



# Pharmacology And Drug Action of Homoeopathic Medicines - An Overview

Dr. Judy Vanlalhriati

PG Scholar MD(HOM), Department of Homoeopathic Pharmacy  
Government Homoeopathic Medical College and Hospital, Bhopal, Madhya Pradesh, India.

**Abstract:** The distinctiveness of Homoeopathic Pharmacology is based on the Theory of Drug Dynamization (Potentization). Hahnemann integrated Pharmacodynamic by proving the drug on healthy individuals and elucidated similarity action of drug in the primary effect on body with the consequences of secondary effect from the vital reaction within the organisms which is opposite and curative to the direct action of drugs on the body. The modus operandi of Homoeopathic medicines from different aspects of modern scientific exploration will be discussed in this article.

**Keywords:** Homoeopathy, Pharmacology, Pharmacodynamics, Drug dynamization, Homoeopathic Pathogenetic Trials

**Abbreviations:** MT – Mother tincture, HPT – Homoeopathic Pathogenetic Trial, X – Decimal scale, C- Centesimal scale

**INTRODUCTION:** Pharmacology is the study of the effects of drugs on the function of living systems as a whole or on organs. According to modern pharmacology drugs acts on a particular cells and tissues but due to its side effects, adverse drug reaction and cytotoxicity, it is emphasized that no drug act with complete specificity. Homoeopathy is a dynamic system of medicine discovered by German physician Dr. Samuel Hahnemann. It follows Law of Similia, Law of Minimum, Law of Simplex, Doctrine of Drug Proving, Theory of Drug Dynamization, Theory of Chronic diseases, Theory of Vital Force and Individualization as its fundamental mode of treatment.

Homoeopathic pharmacy deals with identifying, collecting, preparing, preserving, evaluating, standardizing and embraces the legal and regulation of dispensing of medicines. The mechanisms of action of Homoeopathic medicines even after 200 years of its discovery and successful clinical practice still remains controversial and the Similitude principles of Homoeopathic treatment becomes a huge challenge for scientists to disclose the pharmacological actions of the Homoeopathic drugs.

The preparation of drugs from MT to the different scales (Centesimal, Decimal and 50 Millesimal scales) of potentization (succussion and trituration) itself forms a gap as drugs are stated in their crude form in conventional Pharmacopoeia. The ultra-high dilutions and infinitesimal doses beyond the Avogadro limit (24X or 12C) where there are no traces of the drug molecules is skeptical and unacceptable from the scientific view and non-believers. However, the evidence of effects of Homoeopathic medicines on pre-clinical and clinical trials on healthy and diseased is demonstrable.

**Homoeopathic Pathogenetic Trials:** In sec 105 of Organon, Drug proving is the operation of obtaining the comprehension of information required for the cure of diseases. Hahnemann is called as the father of Experimental Pharmacology as he was the first physician to experiment the pure effects of drugs on healthy individuals by proving on himself and his trusted fellowmen. Drug Proving protocol is mentioned on sec 105-145 Organon of Medicines and the objective and subjective signs and symptoms are observed and recorded in different Materia Medica. Recent advances in drug proving shows that there are several methodological flaws in Hahnemannian Drug-proving such as absence of control group as standard, random allocation, blinding, inclusion of trivial and pre-existing symptoms, lack of definition of healthy state, well known acquaintances as volunteers, sudden prohibition of all medicinal drugs and foodstuffs.

HPT is the first systematic experimental approach to ascertain changes in the healthy provers after exposure to a drug. The effects of diluted and attenuated homoeopathic drugs are explored in non-patient volunteers in relatively stable health conditions.

Favorable outcome of Laboratory Experiments on Pathogenetic and Toxicology of different doses of Homoeopathic drugs done *in vitro* and *in vivo* studies in animals becomes more scientifically acceptable though the secondary curative action within the organisms itself remains inscrutable. In modern pharmacology the secondary action is known as rebound (paradoxical) effect - a stronger responsive reaction from the organisms or patient when ceased or the potency of drugs no longer exist. The drug withdrawal symptoms could be considered under secondary action of the drugs. One of the common negligence of this rebound effect is the secondary action of anti-dyspeptic (antacids, protons pump inhibitors etc.) in which hypersecretion of hydrochloric acid occurred after its primary used for acidity.

