Chapter – Five

Implications of New IPR regime under TRIPS, Biodiversity Act, GI act, CBD act, SPS, Technical barriers to trade (TBT) agreement Under AOA on Indian Agriculture in the Post WTO regime.

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Reference

Chapter Five

Impact of TRIPS, Biodiversity, GI act, CBD act, SPS, Technical barriers to trade (TBT)agreement and AOA in the Post WTO regime and the implications of these on Indian agriculture.

Introduction:

The IPRs (Intellectual property Rights) means the legal protection to the ownership rights of the person against any kind of illegal imitations or copying of invention, discovery of the product or process, in which he is engaged. There are several kinds of IPRs like, **Industrial Design, Copyright, Trademarks, Patents of Products, G.I., R&D, and Innovation & Trade secrets**. The key objectives of IPR protections are to,

(1) To sell new Product & Services, technologies, research & Development worldwide we need new investments in knowledge & innovations and for that one should have exclusive rights & intellectual protection ensured by the state.

(2) To spread & promote these new ideas, Knowledge throughout the world the exclusive right holders of innovations should be protected to place their products in the markets. IPRs should be strong not weak because it not only protects innovators but it helps spread & disseminate knowledge with business trough out the world.

5.1: Objective of this Study:

(1) Our main objective of the Study is to find out the impact of post TRIPS & WTO regime on Indian Agriculture, in the sectors of Farmers Rights, Patents & IPRs, Geographical Indications, Trade marks & Copyrights, Research & Development, Plant Varieties etc.

(2) Secondly the Role & Response of India to new emerging global order under in the Post TRIPS regime.

5.2: TRIPS:

The TRIPS (Trade Related Intellectual Property Rights was constituted Annexure 1C of the Marrakesh Agreement), agreement, was signed under the WTO agreement to enhance and maximise economic growth through fair trade & investment worldwide through IPR protection. TRIPs which requires worldwide patent protection for any kind of invention was highly opposed by the developing countries until 1989 but later on under WTO all the signatory nations were bound to abide by the rules of TRIPS. Every country under WTO are required to amend laws in their countries to fulfil TRIPS's Universal requirements of IPRS which, covers issues like,

(1) In order to improve trade how one country should apply the basic principles of international trading system & intellectual property agreements in their own countries by giving proper protection to IPRs.

(2) How the WTO should make an international dispute settlement body to settle any kind of any dispute between trading members.

(3) How to implement special transitional arrangements during the period when the new system is being introduced.

The TRIPS is regarded as the key international trade treaty which governs IPRS, was formulated during the Uruguay round agreement in 1994. The USA with its dissatisfaction in the Paris Convention wanted to bring IPR issue to the GATT forum and was able to do it when the opponent from the developing nations (India, Brazil etc.) agreed finally to do it. The TRIPS agreement is obliged to protect the member country's innovator's Patents and Copyright and it even looks after the administrative system to comply with the protection of IPRs as per the norms framed by TRIPS.

5.3: Different Wings of TRIPS
There exist several contents of TRIPS that can be classified as,
(1) Patent, (2) Copy Rights & Trade Marks, (3) Geographical Indications, (4) Industrial Designs.

Patent: The patent is a kind of sole privilege of individual right over a certain period of time in individual research & development, scientific innovation and Invention or discovery provided by the government. It protects the individual innovators from copying, imitating or selling their products, process or design by others. Patents are no longer available after a certain period of time to the innovators and the rights over the product, innovation or process becomes available to the general mass, but as **it is the strongest form of control over intellectual property rights**, that is why it limits the reuse or research of that already patented products or processes. That is why in case agriculture the farmers are bare fitted from reuse or refurbishment of patented seeds.

Copy Rights & Trade Marks: Copy Rights are the sole rights of the producers or innovators in manufacturing or selling the product. If any other person violates this by imitating selling the same product then it is the state's responsibility to take legal action against him because in the WTO the TRIPS regime clearly affirmed the member countries to comply with the Berne Convention (India is a signatory of Berne convention) which says respect & Protection of copy rights is every member state's important responsibility. The member countries are also obliged to abide by the norms which say to protect trademarks or service marks.

Geographical Indications: Geographical Indications acts is an important content of TRIPS regime and it is of huge importance to the producers, farmers, manufacturer throughout the world (particularly to the developing countries) because this provision under TRIPS regime and WTO protects and send products to the market which are identifiable by their Geographic origin and are different from other parts of the world. This GI also helps in protecting, conserving the regional, natural resources and local native traditional cultural heritages.

Industrial Designs: The member countries of WTO under TRIPS regime are asked to protect Original Industrial Designs created by the Innovators or designers from imitations (though the preservation of aesthetic considerations is left on the hands of state).

Arguments in favour of TRIPS:
The **WIPO (the world intellectual property organisations)** and Paris Convention on IPR made effective laws for Intellectual property rights but they suffered from lack of authority to enforce it then the TRIPS came under GATT discussion & under WTO it came with complete authority which encourage member countries to maintain minimum standard of quality protection for intellectual

property rights beside dispute settlement body. And TRIPS formulates guidelines, and remedies for each member countries.

The importance of TRIPS,

(1) The TRIPS is Important because it protects and respects intellectual property rights of the innovators, creators, Designers, Scientists, Technologists, and researchers and there by encourage them to invent or reinvent and create.
(2) It regulates the world's Intellectual property rights system and makes it more disciplined, standardised and principle based.
(3) TRIPS help in regulate businesses by helping in dispute settlement between various states in respect of Trade related aspects of Intellectual Property rights. It is more helpful to the least developed and developing countries.
(4) It helps it maintain smooth relations between many international organisations (like WTO, IDA etc) which regulate trade.
(5) TRIPS helps in maintain sole protection to the innovators (both Domestic & foreign) over their Intellectual property rights in a most equitable & fair manner from any kind infringement or theft without any delay.
(6) It looks after the member country's Govt.s so that they must comply with the rules & regulations and helps those solving disputes in trade in an integrated manner.
(7) The TRIPS regime respects the MFN clause of the WTO.
(8) The TRIPs regime framed clear laws on Plant Breeders & Farmers where it asked the state to protect the varieties of plants by both patent law and Sui generis system. It was important in order to encourage new plant breeders & farmers & their rights, preserving or conserving different traditional plant varieties & Seed Varieties and encourages investors (both private & public sector) in the development of agriculture.

5.4: Various important international agreements affecting Multilateral Trade & Biological Diversity in Pre & Post TRIPS regimes.

1. **UN convention on Biological Diversity (CBD) in 1992.**
2. **Technical Barriers to Trade Agreement (TBT) in 1994.**
3. **Formation of the World Trade Organisation (WTO) & Agreements on Agriculture (AOA) in 1995.**
4. **Agreement on applications of sanitary & Phytosanitary measures (SPS) in 1994.**
5. **Formation of Geographical Indication Act (G.I.) in 1999.**
6. **Cartagena Protocol on Bio safety, UN convention on Biological Diversity 2000.**
7. **International Treaty of Plant genetic resources, FAO 2001.**
8. **Protection of Plant Varieties & Farmers rights Act 2001 (PPVFR 2001)**
9. **Patent Act 2002.**
10. **Seeds act 2004.**
11. **Patent Act 2005 (111 amendment)**

5.5: TRIPS & Indian Agriculture:

In different contents of TRIPS the Patent and GI have higher implications on agricultural sector as compare to other wings of TRIPS like Trademarks & copy rights and any other anti competitive practices. The provisions under TRIPS like Article 27. Article 27.3 (b) allows the Governments to include or exclude many types of research or inventions from patenting plant varieties or biological processes. Though the above clause exits under TRIPs then also it states that the member country's Govt.s must protect patents on biological micro organisms and biological processes by applying patent, Sui generis or both. This is however a contradictory by itself. TRIPS have direct and long lasting implication on the Biotechnological sectors of agricultural sector particularly for the developing countries like India.

