



## UTILITY OF PASSIFLORA INCARNATA HOMOEOPATHIC MOTHER TINCTURE IN GENERAL ANXIETY DISORDER: A PILOT STUDY

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### ABSTRACT

**Background:** A pilot study in utility of passiflora incarnate tincture in General Anxiety Disorder. General anxiety disorder is the most common anxiety disorder but is generally less severe than panic disorder. The study was performed on 30 out patients diagnosed with General Anxiety Disorder using DSM IV criteria. Patients were allocated in a random fashion. Passiflora tincture 15 drops per day at bed time up to six month. The results suggest that passiflora incarnate tincture is an effective drug for the management of generalized anxiety disorder.

**Methodology:** A Pilot Study was carried out in Bhartish Homoeopathic Medical College, Hospital and Research Center, Belgaum, Karnataka. The study was selected 30 patients based on purposive sampling method. 30 diagnosed cases were considered. Data collected were analyzed and inferred with T test used to calculate.

**Result:** The overall response of the treatment with the help of Passiflora Incarnata 7% not improved, 37% improved and 56% recovered patients in General Anxiety Disorder.

**Conclusion:** Homoeopathic Mother Tincture Passiflora Incarnata very effective in treating General Anxiety Disorder. There was no side effect during the study.

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### INTRODUCTION

General anxiety disorder (GAD) is a syndrome of ongoing anxiety and worry about many events or feelings that the patient generally recognizes as extreme and inappropriate (DSM-IV-TR). Individuals manifest both physical and mental symptoms leading to significant distress or impairment. General anxiety disorder is a syndrome of ongoing anxiety and worry about many events or thoughts that the patient generally recognizes as excessive and inappropriate. However, the nature of "generalized worry" has been hard to describe in a categorical manner. The criteria required for making a diagnosis are evolving: these criteria clearly increase or decrease markedly the threshold for diagnosis (Slade, T and Andrews G, 2001). Anxiety disorders are one of the most prevalent and highly comorbid psychiatric conditions (Kessler RC and Chiu WT, 2005).

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Since the past decade, many herbal medicines have been used in people with anxiety disorders (Schulz V and Hansel R, 2001). Due to the increasing popularity of herbal medications majority of the patients are consulting herbalists, naturopaths, and other healers, in addition to physicians. There is however, a limited data regarding the benefits and liability of herbal remedies. There have been few reports of serious adverse effects from these medications and by and large these medications have been considered safe and effective (Elkins G, Rajab MH and Marcus J, 2005). A persistent state of anxiety i.e lasting for at least six months, characterizes GAD. Anxiety and apprehensive expectation need to be accompanied by additional symptoms belonging to a motor tension cluster (muscle tension, restlessness and easy fatigability) or to vigilance and scanning cluster (difficulty falling or staying asleep, restless, unsatisfying sleep, difficulty concentrating and irritability). According to DSM-IV (william 1994), the diagnosis is not made if the symptoms exclusively relate to another Axis I disorder. As sleep disturbances are part of the diagnosis requirement, a high prevalence of these symptoms is expected in General anxiety disorder.

For instance, in mental health epidemiological surveys, Ohayon et al (Ohayon MM, 1997) found that, among subjects complaining of insomnia and having a primary diagnosis of mental disorder General anxiety disorder was the most prevalent diagnosis. It has been estimated that about 60% to 70% of patients with General anxiety disorder have insomnia complaint. Whose severity parallels that of the anxiety disorder (Anderson et al., 1984) (Hoehn saric, 1990) suggesting that insomnia could represent one of the core symptoms of General anxiety disorder. General Anxiety disorder is probably the disorder most often found with a coexisting mental order usually another anxiety disorder or a mood disorder (DG, Hughes DC, 1994). The ratio of women to men is about 2:1. The cause of General anxiety disorder is not known. The primary symptoms of General anxiety disorder are anxiety, motor tension, autonomic hyperactivity and cognitive vigilance (Hughes et al., 1991). DSM IV (Thomus, 1994) employs the following criteria for General anxiety disorder; excessive anxiety and worry, occurring more days than not for at least 6 months, about a number of events or activities that are difficult to control. Autonomic symptoms are no longer required for diagnosis. The principal neurotransmitter systems thought to modify anxiety are the gamma aminobutyric acid (GABA) system and the noradrenergic, serotonergic, dopaminergic and histaminergic system (Cohn, 1986) (Dubovsky, 1995). GABA is an important and abundant inhibitory transmitter in the mammalian nervous system.

