers

#### Araiappu

244 milligrams of *Naagam* (Lead), 488 milligrams of *Rasam* (Mercury), 244 mgs *Vellai paadanam* (White arsenic), *Thurusu* (Cupric acetate) and *Gowri* (Yellow lumps) are mixed and burnt in a lead crucible. The fume is exposed on the affected area to treatpubo.

#### Eruvai mulai noi

Equal quantity of *Sambirani* (*Styrax benzoin*), *Kungiliyam* (*Shorea robusta*), *Sikaikkai* 1. (*Acacia concinna*) nd little quantity washed Romam (Hair) are crushes well and burnt. The smoke is applied on the anal area 2 times in a day for 3 days to treat rectal prolapse.

2. The seeds of *Peercku* (*Luffa acutangula*) are burnt and the smoke is applied in anal region to treat external piles, internal piles, maggots and skin ulcers.

#### Iraippu

The dried flower petals of Karu umatthai (*Datura discolor*) is dried, burnt and using cigar pipe to treat asthma.

#### Irumal :

Ari tharam (Yellow orpiment)mid grinded with the bark and leaf juice of Sarakondrai (*Cassia fistula*) and water. The fine paste and applied on a cloth and dried and rolled like a cigar and ignited. The generated smoke is inhaled to treat persistant uncontrolled cough

#### Irumal:

The juice of *Pirandai* (*Cissus quadrangularis*) and powder paste of *Thertankottai* (*Strychnos potatorum*) are mixed and applied on a cloth. Every day the cloth is soaked in *Pirandai* juice for 2 days and then soaked and dried in the juice of *Pirandai* (*Cissusquadrangularis*) and *Kuppaimaeni* (*Acalypha indica*) on third day. Powder of *Aritharam* (Yellow orpiment) is smeared on the cloth roled into wick, dipped in sesame oil and burnt. The generated fume is inhaled through the oral route for three times in a day after

eating boiled rice with buttermilk to treat persistent uncontrolled cough

**Kaalani**

The dry fruits of *Kandankathiri* (*Solanum xanthocarpum*) are burnt and the fume is exposed on the foot to treat corn

**Kadi Vidam**

The *Mayilargu* (feather of peacock) is burnt and the fumes are exposed on the affected areas to treat red venomous centipede bite

**Kadi Vidam**

The roots of *Periyanangai* (*Polygala elongata*) is crushed and the juice is applied on the affected site and then the fumes are exposed after burning the *Mattipaal* (frank incense) and *Perumaram* (*Ailanthus malabarica*) gum resin to treat scorpion sting.

**Kalladaippu**

Equal quantity of *Mayiliragu* (Peacock feather), *Valampuri* (*Helictres isora*), *Poonai malam* (Cat's feces), *ottadai* (Spider web), *Lingam* (Mercuric sulphide), *Manjal* (*Curcuma longa*), *Vasambu* (Acorns *calamus*), *Poondu* (*Alliumsativa*), *Chukku* (*Zingiber officinale*), *Mattu Kombu* (Buffalo's horn) are crushed into small pieces and mixed and kept in a woolen pouch. It is burnt and the fume is applied on the back, abdomen and loin area to treat colic due to renal calculi and delirium

**Kanda Maalai**

20. 48 grams of oil cake of *fluppai* (*Madhuca longifolia*), 5.12 grams of *Nervalam* (*Croton tiglium*) are grinded with leaf juice of *Veliparuthi* (*Daemia extensa*) and the paste is applied on a cotton cloth and dried. The medicated wick is burnt and the fume is inhaled for 7 days to treat glandular swellings of the neck and sinusitis.

**Karuppai irangal**

The cooked husked millet *Samai* (*Eragrostis plumose*) is burnt and the fume is applied all over the body and the vagina and bath is taken using gingelly oil to treat prolapse uterus.