5.6: Intellectual Property Rights in India before & After TRIPS

In India the first Intellectual property rights act (called Act of protection & Inventions) was made in 1856 based on Patent Law of Britain in 1952 which provided certain privileges to patent holders and new innovators at that time. The next law came on 1872 named Patents & Design protection Act 1972 on Cotton Textiles, Garments, Muslins & silks etc. Then in 1911 the new patents & design act came into existence which was amended later after independence. A copy right Act was passed in 1914 which was enacted later in 1959. The copy right act was based on British copy right Act 1956. The Indian Copy right Act was amended in 1983,1984,1992,1994 in order to cope with the new inventions in it he field of Information technology. After independence in 1947 a new patent bill was introduced before the Indian parliament in 1967 and was enacted in 1972. After that in year 1999 new act regarding, Indian Copy rights & Trademarks (after reforming the already existing Trade & merchandise act 1958) was made in India which was both WTO & TRIPS compliant for the protection of service marks, performers rights and rights of the broadcasters. After that the renown Geographical Indications of goods Act was introduced in 1999 (the important characteristics was registration of geographical indications of goods in particular classes, prohibition of registration of particular geographical indications, compulsory advertisement of all accepted geographical indications and making provisions for taking legal action either by an authorized user.)
In the Post TRIPS regime we can see Indian agriculture went through many substantial changes and reforms as TRIPS required certain IPR protection. Major reforms in Administration and in Social, Legal and Institutions were required to implement TRIPS agreement. After successful implementation of all TRIPS requirements in India it can help promoting innovations, investments FDI, Transfer of Technology there by preserving genetic & natural resources and environment. However the fore coming economic benefits in the Post TRIPS regime are much greater than its cost as it can transform a technologically backward country to a knowledge based exporter of technologies & services country.

The Indian Patent History after Independence
1972: The patents act came into effect from 20th April 1972.
1999: The patent act came into force from 01-01-1995 and amended in 1999.
2002: The new patent act amendment in 2002.
2005: Again the patent has been amended and came into effect from 1st January 2005.

Implications of different Wings of TRIPS regime on Indian Agriculture:

5.7: Patent & Indian Agriculture:

After the TRIPS regime came into effect the Indian agricultural research & development in biotechnological and plant variety sector boosted as the filing of patents for much kind of researches in agricultural sector have hiked many times than before. As per the WTO latest report the patent filing by Indian researchers has increased three to four times after 2010. The number of filing of patents by the foreign researchers has increased tremendously in India in the Post TRIPs regime. As per the CSIR (Council of Scientific & Industrial Research) the number of filing of patents have increased many in the last five years (in 2008 the number of Indian patent filing was 500 and foreign filing was 400). From the below table we can see that many time increase of patent filing took place in India (the total applications for patents filed in 2006-07 were 28940 which increased to 36218 in 2007-08 which was 22%). The total number of Patent Granting by the Indian State has also increased many times since the Inception of the TRIPS regime. The president of India finally signed the Indian Patent amendment bill on 8th January 1999 which was passed by the both houses of the Parliament and made it law. Since then any one can apply for product patent in the areas of Pharmaceuticals, Food & Chemicals etc. And they can apply (for foreign applicant it was necessary that they should be bearing a valid licence from their own country which was a signatory of the Paris convention) for licence in for exclusive marketing rights for the same product. For TRIPS obligations the Indian Patent act was amended two times one was in 2002 and then in 2005. **Before 2002's amendment the patent was given on Drugs & Pharmaceuticals and Food processing for 5 years and for other patents it s was given for 14 years but from 2002's patent amendment the period for patent was increased to 20 years**. Other Changes in patent amendment bill 2002 was reform & **omission of Compulsory licence system** and license of right. The section 5 (this section had made Drugs, Chemical processes & food under the excluded category ended after 10 years for India) under the TRIPS this act was deleted by patent act 2005. To be patented one needs to have a new invention in product or processes which may applied later on industrial sectors as per the patent act 2005. As per the patent act 2005 for new patent one Indian national or foreign national should apply for it to the Controller General of Patents, Designs, Trademarks and Geographical Indications and the application will be thoroughly checked by the Patent Office of TRIPS, CBD and IPR Protection in India. There was 22% of yearly increase in the total number of applications for patents (the total number of application for patent have increased from 28940 in 2006-07 to 35218 in 2007-08. In 2007 the total number of Indian application for patent was around 17% of the total applications and the Maharashtra state has highest number of application as compare to the other states.

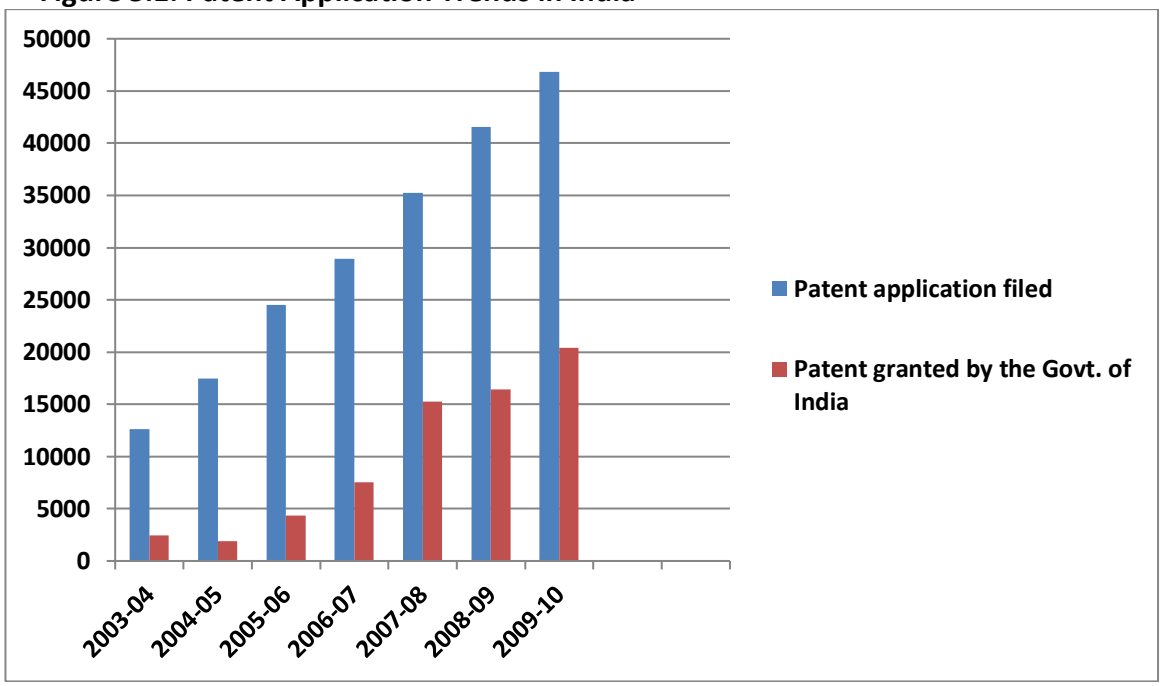
After removing the clause existed in patent act 1970 which restricted medicines to be patented the Patent Act 2005 brought Drugs & Medicines other than traditional medicines under product patent Act. Unless a new invention is done on product or substances or new discoveries made to enhance the efficacy of the old drugs or substances mere discovering without new or enhanced effect may not given patent as per the new Patent law. This has created hindrance in the field of Indian traditional medicines where Indian manufacturers are facing problem in getting patents the US Govt. is started giving patents the big MNCs of US on traditional Indian Medicines and their uses.