Three types of GABA receptor may be distinguished on the basis of their pharmacological properties and physiological consequences of their activation; GABA<sub>a</sub>, GABA<sub>b</sub> and GABA<sub>c</sub>. GABA<sub>a</sub> receptors can be allosterically regulated by a diverse range of both naturally occurring and synthetic compounds (Barnard E 1987, Bormann J 1989, Cost E 1991, Siviloti L, 1991, Mehta AK 1991, Mohler H 2001). These substances include the barbiturates and benzodiazepines, which have important sedative, anxiolytic and anticonvulsant uses (Costa E 1978, Greenblatt DJ 1983, Ferrarese C 1990, Foreman MM 1995, Leacute pine 1995, Craig R 1998). The most effective treatment of patients with General anxiety disorder is probably one that combines psychotherapeutic, pharmacotherapeutic and supportive approaches. Because of the long term nature of the disorder, a treatment plan must be carefully thought out. The primary mechanism action *passiflora* involves modulation of neuronal communication, via specific plant metabolites binding to neurotransmitter/neuromodulator receptors and via alteration of neurotransmitter synthesis and general function. Other mechanisms involve stimulating or sedating CNS activity and regulating or supporting the healthy function of endocrine system (Spinella M 2011, Sarris J 2007, Kumar V 2006). This plant is a benzodiazepine receptor partial agonist and causes GABA system mediated anxiolysis.

## MATERIALS AND METHODS

This study was conducted as on the cases available from December 2016 to June 2017. The present study was carried out in Department of Pharmacy and OPD at Bhartish Homoeopathic Medical College, Hospital and Research Center, Belgaum, Karnataka. Out of thirty patients, 20 to 60 years age group selected for this Pilot study. They are taken regular Out Patient Department after eligibility criteria (inclusion and exclusion criteria) history and interview was taken as per the standard proforma, used Homoeopathic

Materia Medica (Willim Boerick, 1927), Repertory and therapeutic book for reference.

## Follow up

Over a period of time, when a patient came for consecutive follow ups, signs and symptoms were watched, which was after one month, three month and six months of treatment.

## Symptomatic Assessment

This study was conducted over six months duration. Taken consultant signature from patients, Psychiatrist and Counselor opinion. Clinical reexamination was performed at end of three months, six months and one year. The test applied for analysis of date was T Test. Outpatient in group one received fixed daily doses of *passiflora* Homeopathic Mother Tincture 15 drops/day at bed time. Thirty out patients (15 women and 15 men), diagnosis of General anxiety disorder (duration of illness 6 months) and had a score of 14 or more on the Hamilton anxiety rating scale (HAM-A) were recruited. Patients were excluded if screening showed a history of a serious ideation an unexpected recent panic attack or full DSM IV panic disorder within the previous 6 months, a life time diagnosis of DSM IV mania, psychosis, obsessive compulsive disorder (OCD), hypomania or major depression. Pregnant and lactating women were also excluded. Prior to the study the patients were free from all psychotropic medication for a minimum of one week. Study was carried out after the approval and following the guidelines of the institutional Ethical Committee.

## RESULTS

Among thirty General anxiety disorder patients with mean  $\pm$  SD, maximum cases were observed in age group of 20 to 30 years in 7 (23.33%) cases, 30- 40 years in 15 (50%), 40-50 years in 5 (16.66%), 50 – 60 years in 3 (10%). Out of thirty General Anxiety Disorder patients distributed according to sex are males 15(50%) and females 15(50%).

