NATIONAL INSTITUTEOF SIDDHA

Tambaram Sanatorium, Chennai - 47

AFFILIATED TO THE TAMIL NADU DR. M.G.R. MEDICAL UNIVERSITY,

CHENNAI - 600 032

KABA YONI ROGAM

(DISSERTATION SUBJECT)

For the partial fulfillment of the requirements to the Degree of

DOCTOR OF MEDICINE (SIDDHA)

BRANCH I –MARUTHUVAM DEPARTMENT

SEPTEMBER – 2008

CERTIFICATE

This is to certify that I have gone through the dissertation submitted by **Dr.M.RathiRajkumari** a student of final **M.D(S)** Branch-I Department of **Maruthuvam**, National Institute of Siddha, Tambaram sanatorium, Chennai-47, and the dissertation work has been carried out by individual only. This dissertation does not represent or reproduce the dissertation submitted and approved earlier.

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AIM AND OBJECTIVES

AIM:

The aim of the dissertation work is to find the efficacy of treatment for **Kabha yoni rogam(Candida albicans)** with siddha drugs **Reval Chinni Choornam** and **Karpoora Silasathu Parpam**.

OBJECTIVES OF THE STUDY:

- To study the clinical course of the disease kabha yoni rogam – Vellai Noi with observation on Aetiology, classification, pathology, diagnosis, differential diagnosis, prognosis, complication and treatment by siddha aspect.
- To screen the clinical methods of diagnosis by our siddhars and to know how the disease manifests due to deranged Mukkutrams, Poripulangal, Ezhu udal thathukkal and Envagai thervugal.
- To have an idea about the incidence of the disease with age, occupation, economic status, habits, hereditary and clinical conditions.
- To research with detailed clinical investigations.
- To have a clinical trial on **"Kabha yoni rogam"** with Siddha Medicines,
  - **Reval Chinni Choornam**, 2.5g t.d.s with milk
  - **Karpoora Silasathu Parpam** 130mg with ghee
- To evaluate the pharmacological effects of the trial medicines.
- To use the modern parameters to confirm the diagnosis and prognosis of the disease

REVIEW OF LITERATURES

SIDDHA ASPECTS

YONI ROGAM

Yoni rogam means any disease of the female external genitalia.
Kaba Yoni Rogam is one of the types of Yoni Rogam.

SYNONYMS:

Kabha yoni thabitham
Iyyayoni rogam
Iyya kuyya Noi
Kabha yoni thabitha rogam

DEFINITION

Kabha Yoni Rogam is the disease of female external genitalia due to derangement of Kabam or Iyyam.

AETIOLOGY:

According to **Yugimuni** about this disease ,

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- Teasing the poor
- Commanding elders
- stealing gold
- Befrauding other's things

- Boasting
- Betraying
- Excessive sexual indulgence

According to Agathiar in his text **"Agathiar Gunavagadam",**

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- Excessive intercourse
- Starvation
- Increased intake of spicy, sour and salt ingredients

According to **Thirumoolar,**

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- Excessive intercourse during younger age
- Starvation
- Intercourse during indigestion

According to **"Pathinen Siddhargal naadi Sasthiram"** text,

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- Excessive intercourse
- Starvation
- Indigestion
- Increased Iyyam

In **`Guru Nadi'** it has given that Suronitha rogam, which is a synonym of yoni rogam is caused by Kirumis (Pathogenic organisms)

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In **Anubava vaidya deva Ragasyam"** Pg. No.272 for Vellai Noi the name has given as `Soma rogam' and causes for this has dealt like this,

- Excess sexual indulgence
- Sadness
- Insanity
- Diarrhoea
- Due to poisons

According to **T.V. Sambasivam pillai** the root cause of this disease is,

- Veneral disorders
- Prostitution

- Conceptional defects
- Improper dietary habits
- Any accidental happenings

According to **Prof. Dr.Venugobal,** in his text **"Magalir maruthuvam",** the aetiology for yoni rogam are

- Pathogenic infections
- Nosocomial infections
- Injuries during delivery or abortion
- Forceps delivery
- Vaginal douches
- IUCDs
- Initila stage of malignancy

General aetiology for yoni rogam as given in the text **"Siddhar Aruvai Maruthuvam"** by **Prof. Dr. C.S.Uthamarayan** (Page No.119).

- Menstrual disorders
- Having more than one sexual partner
- Sexual transmission from the male partners
- Having sex with a man of abnormally developed penis

CLASSIFICATION:

Yugimuni classified **"Yoni rogam"** as 20 types (Page No.137, Mahalir Maruthuvam) They are,

- Vadha yoni rogam
- Pitha yoni rogam
- Kabha yoni rogam
- Kuruthi yoni rogam
- Vali yoni rogam
- Kuruthi seezh yoni rogam
- Kothippu yoni rogam
- Soolai yoni rogam
- Sutka yoni rogam
- Kozhai yoni rogam
- Sivappu yoni rogam
- Vadi yoni rogam
- Maha yoni rogam
- Nabojaga yoni rogam
- Adhisarana yoni rogam
- Thoolitha yoni rogam
- Kirumi yoni rogam
- Thamarakkai yoni rogam
- Vibareetha yoni rogam

Prof. Dr. C.S. Uthamarayam in his text **"Siddhar Aruvai Maruthuvam"** dealt about 21 various types of yoni rogam under the title **"Penn Kuri noigal"** (Page No.120). They are,

- Vali Kuyya Noi
- Azhal Kuyya Noi
- Aiya Kuyya Noi
- Nurai Kuruthi Kuyya Noi
- Thunburuthum Kuyya Noi
- Kuruthi Ozhukku Kuyya Noi
- Vethuppu Kuyya Noi
- Soolai Kuyya Noi
- Kozhai Kuyya Noi

- Erichal Kuyya Noi
- Vadithal Kuyya Noi
- Parukkum Kuruthi Kuyya Noi
- Ali Kuyya Noi
- Pennkuri Punarchi Kuyya Noi
- Elai surungam Kuyya Noi
- Nunpuzhu Kuyya Noi
- Maraikkai Kuyya Noi
- Panmurai Punarchi Kuyya Noi
- Mukkutra Kuyya Noi

According to **Prof. Dr.P.M.Venugopal,** in his book **"Magalir Maruthuvam"** (Page No.131)

- Yoni thabitham in children
- Yoni thabitham in reproductive age
- Yoni thabitham in postmenopausal women

CLINICAL FEATURES:

General clinical features of **"KABA YONI ROGAM"**

According to Yugimuni:

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- Ulceration of the female genitalia
- Itching

- Pain in Vulva and Vagina
- Whitish appearance of vulva
- Profuse vaginal discharge

According to **Prof. Dr. C.S. Uthamarayan** in text **"Siddhar aruvai maruthuvam"** (Page No.119)

- Pain in the female genitalia
- Itching
- Burning sensation
- Sensation like worms moving
- Congestion and reddening of the genital tract
- Pain in the joint and back
- Discharge of blood through vagina
- Atrophy of breast
- Pre-term child in case of pregnant women

According to **Prof. Dr.P.M.Venugopal** in his text **"Mahilar maruthuvam"** (Page No.137)

- Increased discharge through the vagina
- Lower abdominal pain and low back pain
- Pain all over the body
- Oliguria
- Malaise
- Oedema of Vulva

UYIRTHATHU (MUTTHATHU IYAL):

Vali , Azhal and Iyyam are the three humors which are the life constituents of the human body.

Vali	-	Air and space
Azhal	-	Fire
Iyyam	-	Earth and Water

The three humors have different functions. The right proportion of each is responsible for maintaining good health, when these three humors are disturbed, it manifests as a pathologic state of the body.

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VALI (Vatham):

The following are the natural properties of Vali,

- To stimulate
- To respirate
- To activate the Body, mind and the Intellect
- To expel the fourteen kinds of natural reflexes (vegangal)
- To activate the seven physical constituents (Udalthathus) on junctional co-ordination
- To strengthen the five sense organs

In the above processess Vali plays a vital role to assist the body functions. Vali is having ten different forms and actions

TEN KINDS OF VALI:

1. UYIRKAL (Pranan):

The Prana helps in the digestion of ingested food. It co-ordinates the five senses, mind and the Intellect. Rancorous spitting, coughing, sneezing, belching, respirating and digestion of food are several functions of Pranan.

It s derangement causes respiratory problems.

2. KEZHNOKUKAL (Abanan):

It is responsible for excretion of urine and faces. It helps to take the essence of the digested food to the different parts of the body which requires food.

3. PARAVUKAL (Vyanan):

It activates voluntary and involuntary movements of the body and thus make them to extend or contract. This appreciates the sense of touch, helps to take the essence of the food to the strategic points of the body and guards the body.

It's derangement causes sensory and motor impairment.

4. MELNOKUNGAL (Udhanan):

It takes the essence of food and station it at appropriate places. It helps in digestion and assimilation of food.

It's derangement causes symptoms of upper gastro intestinal tract disease

5. NADUKKAL (Samanan):

This is responsible for the balance of the other four valis. It equalises the six tastes, water, food etc and helps in assimilation.

It's derangement causes impaired memory, lack of coherent thinking

6. NAGAN :

It is responsible for higher intellectual functions, hearing, thinking etc. It causes closing and opening of the eyelids.

Its derangement causes difficulty in closing, opening of eyelids

7. KOORMAN :

It starts from the mind and causes wrinkling of the eyelids, yawning and closure of mouth. It gives strength and helps to visualize things and causes lacrimal secretion.

Derangement of Koorman causes impairment of vision and lacrimal secretion.

8. KIRUKARAN:

It induces hunger, it makes to concentrate on one thing. It causes nasal and salivary secretions. Sneezing and cough are attributed to Kirukaran.

Its derangement causes changes in salivary and nasal secretion.

9. DEVADATHTHAN:

Laziness is attributed to Devadaththan. Occular movements and human passions are attributed to Vali.

10. DHANANJAYAN:

It is responsible for the bloating of the body after death and also for the foul smell.

AZHAL (Pitham):

Azhal is responsible for digestion, vision, maintenance of body temperature, Hunger, Thirst etc. It's other functions include Thought, knowledge, strength and softness.

Azhal is of five types depending upon the locations and the functions as follows.

1. AAKKANAL (Anal Pitham) :

It causes digestion and dries up moist ingested substances

Derangement produces indigestion acidity, heartburn

2. VANNA ERI PITHAM (Ranjaga Pitham):

This fire lies in the stomach and gives Red colour to the chyme and produces Blood. It improves blood.

It's derangement cause anemia..

3. AARRALANKI PITHAM (Sadhaka Pitham):

This fire is responsible for once movement and intellectual activity

It's derangement cause stupor and destroys thinking power. It activates ego to carryout one's desire.

4. OLLOLI THEE (Prasaka Pitham):

It gives colour and complexion and brightness to the skin.

It's derangement cause pigmentation disorder.

5. NOKKAZHAL PITHAM (Alochaka Pitham):

It lies in the eyes and causes the faculty of vision. It helps to visualize things.

Derangement causes defective vision.

IYYAM:

Greasiness, strength, Roughness, knowledge, cool, growth. Heaviness of Bones, Restriction of joint movements. pallor, deep sleep and to have a sweet taste on tongue are the functions of Iyyam.

Five types of Iyyam:

1. ALI AIYYAM (Avalambagam):

It lies in the Lungs and helps in respiration. It causes firmness of the limbs. This is vital among all types of kapham for it controls the other four Iyyam and maintains equillibrium.

It's derangement causes repiratory disease and indirectly derange the other Iyyams.

2. NEERPI IYYAM (Kilathagam):

It lives in the stomach, it mixes the consumed food and water and promotes the digestive process.

Derangement produces indigestion and loss of appetite

3. SUVAIKAAN IYYAM (Pothagam):

It lies in the tongue and helps to realise the taste of the consuming food.

Derangement causes anorexia.

4. NIRAIVU IYYAM (Tharpagam):

Sustaining in the head, this gives refrigerent effect to cool the eyes and other sense organs.

5. ONRI IYYAM (Slethagam):

Sustaining in the joints this makes them move freely and easily

Derangement causes drying of synovial fluid and impairs the mobility of joints.

MUTTHATHU VERUPADUKAL:

As indicated in the name itself, this clinical condition is primarily due to the derangement of **Iyyam**.

Due to the variations in the intrinsic and extrinsic factors, Iyyam deranges its equilbrium and manifests pathological changes which results in thick white discharge through the genital tract with white patches in the gentalia.

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Subsquently the other thathus Azhal, and vali gets deranged and causes Azharchi (Inflammation)

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when vali and Azhal are combinedly affected it results in excoriations and ulcers.

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The derangement of viyanan causes pain and edema of yoni and itching of yoni.

According to the Siddha, seven physical constitutents (thathus) constitute the body.

Though diseases manifest in the variations of the seven physical constituents, basically they occur because of the variations of the three humors.

The Anatomical and the physiological components of the human being is constituted by the three humors.

The food and the individual actions nourishes the humors and based on the predominance of a particular humor, the human body is constituted.

EZHU UDAL KATTUGAL (Seven physical constituents):

The human body is made of seven basic physical constituents. These constituents should be in harmony and normality. Any variation in them will lead to their functional deviations. The natural characters of the seven physical constituents,

1. Saram (Chyle):

This gives mental and physical perseverance

2. Senneer (Blood):

Imparts colour to the body, nourishes the body and is responsible for the ability and intellect of an individual.

3. Oon (Muscle):

It gives shape to the body according to the physical activity and covers the bones.

4. Kozhuppu (Adipose tissue):

It lubricates the joints and other parts of the body to function smoothly.

5. Enbu (Bone):

Supports the frame and responsible for the postures and movements of the body.

6. Majjai (Bone marrow):

It occupies the medulla of the bones and gives strength and softness to them.

7. Suronitham (Ovum):

It is responsible for reproduction.

PINIYARI MURAIMAI (Diagnosis):

Siddha system has the unique diagnostic methods to identify the diseases and their causes.

The diagnosis is made by observing,

(i) PORIYAL ARITHAL (the five sense organs)

(ii) PULANAL THERTHAL (the five senses) and

(iii) VINATHAL (Interrogation).

1. Poriyal Arithal:

Pori means organs of perception, The physical examination of the five sense ogans (Nose, tongue, eyes, ear and skin) are important.

2. Pulanal Therithal:

Pulan means objects of senses

i) Smell (Manam)
ii) Taste (Suvai)
iii) Vision (Oli)
iv) Tactile tic sense (Ouru) and
v) Sound (Oasai)

In **`Kapa yoni Rogham'** apart from general aspects, on per vaginal examination, the smell of vaginal discharge, redness, white patches, ulcers in vulva and vagina and tenderness over external genitalia should be observed.

In both of the above said methods physicians pori and pulan are used as tools for examining the pori and pulan of the patient.

3. Vinathal:

It is the process of obtaining the detailed history of the disease by interrogating the patient.

In diagnosing **"Kapa yoni rogham"** history should be obtained from all the patients regarding, patient's age, native place (thinai) socio-economic status, religion, diet, addiction, period (Paruvakalam) of onset of illness, present symptoms and duration of illness menstrual history, obstetric history, contraceptive use and duration and sexual promisculousness.

THINAI (the five fold geographical divisions):

In Siddha system of medicine the history regarding the patient's native place (Thinai) and period of onset of disease (paruvakalam) have specific significance.

The geographical distribution of the land is classified in to five regions.

Each region has its own character which influences the inhabitant's physical, mental, economic, and cultural activities.

S.No.	Land	Ailments
1.	Kurunji (mountain range)	Iyya Noigal
2.	Mullai (Pastoral area of the forest)	Azhal Noigal
3.	Marutham (The fertile river bed)	No Diseases
4.	Neidhal (The coastal region)	Vali noigal
5.	Paalai (Desert)	Vali, Azhal, and Iyya noigal

As Kapa yoni rogham is caused primarily by the derangement of Iyyam, its occurance is expected to be more in **Kurunji thinai**.

PARUVAKALAM:

The three uyirthathus deranges in accordance with the paruvakalam.

S.No.	Land	Months	Deranging thathus
1.	Kaar Kalam (early rainy season)	Avani, Purattasi, (mid August - mid October)	Azhal and Vali
2.	Koothir Kalam (later rainy season)	Iypasi, Karthigai, (mid October- mid December)	Azhal

3.	Munpani Kalam (early winter season)	Markazhi, Thai, (mid December - mid February)	All thathus remain in equilibrium
4.	Pinpani Kalam (later winter season)	Masi, Panguni, (Mid February - Mid April)	Iyyam
5.	EIavenil Kalam (early summer season)	Chithri - Vaikasi (mid April - mid June)	Iyym
6.	Mudhuvenil (later summer season)	Aani, Aadi, (mid June - mid August)	Vali

As the disease "Kapa yoni rogham" occurs due to the derangement of Iyyathathu, its incidence is expected more during **Pinpanikalam and Elavenil kalam.**

EIGHT METHODS OF DIAGNOSIS

(Envagai Thervugal)

There are eight tools of diagnosis. The symptoms of the body, the colour, the voice, the eyes, the tongue, stools, urine and the pulse, according to the saint **Theraiyar.**

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Naadi, Sparisam, Naa, Niram, Mozhi, Vizhi, Malam and Moothiram are the eight important methods in diagnosing a disease.