Table 5.1: Comparison of Indian Patent Act, 1970 with TRIPS

Indian Patent Act 1970	TRIPS
The products are excluded from being patented in Food & Drugs industry only processes can be Patented. (different methods of agriculture, any Process of medicinal, surgical or any treatment of Human being, animals or plants which may cure them, or enhance their economic value or their product value are excluded from being patented)	**All types of products and processes discovered in all fields of research & development are subje to be patented. (only excludes those products which may affect public order, morally or really damage life or Environment. Along with this Diagnostic, therapeutical and surgical methods and plants ar animals Produced by essential biological processes.)**
There can be given no patents on any kinds living form.	**There can be given patents on Non biological processes In the production of plants & animal products, and Microbiological processes on creating microorganisms but protections are provided here by patents system of sui generis or by both.**
Patents may be given on the processes of Chemical & Drugs for five to seven years and on other items for 14 years.	**The time duration given for of patents is 20years for all Items.**
There was the provision of Licence Right and Compulsory Licensing in the patent act 1970.	**In the TRIPS regime the Compulsory Licensing law has been made restricted and license of Right has been repealed completely.**
The role of the State was supreme on taking decision from the point of view of public interest and there by checks & balances on abuse of patent violation.	**Restricted state's flexibility in taking decision for any abuse.**

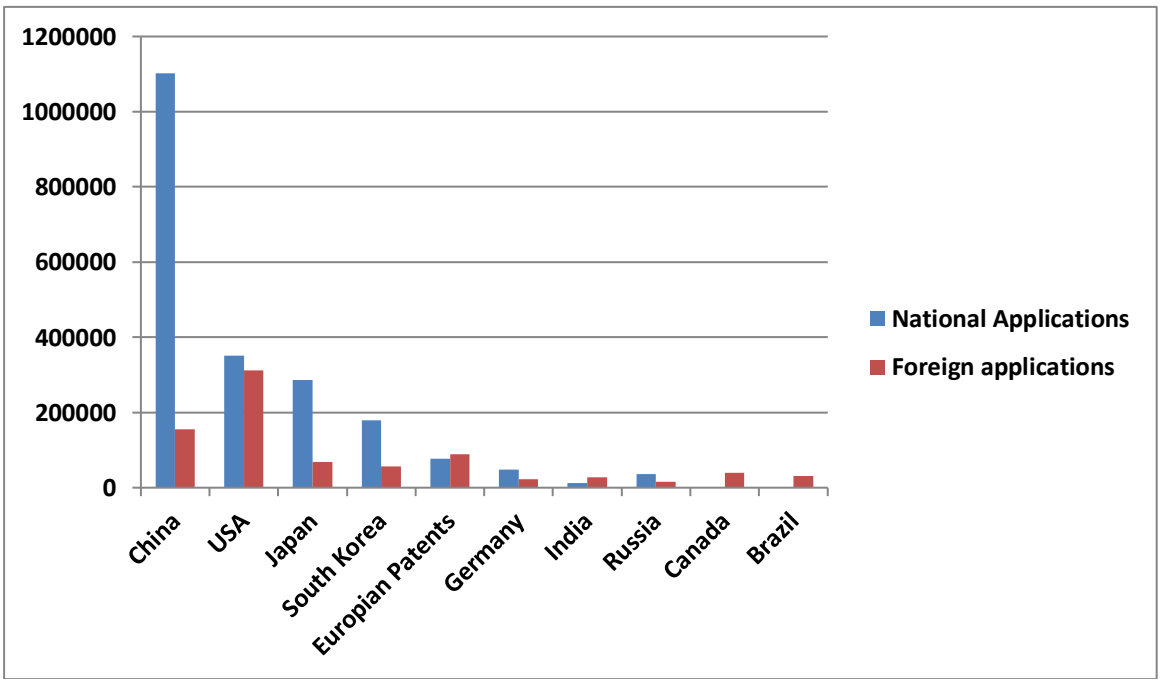
Due to increased awareness among Indian Citizens about Patent, the number of total applications has increased tremendously in recent years.

Figure 5.1: Patent Application Trends in India



Source: WIPO data base.

Figure 5.2: Total number of Patent applications of the top ten Countries of the World in 2015



Source: WIPO data base.

5.8: Geographical Indication (G.I.) and Indian Agriculture:

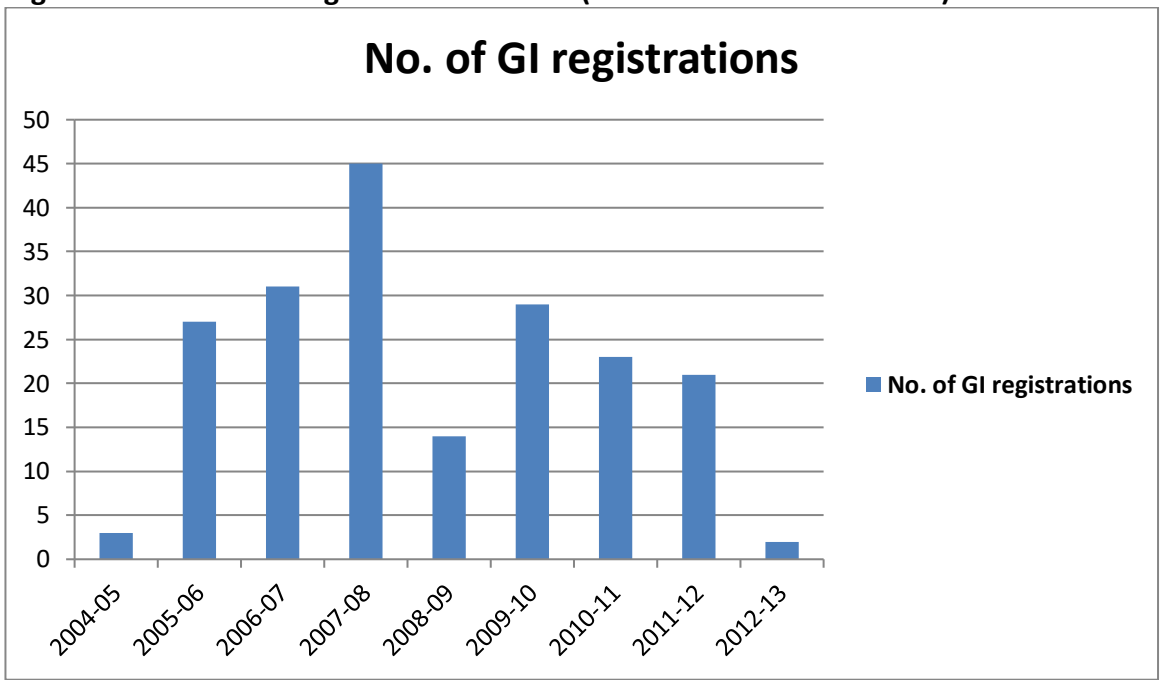
The term Geographical Indication (which came as an Act in India in 1999) expresses any commodity's quality and Origin and provides protection both nationally and globally. The GI is important in preserving and protecting India's rich natural resources and cultural heritage. Any Indian traditional agricultural product (including traditional arts, crafts and food products) of native origin is differs in quality internationally, and can be identified with Indian origin and culture. In India the GI (registration & Protection) act passed **97 items** identified as from Indian origin (agricultural, natural and manufactured goods, handicrafts, textiles and foodstuffs). In India the UP Govt. for example has passed a bill on GI called no one outside the City Luckhnow can sell Chikankary. To understand GI we can imagine Champagne in France, Tea for Darjeeling etc. We can give another Example of GI act implementation in India. In Indian State of Kerala a special variety of Rice named Pokkali is originated and cultivated specially in the districts of Ernakulam, Alappuzha, and Trissur. Cultivation of this variety of Rice is associated with Kerala's whether and salinity of Land (as this land of Kerala are close to Sea level). For this special variety nature the Pokkali rice is demanded both locally and internationally. In order to protect its native character traits and to prevent infringement in producing and selling this rice in any other part of India and abroad the Kerala Govt. Passed a bill and registered all districts name including farmers name in GI application registry.

The need for GI was started earlier but it came into force after the WTO summit in Seattle in Dec 1999, where emphasis were given on multilateral trading system based on paragraph 29 and Article 23.4 of TRIPS, in view to raise benefit level of the poor nations and future sustainability. The GI essentially deals with the need and sustainability of the Indigenous poor farmers of traditional crops and communities of the world which is based on respecting & rewarding the traditions and traditional community based decision making approach. ***The GI is kind of value based social & economic approach which includes society, culture, human efforts, environments and land to express the need for conservation of community based regional cultures & traditions of society and that is not transferable from one to another person. That is why the value of GI is so essentially important in TRIPS as a marketing tool. The GI promotes goods based on particular geographic area attributable to their source of origin and culture of that particular region.***