**Kirigai**

1. Equal quantity of the leaves of *Kuppaimeni* (*Acalypha indica*), *Kilukiluppai* (*Crotalaria verrucosa*) and *Thumbai* (*Leucas aspera*) are dried and burnt. The fume is allowed to come from *Chirattai* (coconut shell) and applied on head, face and all over the body for inducing perspiration and treat 18 types of psychiatric disorders (Kirigai).
2. Equal quantity of the *Mayilargu* (Peacock feather), *Karuppu kambili* (black coloured wool), *Kuppaimeni* (*Acalypha indica*), *Poondu* (*Allium sativum*), *Vettilai* (*Piper betle*), *Aan aattu Kombu* (male goat's horn) and *Thavudu* (bran of unboiled rice) are kept in a pot and boiled with water using *kalli viragu* (*Euphorbia* fire wood). The fume is exposed all over the body and the steam is inhaled to treat 18 types of psychiatric disorders (Kirigai).
3. Equal quantity of *Mannpuzhu* (Earth worm) and *Manjal* (*Curcuma longa*) are dried in sunlight and powdered. The powder is mixed with ghee and burnt using *Puliamara virago* (tamarind fire wood) and the fumes are

inhaled and exposed all over the body to treat 18 types of psychiatric disorders (Kirigai).

4. Equal quantity of *Muttaiodu* (Egg shell), *Naai eru* (Faecal matter of dog), outer skin of the *Poondu* (*Alliumsativum*), *Kattamanakku* (*Jatropha curcas*), *Tulasi* (*Ocimum sanctum*) and *Devadaru* (*Cedrus deodara*) are crushed and powdered. The powder is burnt and the fumes are exposed all over the body and inhaled to treat 18 types of psychiatric disorders (Kirigai).

**Korukku Pungal**

5.2 grams of *Aritharam* (Yellow orpiment) *Lingam* (Mercuric sulphide), *Pooram* (Calomel), *Kodikalli* (*Sarcostemma brevistigma*), *Kazhuthai saani* (Donkey's dung) are grinded with the juice of *Thirugukalli* (*Euphorbia tirucalli*) dried and powdered. Pour the powder into the fire of *Punga viragu* (*Pongamia glabra*) and *Puli viragu* (*Tamarindus indica*). The fumes are exposed to treat the non healing venereal ulcers, lightening pain, nodular lesions, fistula, and bubo

**Kuttta Viranam**

Equal quantity of *Aritharam* (Yellow orpiment), *Rasam* (Mercury) and *Gandhakam* (Sulphur) are powdered and applied in a clean white cloth wick. It is used to light the neem oil fire lamp. The blown off tip of the wick generated fume is inhaled and exposed to whole face to treat leperomatous ulcers, delirium, colic and syphilitic ulcer

**Kutta Viranam**

Equal quantity of *Gandhagam* (Sulphur) and *Pooram* (Calomel) are powdered, mixed with clarified butter and then applied on a cotton cloth to make Ignitee lamp using the wick and the smoke from wick is applied on the affected areas to treat leperomatous ulcers

**Mega Noi**

5.12 grams of *Aritharam* (Yellow orpiment), *Lingam* (Mercuric sulphide), *Pooram* (Calomel), *Elaikalli* (*Euphorbia nereifolia*) and dung of donkey are grinded with the juice of *Elaikalli* (*Euphorbia nereifolia*) and dried. The dried powder is burnt using tamarind twigs and the generated fume is used to cure abdomen colic, gonorrhoea, syphilitic ulcer, bubo and fistula. The fume is exposed on the affected area and the same powder is applied externally with the juice of *Arali* (*Nerium odoratum*) to treat venereal ulcers

**Mega viranam**

Equal quantity of *Lingam* (Cinnabar), *Aritharam* (Yellow orpiment), *Gandhagam* (Sulphur), *Thurusu* (Cupric acetate), seeds of *Neermulli* (*Asteracantha longifolia*) and seeds of *Kandankathiri* (*Solanum xanthocarpum*) are made into fine powder, mixed with butter and smeared on a 7 pieces of cloth wick. The wick is ignited and the fumes are applied on the affected areas for 7 days and castor oil head bath is taken for subsequent three days to treat chronic ulcers due to syphilis and diet regimen is followed

**Moorchai**

The black cloth is burnt /I and the smoke is inhaled to treat syncope.