**Table 1. Distribution of General anxiety disorder according to Sex**

Sex	No of Cases	Percentage (%)
Male	15	50.00
Female	15	50.00
Total	30	100

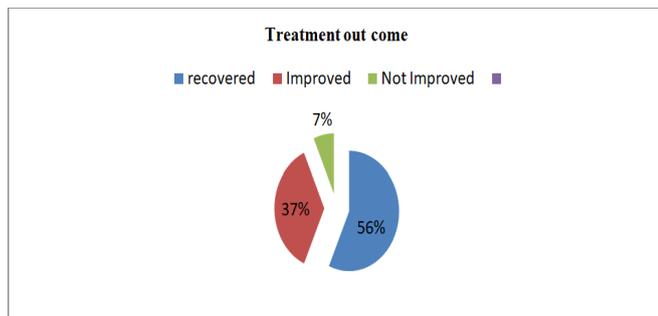
**Table 2. Distribution of General anxiety disorder according to Age group**

Age group	No of cases	Percentage (%)
20-30	7	23.33
30-40	15	50.00
40-50	5	16.66
50-60	3	10.00
Total	30	100

It was observed that 7% not improved, 37% improved and 56% patients are recovered during Pilot Study.

## DISCUSSION

General anxiety disorder is a syndrome of ongoing anxiety and worry about many events or thoughts that the patient generally recognizes as excessive and inappropriate.



**Fig 1. Distribution of Treatment out comes in General anxiety disorder**

However, the nature of generalized worry has been hard to describe in a categorical manner. The criteria required for making a diagnosis are evolving: these criteria clearly increase or decrease markedly the threshold for diagnosis. This pilot study was conducted on the patients who attended the out patients department at Bhartish Homoeopathic Medical college, Hospital and Research Center, Belgaum, Karnataka. Among thirty General anxiety disorder patients with mean  $\pm$  SD, maximum cases were observed in age group of 20 to 30 years in 7 (23.33%) cases, 30- 40 years in 15 (50%), 40-50 years in 5 (16.66%), 50 – 60 years in 3 (10%). Out of thirty General Anxiety Disorder patients distributed according to sex are males 15(50%) and females 15(50%). The pilot study was observed that 7% not improved, 37% improved and 56% patients are recovered during Pilot Study.

## Conclusion

General anxiety disorder (GAD) is common in the community. Individuals manifest both physical and psychological symptoms leading to significant distress or impairment. Most homoeopathy medications may serve as alternatives to traditional anxiolytics in patients who do not tolerate them as they have a favorable safety profile and are free from major side effects. To the best of our knowledge the present pilot study is controlled trial of passiflora in the treatment of GAD (General anxiety disorder). Our main overall finding was that passiflora extract Homoeopathic tincture is effective in the treatment of GAD (General anxiety disorder). Significant effects were observed by first month, three months and six months. The study depicts that 56% of patients got relief from the Passiflora Homoeopathic Mother Tincture and this is not a small Scale. There were no side effective during the treatment and it can be concluded that Passiflora Homoeopathic Mother Tincture can be help the patient to take a new lease on life. With the help of use of Homoeopathic Mother Tincture even other system drugs side effect was avoided. A large scale trial is justified.

## REFERENCES

American psychiatric association 1994. Diagnostic and statistical Mental Disorder (DSM-IV). 4<sup>th</sup> edn. Washington, DC: American Psychiatirc Press.

American psychiatric association. 1994. *Diagnostic and stastical manual of mental disorder*. 4<sup>th</sup> ed. Washington, DC. American psychiatric Association.

Anderson, DJ., Noyes, R. and , RR. 1984. A comparison of panic disorder and generalized anxiety disorder. *Am J Psychiatry.*, 141:572-575.

Barnard, EA., Darilson, MG. and Seeburg, P. 1987. Molecular biology of the GABA a Receptor: the receptor channel superfamily. *Trends in Neuroscience*, 10, 502-509.

Blazer, DG., Hughes, DC. and George, LK. . 1991. Generalized anxiety disorder. In: Bobus LN, Regier DA, eds. *Psychiatric Disorders in America: the Epidemiological Catchments Area Study*. New York: Fress Press. 180-203.

Boericke, W. 1927. *Pocket Manual of Homoeopathic Materia Medica and Repertory and a chapter on rare and un common remedies*. B. Jain Publishers Ltd, New Delhi.499.