Here we can site an example where GI and patent act contradicted each other under the TRIPS regime. For example we can bring the Basmati rice controversy. An US based company named Rice Tec. Inc. Applied for patent on Basmati Rice (This particular variety of rice is famous in India & Pakistan for it taste & beautiful Aroma) as a trademark name American type Basmati rice for an invention called Basmati Rice lines & Grains. This was an attempt to produce Basmati rice in foreign countries outside India. The Rice Tec. Company of the US claimed that the Basmati is a generic name but India & Pakistan claimed that Basmati Rice is a GI. The claim of the Rice Tec. Was mostly matching the new TRIPS laws but as the Basmati was very much renowned for its regional attributes and can't be separated from its origin and regional value system & culture so ultimately these reasons were sufficient for Basmati Rice to become GI. Along with this another challenge to India was the Rice Tec. Company did not violate the article 22.3 and also did not mislead the people by wrongly interpreting the source or origin of Basmati at it called its Patent name as American type of Basmati. There is strong demand in EU and USA for Basmati Rice for its fine quality and after the WTO the new TRIPS law (article 23) GI was effective only on Spirits & wine, so there is tremendous opportunity for big companies to do business over it. The USPTO released patents on three different hybrid subtypes of Indian Basmati rice which were different from it. Though this was a win for India as it challenged it with strong arguments but this was also a challenge thrown by the big MNC's toward s developing countries like India & Pakistan. This Basmati controversy was an eye opener to India & Pakistan as at

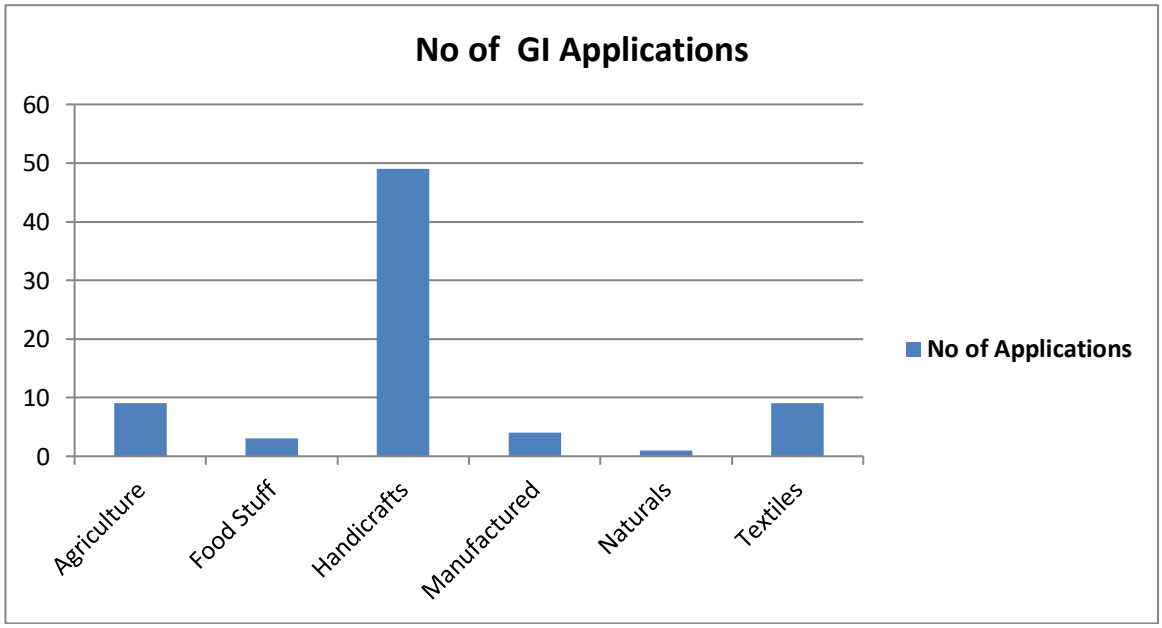
the beginning level the patent office did not find any wrong in giving patent to Rice Tec. and later on new generic brand name called Texmati and Jasmati came and flooded the market as a subtype of Basmati rice, that's why India enacted the GI in 1999 (registration & protection act) and brought many goods under it on the hope that this will protect the Indian GI.

Figure 5.3: Year wise Registered GI in India (From 2003-04 to 20013-14)



Source: http://ipindia.gov.in/cgpdtm/AnnualReport_English_2012-13.

Figure 5.4: Product wise GI registrations in India in the year 2013-14.

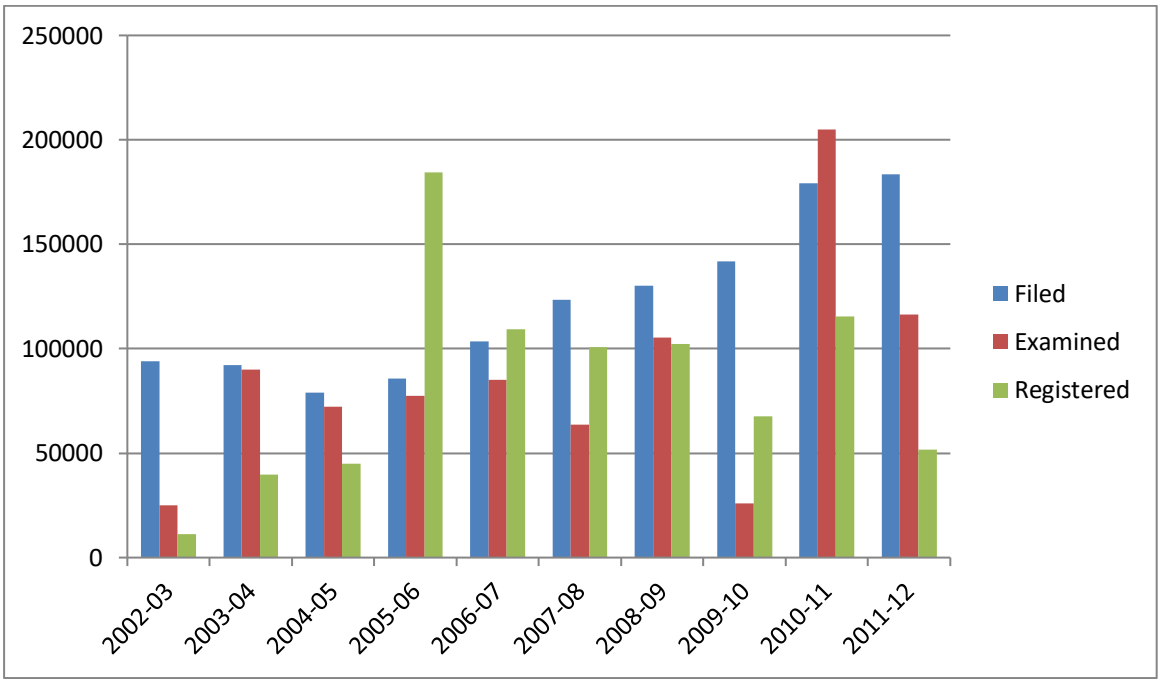


Source: http://ipindia.gov.in/cgpdtm/AnnualReport_English_2013-14

5.9: Trade mark and Indian agriculture

Trade Marks of commodities is an important part of IPR and are truly an economic instrument in any Country. Trademarks have huge implications on any country's political and cultural environment. So it is very much important for any countries, (particularly developing country like India) that new trademarks act must ensure that, it will protect and preserve the cultural, social, institutional, and intellectual heritage of that country. At the same time this new Trademark act should also ensure that it will safeguard the small and marginal producers (small & Cottage industry in case of India) of that country from being eliminated in the market where MNC houses operates and enjoys the benefits of IPRS in the TRIPS regime. The benevolent role of the state is clear in how to protect small & marginal producers from Big Corporate houses by limiting their activities to a certain limit and clear criteria for trademarks & patents to be excluded which is based on moral, ethical, impartial, fair economic and political ground. The Trademarks was enacted in India in 1999 which repealed the trademark & Merchandise mark act 1958 came in effect from 2002 which include the Protection to well known marks, as well as service and Collective marks. At the same time this act will protect innovators from piracy or any kind of infringement as it have established an Appellate Board for this which will give trademarks for ten years and which will be renewed for ten years.

Figure 5.5: Some trends of Applications of Trademarks in India in recent time



Source: worldtrdemarkreview.com

Copyright and India:

Copy Rights are the sole rights of the producers or innovators in manufacturing or selling the product. If any other person violates this by imitating selling the same product then it is the state's responsibility to take legal action against him because in the WTO the TRIPS regime clearly affirmed the member countries to comply with the Berne Convention (India is a signatory of Berne convention 1971) which says respect & Protection of copy rights is every member state's important responsibility.The Indian Copyright Act in 1957 has been amended many times for example it has been amended in 1983, 84,92,94,99 and latest in 2010.The revised Act has come into effect from 2012. Copy Right protection is granted for original music work or Compositions, writings, drama literary and Social science research work, etc to 60 years after the years of publication. Violation of Indian Copy right act is a crime and is subjected to punishable offence. The punishment may include both civil & criminal sections (section 63) of law which may include penalty up to Rs 200000 and imprisonment.