**Nanju nillai**

Equal quantity seeds of *Peipeerkku* (*Luffa amara*), *Nervalam* (*Croton tiglium*) and *Vembu* (*Azadirachta indica*) are dried in sunshade, crushed and made into small cakes. These cakes are kept in a bronze vessel and kept in the sun in slightly slanting position. The oozed oil in the slanting lower part of the vessel is collected on every day, filtered and stored. A wick is soaked in the oil and ignited to generate fumes. The fume is inhaled to treat all poisonous conditions

**Nayana noigal**

Leaf juice of *Ponnanganni* (*Alternanthera sessilis*) is mixed with *Karkandu* (Candy sugar) and grinded as a paste. It is applied on the leaf of *Vetrilai* (*Piper betle*) and burnt to generate fume. The fume is exposed n the eyed to treat ophthalmalgia, blurred vision and burning sensation of the eye

**Neri Katti virnam**

53 grams of *Karuvangam* (molten lead), 105 grams of *Rasam* (Mercury), 8.32 grams each *Aridhaaram* (Yellow orpiment), *Thurusu* (Cupric acetate), *Thutham* (Calamine), *Gandhagam* (Sulphur), *Gowri* (Arsenic penta sulphide), *Vellaipaadanam* (White arsenic), 10.4 grams of *Karunseeragam* (*Nigella sativa*), *Omum* (*Trachyspermum ammi*) are powdered and grinded with latex of *Erukku* (*Calotropis gigantea*) and made into seven equal pills. One pill is burnt by *Puli viragu* (*Tamarindus indicus*) and applied on the affected areas twice in a day for three days and cold water head bath is taken on the fourth day to treat nodular ulcers and swellings. Appropriate diet is followed and castor oil head bath is taken after fifth

**Paambu kadividam**

Equal quantity of the root bark of *Aathondai* (*Capparis horrida*) and *Milagu* (*Piper nigrum*) are grinded well, burnt and the fire is exposed on the bitten spot to treat *Mayakkaravu* snake bite.

**Paambu kadividam**

Equal quantity of the powders of the root bark and leaves of *Erukku* (*Calotropis gigantea*) and *Vasambu* (*Acorus calamus*) are poured into charcoal fire and the fumes are used to inhale to treat *Arunkattu Pudaiyan* bite.

**Paambu kadividam**

Equal quantity of *Vasambu* (*Acorus calamus*), latex of *Erukku* (*Calotropis gigantea*) and *Putrumann* (Soft soil of ant mound) are burnt and the fume is inhaled. It is used to treat the bite of *Kattu Pudaiyan*.

**Peenisam**

1. 35 grams of gum resin of *Sambirani* (*Boswellia glabra*), *Chensanthanam* (*Pterocarpus santalinus*), *Paakku* (*Acacia catechu*), *Devadaru* (*Cedrus deodara*), and bark of *Santhanavembu* (*Cedrela toona*), 2.1 grams of purified *Thalagam* (Yellow

Arsenic trisulphide), *Vangam* (Purified sulphide of lead), *Lingam* (Purified Red Sulphide of mercury) and *Vediuppu* (Potassium nitrate), 140 grams of oil cake of *Iluppai* (*Bassia longifolia*) are grinded with 42 ml. juices of *Umathai* (*Datura alba*), *Veliparuthi* (*Daemia*

*extensa*), mature leaves of *Erukku* (*Calotropis gigantea*), 8.4 grams of powder of *Vediuppu* (Potassium nitrate) are mixed well and grinded. The paste is smeared on a cloth, rolled as a wick and dried. It is allowed burn and the smoke is inhaled through nostrils in morning and evening for 3 days to treat meatal sinusitis (*Mulai mookadaippu*) and sinusitis due to venereal infections.

