

# Homoeopathic drug proving of *Mangolia grandiflora*: A randomised double blind placebo-controlled trial

Goutam Rakshit<sup>1</sup>, A. K. Vichitra<sup>2</sup>, Rajpal Singh<sup>1</sup>, Amulya Ratna Sahoo<sup>3</sup>, Sujata Kumari Choudhury<sup>4\*</sup>, Vinay Kumar Singh<sup>1</sup>

<sup>1</sup>Central Council for Research in Homoeopathy, New Delhi, <sup>2</sup>Dr. D. P. Rastogi Central Research Institute (H), Noida, Uttar Pradesh, <sup>3</sup>Drug Proving Unit, Extension unit of Regional Research Institute (H), Puri at Dr. A. C. Homoeopathic Medical College and Hospital, Bhubaneswar, <sup>4</sup>Regional Research Institute of Homoeopathy, Puri, Odisha, India

## Abstract

**Objective:** This study was carried out to elicit the pathogenetic response of the drug *Mangolia grandiflora* in homoeopathic potencies on apparently healthy human beings. **Materials and Methods:** Drug *Mangolia grandiflora* was proved by the Central Council for Research in Homoeopathy (CCRH) through a double-blind placebo-controlled method. The study was conducted at three centres. The drug was proved in two potencies (6C and 30C) on 48 apparently healthy volunteers who were selected after conducting pre-trial medical examinations by the medical specialists and routine laboratory investigations. In the first phase, volunteers were given 56 doses (4 doses per day for 14 days) of placebo. In the next two phases, 56 doses (4 doses per day for 14 days) of each potency or placebo were consumed. Out of 48 provers, 32 were given the actual drug and 16 were given placebo. The symptoms generated during the trial period were noted by the volunteers and elaborated by the proving masters. The data obtained from all the three centres were compiled at the Proving-Cum-Data Processing Cell at CCRH headquarters after decoding. **Results:** Out of the 32 provers who were on the actual drug trial, 21 manifested symptoms. The drug was able to produce symptoms in each potency in most of the parts of the body. **Conclusion:** New and proved pathogenetic responses elicited during the proving trial expand the scope of use of the drug *Mangolia grandiflora* and will benefit the research scholars and clinicians. These symptoms will carry more value when verified clinically.

**Keywords:** Drug proving, homoeopathic pathogenetic trial, Homoeopathy, *Mangolia grandiflora*, pathogenetic effect

## INTRODUCTION

*Mangolia grandiflora* is a tree widely distributed throughout the mid-Atlantic and southeastern United States. This species has been the object of exhaustive phytochemical research because of its long history of folk-medicinal usage and has yielded a variety of natural products, including alkaloids, terpenoids, lignin glycosides and biphenyls. Some of these compounds show activity/toxicity in various animal-based bioassays. However, despite the common observation that virtually no plant will grow beneath a magnolia tree, suggesting an allelopathic effect, none of the isolates appears to have been tested for phytotoxic properties.<sup>[1]</sup>

In a study, the therapeutic potential of magnolia extract (BL153) was explored for treating obesity-associated kidney damage in a high fat-diet (HFD)-induced mouse model. The results showed that inflammatory markers (tumour necrosis factor- $\alpha$  and plasminogen activator inhibitor-1) and oxidative stress

markers (3-nitrotyrosine and 4-hydroxy-2-nonenal) were all significantly increased in the kidney of HFD-fed mice compared to mice fed with a low-fat diet (LFD). Additionally, proteinuria and renal structure changes in HFD-fed mice were much more severe than those in LFD-fed mice.<sup>[2]</sup>

Another study was conducted to investigate the antimelanogenic and antioxidant properties of *Mangolia grandiflora* L. flower extract. In that study *Mangolia grandiflora* flower extract showed antioxidant properties and potential dermatological effects against melanin production in B16F10 melanoma cells. This was the first report about the effect of *Mangolia*

**\*Address for correspondence:** Dr. Sujata Kumari Choudhury, Regional Research Institute of Homoeopathy, Puri - 752 001, Odisha, India. E-mail: [drsujatamd@gmail.com](mailto:drsujatamd@gmail.com)

**Received:** 27.06.2018; **Accepted:** 28.02.2019

This is an open access journal, and articles are distributed under the terms of the Creative Commons Attribution-NonCommercial-ShareAlike 4.0 License, which allows others to remix, tweak, and build upon the work non-commercially, as long as appropriate credit is given and the new creations are licensed under the identical terms.

**For reprints contact:** [reprints@medknow.com](mailto:reprints@medknow.com)

**How to cite this article:** Rakshit G, Vichitra AK, Singh R, Sahoo AR, Choudhury SK, Singh VK. Homoeopathic drug proving of *Mangolia grandiflora*: A randomised double blind placebo-controlled trial. Indian J Res Homoeopathy 2019;13:22-36.

### Access this article online

Quick Response Code:



Website:  
[www.ijrh.org](http://www.ijrh.org)

DOI:  
10.4103/ijrh.ijrh\_42\_18

*grandiflora* L. flower extract on melanin production. It was found that *Magnolia grandiflora* L. flower extract inhibited melanin synthesis significantly in a dose-dependent pattern. Besides, *Magnolia grandiflora* L. flower extract also expressed antioxidant activities.<sup>[3]</sup>

A study<sup>[4]</sup> on ‘Apoptosis induced by *Magnolia Grandiflora* extract in chlorambucil-resistant B-chronic lymphocytic leukemia tested the ability of *M. grandiflora* extracts to induce the apoptosis of B-chronic lymphocytic leukaemia (B-CLL) cells *in vitro*, and results showed the apoptotic properties of *Magnolia* on B-CLL cells. The evidence suggested a potentially effective repertoire for B-CLL treatment. This herb extract might have promising therapeutic strategies in treating B-CLL or other haematological diseases resistant to alkylating agents in clinical practice.

Another study<sup>[5]</sup> depicted the presence of different phytoconstituents such as alkaloids, carbohydrates, flavonoids, glycosides, gums and mucilage, phenolics, phlobatannins, reducing sugars, saponins, steroids, tannins and terpenoids in leaves and seeds. These chemical compounds are likely to be responsible for medicinal significance of this plant.

Anti-tumor activity<sup>[6]</sup> of 50% ethanol bark extract of *Magnolia grandiflora* Linn. was evaluated against tumours induced in mice using dimethyl benzanthracene and 3-methyl cholanthrene. The activity was assessed using the ability of the plant extract in reducing tumour weight, tumour volume and lung weight. The cytotoxic/cytostatic activity of the plant extract on human cancer cell line Bu25Tk<sup>-</sup> cells was also evaluated using 3-(3,5-dimethylthiazol-2-yl)-2,5-diphenyl tetrazolium bromide assay.

Keeping in view the above therapeutic activities of the *Magnolia grandiflora*, an effort had been taken to explore the homoeopathic pathogenicity of the potentised drug extract on healthy human volunteers.

### Description

- Botanical name: *Magnolia grandiflora*
- Family: Magnoliaceae
- Common name: Magnolia, Southern magnolia
- Hindi: Him Champa.