NAADI (Pulse):

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Naadi diagnosis is the confirmatory diagnosis. Naadi is the core of energy of the human system, which is constituted by proper proportion of thathus. Normally the Naadi is recorded in the radial artery in the right hand for the male and in the left hand for female and the index finger on it after gently enhancing the blood circulation over the area.

The ratio is 1 mathirai for vatham (felt by ring finger)

½ mathirai for pitham (felt by middle finger)

¼ mathirai for kabam (felt by index finger)

So, the normal ratio between Vadham, Pitham, and Kabam is 1:½:¼ respectively. Derangement of this ratio indicates a specific pathological manifestation.

NAADI NADAI IN KABHA YONI ROGAM:

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All the above quotations describe that derangement of Iyyam produces symptoms of **Kabha Yoni rogam.**

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The above quotes explain that aggravation of Vadham and pitham produces symptoms of **Kabha yoni Rogam.**

2. SPARISAM (Touch):

By Sparisam, the temperature of body, smoothness or roughness of body, Oedema, tenderness, any abnormal growth of the organ, tactile, sensibility can be observed. In Kaba yoni rogam along with general aspects, it is especially used for per vaginal examinations to see any tenderness inthe vulva, vagina, the

inflammation of vagina and vulva, any cysts or ulcers any prolapsed and also the palpation of abdomen to find out any tenderness.

2. NAA (Tongue)

It's colour, character and sense have to be observed. In kabha yoni rogam the tongue seems to be pallor under anaemic condition.

3. NIRAM (Colour)

Colour of the skin all over the body, a local region of infection should be observed. In Kabha yoni rogam on local examination the external genitalia would seem to be reddened and white patches may be seen due to thabitham.

4. MOZHI (voice)

The fluctuations of time and speech should be taken in to account with keen observation. Abnormal respiratory sound and abdominal sound are also added. In kabha yoni rogam there is no changes in mozhi considerably.

5. VIZHI (Eyes)

Colour , character, vision (both field of vision and colour of vision) Lacrimination should be observed. In Kabha yoni rogam usually the eyes are not affected.

6. MALAM (Stool)

Quantity, colour, smell, froth should be observed.

7. SIRUNEER (Urine)

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By correlating the pulse reading and proper urine analysis, the physician should confirm the diagnosis . General features of urine explained in Siddha texts are,

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Niram (colour of urine)
Edai (specific gravity of urine)
Manam (Odour)
Nurai (Frothy nature)
Engel (The quantity of urine and sediments of urine)

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In a Iyanoigal, the urine will be white in colour and less in gravity.

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In Kaba diseases the specific gravity of the urine will be low.

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The above quote explain the manam (Odour) of urine in Iyya diseases.

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In Iyya disease Nurai will be present in urine.

NEIKURI:

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The different changes in the oil dropped in the urine is observed.

Method:

On the day before the urine test, one should take food, consisting of all the six tastes at the regular time based on one's digestive fire. After a sound over night sleep, the first urine voided is collected in a glass ware and the test should be done before 90 minutes from dawn.

A drop of gingili oil is dropped in a wide vessel containing urine and be tested and kept in the sunlight and left undisturbed. The nature of spread of oil is noted.

General nature of urine in Oil Examination:

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If the oil drop takes the shape of a snake, it indicates Vatha disease.

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If it spreads like a ring it indicates Pitha. disease

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If it stands like a pearl it indicates Kapha disease.

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NOI KANIPPU VIVATHAM (Differential diagnosis):

S.No.	Disease	Similar symptoms and Signs	Varying Symptom and signs
1	Vadha Yoni rogam	Itching in the Vulva, increase in Vaginal discharge inflammation of Vagina, lower abdominal pain	Dryness and black discolouration of vulva, sweating, enlarged lymph glands in groin, frothy bleeding through vagina
2.	Pitha yoni rogam	Increased vaginal discharge	Foul smelling discharge, dark yellow frothy discharge, bleeding, thirst, and fever
3.	Kuruthi yoni rogam	Pain in the vulva, increased vaginal discharge, vulvo vaginal itching ulcers in vagina	Pus and Bloody discharge , vaginal fistula, itching, bluish discolouration
4.	Vali yoni rogam	Inflammation of vagina, white colouration in vagina	congestion of vaginal mucosa and constriction of vaginal orifice and white discharge
5.	Kuruthi seezh yoni rogam	Painful vagina, increased vaginal discharge	Discharge with blood and pus, foul smelling, multicoloured, spreads to uterus
6.	Kothippu yoni Roham	Inflammation of Vulva	Increased temp, spreads to uterus, if not treated causes cervicitis and induces

			abortion
7.	Soolai yoni rogan	Inflammation of vagina	Congestion of vaginal orifice, prolopse of cervix
8.	Sutka yoni rogam	Dysuria, pain in vagina	Dysuria,Constipation, constriction of vaginal orifice. Prognosis is bad
9.	Kozhai yoni roham	Mucoid vaginal discharge. Pain in vulva	It occurs in the post partum women ,sudden and profuse discharge
10.	Sivappu yoni roham	Inflammation of vagina redness and irritation of vagina	Ulcers,redness,burning sensation.
11.	Vadi yoni roham	Pain and discharge in the vagina	Dark yellow vaginal discharge, diarrhoea, pain in grown and low back pain
12.	Maha yoni roham	Mucoid vaginal discharge	Dilatation of vagina, bloody discharge with pus
13.	Nabojaga yoni Roham	Inflammation of vagina	Atrophy of breast, dyspareunia. It spreads from diseased man through coitus.
14.	Adhisarana yoni roham	Inflammation of vulva pain and discomfort of vulva	Anaemia and general malaise will be present.
15.	Thoolitha yoni roham	Inflammation of vagina	Constriction of vaginal orifice,dyspareunia
16.	Poopukala yoni rogam	Inflammation and pain in the vagina	Bloody discharge, low baqck pain, pain in groin
17.	Kirumi yoni roham	Inflammation of vagina itching in vagina and vulva, increased vaginal discharge	Increased,foul smelling discharge through vagina, itching
18.	Thamaraikkai yoni roham	inflammation of vagina	Tumours in uterus sometimes protruding through vagina.
19.	Vibareetha yoni roham	Inflammation and edema of vagina	Congestion of vagina and general malaise

Through careful observation of signs and symptoms, the physician can easily make the diagnosis. By these parameters of Siddha system of medicine, the disease must be studied out throughly, and diagnosed perfectly.

SATHIYA ASATHIYANGAL (Prognosis):

The knowledge of prognosis is very important for physicians to have an accurate idea in treating the disease. Thorough knowledge about prognosis will save the patient as well as the physician's fame. Kaba yoni rogam is a treatable disease But recurrence is more.

MARUTHUVAM : (Line of Treatment):

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The treatment should be based on the age and body built of the patient, the severity of the disease and the period of the ailment. In siddha system of medicine, treatment is not only for cure of disease, but also the prevention and improving the body condition after treatment. This is said as,

i) Kappu (Prevention)

ii) Neekam (Treatment)

iii) Niraivu (Restoration of well being)

(i) KAPPU (Prevention):

The good habits that prolong life is considered as Kappu or Prevention. The enjoyment of life is associated with pleasure. Disease is against to this sense of pleasure.

"PREVENTION IS BETTER THAN CURE"

One who follows a proper regular diet, good habits, Environment adaptation leads a better, prosperous and healthy long life.

Diet : Pathiyam

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In Kabha Yoni Rogam good nutrients to be followed:

Greens For Kapha Persons:

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Siddhars advised the patients to avoid certain things to get the full efficacy of the medicine.

Other Medical Advise:

- Avoid unhygienic and synthetic garments
- Follow good personal hygiene
- Avoid premarital, extra mariatal sex affairs
- Avoid urinary infection
- Maintain good habits

- Use lexatives once in 6 months
- Practice yoga and Pranayama

Paschimothasana, Sarvangasana, Halasana, Padmasana, Bhujangasana, Shalabasana

(2) NEEKAM: (Treatment)

The aim of the treatment is

(i) To bring the affected thathus to normal level

(ii) To treat the disease according to its symptoms by internal as well as external medicines.

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In Kabha Yoni rogam for normalizing the deranged thathu purgalatives can be given as initial measure. It would bring the affected Kuttram in equilibrium.

Medicine:

- **Reval Chinni Choornam**, 2.5g t.d.s with milk for seven days
- **Karpoora Silasathu Parpam**, 130mg b.d with ghee for 24 days

(3) NIRAIVU: (Restoration)

(i) Assurance of disease recovery should be given to all patients.

(ii) Nutritive food and supportive therapy increase the immunity levels.

(iii) All the patients are advised to live adopting good mortalities.

* * *

MODERN ASPECTS

To understand the various pathological states of gynaecological disorders, it is essential to have a basic knowledge about the anatomy and physiology of female reproductive system.

FEMALE REPRODUCTIVE SYSTEM

The female reproductive organs or genitalia are divided into external and internal organs.

EXTERNAL GENITALIA:

The external genitalia are known collectively as the **vulva** which consists of,

- Labia majora
- Labia minora
- Clitoris
- Vestibule
- Hymen
- Greater vestibular glands

i. Labia majora :

These are two large folds, which form the boundary of the **vulva**. They are composed of skin, fibrous tissue, fat and sabaceous glands. The folds anteriorly join in front of the symphysis pubis and posteriorly they merge with the skin of the perineum.

ii. Labia Minora:

These are two smaller folds of skin between the labia majora, containing sebaceous glands. Posteriorly they fuse to form the **fourchette**. The cleft between the labia minora is the **vestibule.**

iii. Clitoris:

It contains the erectile tissue and corresponds to the penis in male. It has no reproductive significance.

iv. Hymen:

It is the thin layer of muscous membrane, which partially occludes the opening of the vagina.

v. Vestibule:

It is the space lying between the anterior and inner aspects of the labia minora and is bounded posteriorly by the vaginal introitus.

vi. Greater vestibular glands:

The greater vestibular glands (Bartholin's glands) are situated one on each side near the vaginal opening. They secrete mucus that keeps the vulva moist.

Blood supply, lymph drainage and nerve supply of the external genitalia:

Aterial supply is by branches from the **internal pudendal ateries** and **external pudendal arteries.**

Veins form a large plexus, which eventually drains in to the internal iliac veins.

Lymph drainage is through the superficial inguinal nodes.

Nerve supply is by branches from **pudendal** nerves.

INTERNAL GENITALIA:

The internal organs of the female reproductive system lie in the pelvic cavity, and consist of,

- Vagina
- Uterus
- Two uterine tubes
- Two ovaries

i. Vagina:

The vagina is fibro muscular tube lined with stratisfied epithelium, connecting the external and internal organs of reproduction. In the adult the anterior wall is about 7.5 cm long and the posterior wall about 9 cm long. The difference is due to the protrusion of the cervix through the anterior wall.

The vagina has an outer covering of **areolar tissue,** a middle layer of **smooth muscle** and an inner lining of **stratified squamous epithelium.** Between puberty and the menopause **lactobacillus acidophilus** microbes are normally present and they secrete **lactic acid** maintaining the pH between 4.9 and 3.5.

Epithelium

The vaginal epithelium is under the action of sex hormones. At birth and up to 10-14 days, the epithelium is stratified squamous and devoid of any glands. Three distinct layers are defined. They are basal cells, intermediate cells and superficial cornified cells. The intermediate and superficial cells contain glycogen under the influence of estrogen. These cells become continuous with the covering of vaginal portion of the cervix and extend up to the squamous columnar junction at the extension. The superficial cells exfoliate constantly and more in inflammatory and neoplastic conditions. Unlike skin, it does not contain hair follicle, sweatglands and sebaceous glands.

Defence of the vagina:

Defence	**Newborn**	**Upto puberty**	**Child bearing period**	**Postmenopausal period**
Epithelium	Multilayered	Thin	Multilayered	Thin
Glycogen	++	-	++	-
Doderlein's	+	-	++	-
Bacillous pH	Acidic 4-5	Neutral 6-8	Acidic 4-5	Neutral 6-7

Blood supply, lymph drainage and nerve supply:

An **arterial plexus** is formed round the vagina, derived from the uterine and vaginal arteries which are branches of the internal iliac arteries.

A **venous plexus,** drains in to the internal iliac veins.

The **lymphdrainage** is through the deep and superficial iliac glands.

The **nerve supply** consists of parasympathetic fibres from the sacral outflow sympathetic fibres from the lumber outflow and somatic sensory fibres from the pudendal nerves.

ii. Uterus

The uterus is a hollow muscular pear shaped organ, flattened anteroposteriorly. It lies in the pelvic cavity between the urinary bladder and the rectum in an anteverted antiflexed position. It is about 7.5 cm long, 5 cm wide and 2.5 cm thick. It weighs from 40-45 gms. The parts of the uterus are the fundus, body and cervix.

The **fundus** is the dome shaped part of the uterus above the openings of the uterine tubes.

The **body** is the main part. It is narrowest inferiorly at the internal as where it is continuous with the cervix.

The **cervix** protrudes through the anterior wall of the vagina opening in to it at the external os.

Structure

The walls of the uterus are composed of three layers of tissue perimetrium, myometrium and endometrium.

Perimetrium consists of peritoneum, which is distributed differently on the various surfaces of the uterus.

Myometrium is the thickest layer of tissue in the uterine wall. It consists of a mass of smooth muscle fibres interlaced with alveolar tissue, blood vessels and nerves.

Endometrium consists of columnar epithelium. It contains which has a large number of mucus-secreting tubular glands. The upper two thirds of the cervical canal is lined with mucous membrane. The lower third is lined with sqamous epithelium continuous with that of the vagina.

Blood supply, lymph drainage, and nerve supply:

The **arterial supply** is by the **uterine arteries**, which are the branches of the internal iliac arteries.

Venous drainage: The Veins follow the same route as the arteries and eventually drain into the internal iliac veins.

Lymph drainage: There are deep and superficial lymph vessels which drain lymph from the uterus and uterine tubes to the aortic lymphnodes and groups of nodes associated with the iliac blood vessels.

Nerve supply – The nerves supplying the uterus and the uterine tubes consist of parasympathetic fibres from the sacral outflow and sympathetic fibres from the lumbar outflow.

SUPPORTS OF THE UTERUS :

- two broad ligaments
- two round ligaments
- two uterosacral ligaments
- two transverse cervical ligaments
- the pubo cervical fascia

iii. Uterine Tubes (Fallopian tubes) :

The uterine tubes are about 10 cm long and extend from the sides of the uterus between the body and the fundus. They lie in the upper free border of the

broad ligament and their trumpet shaped lateral ends penetrate the posterior wall, opening in to the peritoneal cavity close to the ovaries. The end of each tube has finger like projections called fimbriae. The longest of these is the **ovarian fimbriae**, which is in close association with the ovary.

Structure :

The uterine tubes have an outer covering of peritoneum (broad ligament) a middle layer of smooth muscle and are lined with ciliated epithelium.

iv. Ovaries :

The ovaries are the female gonads, or glands and they lie in a shallow fossa on the laternal walls of the pelvis. They are 2.5 to 3.5 cm long. 2 cm wide and 1 cm thick. Each is attached to the upper part of the uterus by **the ligament of the ovary** and to the back of the broad ligament by a broad band of tissue, the **mesovarium**. Blood vessels and nerves pass to the ovary in the mesovarium.

Structure :

The ovaries have two layers of tissues.

The **medulla** lies in the center and consists of fibrous tissue, blood vessels and nerves.

The cortex surrounds the medulla. It has a framework of connective tissue, or **storma**, covered by **germinal epithelium**. It contains **ovarian (Graffian) follicles**, each of which contains an **ovum**.

