

# A STUDY OF ANTI-PYRETIC ACTIVITY IN SHENBAGA POO KULIGAI SIDDHA DRUG

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**Abstract:** Siddha system of medicine, the pediatric illness are classified into Agakkarana Noigal, Purakkarana Noigal. Mantham is one of the Agakkarana Noi which is classified into mainly 21 types. Suzhi Mantham is one of the types of Mantham. Suzhi mantham which is probably correlates with Acute Respiratory Disease (Naso pharyngitis, Wheeze Associated Lower respiratory infection) with the symptoms of Fever, Cough, Runny nose, Sore throat, Body aches, Irritability in children. The Siddha trial drug shenbaga poo kuligai (SPK) are chosen on the basis of classical attributes of respective ingredients according to the specific action which may correct the vitiated humors in Suzhi Mantham. In this study anti pyretic action in Shenbaga Poo Kuligai (SPK) Siddha drug. Fever, also referred to as pyrexia, is defined as having a temperature above the normal range due to an increase in the body's temperature set point. In Siddha system of medicine there 64 types of fever given. Fever is one of the most common medical signs. There is not a single agreed-upon upper limit for normal temperature with sources using values between 37.2 and 38.3 °C (99.0 and 100.9 °F) in humans. It is part of about 30% of healthcare visits by children, and occurs in up to 75% of adults who are seriously sick. About 5% of people who go to an emergency room have a fever. First selected 6 albino rats and divided into 3 groups. All the rats were made up of hyperthermia by subcutaneous injection of 12% suspension of yeast at the dose of 1ml/100mg body weight. Group 1 received only 2 ml of distilled water. Second group have received standard drug 20mg/ml. And finally the third group have received the SPK 250mg/ml by gastric tube. After drug administration and waiting for 4 ½ hours the different between the mean temperature of the control group and that of the other group was measured.

**Key words:** Siddha, Shenbaga Poo Kuligai, Suzhi mantham, Anti pyretic

**Aim:** To study the anti pyretic activity of Shenbaga Poo Kuligai (SPK).

**Study centre:** Department of pharmacology, K M College of Pharmacy, Madurai.

## Ingredients of the trial drug:

Shenbaga Poo Kuligai (SPK)

S. No	Botanical Name /English Name	Tamil Name
1.	Michelia champaca	Shenbagam
2.	Saussurea lappa	Kostam
3.	Plectranthus amboinicus	Vilamichaiver
4.	Elettaria cardamomum	Ealam
5.	fel bovinum purifacum	Korosanaï
6.	Ferruginous shale	Sathra bedi
7.	Glycyrrhiza glabra	Adhimadhuram
8.	Vetiveria zizanioides	Vetiver
9.	Artemisia nilagirica	Masipachiai

## Procedure:

A Group of six albino Wistar rats (150-200 g) were selected and divided equally into 3 groups, and of either sex were selected and kept for one week to acclimatize to laboratory conditions before starting the experiment. They were subjected to standard diet and water ad libitum, but 12 h prior to an experiment, the rats were deprived of food but not water. The study was approved by the Institutional Animal Ethics Committee (IAEC). All the rats were made hyperthermia by subcutaneous injection of 12% suspension of yeast at a does of 1ml/100gm body weight. 10 hours later one group of animals received only distilled water at a does of 2 ml. Second group received standard drug paracetamol 20mg/ml and the third group received the test drug by gastric tube at a does of 250 mg/ml. Then mean rectal temperature for the 3 groups were recorded at 0 hour. 1 ½ hours, 3 hours and 4 ½ hours after the drug administration. The different between the mean temperature of the control group and that of the other group was measured.

**TABULATION OF RESULTS OBTAINED:**

Sl.No	Name of the drugs / groups	Dose / 100gm of body weight	Initial temperature in centigrade	After drug administration			Remarks
				1½ hr Average	3 hr Average	4½ hr Average	
1.	Water	1 ml	36 <sup>0</sup> C 37.0	36.0 37.0	36.0 38.0	37.0 39.0	
2.	Paracetoma l	20mg / 1 ml	37.0 <sup>0</sup> C 38.0	37.0 37.0	36.5 36.5	35.0 34.0	
3.	Trial Drug	250 mg / 1 ml	37.0 <sup>0</sup> C 37.0	37.0 37.0	37.0 36.5	36.5 36.5	Significant

The results of the antipyretic effect of the test drug SPK, standard (paracetamol 20 mg/1ml) and control are presented in Table 2. The paracetamol as well as extracts at dose of 20 mg/ml started showing effective antipyretic activity after 1½ hr of post dosing, SPK 250mg/1ml reduced temperature after 4½ hr, when compared with control. Antipyretic activity was observed up to 4½ hr. Thus Shenbaga Poo Kuligai has significant antipyretic action.

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