5.10: Traditional Knowledge of Indian Farmers & Protection of Plant Varieties and Farmer's Rights Act 2001.

By traditional knowledge in agriculture we mean indigenous knowledge about the development and adaptation of plants and crops to different ecological conditions, rainfall, temperature, altitude, soil etc about disseminated by one generation to the next either by mouth or as general awareness among the communities of rural farmers or group of people. India has got an Act on traditional Knowledge that protects farmer's right on plant varieties named Plant varieties protection Act of India. In the post Trips regime the IPR is mostly used by big MNCs in agri-business to repeal the benefits of Patent on traditional knowledge by taking away farmer's rights on plant varieties for profit. The **PPVFR 2001** is an Act which provides protection to the indigenous and traditional farming, cultivator's rights on plant and R & D on new plant varieties. This act not only helps farming it will help to protect plant breeders, ensures supply of new plant genetics, availability of HYV seeds and other supports to the farmers, instigate and stimulate new investment both from the private sector and public sectors on R & D on plant & Seed varieties in this way the overall development of the agricultural sector. The developing countries of the world were left with the choice between two provisions to develop agriculture one is joining the TRIPS regime and other is joining with UPOV (Union International Pour la Protection Des Abstentions Vegetables) which is also supports the sui generis system. India choose to have the sui generis system (Sui generis-self generating system which helps protecting farmers of any nation) and the **PPVFR 2001** Act is the Indian version sui generis Act which is an balanced act gives protections to the farmers right and maintains TRIPS obligations. The Indian version of PPVFR act 2001 is a model version of farmers right and plant varieties protection act to the world as it not only facilitates plant breeders and protects their rights but at the same time it is a combination of all different contents of TRIPS obligations for example the Indian Patents Act, Trademarks Act, Geographical Indications Act, Biodiversity Act etc. This helps India to maintain its IPR laws and at the same time harmony between agriculture and Biotech R & D of agricultural commodities.

5.11: The reverse effect of the TRIPS regime on Indian agriculture and Biodiversity

The Indian Farmer's problems under the TRIPS regime:

After the Uruguay round of agreement (1994) the agricultural sector (both plant & seed varieties) came under the jurisdiction of new IPR laws or patent laws of TRIPs regime in India, which created huge problem among cultivators of India as in the time of green revolution in 1970 new high yielding plant and seeds varieties were used again and again every year by the farmers of India to produce million tonnes of food grains and made it a revolutionary success but now to protect IPR on seeds & plants in the new TRIPS regime the traditional agricultural system became dependant on the market (which was already existed in many developed countries even before the WTO). This has created new competition, inequality, poverty and disparities among plant breeders and there by affecting agriculture. The invention of genetically modified sterile seeds narrowed down the scope of reuse of traditional seeds again and again every year by the Indian farmers as these genetic seeds are usable only once so they limits the scope and rights of farmers on Seeds and these genetic seeds sterilization patents helps earning maximum profits for the big Biotech MNC houses by taking away the farmers rights on plant varieties and seeds in a very clever way using the new IPR law. In this way the corporate greed was established once again in the name of protection and rights. The key issues of Indian Agriculture in the TRIPS regime are discussed as follows,

The production, procurement and distribution of Indian agricultural crops were mainly controlled by farmers and the Govt., but in the new IPR regime after TRIPS India is witnessing big MNC corporate houses has spread hand in everywhere in Indian agriculture particularly there where green revolution took place (like Punjab , UP, Haryana). Corporate houses like Monsanto, DuPont, retail chain Giant like Wall mart of US; Reliance Corporation of India has started operation in the Punjab state. These names are quite famous in their activities in developing world.

In the 1940s and 50s before and after the Green revolution in India and others parts of the world the world was united and committed to increase agricultural production, disseminating knowledge and research in agricultural development , creating international body or groups to help each other country agricultural problem to solve, creating a consortium of donors like Big institutions, Countries and the UN etc, collaborating through CGIAR and the countries distributed new varieties of HYV seeds all over the world. All these happened in the world without the need of the IPR at that time. Before1980s there was no patent on life forms or plant genetics. The US started an aggressive way of patenting the different inputs in agricultural sector and the other countries followed it (particularly the western world). The IPR act under TRIPS allows Microorganism and life form to be patented and all plant varieties. This was the most awaited Act for the greedy MNC corporate houses of the world. Around 75% of the plant DNA patents are in the hand of Private corporate houses in the World a study On Nature magazine came out recently) and about 14 MNCs hold half of those patents which didn't exist before 1985.

5.12: Impact of TRIPS on Indian Seed Industry and Farmer's distress:

Seeds are called the Symbol of Life Renewal and in India it is not only sown, harvested, exchanged with neighbours, and saved part of it for the next harvest it is part of most of the indigenous rural traditional rituals, festivals and cultures. But this could no longer be existed because the new Seeds act 2004 and revised patent act in India made Indian seeds most vulnerable and subject to come under the dictatorial greedy hands of the Corporate houses in Seed business and there by liquidating all rights and freedom of the farmers. The tradition of Indian farmers have been exchanging, procuring and

saving indigenous varieties of seeds which is very important for farm ecology and food security of the nation. Still today about 70% of the seeds are saved by the Indian farmers. Indian farmers evolved and procured varieties of seeds for example the farmers of different states of the country evolved seeds that can face hostile regional environments. For example the farmers of Rajasthan have evolved seeds that can fight droughts in arid region, farmers of Bihar & West Bengal has evolved seeds that can survive in flood situations, farmers in Coastal areas of India in the south developed and evolved traditional seeds to face and resist salt from sea water, Himalayan region farmers have evolved frost resistant breeds of Seeds. Indian farmers produce different indigenous varieties of seeds of Rice, wheat, Groundnut, Pulses (including Gahat, Narrangi, Rajma, Urad, Moong, Masur, Tur etc), Various type of Oilseeds, Millets, Coconuts, fruits & vegetables. This is interlinked with the country's diverse culture, nutritional base. This sector has been targeted by the Seeds act (which is part of new IPR act under TRIPS regime) as it has immense potentiality of earning billions of dollar profit by the corporate houses for the long time period. The seeds Act 2004 have gone in favour to the capitalist big corporate houses and against the farmers as mandatory registration of seeds for patent made the farmers bound to purchase new seeds from the Big MNC seed suppliers as they can't use unlicensed varieties of seeds for cultivation. This seeds act made Indian farmers completely vulnerable to be exploited in the seeds market and very weak bargainers of price of their produce. Under the new seeds act the IPR regime created many monopoly houses of seed suppliers in the market where the indigenous farmers are unable to exercise their old rights over reuse and exchange of new varieties of seeds and saving them. Many other countries including in European countries many farmers are being compelled to purchase seeds from the big business houses and if some of them are trying to discover and use new seeds but fail to register it by his own name in the IPR book then he is being subjected to legal action by the law. The World Bank pressurised Indian Govt. to follow new IPR rule, which dismantled India's big public sector cooperation in seed supply (around 20% of total seeds used by the Indian farmers are supplied by the Govt. of India and the rest 80% is traditional seeds of the farmers own saving from centuries). The good quality seed saving, exchange and supply by the traditional farmers to the communities of India is devastated by the seeds act 2004, whose main objective is how to stop Indian farmers from saving and exchange of seeds and compelled them to buy seeds from the market.

The Seeds act 2004 combined with the Corporate in India using vigilantes and watch dog for surveillance on farmers whether they are using or sharing unregistered seeds in their community or not . These seeds police roam around the traditional seeds markets and if any farmer found breaking the Seeds law they are taking legal action against him/her (Penalty of Rs. 25000 instantly) and there by terrorising farmers who are the backbone of Indian agriculture. But this Law is observed to be inefficient in taking legal actions against big seed companies who violates laws or is responsible for crop failures. For example in Bihar farmers lost around Rs 1000 crore as the maize harvest failed and in Maharashtra state thousands of crore of rupees lost every year because of failure of bt. Cotton seeds which is GM seed supplied by the private corporate house.