*Magnolia grandiflora* was described by Carl Linnaeus. The genus *Magnolia* was named by Carl Linnaeus in honour of Pierre Magnol, who was the physician of King Louis XIV of France and was the director of a botanical garden at Montpellier.<sup>[7]</sup> *Magnolia grandiflora* is relatively common and is native to North America. It occurs from North Carolina to Florida and Texas. Although its native range is along the coastal plain, it can be seen as an ornamental tree throughout much of the Southeast, inland as far as the foothills of the Appalachian Mountains. *Magnolia grandiflora* is evergreen, so it drops foliage throughout the year, leaving piles of leathery leaf litter underneath its branches, stunting the growth of other plants and trees. Its trunk is typically straight and erect with spreading branches that form a dense, broadly pyramidal

crown. It has large, thick, leathery dark green leaves which are up to 10” long. In the spring, they have a golden-to-rust colour on their undersides. The large evergreen trees may grow up to 90 feet tall, and the fragrant white blossoms that have smooth, almost velvet-looking petals are 8–12” across. The snow-white flowers are huge and cup shaped when young. The fruits are of reddish-brown cone-like structures, 2–4 in long, with bright red kidney-shaped seeds that hang from little threads when fully mature in the autumn<sup>[7]</sup> [Figure 1]. In the USA, the magnolia is used as a street tree, a free-standing specimen, a framing tree or a shade tree. In most parts of India, magnolias are grown only in select well-maintained gardens. In Manipur, magnolias are commonly grown with the Manipuri name ‘Ootahmbal’ meaning ‘tree lotus’ – flowers are used as offering to God.<sup>[7]</sup>

- Parts used in Homoeopathy: Extracts of flower
- Potencies used: 6C and 30C.

The objective of this study was to explore the pathogenetic effects of the drug *Magnolia grandiflora* on apparently healthy human volunteers in homoeopathic potencies.

## MATERIALS AND METHODS

### Study design

The study was a randomised double-blind placebo-controlled trial. The study was conducted according to the Drug Proving Protocol designed by the Central Council for Research in Homoeopathy (CCRH), New Delhi.

### Participants and settings

The proving was conducted at the following three centres: Drug Proving Unit, Bhubaneswar; Central Research Institute, Kottayam; and Central Research Institute, Noida, during the year 2010–2011. A total of 48 apparently healthy volunteers from the above mentioned three centres, between the age group of 18 and 45 years, comprising 14 males and 34 females, were enrolled in the study. Before commencing the study, all the provers were screened strictly by the experts and apparently healthy provers between the abovementioned age range.

### Inclusion criteria

- Age: Above 18 years of age
- Sex: Both male and female volunteers
- Health status: Experts’ acceptance for certifying that participant is healthy
- Participants must be 2 months free of any homoeopathic remedy with no significant change in the last 3 weeks
- Intelligent enough to record carefully the facts and subjective and objective symptoms generated by the drug during proving.

### Exclusion criteria

- Volunteers suffering from any acute or chronic disease
- Volunteers under any kind of medical treatment
- Hysterical or anxious persons (such individuals display a high incidence of ‘Placebo’ effects)
- Persons having a history of allergies, food hypersensitivity, etc



**Figure 1:** *Magnolia grandiflora* (a) Tree, (b) Bud, (c) Flower, (d) Fruit, (e) Flowering top, (f) Mature fruit just starting to open, (g) mature fruit with seeds opened, (h) seeds

- Women during pregnancy, puerperium and breastfeeding
- Persons with colour blindness
- Persons having addictions to brandy, wine, alcohol, narcotics and tobacco
- Persons who have undergone surgery in the last 2 months
- Hysterical persons, individuals prone to hypersensitivity reactions (such as asthma and allergies), anxiety prone, emotionally disturbed, colour blind, suffering from any chronic disease and pregnant, puerperal and lactating females
- Those with previous homoeopathic treatment in the last 2 months
- Participation in another clinical or proving trial during the last 6 months.

A 'written informed consent' from each volunteer was obtained before the beginning of the trial. Pre-trial Medical Examinations and Terminal Medical Examinations (TMEs) of the volunteers were carried out by general physicians, psychiatrists, cardiologists, ophthalmologists, ENT specialists, dermatologists, gynaecologists and radiologists, and their routine laboratory investigations at the centres were done to ascertain their health status. After the recommendation of experts, healthy volunteers were enrolled in this homoeopathic pathogenetic trial programme.

The study was conducted according to the CCRH Drug Proving Protocol; the sample size included 30% of volunteers under control group at each centre. According to that, out of the 48 volunteers, 32 were kept on the actual drug (verum) and 16 were on placebo (control) in all the three phases. All the volunteers were assigned code numbers, and the coded drugs

of different potencies (including placebo) were supplied in separate glass phials bearing code numbers of the respective volunteers, keeping both provers and proving masters blind about what provers were consuming (drug or placebo).

### Intervention

*Magnolia grandiflora* was procured in 6C and 30C potencies from M/s. Dr Willmar Schwabe India Pvt., Ltd., Noida, in 100-mL sealed phials of each dilution. Globules (number 30) were medicated with these attenuations at the Council's headquarter office and sent to drug-proving research units. The phials containing both the drug and placebo were coded.

### Placebo

Placebo was made up of plain globules (number 30) moistened with plain dispensing alcohol and was therefore indistinguishable from the verum.

### Methodology of proving

The study was completed in three phases. Each phase consisted of 56 doses of coded drugs/placebo.

- Phase I: It is the placebo phase. It is useful in generating prover's response to placebo and therefore, symptoms generated by the prover in this stage act as control for subsequent phases
- Phase II: In the 2<sup>nd</sup> phase, the proving was conducted with 6C potency
- Phase III: In the 3<sup>rd</sup> phase, the proving was conducted with 30C potency.

### Procedure of proving

The volunteers were instructed to take 4–6 globules of a

particular potency of the coded drug, four times a day, dry on the tongue, and also instructed to note down the details of their feelings/changes in the mind and body, after taking the coded drug/placebo in 'Prover's Day Book Proforma' daily.

- If no sign(s)/symptoms(s) appeared: The volunteers were instructed to note down as 'No Symptom' with date and time of intake of the respective dose of the drug/placebo
- If sign(s)/symptoms(s) appeared: The volunteers were asked to stop taking the drug/placebo as soon as he/she felt any change or any sign(s) and/or symptoms(s) developed during the trial. The volunteer noted down the sequence of the appearance of new sign(s) and/or symptoms(s), their progress and the number of doses after which each sign or symptom appears with date, time of onset and duration for which it persisted. The intake of drug remained suspended till the sign(s) and/or symptoms(s) totally disappeared. Any change in the normal routine of the prover with respect to daily habits pertaining to diet, living conditions, etc., and any treatment taken were also noted in the Prover's Day Book Proforma.

After the disappearance of sign(s) and/or symptom(s) developed by the drug, the volunteers were instructed to wait for a further period of 7 days before taking the remaining doses of that potency following the same dose schedule as stated above. In case of further appearance of new sign(s) and/or symptom(s), the same procedure as stated above was followed till the consumption of 56 doses of that potency by the volunteer. If the volunteer was experiencing the same symptom(s) what he/she had already shown, he/she was asked to stop the current quota and to switch over to the next quota after a washout period of 14 days.

Each prover was interrogated by the Proving Master about the appearance of new sign(s) and/or symptom(s) or progress of symptoms and noted down those in 'Symptoms Elaboration Proforma' with respect to the appearance and disappearance of symptoms, their location, sensation/character, modalities, concomitants, extension of symptoms, causation, clinicopathological findings and other treatment taken.

Before commencing the administration of subsequent potencies (subsequent phase) of the drug, the volunteers remained on a washout/rest period (it should be a symptom-free period between the two phases of drug proving in which a volunteer does not take drug) for 14 days and started taking the next potency in the same procedure as mentioned above, till completion of 56 doses. The same procedure was followed for the 3<sup>rd</sup> phase.

Each volunteer was interrogated by the Proving Master to verify the sign(s) and/or symptom(s) recorded by the volunteers. The symptoms recorded in 'Prover's Day Book Proforma' were verified by the Proving Master and completed through further interrogation with the volunteers with respect to their location/sensation/modalities/concomitants, if any, in 'Symptoms Elaboration Proforma'.

During the course of proving, the volunteers were referred to specific laboratory investigation(s) to rule out any pathological

cause for the appearance of new sign(s) and/or symptom(s). In this regard the opinions of experts were also obtained to establish any correlations between the subjective and objective changes where ever needed.