Blood supply, lymph drainage, and nerve supply :

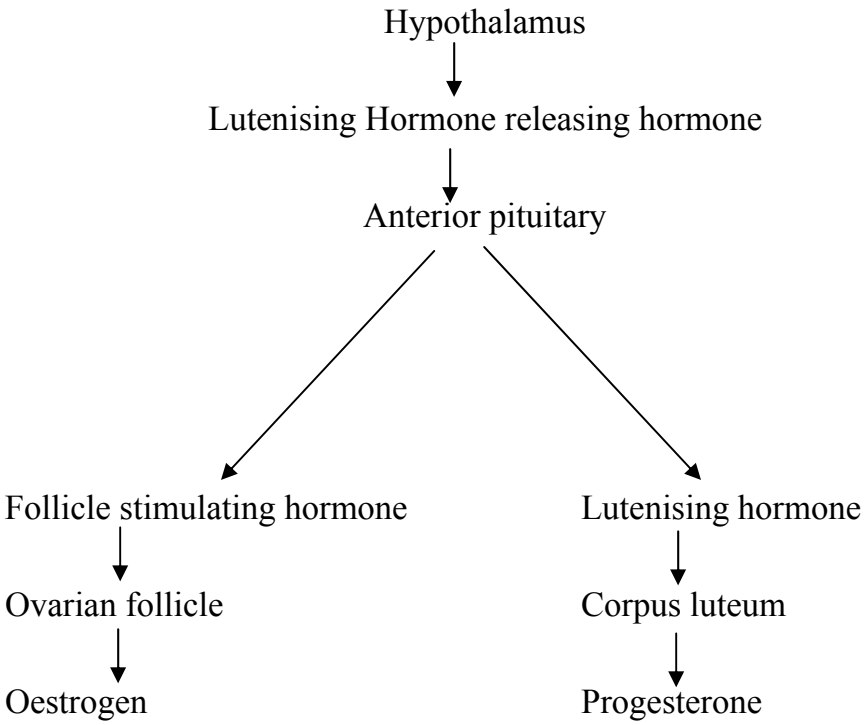
Arterial supply is by the ovarian arteries which branch from the abdominal aorta.

Venous drainage is in to a plexus of veins behind the uterus. The right ovarian vein opens in to the inferior vena cava and the left in to the left renal vein.

Lymph drainage is to the lateral aortic and pre-aortic lymphnodes.

Nerve supply: The ovaries are supplied by parasympathetic nerves and sympathetic nerves.

FEMALE REPRODUCTIVE HORMONES AND TARGET TISSUES



MENSTRUAL CYCLE

This is a series of events, occurring regularly in females every 26-30 days throughout the chidbearing period of about 36 years. The four stages are,

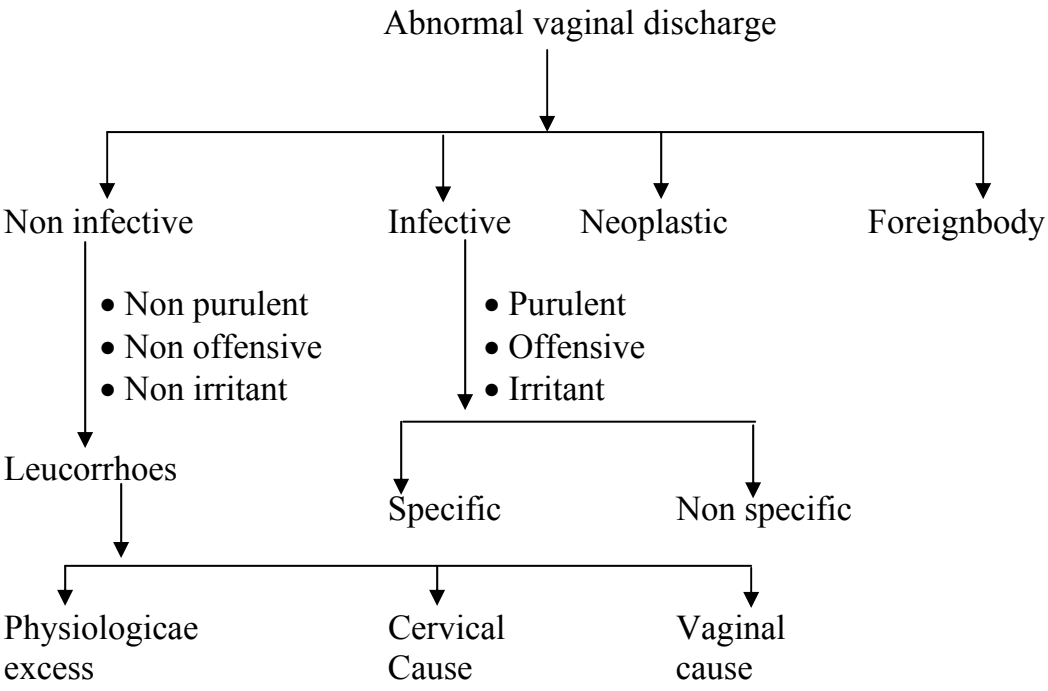
- Growth phase
- Proliferative phase
- Secretory phase
- Menstruation

LEUCORRHOEA

Literally **"leucorrhoea"** means white discharge. It includes conditions when the vaginal discharge is excessive and associated with pathology.

In practice all excessive vaginal discharge white, purulent, yellowish or watery, but not blood stained is leucorrhoea.

CAUSES



PATHO-PHYSIOLOGY:

The physiologic basis involved in normal vaginal secretion is dependent on the endogenous oestrogen level, there is abundant secretory activity of the endocervical glands and the superficial vaginal epithelium becomes rich in **glycogen**. The glycogen loaded epithelium sheds, the glycogen being converted into lactic acid by the **Doderlein bacilli**. As a result the vaginal pH becomes **acidic**. This acidity inhibits the growth of pathogenic organisms.

VAGINAL DISCHARGE

PHYSIOLOGICAL

In healthy women the vagina contains a small quantity of watery secretion. It contains mucus, desquamated epithelial cells, Doderlein's bacilli and lactic acid.

A physiological discharge may become apparent:

(i) At the time of ovulation when the high peak of oestrogen induces the endocervical glands in to excessive secretion.

(ii) As a result of sexual stimulation, when the main increasing component comes from Bartholin's glands.

(iii) As a result of premenstrual congestion, when there may be an increase of discharge for two or three days before the period.

(iv) During pregnancy, when general pelvic congestion and increased vaginal transudate are responsible for the increase of discharge.

Vaginal cause, Cervical cause

PATHOLOGICAL:

The patient should be asked about the nature of discharge, its colour, its duration, whether or not it is offensive and blood stained. Its relation to the menstrual cycle should be noted.

TYPES OF DISCHARGES AND ITS SIGNIFICANCES:

- **Yellow discharge:**

Bacterial infections of the Vagina, infected cervical polypi or erosions together with endocervical infection may give rise to yellow discharge.

- **Purulent discharge:**

Septic abortion, puerperal sepsis, pyometra.

Any infected discharge may be associated with vulval discomfort or soreness.

- **Irritating discharge:**

An irritating discharge are infection by the Trichomonas vaginalis and Candida albicans giving rise to acute or chronic Trichomonas or Monilial vaginitis.

- **Yellowish and greenish discharge:**

Acute gonorrhoea with extreme soreness, pain and tenderness of the vulva.

- **Offensive vaginal discharge:**

Necrotic leisons in the genital tract, such as carcinoma of the cervix, septic myomatous polyp, septic abortion, and of the rare growths such as sarcoma of the uterus and carcinoma of the Vagina.

- **Blood stained discharge:**

This type of discharge occur with oestrogen deficiency (so called senile vaginitis) carcinoma of the cervix, Polyp, infected and degenerated submucous fibroid polyp.

Any ulcerated leison of the genital tract whether inflammatory or malignant will produce a blood stained discharge.

E.g. (i) Ulceration of the posterior fornix from a retained pessary.

(ii) Retained products of conception by a placental polyp.

- **Amber coloured discharge:**

Carcinoma of the fallopian tube.

CERVICAL CAUSE (Cervical leucorrhoea):

Non infective cervical leison may produce excessive secretion which pours out at vulva. Such leisons are cervical erosion chronic cervicities, mucus polyp.

VAGINAL CAUSE (Vaginal leucorrhoea):

Increased vaginal transduation occurs in conditions associated with increased congestion. The leisons are uterine prolapsed, acquired extroverted uterus, chronic inflammation, pill use and vaginal adenoma. Ill health is one of the important causes of excessive discharge. It produces exfoliation of the superficial cells.

VAGINAL CANDIDIASIS

It is estimated that as many as 75% of women experience at least one episode of vaginal candidiasis during their lifetimes. Almost 45% of owomen will experience two or more episodes per year, few will be plagued with chronic recurrent infection.

Causative Organisms :

Candida albicans is responsible for 85 – 90% of vaginal yeast infections.

Other species are,

C. tropicalis

C .parakursei

C. krusei

C. guilliermondi

C. parapsilosis

Morphology

Candida are dimorphic fungi existing as blastospores, which are responsible for transmission and asymptomatic colonization, and as mycelia, which result from blastospore germination and enhance colonization and facilitate tissue invasion.

Predisposing features

glycosuria

diabetes mellitus

pregnancy

obesity

recent use of antibiotics

steriods or immuno suppressants

Antibiotics that most commonly result in east colonization are ampicillin, tetracycline and cephalosporin. Presumably, antibiotics suppress normal bacterial population and allow opportunistic colonization by yeasts.

It is commonly suggested that wearing tight fitting undergarments predisposes to yeast infection by increasing local humidity and temperature.

Mode of transmission

Transmitted by both sexual and non sexual contact, probably because the organism is capable of forming spores. In children and sexually active adolescents, clothing and other items are considered sources of infection.

Symptoms :

White discharge

Intense purities

Dysuria

often Oedema of vulva.

Signs :

1) White discharge - consistency varying from liquid to thick curd like called cottage cheese appearance.

2) The vaginal walls and introitus appears oedematous, reddened or reasonably normal.

3) White patches or plaques of cheesy material adherent to vagina which when removed, leave multiple petechial like haemorrhagic areas.

Classification of Candidal Vaginitis

Feature	Uncomplicated	Complicated
Severity	Mild or moderate	Severe
Frequency	Sporatic	Recurrent
Organism	Candida albicans	Non – albicans species of Candida
Host	Normal	Abnormal (uncontrolled diabetes Mellitus)

Diagnosis

Candidiasis is best diagnosed in KOH wet-mounts or Gram stained. Vaginal plaques, vaginal discharge, or vulvar scrapings from the edge of the erythematous border are mixed with 10% KOH. After mixing the two, place a cover slip on the top of it. KOH dissolves all the cellular debris, hence or microscopic examination candidal hyphae and buds stand out in prominence and are easily diagnosed.

The Mycelial form is usually found only during an infection ; mycelia can be identified by KOH wet mount in 80% of cases.

The pH of vaginal discharge is normal (i.e., 4.7 or less).

Diagnosis can be confirmed culture methods using Sabouraud's or Nickerson's media. Cultures for Candida should be limited to KOH wet-mount negative patients with symptoms or signs of cadidiasis.

Evans reviewed diagnostic methods for the diagnosis of Vaginal candidasis and discussed a new, rapid, antibody – mediated methodology based upon slide latex agglutination.

Treatment :

Local vaginal therapy is used because most antifungal preparations are not absorbed from the intestinal tract. For uncomplicated infection, various intravaginal azole agents used for 3 to 5 days are equally effective for women with primary and infrequent candidal vaginitis.

These agents include :

Miconazole
Clotrimazole,
Butoconazole

The insertion or boric acid powder in to the vagina, is also effective.

A One-time dose of fluconozole 150 mg orally, is also effective for those with uncomplicated infection.

COMMON CAUSES OF VAGINITIS AND ABNORMAL VAGINAL DISCHARGE

	Causes	**Nature**
Infective	Trichomonas vaginitis, Bacterial vaginosis, Monilial Vaginitis Cervicits	Frothy yellow discharge curdy white in flakes Brown, rotten meat odour and non pruritic mucoid discharge.
Atrophic	Post menopausal	Discharge is not prominent Irritation is prominent
Foreign body	Forgotten pessary, tampon, menchanical irritation	Offensive, copious, purulent, often blood stained.
Chemical	Douches, latex condoms, deodorants	Soreness is pronounced then the discharge
Excretions	Contamination with urine or faces producing secondary vaginitis	Offensive discharge with pruritus
Neoplasms	Fibroid polyp or genital malignancy	Serosanguinous, often offensive

-

INVESTIGATIONS

BLOOD : TC, DC, ESR, HB, Sugar

VDRLURINE: Sugar, Albumin Deposits

MOTION : Ova, Cyst

FRESH VAGINAL SMEAR

DIFFERENTIAL DIAGNOSIS

Feature	Normal Vaginal examination	Vulvo vaginal candidiasis	Trichomonas Vaginalis	Bacterial Vaginosis	Gonorrhoea chlamyclo moniasis
Aetiology	Uninfected lacto bacilli present	Candida albicans	Trichomonas vaginalis	Gordenella vaginalis	Nil
Typical symptoms	Nil	Vulval itching irritation	Profuse purulent discharge	Slightly increased discharge	Copious
Discharge	Variable usually scanty	Scanty to profuse	Profuse	Nil	Nil
Smell	Nil	Offensive fishy	Offensive	Nil	Nil
Colour	Nil	White	Yellow or green	White or yellow	Copious clear or green or yellow
Consistency	Non homogenous flocculi	Clumped adherent plaques	Thin homogenous	Thin homogenous	Mucoid purulent uniform coat
PH	Usually less than and equal to 4.5	Less than or equal to 4.5	4.5 – 7	4.5 – 7	Less than 4.5
Micro scopical study	Normally epithelial cells lactobacilli predominent	Leucocytes epithelial cells mycelia or pseudomycelia upto 80% candida positive	Leucocytes, motile Trichomous in 80% - 90% symptomatic patients	Clue cells few leucocytes lactobacilli out numbered by profuse mixed flora	Nil

MATERIALS AND METHODS

The study has been carried out in

Out Patient Department of Maruthuvam,

National Institute of Siddha,Chennai-47

The study involved 30 female patients attending OPD of Natinal Institute Of Siddha.

SELECTION OF PTS - I have selected the patients in active reproductive phase.

CRITERIA FOR SELECTION:

- Age group of 18 –40 years
- White discharge per vagina
- Pruritus vulva
- Lower abdominal pain
- Low back pain
- Dysuria

CRITERIA FOR EXCLUSION:

- Non specific leucorrhoea/Gonorrhoea/Syphilitic Infection
- Malignancy/organic lesion of genitourinary tract
- Cardiac diseases/HT/Any other systemic disorders
- Cases not confirmed by smear.

CLINICAL PARAMETERS:

Detailed clinical history was obtained from all the patients regarding,

- Patients age
- Socio Economic Status
- Marital status
- Other associated symptoms
- Menstrual history
- Pregnancy
- Contraceptive use

Colour, odour, duration and consistency of vaginal discharge and associated symptoms like vulval itching, burning, micturation, lower abdominal pain etc.

History taking is the next step in systemic and gynaecological examinations. The patients were examined in the lithotomy position for the purpose of medical convenience. The external genitalia were inspected and the vagina and cervix were introduced to Sim's speculum thereby collecting the vaginal smear easily.

INVESTIGATIONS:

- All the patients were subjected to routine clinical investigations viz. TC, DC, ESR, HB, Sugar, Urea and cholesteral in blood, sugar, albumin, and deposits in urine.

- Ova, cyst in motion

- Specialized tests like VDRL

- High Vaginal smears taken and microscopic examination to evaluate the causative organism.

- Pap smear was carried out whenever necessary to rule out malignancy.

SIDDHA SYSTEM OF CLINICAL DIAGNOSIS:

All the patients were subjected to siddha mode of investigation including, Poriyal therthal, Pulanal Aarithal, Mukkutra Nilaigal, Envagai thervugal and Udal kattugal.

CASE SHEET PROFORMA:

- All clinical signs and symptoms of **Kaba yoni rogam**
- History of present illness
- History of past illness
- Personal history
- Family history
- Menstrual history
- Obstetrical history
- Systemic examination
- Laboratory investigation
- Prognosis of the disease and management

All these data were recorded systematically in the case sheet proforma for analysis.

DRUG AND DOSE SCHEDULE:

- **Reval Chinni Choornam**, 2.5g t.d.s with milk for seven days

- **Karpoora Silasathu Parpam**, 130mg b.d with ghee for 24 days

OBSERVATION OF CASES:

A total number of thirty cases were observed and analysed.

- Age
- White discharge per vagina
- Pruritus vulva
- Lower abdominal pain
- Low back pain
- Dysuria
- Socioeconomic status
- Food habits
- Duration of illness
- Paruva kaalam
- Distribution of thinai
- Yezhu Udal kattukal
- Udal thathu
- Neerkuri
- Clinical investigations
- Response and result.

DISCUSSION

The symptoms of Kabha Yoni Rogam resemble **vaginal candidiasis** described in modern medicine. This study was to analyse the disease and efficacy of the trial drugs.