It is high time for the country to prioritise whether to ensure the farmer's sovereignty that will further secure the food sovereignty for the country or encourage the private seed industries or the MNCs that continue to run monopoly business of seed growing & selling. The farmers of India has not been saved by the 2004 Seed act which is responsible indirectly for severe distress of million and even death of thousands of farmers. The Non renewable seeds are not reliable but farmers are buying those seeds for the MNCs. Dependency on non-renewable seeds is one major reason for the farmers are to commit suicides for the already debt ridden farmers. There are other reasons for the misery of the farmers of our country. For example, though the farmers have already benefitted by the 1966 act that gives the farmers the opportunity for seed testing and seed certification but this is only a minor help because farmers are finally made to buy non-renewable seeds. CBR (Community Bio-Diversity Register) register

the local & Indigenous agrarian Bio diversity and the variety of farmer's seeds through the local Bio-diversity community. Which resulted in Considerable change in the regulations Acts that controls centralised Seed authority, which pushes the farmers for compulsory registration, as a result of which they can't grow their own seeds, even it forces to stop saving their own seeds and any kind of seed exchange. All the steps taken so far has only marginalised small farmers pushing them back and further back to the brink to ensure the growth of Seed industries of the MNCs.

5.13: The TRIPS regime in India:

5.13.1: Use of Technology in Basmati Rice & Basmati patent:

Looking back to the history of how Basmati rice was patented in India might give us a glimpse over the effects of TRIPS regime brought on to the Agrarian products. Article 22 of TRIPS relates how Basmati rice is bestowed with general level of protection. Basmati rice is famous across the planet for its long aromatic flavoured soft grains, said to have its origin in India & Pakistan. There are 400 types of Basmati found alone in India. Basmati is considered the most expensive and demanded rice in USA & Europe. In EU the Basmati is sold for US$ 1200 and in US it is of US$ 500 per metric ton and this was because of the patent on Basmati which resulted in less than US$ 300 tax rebate to Basmati rice in EU, and this will further result in substitution of US brand uncle Ben over Indian Basmati rice. Now let's try to review the history of patent on Basmati. On one hand we see the struggle of the poor and developing nations, to gain capital on and from the basic indigenous agrarian biodiversity of their country and on the other hand the first world countries or the developed nations trying to produce agrarian products using their technology on industrial level. This gives rise to an inevitable conflict and hence the 'patent'. India's natural connection to the Basamati Rice faced tremendous challenge when the US patented the American breed of basmati Rice known as Texmati. Article 22 explains that how the American breeds Texmati which is of Indian Born Basmati is influencing India's Basmati rice market in the context of both local & Global market, but on which basis of International Intellectual property rights.

5.13.2: Misuse of Patent rights:

The miss use of Patents rights and its severity is well explained by an US based international rice producing corporation named 'Ricetec. Ricetec developed a biotechnologically hybridaised species of rice which has similarity in fragrance & aroma with the Indian born Basmati Rice which the corporation has levelled as Texmati as the rice was grown in Texas and sold by the Ricetec since 1977. Two distinctive features of Texmati are short heighted and non sensitive to the slanting sun shine of the America. The patenting organisation of America called USPTO protected Texmati after granting patent to it in 1995.

Basmati rice its long flavoured aromatic grains with nutty flavour originated in the foot hills of Himalaya and Punjab, Haryana, Delhi & Uttar Pradesh in India and India & Pakistan have been producer and exporter of Basmati rice since centuries back. As per the APEDA India is the second largest producer of rice exporter after China and the export of basamati rice is high and alone in 1997 India has exported more than 5 lakh tonnes of basmati Rice to the Developed countries. The Basamati rice accounted more than US$ 250 million in that year in the US market only. The Rictec was granted patent in 1997 (with the help of UPOV now it can sell rice in the name Basmati anywhere outside India). Until now Ricetec has able to achieve little success in selling rice in the name of Texmati or Kasmati. With the Ricetec's latest success on the patents on Basmati, India and Pakistan received the ever massive jolt to their Basmati export Index. 10% of total basmati rice export of India which is about 45000 tonnes was ascribed to the US market which is totally devoured by Ricetec.

India also lost a large market share of Basmati export to UK, EU, Saudi Arabia and other countries of the Middle East. The patent of basmati was a good example of violation of Geographical origin & long rooted cultural heritage by an US based MNC. Ricetec is only using its biotech knowledge to produce Basmati like fragrance in its green houses and sell it out side. This is a clear violence of WTO & GATT norms which disharmonises the IPR regime and India & Pakistan is fighting against this. The forums of the multinational in WTO, which is suppose to imply that the member nations should obey the regulations and rules applied to all equally. The TRIPS section includes certain patent regimes – namely Drugs & Agro –Chemicals, Sui generis system for patent varieties and Geographical Indications. The American Govt. Keeps silence on Violation of GI in India by RIcetec where it shouted and brought Indian Pharma Company to TRIPs for violating patent of another American pharma company.
India challenged America in WTO forum on Violation of GI of Indian originated Basmati Rice and it got success after taking USA to dispute settlement body and revoked the patent from Ricetec.

5.13.3: Adverse Impact of Seed & Patent Act of India on Indian farmers:

Before the two consecutive and most effective amendments of patent Act 1970 Indian farmers were happily saving, improving, exchanging and exercising their whole rights on traditional seeds. This was somewhat their natural right which was delegitimized by the new amendment, which redefined of what should be called an 'invention 'and what not. As a result of this anew era ushered in with free and incessant patenting of **genetically modified (GM**) crops seeds. This made the farmers lose their traditional and natural right over seed and method of farming, because with the change in the Genetic quality in the seeds, it would also demand change in the method of farming. Now lets us talk about the 2nd amendment of the 1970 patent Act, should not be recognised as an 'invention'. According to the Article 3 (J) of Indian patent act, while dealing with Plants and animals i.e. weather it is an act of improving the quality of their products to increase their economic value by any surgical, medical, creative and by any other attempts of human beings, should not be considered an invention, possibly because this would not involve intervention of modern Biotechnology.
The omission of the term 'plant' in the second amendment purports to mean that only specially processed technologically modified plant can be taken into consideration as invention. Thus patent confer an exclusively special right on newly genetically modified Bt. Cotton with Biotechnological intervention of certain bacterium to produce certain toxins to protect it from bell worm which immediately gave US based Biotech Giant Monsanto a new patent right in India. So it is clearly understood that the new section 3(j) of second amendment of 1970 patent Act does not recognise the natural or Biological process of production or improvement of seeds, species or variety of plant or animal as invention; if Biotechnology is not involved there. But article 27.3 (b) of the 2nd amendment of TRIPS law in India explains that plants and animals produced by essentially Biological process and not non biological process should be kept out of patentability. This thing gave a setback to Monsanto. Immense public opinion and pressure had been generating on Govt. of India to raise the issue to Doha round that how far artificial Biotechnological hand is allowed to research & get patent to do business, especially on life forms.
The 2nd and 3rd amendments of 1970 patent act has brought not only the farmers but also the seeds which is the first link of production in the mouth of danger by hazardously endangering our seeds and there by our food security. According to the 2nd & 3rd amendments of Indian TRIPS law Corporations like Monsanto should be given all rights for patenting the GM seeds i.e. process on life forms, but this will not only bring disastrous effect on farmers and other seeds sellers as they cant reuse, save, exchange or improve seeds and thereby they would be thrown out of this old traditional process of

thousands of years but also on natural biodiversity as it will be hazardous to the nature if indigenous seeds are being modified genetically for higher yield. In this way if the new amendments are implemented by the Govt. of India it will establish a totalitarian dictatorship on agri-business by undermining natural, traditional and indigenous rights of the farmers on their seeds and there by jeopardising nations foundation of agriculture. The Seeds act 2004 under TRIPS gave monopoly power to the MNCs in agribusiness and now the farmers have become only seed purchasers and the price, supply of seeds, seed variety, how much they will, what will be the input price, what should be consumed by citizens and at what amount, how citizens should be converted to agro commodity consumers with help of IT and at what price, all shall be under the supervision of big Trans National Companies. Thus the farmers have ceased to become another tool in the mechanised structure of Agro-business; and an untold slavery is shrewdly superimposed on both the farmers & Citizens. If this thing continues, this will bring grave challenge for the sovereignty of the country. So one initiative can be taken to curve it down, which is, by community rights. The community right is a concept which may be brought to the public domain which will act as a effective balancing concept to guard public interest against corporate totalitarianism. In our country section 3(I) and section 3 (J) of patent law establishes corporate monopoly & totalitarian power on agriculture. These two sections of newly amended Indian patent laws stops farmers and seeds sellers to save, exchange, improve and sell seeds and regards these acts by them is illegal and in this way these acts delegitimizes farmers basic rights on seeds and immediate actions are being taken against violation of patent laws with rapid action team roaming around vegetable and rural seeds markets as vigilantes.