After completion of the trial of all potencies, the volunteers underwent TME. On completion of all the respective phases of the proving programme, the compilation of data recorded in 'Prover's Day Book Proforma', 'Symptoms Elaboration Proforma', 'Pathological Report Sheets' and 'TME sheets' was done at the Council's headquarters by the Drug Proving-cum-Data Processing Cell. After decoding, the sign(s) and/or symptom(s) produced by the volunteers of the verum group were separated from those produced by the volunteers kept on placebo. The sign(s) and/or symptom(s) which were common to both the groups, i.e., placebo as well as drug groups, were not taken into consideration while compiling the pathogenecity of the proved drug.

### Management of adverse effects

A vial of antidote was sent with each quota to each centre. In this trial, homoeopathic potencies of *Camphora* were used as antidote as it is mentioned in *Allen's Key notes* and *Boericke's Materia Medica* that *Camphora*<sup>[8]</sup> can antidote nearly every vegetable medicine. The proving Master gives antidote to the volunteer if symptoms continue for a long time or intensity is much to cause discomfort. The Proving Master is also directed to take the advice of honorary consultants and to get laboratory investigations done, if required. During this trial, no such adverse effects were observed.

## OBSERVATION AND DISCUSSION

The trial programme comprised 48 provers (14 males and 34 females). From the 48 provers, 32 were kept on verum and 16 were on placebo. From the 32 provers who were kept on verum, 20 provers produced symptoms. The drug was able to produce symptoms in different systems of the body. In this trial, there were no mental symptoms produced (as no prover complained of any sort of mental symptoms or perhaps the mental symptoms could have not been extracted). It is also evident from the observation that the drug also did not produce any symptoms in vision, ear, face, teeth, respiration and skin. A comparative study of the present proving symptoms and the symptoms recorded in the *Hand Book of Materia Medica and Therapeutics* by T.F. Allen<sup>[9]</sup> is shown in Tables 1 and 2.

Pathogenetic effects were deduced from the following criteria:

1. Comparison of symptoms developed in placebo phase with symptoms during intervention phases (intraprover comparison)
2. Comparison of symptoms developed by the provers on control (for all phases) with provers on the actual drug trial (interprover comparison).

Out of 48 provers from three centres, 32 were kept on actual drug and out of these, 20 provers produced symptoms. At the Drug Proving Unit (H), Bhubaneswar, out of 15 provers,

**Table 1: Comparison of the symptoms of *Magnolia grandiflora* in the present proving and previously recorded in source book *Hand book of Materia Medica and homoeopathic therapeutics* by T. F. Allen**

System/organ	Symptoms from present proving	Recorded symptoms from the <i>Hand Book of Materia Medica and Homoeopathic Therapeutics</i> By T. F. Allen
Mind	No symptoms	<i>Apprehensiveness</i> that she will die. Nervous, easily frightened, illusions and hallucinations of sight, with sharp pains in the eyes. <i>Repugnance to all occupation</i> . Impatience. Ill humour, with burning in the hands. Sadness. Despondency. Uneasiness. <i>Confusion and dullness</i> . <i>Debility, with loss of appetite</i> , also with burning in the hands and feet. Memory weak; lost
Vertigo	Vertigo with sensation as if the brain is shaking (6C)	<i>Vertigo</i> in the evening, <i>amel.</i> going to bed, with goneness at the stomach; vertigo with flushing of the face; with dislike for physical labour; <i>beginning with blurring of sight; as from seasickness</i> ; causing loss of appetite
Head	Frontal headache with heaviness. Next day, the same symptom <i>agg.</i> morning. Aching pain and heaviness in the left side of the head, <i>agg.</i> lying on the left side; <i>amel.</i> by hot application. It was accompanied with weakness. Stitching pain from the left frontal region to the right frontal region, <i>agg.</i> movement of the head. It is accompanied with burning in both eyes. Bursting type of pain in the left temporal region of the head, <i>agg.</i> heat; <i>amel.</i> tight bandaging, sleep. Pulsating pain in the forehead lasting for few hours. Aching pain in the frontal region of the head. Frontal headache, <i>agg.</i> bending head downward; <i>amel.</i> keeping head straight. Sore pain in the frontal region of the head, <i>amel.</i> by pressure (6C)  Stitching pain in the right temporal region of the head. Pain in the right temporal region extending to the left temporal region, <i>agg.</i> heat; <i>amel.</i> tight bandaging, cold. Headache for 3 times on the 1st day. Next day, pain in the right temple region, <i>agg.</i> cold; <i>amel.</i> pressure. It was accompanied with pain in the shoulder joints. On the 4 <sup>th</sup> day, pain in the right temple region and supraorbital region, <i>agg.</i> heat; <i>amel.</i> cold. Pain extend to the ear. Throbbing pain in the frontal region of the head. Headache relieved in ½ h and again reappeared at night at 9:30 pm with pain in the eyes. Pain extended to the left temple. Headache with sensation of heaviness in the parietal region of the head, <i>agg.</i> movement. Pain radiating to the right supraorbital region. Pain in the parietal region of the head with sensation as if a weight in the head. Pain, <i>agg.</i> towards night. It is accompanied with nasal obstruction. Next day, pulsating pain in the frontal region of the head with sensation as if blood vessels in the brain were breaking, <i>agg.</i> movement, lying down; <i>amel.</i> bathing (30C)	<i>Lancinations</i> ; <i>agg.</i> left side; after eating; and in the right ear. Aching, with griping in the abdomen; Aching with flushes of heat; congestive, throbbing. <i>Vertigo</i> in the evening, <i>amel.</i> going to bed, with goneness at the stomach; vertigo with flushing of the face; with dislike for physical labour; <i>beginning with blurring of sight; as from seasickness</i> ; causing loss of appetite. <i>Pain in temples on bending forward</i> ; pain in the left temple. Migraine. Pain in the occiput and upper dorsal region; pain in the occiput as from a blow. Weight in the occiput
Eye	Heaviness in the eyes. It is accompanied with irritation in the throat, headache, heaviness and feverish feeling. Stitching pain in the upper conjunctiva of the right eye, <i>agg.</i> opening/closing eyes. It is accompanied with watering of eyes. Burning sensation in the eyes, <i>agg.</i> exposure to light. Pain in the left eye as if sand inside the eyes, <i>agg.</i> blinking of eyelids (30C)	Pain from sunlight; sharp pain, with nervousness and with visions. Lids heavy; sensation in the lids as after weeping
Vision	No symptoms	<i>Vision weak; blurred</i>
Ear	No symptoms	<i>Lancinations</i> in the left ear traveling to the shoulder. Pain in the right ear in the morning; <i>sharp pain in the left ear</i> ; traveling to the throat
Nose	Coryza with thin watery nasal discharge. Next day, it was accompanied with fever (100°F). Coryza with sneezing (6C)  Coryza with watery discharge from the nose. It was accompanied with watering from the eyes. Next day, blockage of the nose with cough with yellow thick sputum and increased thirst. Coryza with scanty watery discharge. Next day, slight coryza from the left nose. Fluent coryza with sneezing, <i>agg.</i> cold; <i>amel.</i> hot. It was accompanied with increased thirst and increased sweating. Nasal obstruction with postnasal discharge (30C)	No symptoms
Face	No symptoms	<i>Lancinations in the mandibular joints</i> . Pain in the right side, <i>agg.</i> pressure, also impeding opening of the mouth; sharp pain, going to the ear

Contd...