2. 4.2 grams *Chukku* (*Zingiber officinale*), *Milagu* (*Piper nigrum*), *Thippili* (*Piper longum*), *Manjal* (*Curcuma longa*), *Thumbai* (*Leucas aspera*) and *Sotru uppi* (Sodium chloride) are grinded well with the leaf juice of *Kandankatthiri* (*Solanum xanthocarpum*), smeared and on cloth, rolled and dried. A cardboard or thick paper is rolled like a cone and the tip is opened and inserted into one nostril. The wick is burnt and the fumes are smelt through the hole of the cone tip to treat sinusitis.
3. Equal quantity of *Vediuppu* (Potassium nitrate), *Manjal* (*Curcuma longa*) and *Milagu* (*Piper nigrum*) are powdered and smeared on a cloth and rolled. It is burnt and the smoke is inhaled and exposed all over the body covered by a thick blanket to treat sinusitis and accumulation of fluid in the sinus cavities.
4. Equal quantity of *Thippili* (*Piper longum*), *Manjal* (*Curcuma longa*), *Omum* (*Carum copticum*) and *Milagu* (*Piper nigrum*) are powdered, smeared on a cloth, rolled and soaked in neem oil. It burnt and the fumes are exposed all over the body covered by a thick blanket for 48 minutes to induce lacrimal and nasal secretion get rid to treat head ache and heaviness of head in sinusitis.
5. 12 grams each of *Pavazham* (Coral), *Thalagam* (Yellow orpiment), *Lingam* (Mercuric sulphide) and *Kadal nurai* (Cuttle fish bone) are powdered, grinded with lemon juice and a cloth piece is soaked in it. The dried cloth is separated into 7 pieces and one wick is burnt for one time. The fumigation is done twice in a day for three days and one time on the fourth day.

**Suram**

*Thippili* (*Piper longum*), *Manjal* (*Curcuma longa*), *Omum* (*Carum roxburghianum*) and *Milagu* (*Piper nigrum*) are taken in equal quantity and grinded well. It is applied on a cloth and the cloth is rolled up and made into a wick. It is soaked in the neem oil, burnt and the smoke is inhaled to treat fever, headache by increasing the nasal secretion.



**Thalai noigal**

Equal quantity of *Thippili* (Piper longum), *Manjal* (Curcuma longum), *Milagu* (Piper nigrum) are finely powdered, smeared on a sterile cloth, rolled as a wick, dipped into Neem oil (*Azadiracta indica*) and burnt and kept in fumigation room. The body is covered by blanket and the smoke is exposed all over the room for 48 minutes to treat excess body heat, relieves heaviness of the body and head diseases by inducing perspiration from the skin and watery discharge from nostrils and eyes.

**Valippu**

1. The dry fruits of *Seeragam* (Cumin um cyminum) is tied in a cloth and burnt. The smoke is inhaled to treat fits.
2. 450-750 mg of *Agathiyar kuzhambu* is smeared on a cloth and burnt. The smoke is inhaled to treat Valippu.

**Vikkal**

1. The equal quantity of wood of *Santhanam* {*Santalum album*}, *Athimathuram* (*Glycyrrhiza glabra*) and *Agil* (*Aquilaria agallocha*) are powdered and burnt using a smoke tube. The fume is haled for two times in a day for 3 days through nostrils to cure vikkal (hiccup).
2. Take the sandal wood powder, benzoin resin in equal amount. Collect the mixture in a pepper and rolled. It is burnt and inhaled to treat hiccup.
3. The seeds of *Puli* (*Tamarindus /* indicus) are burnt and inhaled to treat *Vikkal Noi* (hiccup).
4. Powders of *Sandal* (*Santalum album*), *Sambirani* (Benzoin resin,/ powder), *Athimadhuram* (*Glycyrrhiza glabra*) and *Agil* (*Aquilaria agallocha*) are powdered tied in a cloth, burnt and the smoke is inhaled for three days to treat hiccup.

**Viranam**

1.05 grams of *Veeram* (Hydrargyrum perchloride), . *Lingam* (Red sulphate of the m ercury), *Kungiliyam* (*Shorea robusta*) and *Aritharam* (A.rsenic Trisulphate), 20.5 grams of (*Achyranthus aspera*), and powdered and applied on a tied in a clean cloth and burnt. It is burnt using *Puliansirai* (sticks of *Tamarindus indicus*) and a three holed coconut shell is kept above the cloth bundle. The smoke is inhaled once in a day for 7 days to treat chronic ulcers, ankylosis and septic ulcers.