Bormann, J. 1989. Electrophysiology of GABA a and GABA<sub>B</sub> receptor subtypes. *Trends in Neuroscience*, 11, 112-116.

Cohn, JB., Bowden, CL. and Fishers, JG. 1986. Double blind comparison of buspirone and clorazepate in anxious out patients. *American J of Med.*, 80, 10-16.

Cost, E. 1991. The allosteric modulation of GABA<sub>A</sub> receptors. *Neuropsychopharmacology*, 4,225-235.

Costa, E., Guidotti, A. and Toffano, G. 1978. Molecular mechanisms mediating the action of diazepam on GABA receptors. *Braxilian J of Psy*, 133, 229-248.

Craig, R. and Rush, A. 1998. Behavioural pharmacological treatment of anxiety disorders: a review. *Phar. Biochemistry and Behaviour.*, 61, 253-269.

Dubovsky, SL. and Thomas, M. 1995. Serotonergic mechanisms and current and future psychiatric practice. *J of clinical psychopharmacology*, 10, 26-30.

Elkins, G., Rajab, MH. And Marcus, J. 2005. Complementary and alternative medicine use by psychiatric inpatients. *Psychol Rep.*, 96:163-166.

Ferrarese, C, Appollonio, I. and Frigo, M. 1990. Decreased density of benzodiazepines receptors in lymphocytes of anxious patients: reversal after chronic diazepam treatment. *Acta psychiatric scandinavica*, 82, 169-173.

Foreman, MM., Gehlert, DR. and Schaus, JM. 1995. Benzodiazepines on trial: a research strategy for their rehabilitation. *Res Biochemical Inter.*, 11, 7.

Greenblatt, DJ., Shader, RI. and Abernethy, Dr. 1983. Drug therapy. Current status of benzodiazepines. *New England J of Med*, 309, 410-416.

Hoehn saric, R. and McLeod, Dr. 1990.Generalised anxiety disorder in adulthood. In: Hersen M, Last CG, eds. *Handbook of child and adult Psychopathology.*, A Longitudinal Perspective. New York, NY: Pergamon Press. 247-260.

Kessler, RC., Chiu, WT., Demler, O., Merikangas, KR. and Walters, EE. 2005.Prevalence, severity and comorbidity of 12 month DSM-IV disorders in the National Comorbidity Survey Replication. *Arch Gen Psychiatry.*, 62:617-627.

Kumar, V. 2006. Potential medicinal plants for CNS disorders: an overview. *Phytother Res.*, 20:1023- 1035.

Leacute pine, JP. and Pelissolo, A. 1995. Pharmacological treatment of anxiety disorders: an overview. *European Neuropsychopharmacology*, 5,206-207.

Mehta, AK. and Ticku, MK. 1991. An update on GABA<sub>A</sub> receptor subtypes. *Brain Research Review*, 29,196-217.

Mohler, H., Crestani, F. and Rudolph, U. 2001. GABA<sub>A</sub> receptor subtypes: a new pharmacology. *Current opinion in pharmacology*, 1,22-25.

Ohayon, MM. 1997. Prevalence of DSM-IV diagnostic criteria for insomnia: distinguishing insomnia related to mental disorders from sleep disorders. *J Psychiatry Res.*, 31:333-346.

Sarris, J. 2007. Herbal medicines in the treatment of psychiatric disorders: a systematic review. *Phytother Res.*, 21:703-716.

- Schulz, V., Hansel, R. and Tyler, V.E. 2001. Rational phytotherapy: a physician's guide to herbal medicine. Berlin: Springer Verlag.
- Siviloti, L. and Nistri, A. 1991. GABA receptor mechanisms in the central nervous system. *Progress in Neurobiology*, 36, 35-92.
- Slade, T, Andrews G, DSM-IV and ICD-10. 2001. Generalized anxiety disorder: discrepant diagnoses and associated disability. *Soc Psychiatry Psychiatr Epidemiol.*, 36(1); 45-51.
- Spinella, M. 2011. The Psychopharmacology of Herbal Medicine: Plant Drugs that alter the mind, brain and behaviour. MIT Press, Cambridge.

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