Kabha Yoni Rogam is a common embarasing problem in our country among the females and it also a recurrent problem . This is due to the lower economic status, lack of health awareness, poor hygienic and aseptic techniques, inadequate resistance power, criminal abortion, sexually transmitted disease.

Emotional status such as stress and anxiety play a major role in the course of the disease.

The symptoms of the disease have been studied and the efficacy of the trial drugs have also been observed.

MEDICINES :--

- **Reval Chinni Choornam**, 2.5g t.d.s with milk for seven days
- **Karpoora Silasathu Parpam**, 130mg b.d with ghee for 24 days

Seasonal variations also influence the disease to a great extent. During my dessertation period I observed that the incidence of Kabha Yoni Roham was more on pinpanikalam and elavenil kalam. During these periods the iyyam is said to be increased and it aggravates the symptoms of Kabha Yoni Roham.

Siddha literature clearly reveals that Kurunji thinai are place of aggravation of iyyathathu.So Kabha Yoni Rogam is proportionate to Kurunji thinai. Though Neithal thinai is a land of vali disease.the unhygienic habits and improper diets of

the people, influence the occurrence of disease. Thus environmental factors such as diet and personal habits influence the disease Kabha Yoni Rogam.

Among the 30 cases, KEEZHNOKKUKAL and paravukal were affected by causing increased Vaginal discharge, burning mixturation , lower abdominal pain, general body pain and low back pain. Nadukkal affected in some cases causing loss of appetite.

In Pitham Analagam, Ranjigam and Sathagam were affected in some cases causing loss of appetite, anemia, general malaise respectively.

In iyyam kledagam and santhigam were affected in some cases causing loss of appetite and low back pain respectively.

In Ezhu Vudal thathukal, saaram and suronitham affected in most of the case causing loss ill health and vaginal discharge respectively. Seneer causing anemia ,Oon and Kozhuppu causing pain and tiredness was also found in certain patients.

Regarding Enn Vagai Thervugal, nadi was predominant Vatha Pitham. Kabha Vatham and pitha kabham were recorded in some cases. In most cases Neikuri showed Iyyaneer.

On routine urine examination, deposits of pus cells and epithetlial cells were found in all cases and were reduced after treatment.

ESR was found to be raised due to inflammation and it was reduced during the course of treatment.

Apart from routine examinations, Special investigations like VDRL to all patients to rule out Syphilis.

Fresh Vaginal Smear in all cases was taken after treatment and studied microscopically to trace out the Candida albicans. Pap smear was done in some cases to rule out malignancy.

PROGNOSIS

Symptoms like white discharge, pruritis vulvae, dysuria and inflammation of vulva got gradually reduced during the course of treatment. Nearly 73% of the patients got rid of the symptoms and in these patients the vaginal smear for Candida albicans was negative after the treatment. The remaining patients had their symptoms like white discharge and Pruritis vulvae got reduced. All the patients were adviced to maintain proper hygiene.

MEDICAL ADVICE

Do's:-

Patient is advised to take fresh tap water wash and to keep the Vaginal area clean and Use clean sanitary napkins,dry,devoid of moisture.

To take nutritious diet with plenty of water.

To maintain good personal habits.

To do regular exercises meditation and yoga.

Don'ts :-

Using Nylon under garments has to be avoided.

Avoid Dettol wash as it kills doderkin’s bacteria, lactobacilla which are acid immune barriers of vaginal epithelium.

SUMMARY AND CONCLUSION

The clinical study on **Kabha Yoni Rogam** (Vaginal candidiasis) with the administration of the siddha drugs **Reval Sinni Choornam** and **Karpoora Silasathu Parpam** was carriedout at Ayothidoss Pandithar Hospital Of National Institute of Siddha, Chennai-600 047.

A total of 30 OPD patients were under my observation.

The duration of treatment was fixed as 24 days. Clinical and pathological assessments were carried out on the basis of both siddha and medical systems.

SUMMARY:-

The results on the studies summarized as follows:

- Among the 30 cases, the maximum cases were in the age group of 31 to 35.
- The case history reveals that most of the patients were of poor socio-economic group.
- From the history, it was seen that the incidence of **Kabha yoni rogam** is found to be more in Neithal Thinai and during Pinpanikalam and Elavenilkalam.
- On examination the Uyirthathus deranged in maximum cases were.

  Vali → Abanan, Viyanan and Samanan

  Azhal → Sathagam and Analagam

  Iyyam → Kledagam and Santhigam

- Among Udal thathus saaram and suronitham were affected in most of the patients, senner, oon, kozhuppu in some of the cases.

- Naadi showed Vadhapitham predominantly, Kabha vadham and Pitha vadham in some cases.

- In most of the cases ESR was found to be raised and urine deposits were present.

- Microscopial study of vaginal smear showed positive for Candida albicans for all the patients.

- 30 patients were given

  - **Reval Chinni Choornam**, 2.5g t.d.s with milk for seven days

  - **Karpoora Silasathu Parpam**, 130mg b.d with ghee for 24 days

- The responses were assessed once in six days in the OPD and recorded in the proforma.

The patients responded to the medicines showing gradual decrease in signs and symptoms.

Also the medicines have been subjected to

- Toxicological study
- Microbiological study
- Biochemical study

The above studies show that the drug acts well in Kaba Yoni Rogam and there is no toxicity.

CONCLUSION

This study shows the efficacy of the drugs **Reval Sinni Choornam** and **Karpoora silasathu parpam** in curing **kabha yoni rogham** and opened a new chapter for further studies for infections.

The Clinical, Microbiological, Toxicological and Biochemical studies show that the above drugs are free from toxicity and clearly emphasise the effectiveness of the drug.

rPufk;

bghJf;Fzk;

the;jp aUrp Fd;kk; tha;neha;gP ypfkpiug;
ngw;wpUky; fy;yilg;gp yh";rdKl; ? nrh;e;jfk;ky;
Mrd Flhhp baDk; me;j fpufzpa[k;
nghrd Flhhp a[z;zk; nghk;/

Botanical Name : Cuminum Cyminum
Family : Apiaceae

Vernacular Names

English : Cumin, Sans : Ajaji, Jeeraga, Hind – Safeed Jeera;

Suvai : Karppu, Inippu,

Thanmai : Thatpam

Pirivu : Inippu

Part used : Seeds

Chemical Constituents :

Contains a valuable essential oil thymene, cuminol, cymene, **α** pinene **α** phellandrene, **α** terpinene and apigenin.

Properties :

Anthelmintic, Antilfammatory stomachic, Carminative.

Uses:

The Volatile oil has immunostimulatory effect or infections in experimental Candidosis.

Useful in vitiated conditions of kapha & vata. Used in treatment of Leucorrhoea, gonorrhoea fever, strangury, renal. & vesicular calculi.

bfhj;Jky;yp

bghJf;Fzk;

bfhj;Jky;yp btg;gk; Fsph;fha;r;ry; gpj;jke;j";
rh;j;jptpf;fy; jhfbkhL jhJel;lk; ? fj;jpbaGk;
thj tpfhh;klh; td;fh;j;j gptpuzk;
g{jypj;jpy; yhjfw;Wk; nghw;W

Botanical name : Coriandrum Sativum

Family : Apiace

(Vernacular. Name) : Vernacular Names

Eng – Corianda, Sans – Kustumbari, Hin – Dhania,

Part used : Leaves , Seeds,

Suvai : Karpu

Thanmai : Seetha Veppam

Pirivu – Karpu

Chemical Constituents :

Seeds contain 1.5% volatile oil, contains mainly of delta Linalool α pinene, and Terpinine.

Also contain Isocoumarins, Phenolic Acids, Coriandrone, coriandrine, furfural, generaniol and flavanoids.

Properties :

Digestive, diaphoretic, diuretic, tonic, aphrodisiac.

Uses :

Useful in Nausea, loss of appetite, thirst, deranged metabolic functions and for alloying pain and burning sensation.

I essential oil exhibited strong antifungal activity at very low concentration.

The fruits are given in spermatorrhoea, Leucorrhoea and rheumatic fever and urinary tract infections.

Tif ePW

bghJf;Fzk;

TifePw;whd; khjh; Fa;aneha; tpj;jphpjp
ahfbkD khh;g[neh az;Lnkh ? nghfkjpy;
tPhpaKz;lhFk; tPH; fpUkp nehnahL
J}hpUk yPisa[k;ngh"; brhy;

Botanical Name : Maranta arundina

Family : Zingiberaceae

Vernacular Name :

Hind - Tikkor, Eng – East Indian arrow root

Part Used : Root

Chemical Constituents :

Essential oil containing α Pinene, β Pinene, α Camphor, Terpinene, P-Cymene, Limonene

Properties :

Cooling, Tonic, Aphrodisiac

Uses :

Useful in burning sensations, strangury, kidney and bladder calculi.

Used in form of conjee in cases of dysentery, dysuria, gonorrhoea.

Essential oil showed antifungal activity against important plant and human pathogens viz, candida albicans, Aspergillus fumigatus, A. niger, A.flavus and Antibacterial activity against Bacillus subtilis, E.coli and Staphylococcus aureus.

Vyk;

bghJf;Fzk;

bjhz;iltha; ft[s; jhYF j';fspy;
njhd;Wk; nehajp rhuk;gd; nkfj;jhy;
cz;il nghy;vG'; fl;o fphpr;ruk;
cHiy the;jp rpye;jp tp&";Ruk;
gz;il btf;if tpjhf neha; fhrKk;
ghG"; nrhkg; gpzp tpe;J el;lKk;
mz;il aPistd; gpj;jk; ,itf;bfy;yhk;
Mykh';fkH; Vy kUe;nj

Botanical Name : Electaria cardomum
Family : Zingiberaceae

Vernacular Name :

Eng : Cardomum, Sans : Elaa, Hin : Chori Elachi

Suvai : Kaarpu,

Thanmai : Veppam,

Pirivu : Karpu

Part used : Seeds

Chemical Constituents :

Volatile oil includes borneol, camphor, α, β pinene α humulene, caryophyllene, terpinene, p-cymene, Limonene.

Properties :

Antimicrobial, Diuretic, cooling, cardio tonic, anti inflammatory.

Uses :

Used in strangury, renal and vesicular calculi, burning sensation diseases of the bladder, kidney and rectum.

Fruits used in suppressed urine and for dysuria.

rpWehfg;g{

bghJf;Fzk;

rpWehfg; g{tpdJ bra;ifjidr; brhy;nthk;

FwpahFk; nkfj;ijf; bfhy;Yk; bewptpl;Lj;

jPjha;r; bry;tha[ita[e; jPh;f;FkpUky; nghf;Fk;

nfhjha; ,ijawpe;J bfhs;

Botanical Name	:	Mesua ferrea
Family	:	Clusiaceae

Vernacular Name :

Eng : Mesu Ayur – Nagakeshra, Unani – Naaremushk, Hind – Naga Kesara

Suvai : Sirukaippu, Thuvarpu,

Thanmai : Thatpam

Pirivu : Karpu

Part used : Leaves, Buds, Flowers, Seeds.

Chemical Constituents :

Mesua Xanthene A,B, Euxanthene, α, β amyrin, β sitosterol.

Seed oil yielded several phenyl coumarin analogues mesuol, mesuone, mesuagin,.

Properties :

Digestive, Carminative, diuretic.

Uses :

For Leucorrhoea prescribed with butter milk. The ethanolic extract shows diuretic activity in rat.

The essential oil showed antifungal activity. Useful in pruritis, strangury and fever.

fU";rPufk;

bghJf; Fzk;

fU";rP ufj;jhd; fug;gbdhL g[z;qk;

tU";rpuha;g; gPerK khw;Wk; mUe;jpdhy;
fha;r;ry; jiytypa[k; fz;typa[k; nghKyfpy;
tha;r;r kUe;bjdnt it/

Botanical Name : Nigella sativa

Family : Ranunculaceae

Vernacular Names :

Ayur – Upakunchika, Unani – Kalongi, Eng – Black cumin,
sans – Krishnajeraka, Hind – Kala Jira

Suvai : Kaippu,

Thanmai : Veppam

Pirivu : Karpu

Part used : Seeds

Chemical Constituents :

Essential oil from seeds contains Nigellone and methyl isopropyl quinone. Seeds contain fatty acids including palmitic, myristic, oleic, linoleic, linolenic acids, β – sitosterol also present

Properties :

Diuretic, Anthelmintic, Antiinflammatory.

Uses :

Useful in inflammation, strangury and vitiated conditions of vata and kapha. It is used in many prescriptions for affections of female genetalia, internal tumours and piles.

Essential from seeds shows antifungal activity and antibacterial activity.

,nuty; rpd;dp

Botanical Name : Rheum emodi

Family : Polygonaceae

Vernacular Names:

Ayur – Amalaparni, Unani – Revandachini, Sans – Amlavetasa,

Eng – Indian Rhubarb

Chemical Constituents :

It contains crysophanic acid and a number of anthraquinone derivatives – rhein and emodin. Glycosidic active principles – sennosides A – F present.

The astringent consists chiefly of gallic acid. The drug also contains cinnamic acid and rheinolic acids, volatile oil, starch and calcium oxalate.

Properties :

Stomachic, bitter, tonic, purgative

Uses :

Root extract showed anti – inflammatory activity against carragenin induced edema in rates.

The anthraquinone emodin improves immune function of spleen.

rh;f;fiu. fw;fz;L. fUk;g[

bghJf; Fzk;

fUk;g[r;rhW

fUk;gpuj bkj;jt[z;lhw; fhq'; fgneha;

tpUk;gpbty;y bkj;jt[z;lhy; nkfk; ? jUkJ ePh;

cz;lh kijkpjkh a[z;lhy;nk fk;gpj;jk;

kpz;lhkw; rhe;jKWk; tps;

fw;fz;L

<wpd; jog;g[kpUkYk;gy; the;jpfS";

rPWfg Kl;odK"; nruhnj ? njwpaew;

brhw;fz; os';Fapy;fs; R{H kltdnk !

fw;fz; bldt[iuf;F'; fhy;

Botanical Name : Saccharum officinarum

Family : Poaceae

Vernacular Names:

Ayur – Ikshu, Unani – Gannaa, Eng – Sugar cane

Chemical Constituents :

Water 70 - 75%, sugars 12 - 15%, fibre, Nitrogenous substances, fats, waxes, gums & Pectin's.

Non sugar constituents are hemicellulose, pentosans and starch.

Indian cane juices contain, minerals including iron. Vitamine present are thiamine, riboflavin, niacin, pantothenic acid, biotin and vitamin D.

Properties ;

Diuretic, Tonic, Galactogogue.

Uses :

Useful in urophathy, emaciation and general debility.

btoa[g;g[

bghJf;Fzk;

R{Jjf tha[bthL nrhzpj j;jpd; thjKk; n ghk;
thjtyp Fd;kkpit khW';fhz; ? kPjhe;j
bfhoa tapwpHpa['; nfhiHfg nkFk;
btoa[g;g[jd;id tpsk;g[

Chemical Name : Pottassium Nitrate

Vernacular Name :

Nitre, Nitrate of Potash, Purified Nitre.

Sans : Yavakshar, Saindowa
Hind : Shora

The earth containing crude salt is dissolved in water, strained and re-crystallized by boiling and evaporation.

It is also obtained from collection of saline earth after the rains and from mud heaps, mud, buildings and other places on which it is formed and then subjected to a process of solution and filtration throgh crude mud filter.

The Impure Nitre is known as "Dhaab" which contain about 45% - 75% of the actual salt, the remainder being sulphate and chloride of sodium and insoluble matter.

- The Nitre obtained in bazaars is generally impure.
- For Medical use it is dissolved in water, strained and crystallized.

Properties and uses :

- It is the foremost of all medicines which make the body compact and durable.
- It invigorates the memory and the understanding.
- It gives tones to the systems.

Actions : Refrigent, Efficent diuretic, diaphoretic

Irritant in solid and concentrated form.

Properties and uses :

It is a constituent of sanga dravagam Potassium Nitrate is a good diuretic and is useful in fever, influenza, measles, small pox etc.,

Inhalation of burning Nitre gives feat relief in asthenia and spasmodic cough.

In Leucorrhoea : Combination of Nitre 10 grains and alum 5 grains is recommended to be taken thrice a day.

fw;g{u rpyhrj;J

fy;yilg;g[nkf'; fdJ}yk; tpj;jpujp
brhy;yilf;F ePuUfw; nrhzpjf;fhd; ? bky;ypilahh;f;
fpy;yfr;rj; jpy;iyabD kpe;jphpa el;lKkh';
fy;yfr; rj; jpy;iyabD'; fhy;/

Vernacular names

Sans : Silajit, Eng : asphalt, mineral pitch, Jew's Pitch

Hindi : Silajita

Source :

Ejected out of rocks during hot weather in the lower Himalayas Vindhya and other mountain tracts and Nepal where Iron abounds, naturally flowing out from the fissures in the rocks, or it may be a tar formed in the earth from the decomposition of vegetable substances.

