CHAPTER I INTRODUCTION AND RESEARCH METHODOLOGY

1. Introduction

Agriculture is the first culture of mankind. There is no culture and no life without agriculture, as we require food to eat at least 2-3 times a day. But agriculture needs to be still developed because the 21st century agriculture will be different from the past and present day agriculture. Because in current globalized economic, agriculture can't keep away from competition and it should not remain a mere subsistence activity. Agriculture has to make use of scientific development in the method of cultivating, in seeds, in fertilizer, in pesticides, in harvesting and in further processing, etc. So that India will become self sufficient in the matter of food, security, Overcoming the edge-old problems of hunger, malnutrition and poverty.

Agriculture plays a crucial role in rural development by lacking the problems of malnutrition, unemployment and poverty. In this context, agriculture is sine qua non national as nearly 80% of population live in rural areas and depend on agriculture sector which accounts for nearly 40% of gross domestic Product (GDP) and 30% of country's export in India.

India has been referred to as one of the top mega-diversity regions of globe. Indian region has over 1,30,000 species of plants and animals, which have been significantly documented. The richness of biodiversity of the region is largely due to the occurrence of rich diversities of species, genetic and ecological variability in different bio-geographically and bio-climatically defined zones. This natural wealth includes many varieties of crops and animals that indigenous and local communities have developed over countries. [E.g. grain 'Shalu' [Jawar] and legume 'Tur' Vegetable Amaranths species.' Pokala' and a buffalo breed 'Pandharapuri', cowbull 'Khilari' are some our breeds Today many

farmers continue these traditions, developing seeds by careful identification and propagation. India should the conserve its biodiversity as well as sustainable and equitable utilization of its genetic resources.

The IPR for agriculture were seen congruently with industrial property rights for the first time only under Round of General Agreement of Trade And Tariffs (GATT) negotiations in late 1980 that culminated with signing of Ministerial Declaration at Marrkesh in 1994. The WTO is established in the year 1995.

Indian agriculture play a vital role in Indian economy, as nearly 80% of population live in rural areas and it accounts about nearly 33 percent of Indian national income. And 30% country's export in India. India has been referred to as one of the megadiversity regions of the globe. Indian region has over 1,30,000 species of plants and animals. This richness of biodiversity must be used fr getting patents. Otherwise the MNCs of developed world getting the IPR claim and trying to get the advantage of unexplored bio-wealth which in turn putting forth the concern of biocolonalism. So if proper guidance and knowledge given to farmers about intellectual property rights [IPR] and by which way they should produce with respect to worlds choice. Then there is a very good opportunity to becoming India superpower in future. But for this India is urgently needs following things.

- India needs of taking the patents of fruits, flowers, species, medicinal plants etc.
- Registration or documentation of traditional knowledge for further research and development.

- 3) To acknowledge the people about trade name and GIs in agriculture sector.
- 4) There is need of Advisory committee of IPR, at different levels.

2. Scope of patents in Agriculture in India

Although methods of agriculture or horticulture cannot be patented, implements and tools, etc. can be patented if the patent specifications are drafted in such a way that they are shown not to be falling in the class method of agriculture for horticulture. Although plants and plant products cannot be patented, the process to obtain or extract them can be patented. There is not specific provision for patenting of microorganisms or microbiological processes in the Indian patent Act. However, per se microorganisms are not patentable in India at present although under TRIPs India has to intorudce system for patenting of microorganisms. Draft laws in this regard have been formulated. Many countries allow both process and product patents in regard to microbiological inventions and microorganisms per se. All such countries allow patenting of Genetically modified. Microorganisms but a few also allow patenting of naturally occurring microorganisms if isolated from nature for the first time and other conditions of patentability are satisfied. The inventor has to deposit the strain in any one of the international depositories in many countries recognized under the Budapest Treaty.

3) Objectives of Present study:

The objectives of the study were as under.

1) To study the Traditional knowledge [TK] and it's integration for IPRs protection.

- 2) To study various forms of IPRs.
- To study how MNCs dominates on Indian agriculture sector through patenting.

4) Hypothesis:

The steps taken by the Government of Indian in respect of intellectual property rights [IPRs] are very limited and there is still scope for IPRs in India.

5) Methodology of Study

For the proposed study we have used secondary data. The study was based on books, journals, reports, magazines, web-sites (internet) which were published by economist, patent offices etc.

6) Chapter Scheme:

- I. introduction and Research Methodology.
- II. Meaning and Nature of IPRs. Concept and Forms of IPRS.
- III. Review of Literature.
- IV. Intellectual Property Rights in Agriculture.
- V. Summary and Conclusions.

7) Limitations of the study

The present study has many limitations. Following were the limitations of present work.

- 1) The data relating to this topic is not available at the local level.
- 2) No much data is published in books and journals.
- 3) So, whatever the data was available in the libraries of Shivaji University, and **Collage** of agriculture paper form was taken into consideration. Hence the present work has limitations. However, the development in respect of IPR in agriculture have been studied and some literature has been bought

together in a dissertation form. Some lacunas might have left out in the study.

8. Research Methodology:

The present study is based on secondary data. And the secondary data is collected through the journals, magazines, research papers, conference publications and from various web sites from the internet facility. For this secondary data I was used the following libraries.

- 1. Dr. B. Khardekar Library, Shivaji University, Kolhapur.
- 2. Shatt. Shahu Institute of Management (CYBER), Kolhapur.
- 3. Agriculture Collage, Kolhapur.