**Table 1: Contd...**

System/organ	Symptoms from present proving	Recorded symptoms from the <i>Hand Book of Materia Medica and Homoeopathic Therapeutics</i> By T. F. Allen
Mouth	Dryness of mouth. It is accompanied with irritation in throat; during daytime. Painful aphthous ulcer on the inner side of the right cheek, <i>agg.</i> taking hot food. Aphthous ulcer on the inner lower lip (30C)	Pain <i>amel.</i> tepid water
Teeth	No symptoms	Shooting in the teeth. Soreness of teeth, impeding mastication
Throat	Burning pain in the throat. It is accompanied with cough with no expectoration. Later cough with white sputum. Aching pain in the throat with difficulty in swallowing, <i>agg.</i> talking. It is accompanied with cough without sputum. Severe pain in the throat (O/E both tonsils inflamed) (6C) Pricking pain in the throat, <i>agg.</i> swallowing liquid. Next day, the same symptom accompanied with headache and heaviness in the upper eyelids. Irritation in the throat. It is accompanied with heaviness in the eyes and head. Dryness of throat without thirst. Next day, dryness of throat, <i>amel.</i> by hot drink. Dust sensation in the throat (30C)	Fauces red. Pain; on turning head; waking him/her frequently at night. <i>Constriction</i> ; <i>agg.</i> right side; <i>agg.</i> bending forward. <i>Burning</i> ; and <i>dryness</i> ; with pain in the pit of the stomach and often extending to abdomen; preventing sleep. Sensation of mucus, with fruitless attempts to remove it. Difficult swallowing; <i>of saliva</i>
Stomach	Burning pain in the epigastrium, <i>agg.</i> eating (6C) Burning pain in the epigastrium, <i>amel.</i> pressure. On the 3 <sup>rd</sup> day, the same symptom with pain extending to the umbilical region. Decreased thirst. Burning pain in the epigastrium. Less appetite (30C)	Appetite lost after vertigo; lost, with lassitude. Sensation as from hunger, with acidity. <i>Nausea</i> in the morning on rising, <i>amel.</i> breakfast; <i>nausea as from tobacco.</i> Pain; with <i>languor</i> ; with griping in the intestines; extending to hypochondria; as from a blow; rapid, pulsating and in the left side of the abdomen; burning, extending to the chest. <i>Emptiness</i> ; with <i>general lassitude, vertigo and nausea</i>
Abdomen	Aching pain in the abdomen. Pain in the left hypochondrial and umbilical regions of the abdomen, <i>agg.</i> pressure (6C) Aching pain in the abdomen with constipation, <i>agg.</i> eating. It is accompanied with sour eructations. Acute sharp lower abdominal pain with bloated abdomen, flatulence locked up. Later, fullness of abdomen and constipation, stool hard, once in the morning. Pain in the left side of the abdomen, <i>amel.</i> hard pressure	Flatulence. Griping; with ineffectual desire for stool. Pain; from pressure; with diarrhoea; in hypochondria, with suffocation; <i>alternately in spleen and heart</i> ; contusive, in liver and spleen, extending to stomach; in hypogastrium; in the left groin. Lancinations in liver. Constriction of liver and spleen
Rectum	Constipation with hard stool. It is accompanied with flatulence. Constipation, stool hard, past 3 times with ineffectual urge. It is accompanied with increased flatus during stool. Irregular stool, constipation, voiding stool in the evening. Next day, the same symptom with flatulence lower abdomen. Later, mild pain in the left side of head. Then, flatulence with bloated abdomen also accompanied. After that, no stool in the morning and offensive stool in the evening. Constipation, unsatisfactory stool. It is accompanied with pain in the lower abdomen. Irregular stool, loose non-offensive stool, <i>agg.</i> morning. It is accompanied with pain in the lower abdomen. Diarrhoea, loose, watery, painless, yellowish stool (3 times in ½ hourly gap), <i>agg.</i> after eating, morning, afternoon (6C) Diarrhoea, loose, offensive stool, <i>agg.</i> morning. It is accompanied with an increased thirst for cold water, flatulence and offensive flatus. Constipation, hard scanty stool in evening. Unsatisfactory soft stool with acute pain in the lower abdomen. Next day, after long time with fullness of abdomen. On the 3 <sup>rd</sup> day, unsatisfactory stool twice a day with bloating of whole abdomen. Diarrhoea, watery painless stool, 5 times at an interval of 10 min. It is accompanied with thirstlessness. Next day, stool once in the morning with mild pain in epigastrium. Watery, scanty stool with burning in anus after passing stool (30C)	No symptom was given under rectum in <i>A Hand Book by Allen</i> but in <i>A Dictionary of Practical Materia Medica</i> by J. H. Clarke, <sup>[10]</sup> constipation is given
Bladder	Constant urging for urination (30C)	No symptom was given under urinary organs in <i>A Hand Book by Allen</i> , but in <i>A Dictionary of Practical Materia Medica</i> by J. H. Clarke <sup>[10]</sup> 'Straining on passing water' is given
Female genitalia	Painful menses with lower abdomen pain (30C)	Congestion of the left ovary, with pain extending to the left thigh. Thick white or yellow leucorrhoea, with straining when urinating, also with constipation. Metrorrhagia. Menses delayed; pale and scanty; of coagulated blood for 2 days, then intermission for 8 days, then normal; painful; preceded by pain in small of back, hypogastrium and thighs, with headache, flushes of heat to face, nausea and chill

Contd...

**Table 1: Contd...**

System/organ	Symptoms from present proving	Recorded symptoms from the <i>Hand Book of Materia Medica and Homoeopathic Therapeutics</i> By T. F. Allen
Larynx and trachea	Hoarseness of voice (30C)	Hoarse
Respiration	No symptoms	<i>Suffocation; when walking fast; when lying on the left side; after a meal, with desire for pandiculations; with uneasiness; in paroxysms</i>
Cough	Cough with thick white sputum. It was accompanied with decreased thirst. Later cough was accompanied with difficulty in swallowing, heaviness of head, no desire to eat (6C) Dry cough, <i>agg.</i> night (30C)	Dry cough during the day, <i>amel.</i> night by going to bed
Chest	Palpitation Throbbing sensation near the neck, increased palpitation and sweating. Heart: Bounding pulse, pulse rate increase to 98/min (30C)	<i>Stitches in sides; right side. Lancinations in the right side. Pain anteriorly; pain, with emptiness of stomach and lassitude; with suffocation and headache; in the right side, with suffocation; rheumatic, in the right clavicle; rheumatic, in the right side, then in the heart, causing fear of death, with general coldness; contusive, with headache; erratic, in sides. Constriction of from a band just beneath the axilla. Tired feeling. Stiffness of sides; stiffness as from exposure to a draught, when overheated</i> Heart - <i>Stitches; waking him/her frequently. Pain morning on rising; in the morning on deep breathing; when lying on the left side; on deep breathing; with fear; with lassitude; with itching of feet; extending to the back; acute; alternating with pain in the left shoulder; rheumatic and in the left shoulder. Soreness after disappearance of pain. Sensation as if it had stopped beating. Weak and frequent</i> In cardiac affections, faintness in stomach, with mental and physical debility, vertigo, nausea as from tobacco, fear, frequent breathing, palpitation, suffocation, numbness of left upper limb, restless sleep and frequent waking as if frightened. In valvular disease of the heart, with lassitude, difficult breathing from pain in heart, fear of death, pain in the region of heart and cold sensation in the whole body. In endocarditis, pain in the cardiac region extending to the left shoulder and sometimes to the back; in endocarditis, articular rheumatism and crampy pain in the heart alternating with lancinations. Pain in the heart, with suffocation, constriction of throat, pericarditis, general rheumatism. In cardiac hypertrophy, constriction of throat In aortic aneurism, crampy pain in the heart; dry cough, nausea, with vertigo and angina pectoris
Back	Pain in the neck and shoulders, <i>agg.</i> movement of head; <i>amel.</i> lying. Pain extending downwards along the spine to the sacral region (6C) Pricking pain in the lumbosacral region of back. Pain in the left side of the back of the neck (30C)	Weight in neck, with tiredness of spine. Stiffness and contusive pain; <i>stiffness and tiredness and in the back. Back – Stitches in the right side. Pain, and in the left side of the chest; in dorsal and sacral regions; burning; tingling burning, as from overexertion of the arms; sharp, in sacrum; sharp, in the lumbar region. Tiredness impeding motion</i>
Extremities	Pain in the left thigh, <i>agg.</i> sitting, standing; <i>amel.</i> moving, walking. Slight twitching of middle finger of left hand for 5 s. Sore and bruised pain in the left thigh, <i>amel.</i> whole day (6C) Myalgia in both forearms, <i>agg.</i> motion. Pain in the shoulders and nape of the neck, <i>agg.</i> motion. Pain in left ankle joint (30C)	<i>Sharp, erratic or rheumatic pains. Lancinations anteriorly in the elbows and popliteal spaces. Sprained pain in the joints. Alternating pains in the joints. Tired. Stiffness pain in left upper, with weakness; pain in left shoulder extending to heart; from left shoulder to left ear. Stinging in arms. Arms weak. Rheumatic pains in wrists. Uneasiness in hands, compelling constant rubbing. Sharp pain in metacarpal joint of right thumb. Stiffness of lower. Rheumatic pains in lower; in thighs, with uneasiness in the left leg; in the left knee; in tibia; soles. Pain in hip; in thighs in the morning on rising, amel. noon, with tiredness; in legs, with tiredness. Legs tired as after running. Muscular rheumatism of left arm</i>
Sleep	Disturbed sleep. Sleeplessness (30C)	Yawning during the day, with sleepiness. Sleepless early in the morning. Extravagant dreams
Chill	Chilliness (30C)	Chill in afternoon, then fever lasting into night; erratic chill