The struggle of the farmers have already started for their rights and sustenance but the role of the Government is crucial here to stop patenting life forms and natural plant genetics by profit making transnational companies which have little commitments to the citizen and Bio-diversity of any society. This thing should be curbed otherwise not only farmers and biodiversity but also the choice of the consumers also going under control of these giant MNCs of USA or any other part of the world as the consumers are becoming agro-food purchasers in place of their traditional choice to choose.

5.14: Indian agriculture in the Post Trips regime:

Agricultural sector plays a very important role in the GDP, self sustenance, trade and food security of this vast nation. The agriculture is essentially rural based, giving employment of more than 48% of the total population, traditional, subsistence and indigenous in nature so introducing biotechnology (which is all most essential today particularly for developing countries with huge population burden) has huge immediate and long lasting implication in agriculture and society. The public investment is comparatively low in Biotechnological R & D in India (which is very much essential as public investment in biotechnology intends to benefit both farmers & consumers) as compare to private investments in the Developed nations. The private investment is also good but record of Big MNCs in Biotechnology is different. As the previous record says if the Govt. of India allows these Big US Giants like Monsanto, DuPont, and Wal-Mart etc to come to India these companies will come with huge investments in R&D in Biotech sector and start patenting several agricultural lines, life forms, plant genetics and breads and make IPRs on various sectors of Indian agriculture and block any further development, improvement or R & D on agriculture, as a result of which will subside the traditional direct stake holders of Indian agricultural sector. The Govt of India established DBT (Department of biotechnology) in 1986 with good amount of investment which looks after three areas of Indian agricultural sector namely Research sector, agricultural sector and food sector. These types of public institutions are essential for India as it can work on the solution of huge food shortages by working on plant genetics but there exists many hurdles in their path because of lack of Investments in the R & D, Lack of Infrastructural base and supply of skilled personals and competition with giant Private

Biotech MNCs (who come in with big investment and advance R & D in Biotechnology) where it becomes very difficult to save patents for domestic innovators from the hand of these Corporations.

5.15: SPS & Non –Tariff challenge for Indian agricultural sector:

The SPS includes Sanitary (which is for Human & animal) and Phyto sanitary (for plants) measures for maintaining international food & heath safety standard at domestic areas. That means any country under the TRIPS can inspects, treat, and search imported food or other products, Use of Pesticides, additives, quality of materials etc on the basis of disease, International health standard and maintained high domestic standard under SPS measures. These are being maintained by 132 member countries and without any already specific written laws but deliberately and voluntarily. The SPS agreements allows nations to built their own SPS standard which shall match international standard as it is becoming real cause of concern that diseases are being spread throughout the world through exports and imports for example Avian Bird flu, Foot & Mouth Disease, Mad Cow disease etc recently broke out throughout the world. In Uruguay round agreement in 1988 few basic areas were made for effective SPS measures which are (**1) Harmonisation, (2) Effective Notification process, (3) bilateral Dispute resolution system.** These were meant to develop an international trade safety standard model or system which will help protecting and expanding agricultural trade among nations smoothly. Though there exists generalised model of SPS but the SPS standard varies from country to country depending upon Geographical & social standard for example the developing countries often fail to meet SPS standard framed by the Developed nations because of lack of infrastructural & institutional capacity, that is way sometime trade disputes arises as there is no clear definite norms for it provided by the WTO to the member countries. The standard SPS rules has been framed by article 3.2 of SPS agreement under WTO, and the WTO asks the member countries to abide by these rules to maintain international, human, animal, and plant safety measures from proliferation of diseases, but the developing nations have strong arguments against this because what they have found is that the developed countries are using these SPS measures as Non tariff barriers against tem because the developing nations are mostly incapable in meeting these standards because of their institutional & infrastructural bottlenecks. The competent authority like WTO should take initiatives to aware the Governments, Farmers, Exporters, Middlemen and all other stake holders of Agricultural sector when implementing SPS standard throughout the world. There exits several international bodies like FAO (Food & Agricultural Organisation), CAC (Codex Alimentarious commission) formed by WHO which looks after international standard of food, IOE (international office of Epizootics), and IPPC (International plant protection convention) which look after animals, and plants health standards. The WTO must also ensure to protect the interest of the developing countries that as most of the developing countries are suffering from institutional & infrastructural bottlenecks as well as lack of information and awareness so they must give training and time for preparation to meet international SPS standard, meanwhile the Developed countries should not impose Non tariff barriers on country like India where poor subsistent living below poverty line often fails to follow SPS standard framed with high standard of US and EU.

If we look at India it is also facing hurdles some times when it faces Non Tariff barriers by the developed countries as a result of not fulfilling SPS criteria. India is an emerging country in the field of export of processed food items and Horticultural exports and it ranks 2nd in the world just after china (India's produced approx 170 million metric tonnes of vegetables, approx 90.2 million metric tonnes of fruits in 2015-16 and its export of processed foods was around 27000 crore in 2017-18. These figures are optimistic but the commercial processing of these commodities is less than 2% of total

production. Despite the post reform period growth the capacity utilisation of food processing industry remains below 50%.for example India's processed milk is only 16% of its total produce which is much less than Britain (88%), and China (23%). Apart from these Indian producers and exporters of agricultural sector suffers from their knowledge of health & hygiene as mostly they are unaware of where to go to understand and full fill international SPS obligations as there exits multiple agencies in India forging health norms for local & international platform. The Ministry of Agriculture and Ministry of food processing agency looks after these issues in India and **BIS (Bureau of Indian Standards), MFP (ministry of Food processing Industry), Food and Agricultural Department (FAD)** are some of the premier institutions which look after the administrations, guidelines, Formulations & implementations of SPS regulations in India. **The ISI (Indian Standard Institution**) which was formed in 1986 (under the BIS which is known as WTO-TBT enquiry point for India) works under the Ministry of consumer's affairs, food & public distribution, govt of India. The BIS works relentlessly to maintain international standards (It has enforced around 26500 standards by August 2016) both on Agricultural & Manufacturing sectors of India where Indian producers as well as foreign exporters are required to obtain BIS license before entering into the market.

The **MFP:** the ministry of food processing industry was set up in 1988 with a view to administer regulations on the formulation and enforcement of Law regarding to food processing in India. Working as a catalyst and facilitator the MFP intends to attract domestic & foreign investments for the development of food processing Industry in India. The four sectors which its takes into account are (1) Infrastructural development, (2) Technological Up gradations, (3) Development of the farmers standard of Living, (4) Administering the quality control checks and maintaining the standard of processed food quality at domestic & International market.

The **FAD:** The food and agricultural department looks after the livestock's, agricultural machinery, all types of Bio & Non Bio elements used in agriculture and food processing industry.

Despite of many initiatives taken by India to comply its agri-exports with the international standards the Developed nations often block Indian imports of goods on SPS standard ground and there by uses it as a tool of non tariff measures as even most time the DCs denied the entry of commodities on SPS ground by undermining domestic infrastructural standard of the LDCs and given them not sufficient time to upgrade these (Akram 2007).

One hardcore about SPS and TBT as non –tariff barriers to create hindrance is proven from the ever increasing ban and detention of Indian products by depriving the country from correct and timely notification of information before rejecting the shipment. And non compliance with Minimum Required Performance limit (MRPL) is shown as the reason for rejection of shipments by the authorities and no compensation granted to the producer of the goods. Whereas the truth is that new clause of rules and regulations are announced just before the date of the consignment about to reach the destination. Though Indian exporters comply to Codex Standard, concrete examples of these kind of arbitrary imposition of SPS ban can be found in the incidence of the rejection of India's a consignment of 'Egg Powder' to EU. India must raise demand in the rounds of WTO, keeping in mind the interest of the domestic exporters and producers against any sort of Arbitrary and discriminatory ban in the name of SPS & TBT and ask for proper compensation for the producers and exporters from the importing countries on failure of timely intimation regarding the change of rule. Efforts should be on both sides on the importing and exporting nations and the governing body of the WTO for the proper utilisations of the SPS norms so that it does not become anon tariff hindrance to trade.