Large quantities are imported in to India from Katmandu. A white variety is said to be collected from rocks in Mount Abu, Rajputana.

Varieties and their characters :

Four varieties of shilasath are described by the ancient Hindu writers.

The gold Silasath – Red in colour.

Silver silasath – White in colour

Copper silasath – Blue in colour

Iron Silasath – Blackish brown colour

Blue and red are not found commonly and the variety most available is the fourth variety which from the therepeutic view is considered to be active.

Silasath is bituminous substance which is a compact mass of vegetable organic matter composed of dark gummy matrix interspersed with vegetable fibres, sand and earthy matter.

On Igniting it leave a large quantity of ash consisting of lime Magnesia, Silica and Oxides of iron.

It contains

Urea, water, organic matter, mineral, nitrogen, potash, lime, phosphoric acid, silica.

It dissolves in water and is neutral in reaction.

It did not assume a crystalline structure when carefully, evaporated from alcoholic solution.

The test would indicate the presence of mineral hydrocarbons.

Chemical Compounds :

Shilasath contains : Chloroform, Ethyl acetate, Alcohol, Benzoic acid.

Ash Contains :

Hippuricacid Albuminoids, Resin, Waxy matter,

After Comparative study, crude and purified shilasath is not having much difference.

Actions :

Local : Antiseptic, Parasiticide,

Internal : Tonic, Slightly Laxative, Disinfectant, Expectorant,

Charaka says "There is hardly any curable disease which can't be controlled or cured with the aid of Shilasath".

It is specially employed in genito – urinary diseases and in diabetes mellitus.

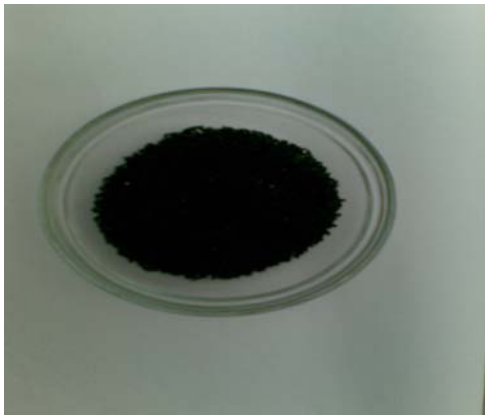
Parpam is given in for gonorrhoea, Leucorrhoea. It is also given in anemia and general debility as a tonic.

SIRUNAGAPOO

KARKANDU

KARPOORA SILASATHU

REVALSINNI



KARUNSEERAGAM

KARPOORA SILASATHU PARPAM

REVAL SINNI CHOORANAM

BIOCHEMICAL ANALYSIS OF KARPOORA SILASATHU PARPAM

Sl. No.	Experiment	Observation	Inference
1.	**APPEARANCE OF THE SAMPLE**	Dull white	-
2.	**SOLUBILITY**		
	a. A little of the sample is shaken well with distilled water	Solubility	Insoluble
	b. A little of the sample is shaken wel with Con.HCL/Con. H_2SO_4/ Con.HNo_3	Solubility	Insoluble
3.	**ACTION OF HEAT** A small amount of the sample is taken in a dry test tube and heated gently at first and then strongly	No characteristic change	Absence of Carbonate, Nitrate
4.	**Flame Test** A small amount of sample is made in to paste with con.HCL in a watch glass and introduced in to the non luminous part of the Bunsen flame	Absence of Characteristic colour flame	Absence of copper, Sodium and Calcium
5.	**Ash Test** A filter paper is soaked in to a mixture of sample and cobalt nitrate solution and introduced to the Bunsen flame and ignited.	Absence of light blue and brown colour flame	Absence of Aluminium and copper

PREPARATION OF EXTRACT

5 gm of Karpoora silasathu parpam is weighed accurately and placed in a 250 ml of clean beaker and added with 50ml of distilled water. Then it is boiled well for about 10 minutes. Then it is cooled and filtered on a 100ml volumetric flask and the distilled water be mixed upto the level of 100ml.

S.NO	EXPERIMENT	OBSERVATION	INFERENCE
I	**TEST FOR ACID RADICALS**		
1.	**TEST FOR SULPHATE**		
a.	2 ml of the above prepared extract is taken in a test tube. To this add 2 ml of 4% Ammonium oxalate solution.	Cloudy appearance is obtained	Presence of sulphate is confirmed
b.	2ml of Sodium Carbonate extract is added with 2ml of dilute HCL acid, until the effer - vescence ceases off. Then 2ml of silver Nitrate Solution is added.	A white precipitate is insoluable in on HCl is obtained	Presence of Sulphate is confirmed
2.	**TEST FOR CHLORIDE**		
	2ml of Sodium Carbonate extract is added with dilute Nitric acid till the effervescence ceases. Then 2ml of Silver.Nitrate Solution is added.	Absence of Cloudy, white precipitate	Absence of chloride
3.	**TEST FOR PHOSPHATE** 2 ml of the extract is treated with 2ml of Ammonium molybdate solution and 2 ml of con. Nitric acid	No yellow precipitate	Absence of phosphate
4.	**TEST FOR CARBONATE** 2ml of the extract is treated with 2ml of magnesium sulphate solution.	Absence of white precipitate	Absence of Carbonate
5.	**TEST FOR SULPHIDE** 1gm of the substance is treated with 2 ml of magnesium sulphate solution.	Absence of rotten egg smelling gas	Absence of Sulphide
6.	**TEST FOR NITRATE** 1 gm of Substance is heated with	Absence of reddish	Absence of Nitrate

	copper turnings and concentrated sulphuric acid and viewed the test tube vertically down.	brown gas is obtained	
7. a.	**TEST FOR FLUORIDE AND OXALATE** 2 ml of the extract is added with 2 ml of dilute, acetic acid and 2 ml of calcium chloride solution and heated.	Presence of white precipitate	Presence of Oxalate
b.	5 drops of clear solution is added with 2 ml of dilute sulphuric acid and slightly warmed. To this 1 ml of dilute potassium permanganate solution is added.	No characteristic colour change	Absence of fluoride
8.	**TEST FOR NITRITE** 3 drops of the extract is placed on a tilter papers. On that 2 drops of aceticacid and 2 drops of Benzidine Solution is placed.	Absence of development of yellowish red colour	Absence of Nitrite
9.	**TEST FOR BORATE** 2 pinches of the Substance is made in to paste by using sulphuric acid and alcohol (95%) and introduced in to the blue flame.	No green tinged flame is obtained	Absence of Borate
II.	**TEST FOR BASIC RADICALS**		
10.	**TEST FOR LEAD** 2 ml of the extract is added with 2 ml of potassium iodide solution	No yellow precipitate	Absence of lead
11. a.	**TEST FOR COPPER** One pinch of substance is made in to paste with con. HCl in a watchglass and introduced in to the non luminous part of the flame.	No bluish green colour	Absence of copper
b.	2ml of the extract is added with	No white	Absence of copper

	excess of Ammonia solution	precipitate	
12.	**TEST FOR ALUMINIUM** To the 2ml of the extract sodium hydroxide solution is added in drops to excess	No white precipitate	Absence of Aluminium
13.	**TEST FOR IRON** To the 2ml of extract 2ml of Ammonium thio cyanate Solution is added	No blood red colour	Absence of Ferric iron
	b. To the 2 ml of extract 2 ml of Ammonium thio Cyanate Solution and 2 ml of con. Nitric Acid is added	No Blood red colour	Absence of Ferric iron
14.	**TEST FOR ZINC** To the 2 ml of extract Sodium hydroxide Solution is added in drops in excess	No white precipitate	Absence of Zinc
15	**TEST FOR CALCIUM** 2 ml of the extract is added with 2ml of 4% Ammonium oxalate solution	White precipitate	Presence of Calcium
16	**TEST FOR MAGNESIUM**		
	To the 2ml of the extract sodium hydroxide Solution is added in drops to excess	Absence of insoluble white precipitate	Absence of Ammonium
17	**TEST FOR AMMONIUM** To 2ml of extract few me of Nesslers reagent and excess of Sodium Hydroxide solution are added.	No red Brown precipate	Absence of Ammonium
18	**TEST FOR POTASIUM** A pinch of Substance is treated with 2ml of Sodium nitrite Solution and then treated with 2ml of Cobalt nitrate in 30% glacial acetic acid.	No yellow Precipitate	Absence of Potasium

19	Test For Sodium 2 Pinches of the Substance is made in to paste by using HCl and introduced into blue flame	No yellow flame is obtained	Absence of Sodium
20	**TEST FOR MERCURY** 2ml of the extract is treated with 2 ml of sodium hydroxide solution	No yellow precipitate	Absence of Mercury
21.	**TEST FOR ARSENIC** 2 ml of extract is treated with 2 ml of Silver nitrate solution	No yellow or brown precipitate	Absence of Arsenic
III	**MISCELLANEOUS**		
22.	**TEST FOR REDUCING SUGAR**		
	5 ml of Benedict's qualitative solution is taken in a test tube and allowed to boil for 2 minutes and added 8 to 10 drops of the extract and again boiled for 2 minutes. The colour changes are noted.	No colour change	Absence of reducing sugar
23	**TEST FOR STARCH** 2 ml of the extract is treated with weak iodine solution	No blue colour	Absence of starch
24 a.	**TEST FOR ALKALOIDS** 2 ml of the extract is treated with 2ml of Pottassium Iodide Solution	No yellow colour	Absence of Alkaloids
b.	2ml of the extract is treated with 2 ml of pioric acid	No yellow colour	Absence of Alkaloids
c.	2 ml of the extract is treated with 2 ml of phosphotungstic acid	No white precipitate	Absence of alkaloids
25	**TEST FOR TANNIC ACID**	No Brown colour precipitate formed	Absence of Tannic acid

	2 ml of the extract is treated with 2ml of Ferric chloride solution		
26	**TEST FOR UNSATURATED COMPPOUND** To the 2 ml of the extract 2ml of potassium permanganate solution is added	No Colour Change	Absence of Unsaturated Compound.
27	**TEST FOR AMINO ACID** 2 Drops of the extract is placed on a filter paper and dried well. After drying 1% Ninhydrine is sprayed over the same and dried well.	No violet colour	Absence of Amino Acid
28	**TEST FOR ALBUMIN** 2 ml of the extract is added with 2 ml of Esboch's reagent	no yellow precipitate	Absence of albumin
29	**TEST FOR TYPE OF COMPOUND** 2 ml of the extract is treated with 2ml of ferric chloride solution	No Colour developed	No Aliphatic, Antipyrine, Amino Acid and meconic acid

RESULTS

The given sample contains,

I. **ACID RADICALS** : Sulphate, Oxalate, Calcium.

II. **BASIC RADICALS** : Nil

MISCELLANEOUS **:Nil**

ANNEXURE – III

BIOCHEMICAL ANALYSIS OF REVAL SINNI CHOORNAM

Sl. No.	Experiment	Observation	Inference
1.	**APPEARANCE OF THE SAMPLE**	Dull brown in Colour	-
2.	**SOLUBILITY**		
	a. A little of the sample is shaken well with distilled water	Solubility	Sparingly soluble
	b. A little of the sample is shaken wel with Con.HCL/Con. H_2SO_4/ Con.HNo_3	Solubility	Sparingly Soluble
3.	**ACTION OF HEAT** A small amount of the sample is taken in a dry test tube and heated gently at first and then strongly	No characteristic change	Absence of Carbonate, Nitrate
4.	**Flame Test** A small amount of sample is made in to paste with con.HCL in a watch glass and introduced in to the non luminous part of the Bunsen flame	Absence of Characteristic colour flame	Absence of copper, Sodium and Calcium
5.	**Ash Test** A filter paper is soaked in to a mixture of sample and cobalt nitrate solution and introduced to the Bunsen flame and ignited.	Absence of light blue and brown colour flame	Absence of Aluminium and copper

PREPARATION OF EXTRACT

5 gm of Reval sinni choornam is mixed with 5 gm sodium carbonoate in a 100 ml of clean beaker and added with 20ml of distilled water. Then it is boiled

well for about 10 minutes. Then it is cooled and filtered. The filterate is called sodium carbonate extract.

S.NO	EXPERIMENT	OBSERVATION	INFERENCE
I	**TEST FOR ACID RADICALS**		
1.	**TEST FOR SULPHATE**		
a.	2 ml of the above prepared extract is taken in a test tube. To this add 2 ml of 4% Ammonium oxalate solution.	Cloudy appearance is obtained	Presence of sulphate is confirmed
b.	2ml of Sodium Carbonate extract is added with 2ml of dilute HCL acid, until the effer - vescence ceases off. Then 2ml of silver Nitrate Solution is added.	A white precipitate is insoluable in on HCl is obtained	Presence of Sulphate is confirmed
2.	**TEST FOR CHLORIDE**		
	2ml of Sodium Carbonate extract is added with dilute Nitric acid till the effervescence ceases. Then 2ml of Silver.Nitrate Solution is added.	Absence of Cloudy, white precipitate	Absence of chloride
3.	**TEST FOR PHOSPHATE** 2 ml of the extract is treated with 2ml of Ammonium molybdate solution and 2 ml of con. Nitric acid	No yellow precipitate	Absence of phosphate
4.	**TEST FOR CARBONATE** 2ml of the extract is treated with 2ml of magnesium sulphate solution.	Absence of white precipitate	Absence of Carbonate
5.	**TEST FOR SULPHIDE** 1gm of the substance is treated with 2 ml of magnesium sulphate solution.	Absence of rotten egg smelling gas	Absence of Sulphide
6.	**TEST FOR NITRATE** 1 gm of Substance is heated with copper turnings and concentrated	Absence of reddish brown gas is	Absence of Nitrate

	sulphuric acid and viewed the test tube vertically down.	obtained	
7. a.	**TEST FOR FLUORIDE AND OXALATE** 2 ml of the extract is added with 2 ml of dilute, acetic acid and 2 ml of calcium chloride solution and heated.	Presence of white precipitate	Presence of Oxalate
b.	5 drops of clear solution is added with 2 ml of dilute sulphuric acid and slightly warmed. To this 1 ml of dilute potassium permanganate solution is added.	No characteristic colour change	Absence of fluoride
8.	**TEST FOR NITRITE** 3 drops of the extract is placed on a tilter papers. On that 2 drops of aceticacid and 2 drops of Benzidine Solution is placed.	Absence of development of yellowish red colour	Absence of Nitrite
9.	**TEST FOR BORATE** 2 pinches of the Substance is made in to paste by using sulphuric acid and alcohol (95%) and introduced in to the blue flame.	No green tinged flame is obtained	Absence of Borate
II.	**TEST FOR BASIC RADICALS**		
10.	**TEST FOR LEAD** 2 ml of the extract is added with 2 ml of potassium iodide solution	No yellow precipitate	Absence of lead
11. a.	**TEST FOR COPPER** One pinch of substance is made in to paste with con. HCl in a watchglass and introduced in to the non luminous part of the flame.	No bluish green colour	Absence of copper
b.	2ml of the extract is added with excess of Ammonia solution	No white precipitate	Absence of copper
12.	**TEST FOR ALUMINIUM**	No white	Absence of

	To the 2ml of the extract sodium hydroxide solution is added in drops to excess	precipitate	Aluminium
13.	**TEST FOR IRON** To the 2ml of extract 2ml of Ammonium thio cyanate Solution is added	No blood red colour	Absence of Ferric iron
	b. To the 2 ml of extract 2 ml of Ammonium thio Cyanate Solution and 2 ml of con. Nitric Acid is added	No Blood red colour	Absence of Ferric iron
14.	**TEST FOR ZINC** To the 2 ml of extract Sodium hydroxide Solution is added in drops in excess	No white precipitate	Absence of Zinc
15	**TEST FOR CALCIUM** 2 ml of the extract is added with 2ml of 4% Ammonium oxalate solution	No white precipitate	Absence of Calcium
16	**TEST FOR MAGNESIUM**		
	To the 2ml of the extract sodium hydroxide Solution is added in drops to excess	Absence of insoluble white precipitate	Absence of Ammonium
17	**TEST FOR AMMONIUM** To 2ml of extract few me of Nesslers reagent and excess of Sodium Hydroxide solution are added.	No red Brown precipate	Absence of Ammonium
18	**TEST FOR POTASIUM** A pinch of Substance is treated with 2ml of Sodium nitrite Solution and then treated with 2ml of Cobalt nitrate in 30% glacial acetic acid.	No yellow Precipitate	Absence of Potasium
19	Test For Sodium 2 Pinches of the Substance is made in to paste by using HCl and introduced into blue flame	No yellow flame is obtained	Absence of Sodium
20	**TEST FOR MERCURY**	No yellow	Absence of

	2ml of the extract is treated with 2 ml of sodium hydroxide solution	precipitate	Mercury
21.	**TEST FOR ARSENIC** 2 ml of extract is treated with 2 ml of Silver nitrate solution	No yellow or brown precipitate	Absence of Arsenic
III	**MISCELLANEOUS**		
22.	**TEST FOR REDUCING SUGAR**		
	5 ml of Benedict's qualitative solution is taken in a test tube and allowed to boil for 2 minutes and added 8 to 10 drops of the extract and again boiled for 2 minutes. The colour changes are noted.	No green colour formed	Absence of reducing sugar
23	**TEST FOR STARCH** 2 ml of the extract is treated with weak iodine solution	Blue colour	Presence of starch
24 a.	**TEST FOR ALKALOIDS** 2 ml of the extract is treated with 2ml of Pottassium Iodide Solution	Yellow colour	Presence of Alkaloids
b.	2ml of the extract is treated with 2 ml of pioric acid	Yellow colour	Presence of Alkaloids
c.	2 ml of the extract is treated with 2 ml of phosphotungstic acid	White precipitate	Presence of alkaloids
25	**TEST FOR TANNIC ACID** 2 ml of the extract is treated with 2ml of Ferric chloride solution	No brown colour precipitate formed	Absence of Tannic acid
26	**TEST FOR UNSATURATED COMPPOUND** To the 2 ml of the extract 2ml of potassium permanganate solution is added	No Colour Change	Absence of Unsaturated Compound.
27	**TEST FOR AMINO ACID** 2 Drops of the extract is placed	No violet colour	Absence of Amino Acid

	on a filter paper and dried well. After drying 1% Ninhydrine is sprayed over the same and dried well.		
28	**TEST FOR ALBUMIN** 2 ml of the extract is added with 2 ml of Esboch's reagent	No yellow precipitate	Absence of albumin
29	**TEST FOR TYPE OF COMPOUND** 2 ml of the extract is treated with 2ml of ferric chloride solution	No red colour	No Aliphatic, Antipyrine, Amino Acid and meconic acid

RESULTS

The given sample contains,

III. **ACID RADICALS** : Sulphate

IV. **BASIC RADICALS** : Nil

MISCELLANEOUS : Starch, Alkaloids.