*Contd...*

**Table 1: Contd...**

System/organ	Symptoms from present proving	Recorded symptoms from the <i>Hand Book of Materia Medica and Homoeopathic Therapeutics</i> By T. F. Allen
Fever	Fever (99°F). It is accompanied with cough with white sputum. Fever (100°F), <i>agg.</i> night. It is accompanied with headache, bodyache, increased thirst and pain in the eyes. Fever (99°F). It is accompanied with headache, nausea, cramps in stomach and weakness. Next day, fever (100°F) with loose stools. Fever (102.8°F), <i>agg.</i> evening. It is accompanied with increased thirst for sips of cold water, restlessness and breathlessness. Fever (99°F) with dry cough and sneezing (6C)	Heat; with burning in throat and headache; flushing, with sweat; <i>of hands</i> ; hands and feet; upper limbs
Skin	No symptoms	Itching; of feet; general, sometimes with uneasiness of legs
Generalities	Bodyache and restlessness, <i>agg.</i> evening. Generalized weakness, cannot utter a word, so much weakness, <i>amel.</i> whole day (6C) Prostration, <i>amel.</i> lying down. Bruised pain in whole body, <i>amel.</i> rest. Next day, body pain mainly in joints on exposure to cold. Pain all over the body (30C)	Contusive pains in all parts; rheumatic pain. In different parts, <i>amel.</i> morning by rising. Prickling in whole body. Soreness <i>amel.</i> exercise. Heaviness as from want of sleep. Weakness; with loss of consciousness as to actions, defective hearing and sensation as if everything were at a great distance. Aversion to motion; to going out. <i>Stiffness from slightest exposure to draught of damp air</i> ; <i>Stiffness amel. dry weather</i> ; causing sleeplessness, with pain in heart and apprehension. <i>Amelioration</i> of cardiac and rheumatic pains generally in morning, sometimes after rising; of pain in dry weather

The symptoms produced by different potencies are marked as 6C and 30C. The symptoms written in bold are indicative of already-proved symptoms mentioned in previous literature i.e., verified from the source book "A Hand Book of *Materia Medica* and Homoeopathic Therapeutics" by T. F. Allen

**Table 2: Prover-wise proving symptoms of *Magnolia grandiflora***

Proving symptoms of <i>Magnolia grandiflora</i>	Number of provers producing the symptom	Potency used	Number of doses after which the symptom is produced	Duration of symptom
Vertigo				
Vertigo with sensation as if the brain is shaking	1	6C	8	1
Head				
Frontal headache with heaviness. Next day, the same symptom <i>agg.</i> morning	1	6C	56	2
Aching pain and heaviness in the left side of head, <i>agg.</i> lying on the left side; <i>amel.</i> by hot application. It was accompanied with weakness	1	6C	34	4
Stitching pain from the left frontal region to the right frontal region, <i>agg.</i> movement of head. It is accompanied with burning in both eyes	1	6C	8	1
Bursting type of pain in the left temporal region of head, <i>agg.</i> heat; <i>amel.</i> tight bandaging, sleep	1	6C	3	4
Pulsating pain in the forehead lasting for few hours	1	6C	10	3
Aching pain in the frontal region of head	1	6C	10	1
Stitching pain in the right temporal region of head	1	30C	10	1
Stitching type of pain in head	1	30C	10	1
Pain in the right temporal region extending to the left temporal region, <i>agg.</i> heat; <i>amel.</i> tight bandaging, cold. Headache for 3 times on the 1 <sup>st</sup> day. Next day, pain in the right temple region, <i>agg.</i> cold; <i>amel.</i> pressure. It was accompanied with pain in the shoulder joints. On the 4 <sup>th</sup> day, pain in the right temple region and supraorbital region, <i>agg.</i> heat; <i>amel.</i> cold. Pain extend to ear	1	30C	5	10
Throbbing pain in the frontal region of head. Headache relieved in ½ h and again reappeared at night at 9:30 pm with pain in eyes. Pain extended to the left temple	1	30C	11	2
Headache; sensation of heaviness in the parietal region of the head, <i>agg.</i> movement. Pain radiating to right supraorbital region	1	30C	2	1

*Contd...*

Table 2: Contd...

Proving symptoms of <i>Magnolia grandiflora</i>	Number of provers producing the symptom	Potency used	Number of doses after which the symptom is produced	Duration of symptom
Pain in the parietal region of the head with sensation as if a weight in the head. Pain, <i>agg.</i> towards night. It is accompanied with nasal obstruction. Next day, pulsating pain in the frontal region of the head with sensation as if blood vessels in the brain were breaking, <i>agg.</i> movement, lying down; <i>amel.</i> bathing	1	30C	2	2
Headache (undefined)	1	30C	5	1
Frontal headache, <i>agg.</i> bending head downwards; <i>amel.</i> keeping head straight	1	6C	9	1
Sore pain in the frontal region of head, <i>amel.</i> by pressure	1	6C	8	1
Eye				
Heaviness in eyes. It is accompanied with irritation in throat, headache, heaviness and feverish feeling	1	30C	48	1
Stitching pain in the upper conjunctiva of the right eye, <i>agg.</i> opening/closing eyes. It is accompanied with watering of eyes	1	30C	10	3
Burning sensation in eyes, <i>agg.</i> exposure to light	1	30C	5	1
Pain in the left eye as if sand inside the eyes, <i>agg.</i> blinking of eyelids	1	30C	4	5
Nose				
Coryza with thin watery nasal discharge. Next day, it was accompanied with fever (100°F)	1	6C	34	2
Coryza with watery discharge from nose. It was accompanied with watering from eyes. Next day, blockage of nose with cough with yellow thick sputum and increased thirst	1	30C	8	4
Coryza with sneezing	1	6C	10	3
Coryza with scanty watery discharge. Next day, slight coryza from the left nose	1	30C	10	2
Fluent coryza with sneezing, <i>agg.</i> cold; <i>amel.</i> hot. It was accompanied with increased thirst and increased sweating	1	30C	5	5
Nasal obstruction with postnasal discharge	1	30C	2	2
Obstruction of both nostrils	1	30C	2	1
Fluent coryza	1	30C	5	1
Mouth				
Dryness of mouth. It is accompanied with irritation in throat	1	30C	44	3
Dry mouth and tongue during daytime	1	30C	10	1
Painful aphthous ulcer on the inner side of the right cheek, <i>agg.</i> taking hot food	1	30C	5	2
Aphthous ulcer on the inner lower lip	1	30C	2	1
Throat				
Burning pain in throat. It is accompanied with cough with no expectoration. Later cough with white sputum	1	6C	16	4
Aching pain in throat with difficulty in swallowing, <i>agg.</i> talking. It is accompanied with cough without sputum	1	6C	40	3
Pricking pain in throat, <i>agg.</i> swallowing liquid. Next day, the same symptom accompanied with headache and heaviness in the upper eyelids	1	30C	38	3
Irritation in throat. It is accompanied with heaviness in the eyes and head	1	30C	48	3
Severe pain in throat (O/E both tonsils inflamed)	1	6C	8	1
Throat pain	1	30C	10	1
Dryness of throat without thirst. Next day, dryness of throat, <i>amel.</i> by hot drink	1	30C	2	3
Dust sensation in the throat	1	30	5	1

Contd...