**Posology and Pharmacology:** Bioavailability of the drugs depends on the dosage and routes of administration of drugs (Pharmacology). In Pharmacology, bioavailability is the fraction ( $F$ ) of an unimpaired drug orally administered that reaches the systemic circulation, taking into account the absorption and metabolic degradation. When drug is administered intravenously its bioavailability is 100% and decreases via other routes due to incomplete absorption and first pass metabolism or may be deferred from patient to patient (inter-individual variation). Homoeopathic Posology includes potency, dispensing (quantity and form) and repetition of the dose of the medicine. Law of single simple remedy and minimum dose is the principles of Homoeopathic posology on the basis of similarity to avoid unwanted aggravations. These two studies play an important role in the action of drugs.

Dr. Hahnemann introduced "Theory of Drug dynamization" in his 5<sup>th</sup> edition of Organon of Medicine, since then homoeopathic drugs are diluted/potentized into such extent that not even a single molecule could be trace by modern scientific technology. Meanwhile, in homoeopathy the more dilute (higher potency) the solution is, the more potent (stronger and faster action) it become. Though molecular tracking of ultra dilutions in organism are impossible, the results of action of infinitesimal doses could be seen in day-to-day practice. One of the remarkable attempts to explain this mechanism is the Hormesis concept, which is proposed by Southam and Ehrlich on 1940s while studying the pathophysiology of red cedar heartwood on cultured fungi, they found out that the high concentrations of stimulatory effects of extracts from cedar wood inhibited the growth of wood decaying fungi. This dose-response phenomenon is interpreted by Arndt-Schultz law "for every substance, small doses stimulate, moderate doses inhibit, large doses kill". Toxins in their highly diluted form stimulates the physiological functions and in their lowest form destroy it.

French Immunologist Jacques Benveniste claimed that water have the ability to retain the dissolved substances even after multiple dilutions and this theory is called as Water Memory. Water when mixing with other molecules stores energy that triggers all the chemical reaction and by collision there is alteration in the molecules. Structural changes are materialized in Homoeopathic medicines after serial dilutions with an agitation as ice crystals due to its vibrational energy contained. The size of ice crystals increases with increase in the vibrational energy.

Molecular study of Homoeopathic medicines using Nuclear Magnetic Resonance shows changes in infrared spectrum. After dilutions and succussions, the disappearance of drug molecule created 'white hole' in opposition of 'black hole' which support the hyper protons model. Homoeopathic solutions have contonian frequency which is remanent wave and proportional to the density of the matter disappeared.

**Conclusion:** Scientific unacceptance and stigma of Homoeopathic system in medical fraternity persist as the exact mode of action, metabolic pathway and molecular imprints cannot be ascertained by the modern scientific technology. The serial dilutions of drug to a billionth fold of the original drug alone are concerned as baseless. Despite its limitations on emergency case, the popularity of Homoeopathic treatment becomes more and more recognizable due to its efficacies on acute and chronic illnesses. Innumerable clinical results and laboratory experiments from different scientific disciplines on Homoeopathic medicines shows the rationality of the system. Homoeopathy has vast scope in research to bring the light of its pharmacological actions of drugs.

## REFERENCES

1. Ritter JM, Rang HP, Flower RJ, Henderson G, Loke YK, MacEwan D. Rang & Dale's Pharmacology. 9th ed. London, England: Elsevier Health Sciences; 2019.
2. Mandal PP, Mandal B. A textbook of homoeopathic pharmacy. 3rd ed. Delhi, India: New Central Book Agency; 2012.
3. Sumit Goel M. Art and Science of HOMOEOPATHIC PHARMACY. Karol Bagh, New Delhi 110005: Indian Books & Periodicals Publisher; 2014.
4. Hughes R. A Manual of Pharmacodynamics. Arkose Press; 2015.
5. Rolland R. CONTE, Henri BERLIOCCI Yves LASNE, Gabriel VERNOT. Theory of high dilutions and experimental aspects. 1996.