ANTIMICROBIAL ACTIVITY OF KARPOORA SILASATHU PARPAM

The tested microorganisms

The strains of Escherichia coli, S. aureus, Klebsiella, Proteus and Candida albicans, used in this work, were provided from the Culture Stock Collection of the Department of Microbiology, Vel's college. The bacteria was maintained by weekly transfer in a chemically defined medium and Tryptic Soy Broth (TSB) and distributed in 5ml volumes in screw-capped tubes. Cells were grown at 37°C for 48h and cultures were kept at 4°C.

Method

The antibacterial action of the Karpoora Silasathu Parpam was tested on the test bacteria using the agar-gel diffusion inhibition test. In the agar-gel diffusion inhibition test, 0.2ml of a 24h broth culture (10^6cfu/ml) of the bacteria, aseptically introduced into four wells of about 4.0mm diameter, were aseptically punched on agar-plate using a sterile cork borer allowing at least 30mm between adjacent wells,between peripheral wells and the edge of the petri dish. Fixed volumes (0.1ml) of the Karpoora Silasathu Parpam in different concentration like 1.5mg, 1mg and 500micrograms of 0.1, 0.2, 0.3ml were used to seed a molten nutrient agar medium, which was cooled to 45^{o}C to obtain approximately 10^6cfu/ml. This was poured into the sterile Petridishes and used for the investigations. Candida albicans was grown on sabouraud 4 % glucose agar and suspension in 1/4 strength Ringers solution and was used to prepare the seeded Sabouraud 4 % Dextrose agar plates. A control well was loaded with 0.1ml of the solvent. The plates incubated at

37°C for 24hr for the test bacteria. The plates were duplicated in all the experiments.

Preparation of plates for susceptibility tests

The KSP stock solution was reconstituted with sterile distilled water and stock concentration of 1mg/ml or 100mg/ml was made. The KSP was tested at a concentration of 25mg/ml. 10, 20, 30µl of this concentration was delivered into wells (4mm in diameter) bored into the already seeded nutrient agar plates. Equal volume of distilled water was assayed as control. The nutrient agar plates were incubated at 37 ^{O} C for 24 hours while the sabouraud agar plates were incubated on the laboratory bench. The diameters of zones of inhibition were measured in millimeter with a ruler and recorded. This was repeated three times and average diameters were recorded. The minimum inhibitory concentrations (MICs) of the VPC for each test microorganism were regarded as the agar plate with the lowest concentrations without growth.

Results and discussion

The Karpoora Silasathu Parpam exhibited prominent anti microbial activity against Candida, Proteus and S. aureus microorganisms used in the study from the zone of inhibition produced by the Karpoora Silasathu Parpam. None of the negative control exhibited anti microbial activity Thus the solvent used for solubilisation of drug had no anti microbial activity. Thus it is confirmed that the Karpoora Silasathu Parpam exhibited anti-microbial activity against Candida, Proteus and S. aureus microorganisms in

which the effect was very high against candida and Proteus. The lowest antibacterial activity of KSP (inhibition zones ranging from 6 mm to 11 mm) was observed against the tested strains of S. aureus. There was no antibacterial activity of the Karpoora Silasathu Parpam on the E. Coli and Klebsiella test organisms used in this study.

Conclusions

Results reported here contribute to the knowledge of the antimicrobial efficacy of KSP. It has been established that the KSP affects the tested bacteria and fungi remarkably, but exerts less antimicrobial efficacy compared to some commercial preparations reported in the literature. These differences may be partly caused by the differences in the concentration of active principles. Further phytochemical and biological investigations are needed.

Table1: In vitro antimicrobial activity of 10, 20, 30µg /ml of the KSP.

Organisms	Mean diameter of zone of inhibition in mm			
	10µg/ml	20µg/ml	30µg/ml	Control
Esherichia coli.	0	0	0	0
Klebsiella pneumonia	0	0	0	0
Proteus	0	0	16	0
Candida albicans	0	0	10	0
Staphylococcus aureus	0	0	18	0

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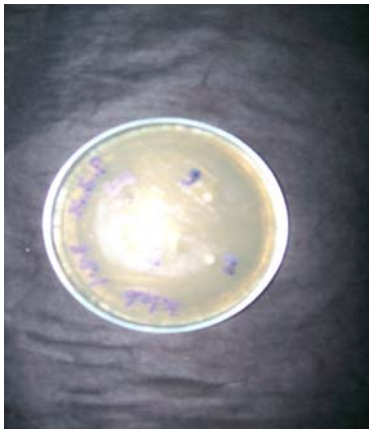

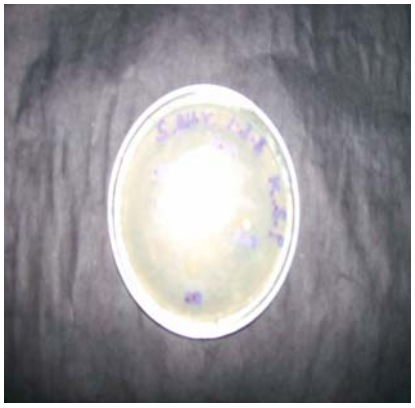

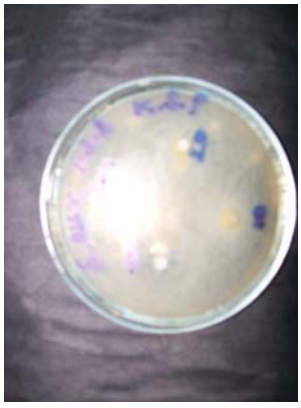

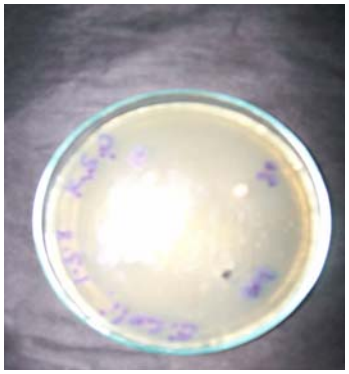

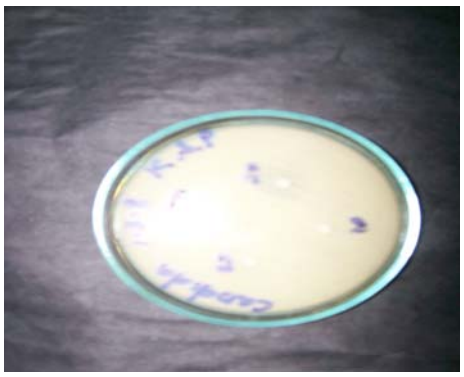

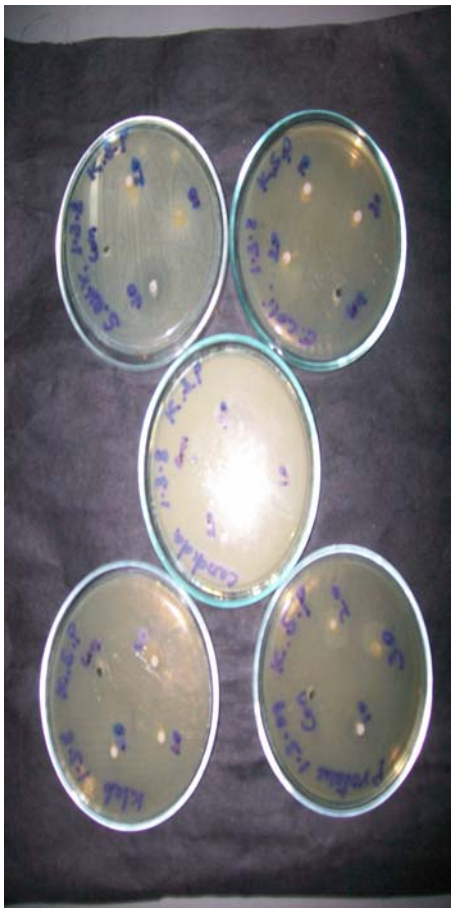

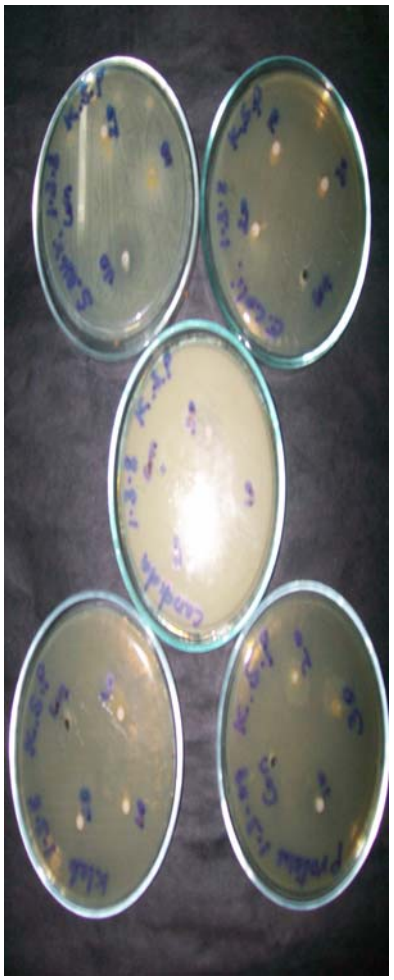

ANTIMICROBIAL ACTIVITY OF REVAL SINNI CHOORNAM -A SIDDHA DRUG

INTRODUCTION

Throughout history, medicinal plant-based remedies have been used with varying degrees of success for the management of infectious diseases and a number of compounds from plants have been shown to have potent antimicrobial properties. Thus scientific investigations in search of antimicrobial agents from plant based preparations constitute an important approach to the problem of antibiotic resistant strains. The present study was therefore designed to assess the antimicrobial property of R.S.C.. The R.S.C. has a variety of traditional uses. The drug is administered orally for the treatment of **Kaba Yoni Rogam**. In the present study, the antibacterial activity of the R.S.C. against *Escherichia coli, Klebsiella species*, *Proteus vulgaris*, *Pseudomonas*, *Candida albicans* and *Staphylococcus aureus* was carried out.

MATERIALS AND METHODS

Test organisms

The following microorganisms were used for the study. Standard strain of *Esherichia coli, Klebsiella pneumoniae, Proteus vulgaris*, *Staphylococcus aureus* and *Candida albicans.* These micro-organisms were obtained from the laboratory stock of the Department of Pharmaceutical biotechnology, Vel's college, Pallavaram. They were maintained on agar slants at 4^{o}C in the refrigerator.

Drugs and Microbiological Media

R.S.C. (1mg/ml) stock solution was used. Nutrient broth and nutrient Agar and Sabouraud Dextrose Agar.

Preparation of plates for susceptibility tests

The agar-well diffusion method, suitably modified was adopted for the susceptibility studies. Inocula of the test organisms obtained were prepared by growing each pure isolate in nutrient broth overnight 37^{o}C. The overnight broth culture was, subcultured in fresh nutrient broth and grown for 3 hours, to obtain log phase culture. This was matched with MacFarland's turbidity standard to give approximately 10^{8}cfu/ml. Aliquots of 0.1, 0.2, 0.3ml was used to seed a molten nutrient agar medium, which was cooled to 45^{o}C to obtain approximately 10^{6}cfu/ml. This was poured into the sterile Petridishes and used for the investigations. *Candadia albicans* was grown on sabouraud 4 % glucose agar and suspension in 1/4 strength Ringers solution was used to prepare the seeded Sabourand 4 % Dextrose agar plates. The *R.S.C.* stock solution was reconstituted with sterile distilled water and stock concentration of 1mg/ml or 100mg/ml was made. The *R.S.C.* was tested at a concentration of 25mg/ml. 10, 20, 30µl of this concentration was delivered into wells (4mm in diameter) bored into the already seeded nutrient agar plates.

One hundred microlitres of cell suspension from the standard inoculum were plated and 6 mm wells were drilled into the agar. 10-30 microlitres of test drug prepared using DMSO/H2O (25 % v/v) were dropped into the wells. The DMSO/H2O solution served as the negative control. The plates were incubated under microaerophilic conditions at 37 °C for 72 hours. Test drug that showed a diameter of inhibition 8 mm were considered to be active. The active drugs were further diluted serially using sterile DMSO/H2O (25 % v/v) to obtain 3 serially two-fold decreasing concentrations which were re-tested in triplicate and the results expressed as a mean diameter of inhibition zone. The Minimum Active Quantity was determined as the minimum quantity that produced an inhibition zone < 8 mm.

RESULTS

The results of the antibacterial activity of the *R.S.C.* of Standard strains of *Staphylococcus aureus, Esherichia coli, Klebsiella pneumoniae, Proteus vulgaris*, *Candida albicans Staphylococcus aureus,* The minimum inhibitory concentrations (MICs) of the *R.S.C.* against the test organisms are shown in Table 1. The *R.S.C.* showed activity against Proteus and *Staphylococcus aureus was found to be excellent. But the activity against Klebsiella and Candida* was moderate and effective at maximum dose level used in this study (Table-1). The MIC was 30µg /ml against both the clinical isolates of Klebsiella *and Candida albicans,* and 20 & 30µg/ml against S. aureus and *Proteus.* The control did not produce any inhibitory activity against the organisms. The zone of inhibition produced by 30µg /ml of the *R.S.C.* was 10mm against Proteus, 8mm against S. aureus and 6&8mm against the clinical isolates of Klebsiella and Candida respectively. The zone of inhibition produced by *R.S.C.* against Standard strains of E. Coli was much lower or negligible (3mm).

Table1: *In vitro* antimicrobial activity of 10, 20, 30µg /ml of the *R.S.C.*.

Organisms	Mean diameter of zone of inhibition			
	Control	10µg/ml	20µg/ml	30µg/ml
Esherichia coli	0	0	0	3
Klebsiella pneumonia	0	0	4	6
Proteus	0	0	7	10
Staphylococcus aureus	0	0	4	8
Candida albicans	0	0	6	8

DISCUSSION

The active principles of the *R.S.C.* elicited antibacterial activity appeared to have remarkable activity against few bacteria. This observation could possibly

justify the usefulness of the *R.S.C.* as clinical reports in siddha system of medicine. The *R.S.C.* presents narrow spectrum antibacterial activity.

CONCLUSION

The *R.S.C.* has activity against bacteria. There was no activity against E. coli. However, the activity shown against susceptible organisms, as observed in this study, would appear to justify the medicinal use in recipes for infections. Further studies required to characterization and identify the bioactive constituent responsible for the specific antimicrobial activity.