Table 2: Contd...

Proving symptoms of <i>Magnolia grandiflora</i>	Number of provers producing the symptom	Potency used	Number of doses after which the symptom is produced	Duration of symptom
<b>Stomach</b>				
Burning pain in the epigastrium, <i>agg.</i> eating	1	6C	36,56	1,1
Burning pain in the epigastrium, <i>amel.</i> pressure. On the 3 <sup>rd</sup> day, the same symptom with pain extending to the umbilical region	1	30C	2	4
Decreased thirst	1	30C	2	1
Burning pain in epigastrium	1	30C	2	2
Less appetite	1	30C	5	1
<b>Abdomen</b>				
Aching pain in the abdomen	1	6C	10	1
Aching pain in the abdomen with constipation, <i>agg.</i> eating. It is accompanied with sour eructations	1	30C	24	1
Acute sharp lower abdominal pain with bloated abdomen, flatulence locked up. Later, fullness of abdomen and constipation, stool hard, once in the morning	1	30C	20	4
Pain in the left hypochondrial and umbilical regions of the abdomen, <i>agg.</i> pressure	1	6C	8	1
Pain in the left side of the abdomen, <i>amel.</i> hard pressure	1	30C	10	1
<b>Rectum</b>				
Constipation with hard stool. It is accompanied with flatulence	1	6C	36	1
Constipation, stool hard, past 3 times with ineffectual urge. It is accompanied with increased flatus during stool	1	6C	24	1
Irregular stool, constipation, voiding stool in the evening. Next day, the same symptom with flatulence lower abdomen. Later mild pain in the left side of the head. Then flatulence with bloated abdomen also accompanied. After that, no stool in the morning and offensive stool in the evening	1	6C	10	16
Constipation, unsatisfactory stool. It is accompanied with pain in the lower abdomen	1	6C	10	5
Irregular stool, loose non-offensive stool, <i>agg.</i> morning. It is accompanied with pain in the lower abdomen	1	6C	56	6
Diarrhoea, loose, watery, painless, yellowish stool (3 times in ½ hourly gap), <i>agg.</i> after eating, morning, afternoon	1	6C	16	1
Diarrhoea, loose, offensive stool, <i>agg.</i> morning. It is accompanied with increased thirst for cold water, flatulence and offensive flatus	1	30C	12	2
Constipation, hard scanty stool in the evening	1	30C	20	1
Unsatisfactory soft stool with acute pain in the lower abdomen. Next day, after long time with fullness of abdomen. On the 3 <sup>rd</sup> day, unsatisfactory stool twice a day with bloating of the whole abdomen	1	30C	20	3
Constipation, stool as hard as stone, lacerating anal mucosa. It is accompanied with pain in rectum with frank red bleeding. Next day, with pain with bleeding while passing stool, even while straining for urination (O/E <i>fissure in ano</i> )	1	30C	40	6
Diarrhoea, watery painless stool, 5 times at an interval of 10 min. It is accompanied with thirstlessness. Next day, stool once in the morning with mild pain in epigastrium	1	30C	8	2
Watery, scanty stool with burning in anus after passing stool	1	30C	5	1
<b>Urinary bladder</b>				
Constant urging for urination	1	30C	5	1
<b>Female genitalia</b>				
Painful menses with lower abdomen pain	1	30C	11	3
<b>Larynx and trachea</b>				

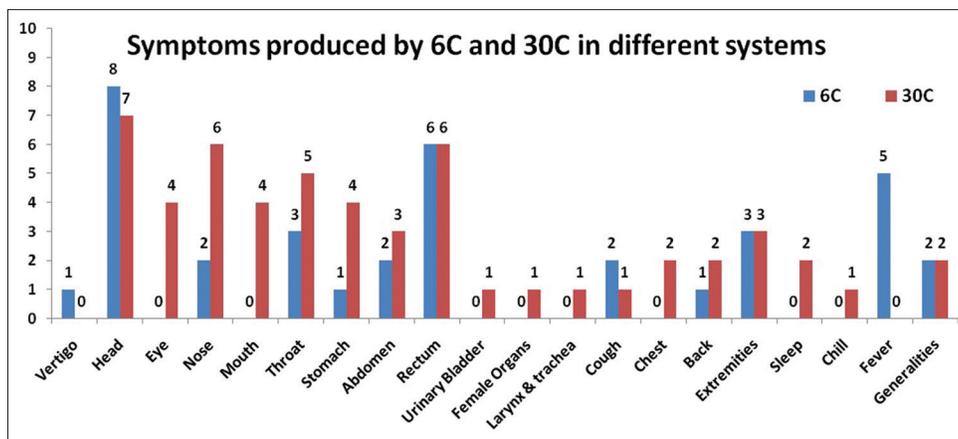
Contd...

Table 2: Contd...

Proving symptoms of <i>Magnolia grandiflora</i>	Number of provers producing the symptom	Potency used	Number of doses after which the symptom is produced	Duration of symptom
Hoarseness of voice	1	30C	2	1
Cough				
Cough with thick white sputum. It was accompanied with decreased thirst. Later cough was accompanied with difficulty in swallowing, heaviness of head, no desire to eat	1	6C	34	7
Dry cough	1	6C	32	3
Dry cough, <i>agg.</i> night	1	30C	8	2
Chest				
Palpitation	1	30C	2	1
Bounding pulse, pulse rate increase to 98/min. Throbbing sensation near the neck, increased palpitation and sweating	1	30C	5	1
Back				
Pain in neck and shoulders, <i>agg.</i> movement of head; <i>amel.</i> lying. Pain extending downwards along the spine to the sacral region	1	6C	8	1
Pricking pain in lumbago sacral region of the back	1	30C	2	7
Pain in the left side of the back of the neck	1	30C	2	1
Extremities				
Pain in left thigh, <i>agg.</i> sitting, standing; <i>amel.</i> moving, walking	1	6C	8	1
Slight twitching of middle finger of left hand for 5 s	1	6C	12	1
Myalgia in both forearms, <i>agg.</i> motion	1	30C	10	1
Pain in shoulders and nape of neck, <i>agg.</i> motion	1	30C	10	1
Pain in the left ankle joint	1	30C	2	1
Sore and bruised pain in the left thigh, <i>amel.</i> whole day	1	6C	5	1
Sleep				
Disturbed sleep	1	30C	5	1
Sleeplessness	1	30C	5	1
Chill				
Chilliness	1	30C	2	1
Fever				
Fever (99°F). It is accompanied with cough with white sputum	1	6C	32	2
Fever (100°F), <i>agg.</i> night. It is accompanied with headache, bodyache, increased thirst and pain in the eyes	1	6C	48	3
Fever (99°F). It is accompanied with headache, nausea, cramps in the stomach and weakness. Next day, fever (100°F) with loose stools	1	6C	13	5
Fever (102.8°F), <i>agg.</i> evening. It is accompanied with increased thirst for sips of cold water, restlessness and breathlessness	1	6C	55	1
Fever (99°F) with dry cough and sneezing	1	6C	32	5
Generalities				
Bodyache and restlessness, <i>agg.</i> evening	1	6C	55	1
Prostration, <i>amel.</i> lying down. Bruised pain in whole body, <i>amel.</i> rest. Next day, body pain mainly in the joints on exposure to cold	1	30C	92	2
Pain all over the body	1	30C	5	1
Generalized weakness, cannot able to utter a word, so much weakness, <i>amel.</i> whole day	1	6C	5	2