5.16: India's Response to Agreement on TBT:

Although the full form is Technical Barriers to Trade TBT is a 'Standard Code' which follows recommendations of CAC to set standards for packaging and levelling of agricultural products. The member countries which have so far signed the agreement on TBT are expected to embody the 'WTO Code of Good Practice's attached in the annex three to the agreement. All the signatory countries are expected to conform to the agreement and 'code of Good Practice for the formulation, incorporation & Implementation of the set standard'. TBT aims at propagation of smoother trade by resolving the ensuing difference between the domestic regulation of standards and that of international. Though both TBT & SPS act as Non-tariff barriers, however, distinctions lies between their scope- SPS measures intends to protect the entry and speared of disease carrying organism or disease causing organism, and administer regulation on the Use of additives, Contaminants, Pesticides, Toxins, or disease causing organisms in food on the other hand TBT measures is concerned with technical regulations regarding inspections, testing, verification, evaluations, assurance of compliance, approval and certification. The subjects, TBT measures could cover may include levelling of alcohol beverages or cigarettes, restrictions on pharmaceutical products, materials used in packaging of foods, regulations of car safety, on various energy saving devices etc. Human health issues, unless these are caused by contamination through plants and animals, mostly come under the TBT agreement. The sectors where BIS implements the TBT agreement norms are –water resources which include water purification process, bottling, packaging, labelling etc: Petroleum related products, coal related products, metallurgical engineering, textile –all types –cotton, Polyester, Nylon, Rayon etc: Transport engineering, Chemical production, Storage, Usage etc: Electronic and telecommunication engineering , civil Engineering, Food & Agriculture , Mechanical engineering: Equipments used in transport companies and factories: equipments used for medical purposes : Management of Hospital & Nursing home services etc. TBT encompasses the entire service sector. India has been making persistent effort with the view to complying with TBT agreement of WTO which makes platform for the signatory countries to actively participate in the meetings of CAC for better comprehension of rules and regulations, all pervasive and successful implementation of SPS and TBT. Developing countries like India are yet to improve the infrastructure to keep pace with TBT agreement to avert the inevitable trade barriers.

5.17: Effects of CBD VS TRIPS conflicts on Indian Agriculture:

The Convention on Bio-Diversity (CBD), more popularly known as Bio-diversity act passed on 5th June 1992 under the UN, has been in some kind of conflicting relationship with the TRIPS. Though both of these have nominal authority, TRIPS has penalty clauses. Since TRIPS has come into being by the power of patent clause the private entrepreneurs plunders the Bio-diverse resources all over the world. The misuse of patented knowledge and plunder of indigenous resources and exploitation of local community encouraged by TRIPs face the counter challenge from CBD which makes provisions for the establishment of community knowledge and community rights and equal share of benefits. Although CBD came into being before TRIPS, the clashes that arise time to time remain unresolved because of lack of established institutions, scientific and legal forum to deal with these conflicting issues and deliver fair judgement. There are 168 nations who have signed the CBD Act including India. The purpose of CBD is the protection or preservation of Bio-Diverse components of the World so that the resources are not plundered. CBD advocates for the sustainable use of Bio-diverse components or indigenous resources had upholds the cause of the indigenous community by recognising their equal rights in the equal sharing of benefits. CBD Act VS TRIPS clearly defines the clash between the interest of the private entrepreneurship and community rights. Most of the CBD signatory nations face

challenge in striking a balance between the laws already in force, formulated before conforming to the principles of CBD Act and Newly emerging rules and laws in the TRIPS regime which has directives conflicting with those of CBD Act. When conflicts as regards trade, Community rights and violation on Diversity ensues , which of the authority body, those CBD act came into being before TRIPS rides over the other is not clear: because of the vagueness in the framework in the international policies. While TRIPS fails to check Bio-Piracy, CBD is there to check and control Bio-Piracy. India signed Bio-Diversity Act in 2002 but later leaned completely on to the RIPS agreements. India's move brings about somewhat unhealthy effects on the natural resources of the country plundering Bi-diversity and thoroughly undermining the knowledge of the Indigenous community which nurtures the Bio-Diverse components from ages immemorial.

5.18: Summery & Conclusion:

The world development process has been skewed & Partial since long time due to immense economic, Political, Technical, administrative power & resources of the developed nations along with cooperative understanding to work as a group to cartel and substantial competency which enables to bargain in the WTO negotiating table and form mandate in favour of them. The Western Developed nations leaded by the US is replacing the international laws of Justice framed for conservation of Bio-diversities, natural resources & environment for sustainability of human being and nature by raising trade agreements and intend to showing them as universal laws which every countries has to abide by. In this way they have created a system of world capitalist hegemony over the rights and needs of poor countries. They don't bother to take decision which obviously is beneficial for their big Corporate MNC houses at the cost of Natural resource, Forests, environment or even mankind. India with many developing countries has been opposing and trying to resist different proposals initiated by the Developed Countries in various Rounds of WTO including Seattle, Doha Cancun etc on Biodiversity, Plant variety, New IPR, SPS, GI and many other sectors. In case of Plant Variety amendments under the TRIPS regime India is taking all precaution and rethinking before signing on contents like **UPOV** (Union of the protection of the New varieties of Plant) legislation (TRIPS Plus legislation) which has been put forwarded by the Developed countries for protection of higher standard of plant varieties (like many areas which were not covered by the old plant variety regulation act now comes under this UPOV) (Lalitha) [1] because it will displace farmers rights from all kinds of reuse , save or share of different genetical varieties of plants & seeds,(may it be traditional or GM crops) as all these would be under the legal control or patent of registered intellectual property right holder. This will definitely overthrow farmer's right to traditional varieties of plants & seeds which is dangerous for the poor subsistence farmers of the LDCs. The big MNC houses based in the United States along with their counter parts in Europe has been successful in influencing their governments to place proposals in WTO summits and technically pass it for their favour. For example the provision of Patenting life forms which is result in tremendous & outstanding research & development of Biotechnology sector owned by private MNC houses of these industrialised nations, is a completely conflicting matter and goes against the negotiations of environmental safety & Biodiversity under WTO & CBD. Like this many other new areas also has been targeted by the Bio-tech MNCs. ***The CBD & the TRIPS both are very important contents of WTO, but in many areas they have conflicting laws. The convention of Biodiversity in many areas are quite good to uphold values and need of sustainable Bio diversity in the world and this area has been referred in article 16(5) in WTO, but the article 27.3(b) of TRIPS went against it by providing rights to research & patent of Life form which may endangered the Basic idea of BIO diversity*****.** That is why

it is important that WTO should take a sensitive look about this matter and try to resolve the issue of conflict between its two major organs TRIPS and CBD. **Articles 14.4, 15.1** etc of CBD is there which try to preserve Biodiversity issue more strongly. So it is important for the international community & WTO to review and replace the Article 27.3 (b) of TRIPS as it is creating ambiguity among the international arena of complex laws and helping Bio-piracy and at the same time give recognition to the Provisions of CBD called ABS and PIC etc which may be beneficial for conservation of Bio-diversity and traditional knowledge of LDCs. Like many developing countries India's economic base for the future of robust economic development lies on the diverse and substantially creative agricultural sector which is often called the back bone of Indian Economy that is why it has to decide where to go. Recently we are notarising India's agricultural development with very low growth rate is shifting from artificially & genetically engineered highly profitable but not sustainable GM development to new model of sustainable development programs in **Agriculture like Evergreen revolution, water harvesting, organic farming, look east policy, Farmers development by MSP, National Commission for Farmers, along with agricultural infrastructure development, improvement in Soil health, Use of organic & less harmful fertilisers, R & D in Biotechnology not only for corporate profits but also for farmers & farms welfare. We are hopeful that India shall no longer stuck into the complexities of new regulations under the new IPR regime but it will gradually** move forward for the overall development of agricultural sector for Inclusive Growth & sustainable Development.

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