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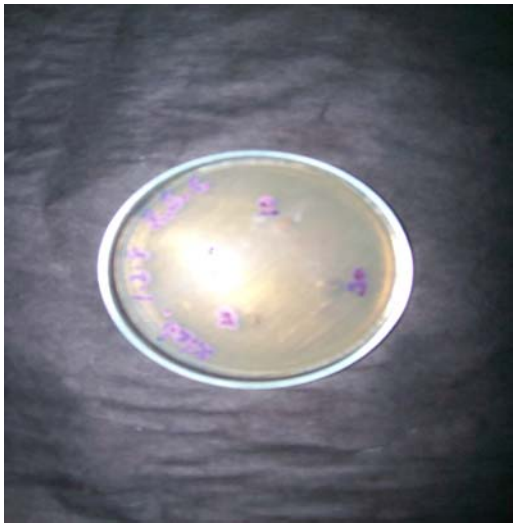
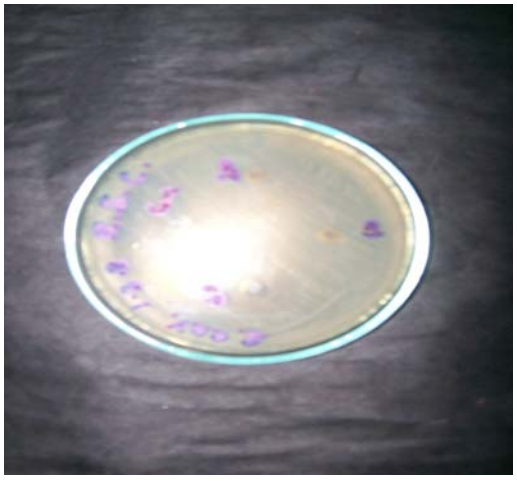
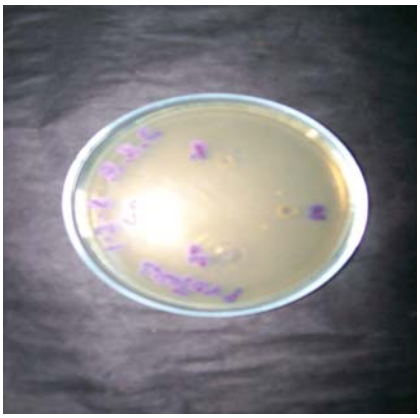
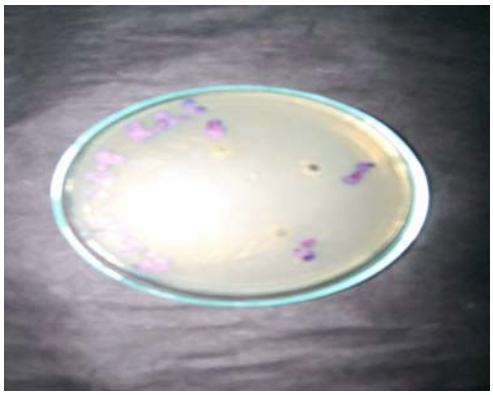
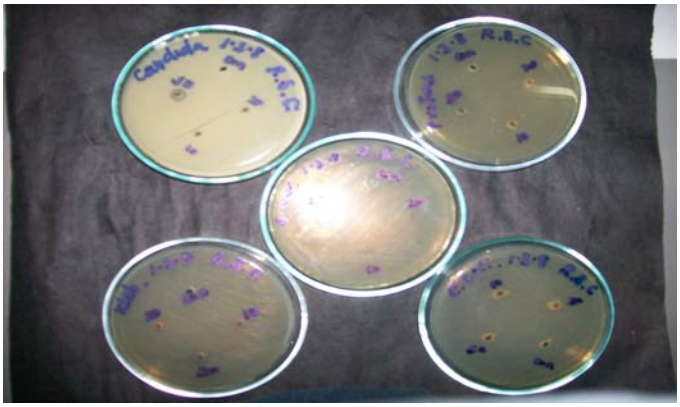
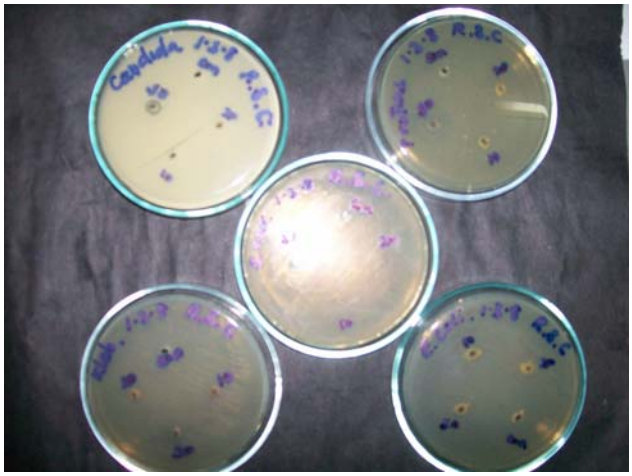












ACUTE TOXICITY STUDY OF KARPOORA SILASITHU PARPAM

Procedure:

Randomly bred adult Wistar male and female rats from animal facility were used. The rats were kept in polypropalene cages with dust free rice husk as bedding material and fed with pelleted rat feed (Sai Durga Agencies, Bangalore) and water ad libitum, The rats were fasted for 18 h before the experiment. Animals were selected at random; divided into seven groups, each group consists of 3 male and 3 female rats. seven dose ranges used were (50,100,250,500,1000,2000 and 4000mg/kg body wt). The drug was prepared in 2% carboxy methyl cellulose in distilled water as the vehicle. The suspensions were made using a mortar and pestle. The drugs were administered orally in the prescribed dose using an oral needle. Rats were monitored during these period for skin changes, mobility, aggressiveness, sensitivity to sound and pain, as well as respiratory movements and any other toxic symptoms. Finally, the number of survivors was noted after 24 h and these animals were then maintained for a further 13 days and observations made daily. The pathological observations of the various vital organs were performed after sacrificing the animals on gross. The toxicological effect was assessed on the basis of mortality.

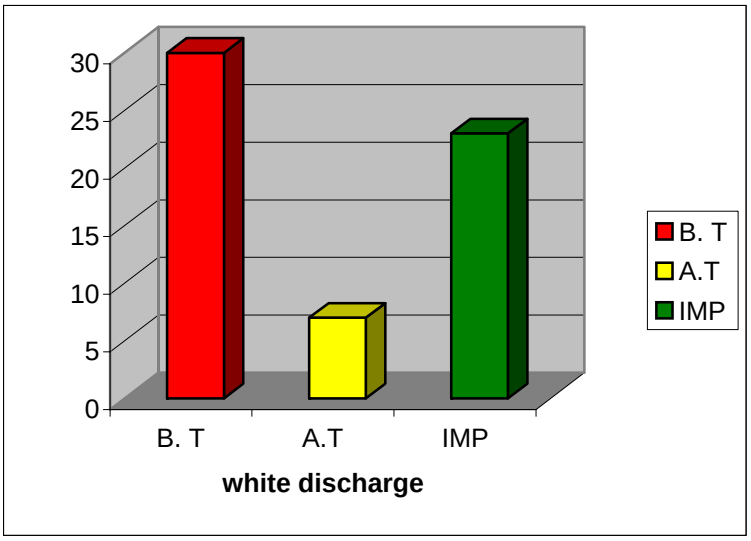
Results

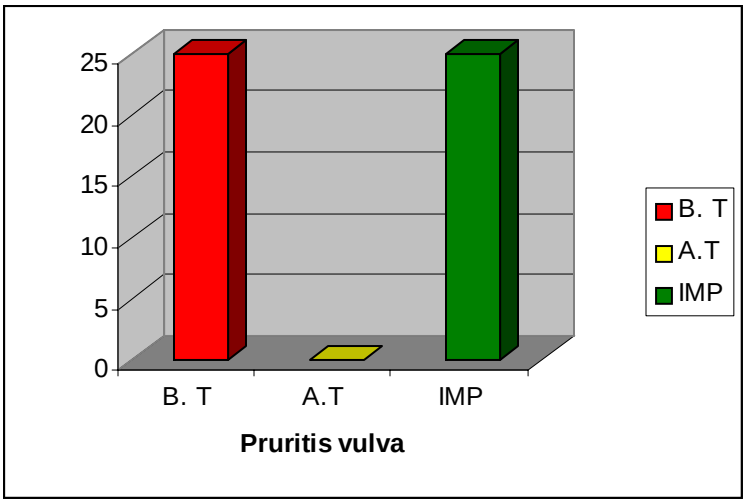
There was no mortality after treatment with upto 4gm/kg body weight. There was no other adverse reaction. The animals showed moderate changes in general behavior other physiological activities like giddiness, sniffing, aggressiveness, tachypnoea finally at the dose level of 4g/kg.The data indicates that administration of the drug Karpoora Silasithu Parpam orally at different dose levels to Wistar rats did not produce any toxic symptoms. In conclusion, due to the wide margin of safety the Karpoora Silasithu Parpam is practically nontoxic after an acute exposure to the maximum dose range of 4g/kg used in this study.

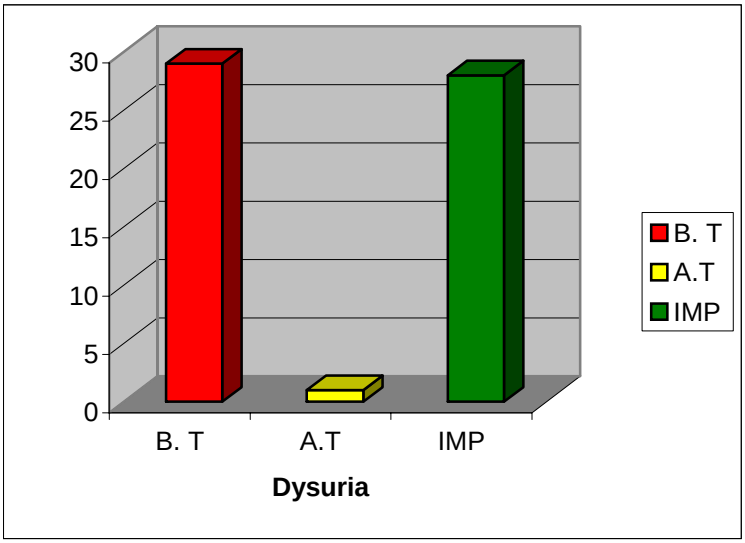
No	Treatment	Dose	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
1	I	50	+	-	-	-	-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2	II	100	+	-	-	-	-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-
3	III	250	+	-	-	-	-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-
4	IV	500	+	-	-	-	-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-
5	V	1000	+	-	-	-	-	+	-	-	-	-	-	-	-	-	-	-	-	-	-	-
6	VI	2000	+	-	+	-	-	+	+	-	-	+	-	+	-	-	-	+	-	-	+	-
7	VII	4000	+	-	+	-	-	+	+	-	-	+	-	+	+	+	-	+	-	-	+	-

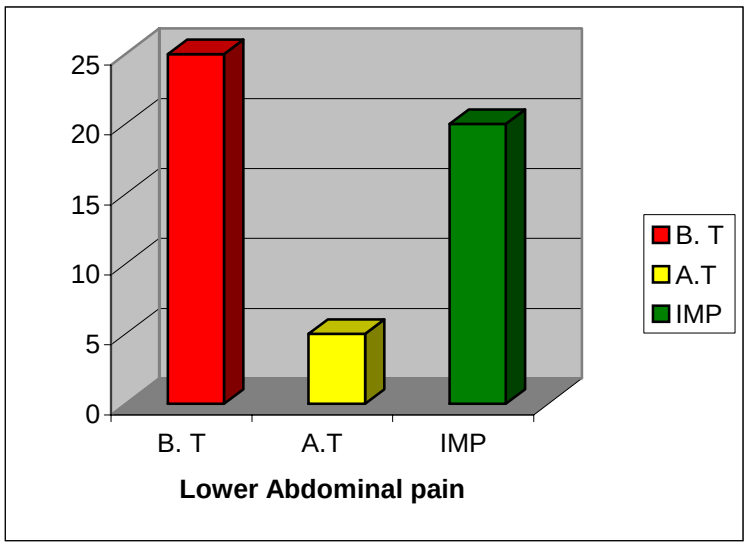
1. Alertness 2. Aggressiveness 3. Pile erection 4. Grooming 5. Gripping 6. Touch Response 7. Increased Motor Activity 8. Tremors 9. Convulsions 10. Muscle Spasm 11. Catatonia 12. Muscle relaxant 13. Hypnosis 14. Analgesia 15.Lacrimation 16. Exophthalmos 17. Diarrhoea 18. Writhing 19. Respiration 20. Number of Deaths (Mortality)