4 provers reported symptoms. At the Central Research Institute (H), Kottayam, out of 15 provers, 7 provers reported symptoms. At the Central Research Institute (H), Noida, out of 18 provers, 9 provers reported symptoms. Ninety-one symptoms were observed in this trial of which 36 symptoms

were observed during the 2<sup>nd</sup> quota drug trial, i.e., by 6C, and 55 were produced during the 3<sup>rd</sup> quota drug trial, i.e., by 30C. Figure 2 shows the frequency of symptoms in different systems/organs produced by *Magnolia grandiflora*. More number of symptoms were produced related to head, rectum



**Figure 2:** Frequency of the produced symptoms

and fever in this proving in both 6C and 30C potencies except that fever and vertigo symptoms were produced only by 6C potency. Likewise, symptoms related to urinary organs, female genital organs, eyes, mouth and sleep were produced only by 30C potency.

The incidence of pathogenetic effects per prover is defined as the total number of findings observed in the trial divided by the total number of provers producing the symptoms. In this trial, 91 symptoms were produced by twenty provers. Hence, incidence in this proving trial was 4.55.

The incidence of pathogenetic effects of the trial (claimed % of provers) is the number of provers who had produced symptoms divided by the total number of provers taking medicine, and it was  $(20/32 \times 100)$  i.e., 62.5%.

The percentage of responsive volunteers is the number of provers producing symptoms in the trial divided by the total number of provers participated in the trial, and it was  $(20/48 \times 100)$  i.e., 41.67.

## CONCLUSION

From the pathogenetic effects or symptoms of *Magnolia grandiflora* produced during this pathogenetic trial, it is evident that this drug from the plant kingdom produced so many symptoms in different systems/organs, so the plant can be used for treating different clinical conditions such as headache, palpitation, menstrual abnormality, rhinitis, rheumatic pains, and myalgia. There are so many other symptoms which are not observed during this proving trial which are already mentioned in source books. The sample size of provers is too small to produce more number of symptoms in different systems/organs. However, whatever symptoms we found during this proving programme may be clinically verified afterwards to validate this.

## Financial support and sponsorship

Nil.

## Conflicts of interest

None declared.

## REFERENCES

1. *Magnolia Grandiflora*. Available from: <http://www.pubs.acs.org/doi/abs/10.1021/jf00006a036>. [Last accessed on 2018 Apr 06].
2. Cui W, Wang Y, Chen Q, Sun W, Cai L, Tan Y, *et al.* Magnolia extract (BL153) ameliorates kidney damage in a high fat diet-induced obesity mouse model. *Oxid Med Cell Longev* 2013;2013: Article ID 367040.
3. Huang HC, Hsieh WY, Niu YL, Chang TM. Inhibition of melanogenesis and antioxidant properties of *Magnolia grandiflora* L. Flower extract. *BMC Complement Altern Med* 2012;12:72.
4. Thakur S, Sidhu MC. Phytochemical screening of leaves and seeds of *Magnolia grandiflora* L. Scholars research library. *Pharm Lett* 2013;5(4):278-82. Available from: <http://www.scholarsresearchlibrary.com/dpl-vol5-iss4/DPL-2013-5-4-278-282.pdf>. [Last accessed on 2015 Feb 02].
5. Marin GH, Mansilla E. Apoptosis induced by *Magnolia grandiflora* extract in chlorambucil-resistant B-chronic lymphocytic leukemia cells. *J Cancer Res Ther* 2010;6(4):463-5.
6. Singh LS, Sagolsem M, Sharma GJ. Evaluation of Antitumor Activity of Bark Extract of *Magnolia grandiflora* Linn. *In vivo and in vitro*. 2012 3<sup>rd</sup> International Conference on Biology, Environment and Chemistry IPCBEE; 2012;46:53-7. Available from: <http://www.ipcbec.com/vol46/012-ICBEE2012-G025.pdf>. [Last accessed on 2018 Apr 06].
7. *Magnolia grandiflora* L. Available from: <http://www.discoverlife.org/nh/tx/Plantae/Dicotyledoneae/Magnoliaceae/Magnolia/grandiflora/>. [Last accessed on 2018 Apr 06].
8. Allen HC. Key Notes and Characteristics with Comparisons of Some of the Leading Remedies of the Materia Medica with Bowel Nosodes. 8<sup>th</sup> ed. New Delhi B: Jain Publishers (p) Ltd.; 2008. p. 78.
9. Allen TF. A Hand Book of Materia Medica and Homoeopathic Therapeutics. Available from: <http://www.homeoint.org/books1/allenhandbook/m/mgl-grand.htm>. [Last accessed on 2018 Jun 14].
10. Clarke JH. A Dictionary of Practical Materia Medica. Available from: [http://www.homeoint.org/clarke/m/mgl\\_grand.htm](http://www.homeoint.org/clarke/m/mgl_grand.htm). [Last accessed on 2018 Jun 14].

## मैग्नोलिया ग्रैंडिफ्लोरा के होम्योपैथिक रोगजनक परीक्षण

### सार

**उद्देश्य:** इस अध्ययन को स्पष्ट रूप से स्वस्थ मानव पर होम्योपैथिक पोटेंसी में औषधि मैग्नोलिया ग्रैंडिफ्लोरा के रोगजनक प्रतिक्रिया को प्राप्त करने के लिए किया गया।

**कार्यप्रणाली:** औषधि मैग्नोलिया ग्रैंडिफ्लोरा को केंद्रीय होम्योपैथी अनुसन्धान परिषद् द्वारा डबल-ब्लाइंड प्लेसबो-नियंत्रित विधि के माध्यम से प्रमाणित किया गया। अध्ययन तीन केंद्रों पर आयोजित किया गया था। चिकित्सा विशेषज्ञों और नियमित प्रयोगशाला जांच द्वारा पूर्व परीक्षण चिकित्सा परीक्षा आयोजित करने के बाद चुने गए 48 स्वैच्छिक स्वयंसेवकों पर औषधि दो पोटेंसीज (6सी और 30सी) में प्रमाणित की गई। पहले चरण में स्वयंसेवकों को प्लेसीबो की 56 खुराक (14 दिनों के लिए प्रति दिन 04 खुराक) दी गयीं। अगले दो चरणों में प्रत्येक पोटेंसी या प्लेसिबो की 56 खुराक (14 दिनों के लिए प्रति दिन 04 खुराक) दी गयी। 48 में से 32 को वास्तविक दवा दी गई और 16 को प्लेसबो दिया गया। परीक्षण अवधि के दौरान उत्पन्न लक्षण स्वयंसेवकों द्वारा नोट किए गए और प्रमाणकर्ताओं द्वारा सविस्तर किये गए। तीनों केंद्रों से प्राप्त डेटा को डिकोड करने के बाद परिषद् मुख्यालय में सह-डाटा प्रोसेसिंग प्रकोश्ट द्वारा प्रमाणित करने के लिए संकलित किया गया।

**अवलोकन:** 32 प्रमाणकर्ताओं में से जो वास्तविक दवा परीक्षण पर थे, 21 ने लक्षण प्रकट हुए। दवा शरीर के अधिकांश हिस्सों में दोनों पोटेंसीज में लक्षण पैदा करने में सक्षम थी।

**निष्कर्ष:** प्रमाणित होने वाले परीक्षण के दौरान प्राप्त रोगजनक प्रतिक्रियाओं से औषधि मैग्नोलिया ग्रैंडिफ्लोरा के उपयोग के दायरे का विस्तार हुआ और इससे अनुसंधान विद्वानों और चिकित्सकों को लाभ होगा। नैदानिक रूप से सत्यापित होने पर ये लक्षण अधिक महत्वपूर्ण होंगे।

## ESSAI HOMÉOPATHIQUE PATHOGÉNIQUE DE MAGNOLIA GRANDIFLORA

### Résumé

**Objectif:** L'étude avait pour objectif de provoquer l'effet pathogénique du médicament *Magnolia grandiflora* en dilutions homéopathiques sur des êtres humains qui étaient apparemment en bonne santé.