**Fumigation for lepramatous ulcers**

Equal quantity of Yellow orpiment (Arithaaram), Mercury (Rasam), Sulphur (Gandhakam) are powdered and applied in a clean white cloth. This is converted into a medicated wick. The wick is used to light a lamp with neem oil as fuel. When the flame is blown off, the tip of wick products smoke which has to be inhaled and the whole face of the patient should get the smoke as fumigation. This can be repeated by lighting the flame and blowing off the flame again. This is indicated for treating delirium, colic, leperomatous ulcers and syphilitic ulcer.

**Fumigation for syphilis**

5.12 grams of Yellow orpiment (Arithaaram), Mercuric sulphide (Lingam), Calomel (Pooram), *Euphorbia nereifolia* (Eiaikalli) and made into fine powder. This powder is burnt with tamarind twigs. The emanating fume from this helps in curing colic, gonorrhoea, syphilitic ulcer, and. fistula. This powder is triturated with the juice of *Nerium odorum* (Aralee) and applied on the ulcers.

**Fumigation for nodular swelling**

8.32 grams of Tin (Velliyum) is molten and poured on sand thrice. During the molten state Mercury (Rasam) is added to it. This amalgam is triturated separately with the following juices sequentially - *Hibiscus rosa sinensis* (Sembarathai), *Lippia nodiflora* (Poduthalai), *Eclipta alba* (Karisalai), *Ocimum sanctum* (Thulasi). This is stored in a container and 2.8 to 3.12 gram is applied on a cotton cloth and wick is prepared. This wick is used for fumigation in the charcoal fire of *Tamarindus indica* twice daily for six days for the treatment of nodular swellings.

**Fumigant for cancerous ulcer of the scrotum**

8.2 grams each of the following materials are triturated with lime juice to fineness and applied on a cloth and a wick is prepared-Yellow orpiment (Arithaaram), Yellow lumps (Gowri), White arsenic (Vellai paadanam), *Plumbago zeylanica* (Koduvaeri), Calamine (Paal thutham), Snake slough, *Solanum xanthocarpum* (Kandankathiri), *Solanum melongena* (Kaththiri) and *Vitis vinifera* (Kodimunthirigai). This wick is soaked in clarified butter and lit after three days. The fumes emanating from the wick is exposed to non healing wounds including cancerous ulcers of the male genitalia with secondaries in axilla and inguinal region. This process has to be repeated seven times (twice a day) and after that castor oil is used as bath oil and strict regimen is to be followed for subsequent seven days also. The regimen includes avoidance of tamarind, tobacco products and strict abstinence. Intake of fried salt is recommended.

**Fumigation for uterine colic**

15.36 grams each of the dry tubers of *Corallocarpus epigaeus* (Akasakarudan) and *Shorea robusta* (Kungiliyam) are powdered. This powder is added to the coconut shell fire and the fume emanating from helps in uterine colic including post partum septicaemia.

**Fumigation for colic**

Peacock feather, *Helictres isora* (Valampuri), Cat's feces, Spider web, Mercuric sulphide (lingam), *Curcuma longa* (Manjal), *Acorus clamus* (Vasambu), *Allium sativa* (Vellai poondu), Dried *Zingiber officinale* (Chukku), Powder of Buffalo's horn are powdered and mixed together. This is taken in a woolen wick and burnt. The emanating fume helps in the treatment of colic due to renal calculi and delirium.

**Fumigant to ward off evil spirit**

Crush the following materials, root and bark of Strychnos nux vomica (Etti), sand collected below the oil press, Azadirachta indica (Vaembu) seeds, Curcuma longa (Manjal), Crataeva nurvala (Mavilingam), Ficus bengalensis (Aalam), nest of the crow built on neem tree, tortoise shell, horse hoof, snake slough, menstrual cloth, Clitoria ternatea (Kakkanam), Root of Amaranthus gangeticus (Sirukeerai), cow horn, mouse skin, woolen blanket piece, egg of red ant (Musurumuttai) and add Vateria indica (Kundurukkam) quantity equal to the total quantity of all other materials listed above. Fumigate thrice a day of the above blend to ward off evil spirit.

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