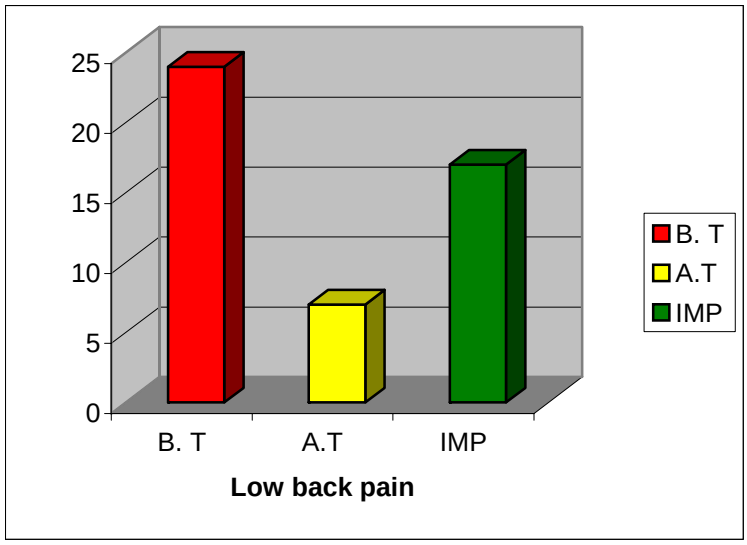
BIOSTATISTICAL ANALYSIS

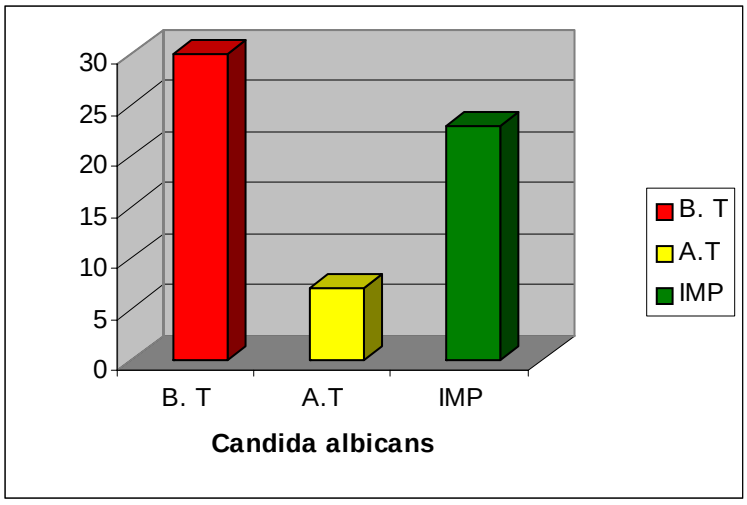


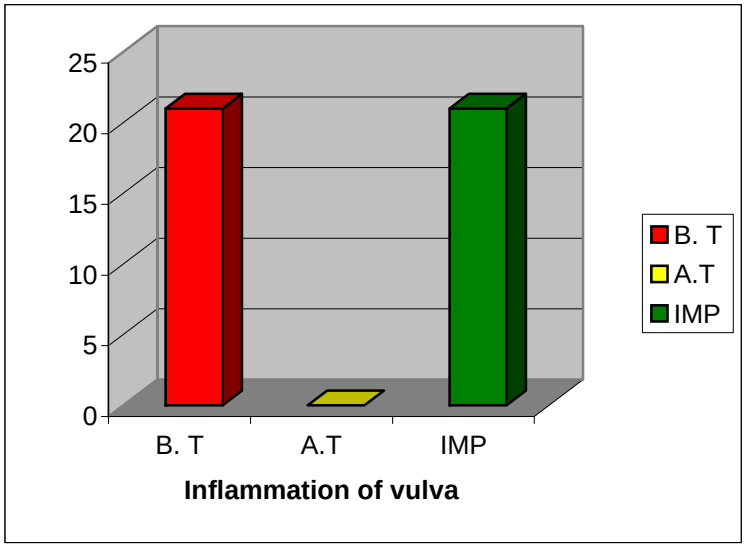


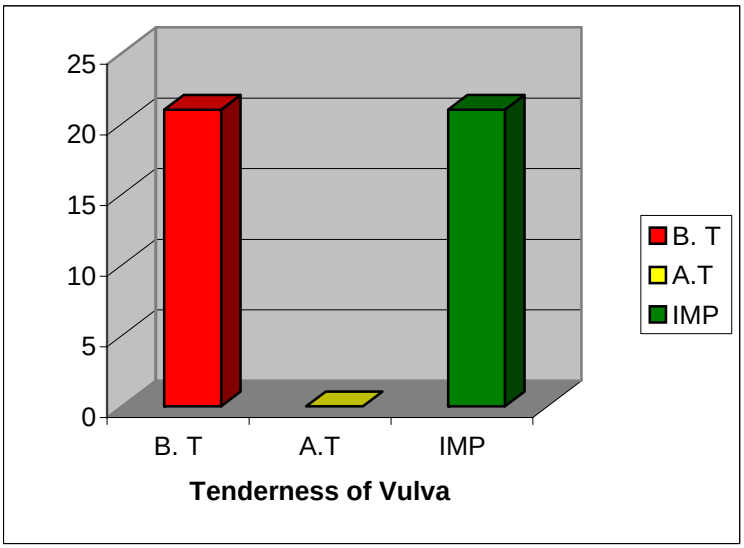


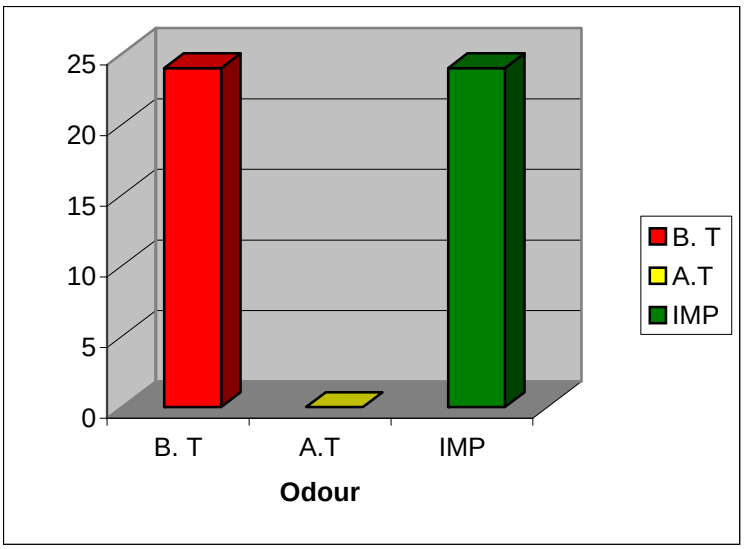

25
20
15
10
5
0
B. T
A.T
IMP
B. T
A.T
IMP
Lower Abdominal pain


25
20
15
10
5
0
B. T
A.T
IMP
B. T
A.T
IMP
Low back pain


30
25
20
15
10
5
0
B. T
A.T
IMP
B. T
A.T
IMP
Candida albicans


25
20
15
10
5
0
B. T
A.T
IMP
B. T
A.T
IMP
Inflammation of vulva


25
20
15
10
5
0
B. T
A.T
IMP
B. T
A.T
IMP
Tenderness of Vulva


25
20
15
10
5
0
B. T
A.T
IMP
B. T
A.T
IMP
Odour

A PILOT OPEN CLINICAL TRIAL OF SIDDHA DRUGS
REVAL SINNI CHOORNAM* AND *KARPOORA SILASATHU PARPAM
FOR THE TREATMENT OF *KABA YONI ROGAM*(VAGINAL CANDIDIASIS)

CONSENT FORM

CERTIFICATE BY INVESTIGATOR

I certify that I have disclosed all details about the study in the terms readily understood by the patient.

Date: _____ Signature: _____

Station: _____ Name: _____

CONSENT BY PATIENT

I have been informed to my satisfaction, by the attending physician, the purpose of the clinical trial, and the nature of the drug treatment and follow-up including the laboratory investigations to be performed to monitor and safeguard my body functions.

I, exercising my free power of choice, hereby give my consent to be included as a subject in the clinical trial of *Reval sinni choornam* and *Karpoora silasathu parpam* on *Kaba yoni rogam* (vaginal candidiasis)

Date: _____
Signature: _____

Station: _____ Name: _____

Signature of witness: _____

Date: _____ Name: _____

Station: _____ Relationship: _____

A PILOT OPEN CLINICAL TRIAL OF SIDDHA DRUGS
REVAL SINNI CHOORNAM* AND *KARPOORA SILASATHU PARPAM

FOR THE TREATMENT OF *KABA YONI ROGAM*(VAGINAL CANDIDIASIS)

FORM-I SELECTION PROFORMA

1. O.P.No / I.P No: _____ 2. Bed No: _____ 3. S.No: _____

4. Name: _____ 5. Age (years): ☐☐ 6. Nationality: _____

7. Religion: _____8. Occupation: _____ 9.Income: _____

10. Address: _____

_____

11. Complaints and duration: _____

_____

_____

12. History of present illness: _____

_____

13. Past history: _____

_____

14. Family history: _____

_____

15. Menstrual & Obstetric history: _____

_____

_____

Habits	Yes (1)	No (2)
16. Betalnut chewer	☐	☐
17. Tea	☐	☐
	☐	☐

18. Coffee

19. Milk ☐ ☐

20. Non-vegetarian ☐ ☐

GENERAL EXAMINATION

21. Built: Normosthenic ☐ Hypersthenic ☐ Hyposthenic ☐

22. Nutrition: Normal ☐ Overweight ☐ Underweight ☐

23. Weight (kg) ☐☐☐

24. Temperature (°F) ☐☐☐ . ☐

25. Pulse rate / minute ☐☐☐

26. Heart rate / minute ☐☐☐

27. Respiratory rate / minute ☐☐☐

28. Blood pressure (mmHg) ☐☐☐ ☐☐☐

	1. Yes	2. No
29. Pallor	☐	☐
30. Jaundice	☐	☐
31. Cyanosis	☐	☐
32. Lymphadenopathy	☐	☐
33. Pedal oedema	☐	☐
34. Clubbing	☐	☐
35. Jugular vein pulsation	☐	☐

VITAL ORGANS EXAMINATION

	1. Normal	2. Affected	
36. Heart	☐	☐	_____
37. Lungs	☐	☐	_____
38. Brain	☐	☐	_____
39. Liver	☐	☐	_____
40. Kidney	☐	☐	_____
41. Spleen	☐	☐	_____
42. Stomach	☐	☐	_____

CLINICAL EXAMINATION

SIGNS AND SYMPTOMS

	1. Yes	2.No
43. White discharge	☐	☐
44. Pruritis vulva	☐	☐
45. Dysuria	☐	☐
46. Lower abdominal pain	☐	☐
47. Low back pain	☐	☐

PER VAGINA

VAGINAL DISCHARGE

48. Colour 1. White ☐ 2. Green ☐ 3. Yellow ☐ 4.Blood stained ☐

49. Consistency 1. Thin ☐ 2. Thick ☐ 3. Cheesy ☐

50. Amount 1. Mild ☐ 2. Moderate ☐ 3. Profuse ☐

	1. Yes	2.No

51. Odour ☐ ☐

52. Inflammation of vulva ☐ ☐

53. Tenderness ☐ ☐

SIDDHA SYSTEM OF EXAMINATON

IYMPORI

	1. Normal	2. Affected
54. Mei	☐	☐ _____
55. Vaai	☐	☐ _____
56. Kan	☐	☐ _____
57. Mookku	☐	☐ _____
58. Sevi	☐	☐ _____

KANMENTHIRIUM

59. Kai	☐	☐ _____
60. Kaal	☐	☐ _____
61. Vaai	☐	☐ _____
62. Eruvai	☐	☐ _____
63. Karuvaai	☐	☐ _____

PARUVA KAALAM

64. Kaar kaalam ☐ 65.Koothir kaalam ☐

66. Elavenil kaalam ☐ 67. Muthuvenil kaalam ☐

68. Munpani kaalam ☐ 69. Pinpani kaalam ☐

THINAI

70. Kurunji ☐ 71. Mullai ☐ 72. Marutham ☐

☐ ☐

73. Neithal 74. Paalai

YAKKAI

75. Vali ☐ 76. Azhal ☐ 77. Iyam ☐

78. Valiazhal ☐ 79. Valiaiyam ☐ 80. Azhalvali ☐

81. Azhaliyam ☐ 82. Iyavali ☐ 83. Iyaazhal ☐

GUNAM

84. Sathuva gunam ☐ 85. Rajo gunam ☐

86. Tamo gunam ☐

UYIR THATHUKKAL

VALI

	1. Normal	2. Affected
87. Pranan	☐	☐ _____
88. Abanan	☐	☐ _____
89. Samanan	☐	☐ _____
90. Udhanan	☐	☐ _____
91. Viyanan	☐	☐ _____
92. Nagan	☐	☐ _____
93. Koorman	☐	☐ _____
94. Kirukaran	☐	☐ _____
95. Devathathan	☐	☐ _____
96. Tananjeyan	☐	☐ _____

AZHAL

	1. Normal	2. Affected
97. Anala pittham	☐	☐ _____
98. Prasaka pittham	☐	☐ _____
99. Ranjaka pittham	☐	☐ _____
100. Aalosaka pittham	☐	☐ _____
101. Saathaka pittham	☐	☐ _____

IYAM

	1. Normal	2. Affected
102. Avalambagam	☐	☐ _____
103. Kilethagam	☐	☐ _____
104. Pothagam	☐	☐ _____
105. Tharpagam	☐	☐ _____
107. Santhigam	☐	☐ _____

UDAL THATHUKKAL

	1. Normal	2. Affected
108. Saaram	☐	☐ _____
109. Chenneer	☐	☐ _____
110. Oon	☐	☐ _____
111. Kozhuppu	☐	☐ _____
112. Enbu	☐	☐ _____
113. Moolai	☐	☐ _____
114. Suronitham	☐	☐ _____

ENVAGAI THERVUKAL

	1. Normal	2. Affected	
115. Naa	☐	☐	_____
116. Niram	☐	☐	_____
117. Mozhi	☐	☐	_____
118. Vizhi	☐	☐	_____

Malam	1. Normal	2. Affected	
119. Niram	☐	☐	_____
120. Thanmai	☐	☐	_____

Moothiram
Neerkuri

121. Niram	☐	☐	_____
122. Eadai	☐	☐	_____
123. Manam	☐	☐	_____
124. Nurai	☐	☐	_____
125. Enjal	☐	☐	_____

Neikuri: 126.Vali ☐ 127. Azhal ☐ 128. Iyam ☐

Naadi: 129. Vali ☐ 130. Azhal ☐ 131. Iyam ☐

132. Valiazhal ☐ 133. Valiiyam ☐ 134. Azhalvali ☐

135. Azhaliyam ☐ 136. Iyavali ☐ 137. Iyaazhal ☐

Sparisam: 138. Mithaveppam ☐ 139. Miguveppam ☐

140. Thatpam ☐

INVESTIGATION
BLOOD

☐☐☐☐

141. TC (cells /cumm):

142. DC (%): 1. P ☐☐ 2. L ☐☐ 3. E ☐☐ 4. B ☐☐

5. M ☐

143. Hb (gms %): ☐☐.☐

144. ESR (mm/hr): a. 1/2hr ☐☐ b. 1hr ☐☐

145. Blood Sugar (mg %): a.Fasting: ☐☐☐ b. PP: ☐☐☐

146. Blood Urea (mg %): ☐☐

147. Serum Creatinine (mg %): ☐.☐

148. Serum Cholesterol (mg %): ☐☐☐

149. VDRL 1. Positive ☐ 2. Negative ☐

URINE

150. Albumin: 0. Nil ☐ 1. Trace ☐ 2. + ☐ 3. ++ ☐

4. +++ ☐

151. Sugar: 0. Nil ☐ 1. Trace ☐ 2. + ☐ 3. ++ ☐

4. +++ ☐

152. Deposit	1. Yes	2. No
1. Pus cells	☐	☐
2. Epithelial cells	☐	☐
3.. RBC	☐	☐
4.. Crystals	☐	☐

MOTION

	1. Yes	2.No
153. Ova	☐	☐

154. Cyst ☐ ☐

155. Occult blood ☐ ☐

VAGINAL SWAB

_____

_____

VAGINAL PH_____

156. ADMITTED TO TRIAL: 1.Yes ☐ 2. No ☐

If yes

157. S. No: ☐☐

158. I.P / O.P 1. I.P ☐ 2. O.P ☐

159. Drug issued for OP patient (g): ☐☐

Station Signature of Investigator

Date Signature of Medical Officer

A PILOT OPEN CLINICAL TRIAL OF SIDDHA DRUGS
REVAL SINNI CHOORNAM* AND *KARPOORA SILASATHU PARPAM

FOR THE TREATMENT OF *KABA YONI ROGAM*(VAGINAL CANDIDIASIS)

FORM II-ASSESSMENT PROFORMA

1. OP/IP No:_____ 2.BED No:_____3.S.No:_____

4. NAME:_____

5. DATE OF ADMISSION: | | | | | | |

6. DATE OF ASSESSMENT: | | | | | | |

7. DAY OF ASSESSMENT: | | |

CLINICAL EXAMINATION

SIGNS AND SYMPTOMS

	1. Yes	2.No
8. White discharge	☐	☐
9. Pruritis vulva	☐	☐
10. Dysuria	☐	☐
11. Lower abdominal pain	☐	☐
12. Low back pain	☐	☐

PER VAGINA

VAGINAL DISCHARGE

13. Colour 1. White ☐ 2. Green ☐ . Yellow ☐

14. Consistency 1. Thin ☐ 2. Thick ☐ . Cheesy ☐

15. Amount 1. Mild ☐ 2. Moderate ☐ . Profuse ☐

	1. Yes	2.No
16. Odour	☐	☐
17. Inflammation of vulva	☐	☐
18. Tenderness	☐	☐

ENVAGAI THERVUKAL

	1. Normal	2. Affected	
19. Naa	☐	☐	_____
20. Niram	☐	☐	_____
21. Mozhi	☐	☐	_____
22. Vizhi	☐	☐	_____

Malam 1. Normal 2. Affected

23. Niram	☐	☐	_____
24. Thanmai	☐	☐	_____

Moothiram

Neerkuri

25. Niram	☐	☐	_____
26. Eadai	☐	☐	_____
27. Manam	☐	☐	_____
28. Nurai	☐	☐	_____
29. Enjal	☐	☐	_____

Neikuri: 30.Vali ☐ 31. Azhal ☐ 32. Iyam ☐

Naadi: 33. Vali ☐ 34. Azhal ☐ 35. Iyam ☐

36. Valiazhal ☐ 37. Valiiyam ☐ 38. Azhalvali ☐

39. Azhaliyam ☐ 40. Iyavali ☐ 41. Iyaazhal ☐

Sparisam: 42. Mithaveppam ☐ 43. Miguveppam ☐

44. Thatpam ☐

INVESTIGATION (ONLY ON THE DAY 24)

BLOOD

45. TC (cells /cumm): ☐☐☐☐

46. DC (%): 1. P ☐☐ 2. L ☐☐ 3. E ☐☐ 4. B ☐☐

5. M ☐

47. Hb (gms %): ☐☐.☐

48. ESR (mm/hr): a. 1/2hr ☐☐ b.1hr ☐☐

49. Blood Sugar (mg %): a.Fasting: ☐☐☐ b.PP ☐☐☐

50. Blood Urea (mg %): ☐☐

51. Serum Creatinine (mg %): ☐ ☐

52. Serum Cholesterol (mg %): ☐☐☐

53. VDRL 1. Positive ☐ 2. Negative ☐

URINE

54. Albumin: 0. Nil ☐ 1. Trace ☐ 2. + ☐ 3. + + ☐

4. + + + ☐

55. Sugar: 0. Nil ☐ 1. Trace ☐ 2. + ☐ 3. + + ☐

4. + + + ☐

56. Deposit	1. Yes	2. No
1. Pus cells	☐	☐
2. Epithelial cells	☐	☐
3.. RBC	☐	☐
4.. Crystals	☐	☐

MOTION

	1. Yes	2.No
57. Ova	☐	☐
58. Cyst	☐	☐
59. Occult blood	☐	☐

VAGINAL SWAB

_____

_____

VAGINAL PH _____

60. RESULT: Cured ☐ Improved ☐ No change ☐

FOR O.P.PATIENTS:

61**. Drugs returned:**

1. No of packs:……..

62. Date: Signature of investigator

63. Station: Signature of Doctor