**Méthodologie:** Le médicament *Magnolia grandiflora* a été étudié par le Conseil central pour la recherche en homéopathie par la méthode à double insu et contrôlée par placebo. L'étude a été menée dans trois centres. Le médicament a été testé en deux dilutions (6C et 30C) sur 48 volontaires apparemment en bonne santé qui avaient été choisis après des examens médicaux réalisés par des médecins spécialistes et des analyses habituelles de laboratoire. Dans la première phase de l'étude, les volontaires ont reçu 56 doses (04 doses par jour pendant 14 jours) de placebo. Dans les deux phases suivantes, 56 doses (04 doses par jour pendant 14 jours) de soit une des deux dilutions du médicament soit le placebo ont été administrées. Sur l'ensemble des 48 volontaires, 32 ont reçu le vrai médicament et 16 ont reçu un placebo. Les symptômes générés au cours de la période d'essai ont été notés par les volontaires et étudiés par les experts chargés des essais. Les données obtenues des trois centres ont été compilées à la cellule des essais et de traitement des données au siège du CCRH après décodage.

**Observations:** Sur les 32 volontaires qui ont reçu le vrai médicament, 21 ont manifesté des symptômes. Les deux dilutions du médicament ont produit des symptômes dans la plupart des parties du corps.

**Conclusion:** Les effets pathogéniques provoqués durant l'essai clinique élargissent la portée de l'utilisation du médicament *Magnolia grandiflora* et aideront les chercheurs et cliniciens. Ces symptômes auront plus d'importance lors de la vérification clinique

## PATOGENESIA HOMEOPÁTICA DE *MAGNOLIA GRANDIFLORA*

### Resumen

**Objetivo:** El estudio se efectuó para elucidar la respuesta patogenésica que el medicamento *Magnolia grandiflora* administrado a potencias homeopáticas, genera en seres humanos aparentemente sanos.

**Metodología:** El CCRH (*Central Council for Research in Homoeopathy*) efectuó una patogenesia del medicamento *Magnolia grandiflora* aplicando un método a doble ciego, controlado por placebo. El estudio se realizó en tres centros. El medicamento se examinó en dos potencias (6C y 30C). Los 48 voluntarios aparentemente sanos fueron seleccionados tras los exámenes clínicos preensayo realizados por especialistas médicos y tras los análisis rutinarios de laboratorio. En la primera fase, los voluntarios recibieron 56 dosis de placebo (04 dosis al día durante 14 días). En las siguientes dos fases, los voluntarios recibieron 56 dosis (04 dosis al día durante 14 días) de cada potencia o de placebo. El medicamento verdadero se administró a 32 de los 48 voluntarios, mientras que 16 recibieron placebo. Los voluntarios anotaron los síntomas generados durante el periodo del ensayo, y los instructores de la patogenesia elaboraron estos síntomas. Los datos obtenidos en los tres centros se recopilaron en la celda de procesamiento *proving-cum-data* en la sede central del CCRH tras la decodificación.

**Observaciones:** Se constataron síntomas en 21 de los 32 voluntarios incluidos en el ensayo con el medicamento real. El medicamento generó síntomas en ambas potencias en la mayor parte del organismo.

**Conclusiones:** Las respuestas patogenésicas evidenciadas durante la patogenesia amplían el campo de aplicación del medicamento *Magnolia grandiflora* y serán de provecho para los estudiantes y médicos de investigación. Estos síntomas tendrán una mayor validez cuando se verifiquen clínicamente.

## HOMÖOPATHISCHE ARZNEIPRÜFUNG VON *MAGNOLIA GRANDIFLORA*

### Abstrakt

**Ziel:** Die Studie wurde durchgeführt, um eine pathogenetische Reaktion des Arzneimittels *Magnolia grandiflora* in homöopathischen Potenzen in scheinbar gesunden Menschen auszulösen.

**Methodik:** *Magnolia grandiflora* wurde vom „Central Council for Research in Homoeopathy“ mittels einer placebo-kontrollierten Doppelblindenstudie geprüft. Die Studie wurde an drei Zentren durchgeführt. Das Arzneimittel wurde in zwei Potenzen (C 6 und C 30) an 48 scheinbar gesunden Freiwilligen nachgewiesen, die man ausgewählt hatte, nachdem medizinische Untersuchungen durch Fachärzte und Routine-Laboruntersuchungen durchgeführt worden sind. In der ersten Phase erhielten die Probanden 56 Dosen (04 Dosen pro Tag für 14 Tage) mit Placebo. In den nächsten zwei Phasen wurden 56 Dosen (04 Dosen pro Tag über 14 Tage) von jeder Potenz oder jedem Placebo verabreicht. Von 48 Prüfern erhielten 32 tatsächliche Arzneimittel und 16 erhielten Placebo. Die Symptome, die sich während des Versuchszeitraums zeigten, wurden von den Freiwilligen festgehalten und von den Prüfungsleitern erarbeitet. Die Daten aus den drei CCHR-Zentren wurden nach der Dekodierung in der CCRH-Zentrale in einer Kontroll-Datenverarbeitungszelle zusammengestellt.

**Beobachtungen:** Von 32 Prüfern, die an der Arzneimittelprüfung teilgenommen haben, zeigten 21 Symptome. Das Medikament – in beiden Potenzen – brachte in den meisten Körperregionen Symptome hervor.

**Schlussfolgerung:** Die im Rahmen der Erprobungsstudie hervorgerufenen pathogenetischen Reaktionen erweitern den Anwendungsbereich des Arzneimittels *Magnolia grandiflora* und werden Forschern und Klinikern von Nutzen sein. Diese Symptome haben größeren Wert, wenn sie klinisch bestätigt werden.

## 順勢療法致病學試驗：荷花玉蘭 (MAGNOLIA GRANDIFLORA)

### 摘要

**目標：**於健康的人體中，引發順勢療法療劑荷花玉蘭 (*Magnolia grandiflora*) 的致病反應。

**方法：**由順勢療法研究中央委員會 (CCRH)，透過雙盲安慰劑對照方法，驗證療劑荷花玉蘭 (*Magnolia grandiflora*)。研究在3個中心進行。在試驗前由醫學專家對志願者進行醫學檢查，以及常規實驗室調查，然後選出48個表現健康的志願者。在48名表現健康的志願者中使用兩個層級 (6C和30C) 進行驗證。在第一階段，志願者被給予56劑 (14天，每天4劑) 安慰劑。在第二階段，給予56劑 (14天，每天4劑) 各層級或安慰劑。在48名驗證者中，32名被給予真實療劑，16名被給予安慰劑。試驗期間產生的症狀，由志願者記錄，並由驗證專家詳細說明。由3個中心取得的所有數據都在解碼之後，在CCRH總部的驗證與數據處理單位進行編譯。

**觀察：**在32名進行真實療劑試驗的驗證者中，21人展示症狀。療劑在兩個層級中，都能在身體大部分部位產生症狀。

**結論：**驗證試驗中引發的致病反應，擴闊了療劑荷花玉蘭 (*Magnolia grandiflora*) 的使用範圍，將有利研究學者和臨床醫生。如果透過臨床證實，這些症狀會產生更大價值。

