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Pharmacognostical profile (Fluorescence Test) of In Vitro proliferation an important medicinal plant Aloe Vera Barbadensis(L.)

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ABSTRACT- The plants of Aloe-Vera used of the present study.Aloe VeraBarbadensis(L.)belong to the family **Liliaceae** respectively. Aloe Vera, sometimes described as a "wonder plant," is a short-stemmed shrub. AloeVera have many medicinal properties most Aloe Vera many species occur in North Africa. Many disease treated by Aloe–Vera like. The leaves of Aloe Vera are succulent, erect, and form a dense rosette. Many uses are made of the gel obtained from the plant's leaves.Aloe Veramostly used for scientific study over the last few years, regarding several claimed therapeutic properties. Younger leaf of Aloe- Vera be can inoculate invitro condition and get many multiple copies of Aloe -Vera we can easily grow Aloe Vera in lab in short time. We are used crude extract of plant for the studyIt is a rich source of provitamin A. The present investigation on the fluorescent characters of the leaf powder showed varied colours like green, pale green, dark green, brown and yellow under different chemical treatments in both the medicinal plants used for the study.

Keywords: Plant crude, Aloe Vera, fluorescent test, Pharmacogonsy.

I. INTRODUCTION

Since times immemorial human beings have endeavored for good health and immortality. In today's run-of-the-mill life, every person needs to take care of themselves but not everyone is able to take care of themselves. Due to a run-of-the-mill life, they are unable to take care of themselves and fall ill. They can keep themselves healthy by using good things at home like healthy foods and home remedies.In the earlier times, due to not being a doctor, people used to use Ayurveda medicine at home and keep themselves healthy they can grow few medicinal plant at home for make a healthy atmosphere like Aloe Vera, Aswagandha, Sarpagandha, Nagarjur, Geloy, Tulsi, Neem, Ginger, Garlic etc.

Yoga (techniques to elevate the physicalof and mental status of an individual), and Ayurveda (use of medicaments to maintain health, longevity and vitality) have played a pivotal role. Plants have been used as an important source of medicine since ancient times and their products are being used for different purposes suchitic plan as medicine, food, health care, agriculture, agrochemicals, pharmaceutical, etc. Initially practiced as ethno medicine then transformed into organized systems e.g. Ayurveda, Unani, Siddha, etc. (Natesh, 2001). Plants were used in crude form or even essence. With the advances made in phytochemistry and pharmacology, umpteen active principles of various medicinal plants were isolated and used as valuable drugs in contemporary medicine (Trivedi, 2004) According to World Health Organization (WHO), nearly 80 per cent of the people in developing countries consume traditional medicines for sustaining health and vitality. According to one estimate 20,000 to 35,000 species of plants are used as medicines, pharmaceuticals, cosmetics and neutraceuticals by different ethnic groups the entire world over (Trivedi, 2006). The medicinal properties of different plant species have contributed to the origin and evolution of many traditional herbal therapies. Attempts have been made to categorize them as plants used in organized systems of medicine e.g. Unani, Sidha, Ayurveda (plant sp of codified knowledge) and include nearly 1500 sp. As many as three thousand species are used as ethnomedicine (plants of empirical knowledge) and nearly 700 species are researched pharmacologically and chemically. In most of these species active principles are exploited in modern medicines and are referred to as plants of scientific knowledge.Medicinal plants are an integral component of research and development in the pharmaceutical industry. They constitute nearly

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70 % of the basis of modern pharmaceutical products including 25 % of drugs derived from different plants and many others are synthetic analogues built on prototype compounds isolated from them. A large number of drugs of plant's origin, used in western medicine are Digitoxin, L-Dopa, Quinine, vincaleukoblastin, digoxin, ajmalicine, codeine, reserpine, pilocarpine atropine, morphine, etc. WHO estimated that approximately one fourth of the 500 million prescriptions written in US each year contain a mention of leafy plant extracts or active ingredients obtained from or modeled on plant substances. The most popular analgesic, aspirin, was originally derived from species of Salix and Spiraea and some of the most valuable anti-cancer agents such as paclitaxel and vinblastine are derived solely from plant sources (Katzunget al.1995. Pezuto et al.,1996). Some of the examples of medicinal plants are: - Aloe verabarbadensis,Ocimumbasilicum, Bacopamonnieri, Brassica campestris, Catharanthusroseus and many more.

II. METHODOLOGY

Fluorescence characteristics of the powdered Aloe verawas observed in daylight and UV light. Also the fluorescent study was performed on treating the drug powder with different chemical reagents.

III. RESULT

The fluorescence character of powdered drug plays a vital role in the determination of quality and purity of the drug material. The powder drugs exhibit different fluorescence character in the presence of different chemical reagents under ultra-violet light due to presence of different functional groups in drug. The results of fluorescence characteristics of plant are displayed in table. The fluorescence analysis is a tool for the qualitative analysis of crude drug.

Fluorescence analysis of Aloe vera powder

Chemical Treatment	Day light	UV Light (365 nm)
Powder as such	Green	Green
Powder + 1 N HCl	Light Green	Dark green
Powder + aqueous 1 N NaOH	Pale yellow	Fluorescence Yellowish Green
Powder + alcoholic 1 N NaOH	Green	Fluorescence Green
Powder + 50% HNO_3	Yellowish orange	Fluorescence Green
Powder + 50% H_2SO_4	Yellowish green	Greenish brown
Powder + Ammonia	Light Green	Light Green
Powder + Methanol	Green	Green
Powder + Water	Light green	Green

Organoleptic evaluation comprises appearance, colour, odour, and taste gel were recorded
Appearance : Viscous
Odour :odourless
Colour :Colourless
Taste : Slight bitter

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