

Effects of the trips agreement on developing countries economics essay



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For detailing the effects of the TRIPs agreement on the developing countries we have carefully selected the sector and the country: finally we have chosen to investigate the effects on the pharmaceutical sector in India. In our opinion this is pretty interesting because for developing pharmaceuticals an high investment is needed, but they have a low-cost reproduction and it suit very well with India, a country where pharmaceuticals was unpatentable.

The market structure

The pharmaceuticals market has been traditionally dominated by a stable core of large, globalised and innovative firms. All these top firms, looking at Fortune Magazine Rankings, are from the more industrialized countries like USA, UK and Switzerland, in particular, Lehman (2003), reported that the 82% of investments by global pharmaceuticals company are spent in the USA.

The players are also small domestic firms (involved in adaptation, manufacturing or marketing), the new biotech firms and the generic producers. Until the biotech entry the market was characterized from a low number of new entry and also we have to considerate the strong information asymmetries and the so-called "third payer problem", in-fact in many welfare-states the most important drugs are provided by the state.

Harris et al. (1990) and Smith (1993) have analyzed the effect of an increase in prescription drugs copayments and have calculated the own-price elasticity between -0.05 and -0.10, indicating an inelastic demand curve for this sector.

Also the dynamics of competition for the sector is interesting: it's a clearly Schumpeterian competition based on innovation. The firm who innovates have 20 years of monopoly granted by the patent and so can make high profits after the drug's introduction, but the product is easy to imitate and so after the patent expiration the generics will enter in the market. Without a patent the high R&D costs will be difficult to recover, but as we can see from Graphic 2 a study by the US Office of Technology Assessment demonstrates that returns in the pharmaceutical sector are higher than returns in other sectors made by the 500 top firms in the world.

Pharmaceuticals & Poor Countries

The Indian National Institute of Pharmaceutical Education & Research, in its final report "Impact of TRIPS on Pharmaceutical Prices, with specific focus on generics in India", has individualized the most important problems of access to drugs for developing and least-developed countries, identifying two major gaps with regard to inadequate access to drugs: a "discovery/development" gap between morbidity/mortality and available remedies and an "access imbalance" between consumption of drugs in developing and developed countries.

Additionally people in poor countries are more exposed to substandards and counterfeits since their countries don't grant patent protection for pharmaceutical products developed in other countries. Other disadvantage is the R&D imbalance, while the relative incidence of infectious diseases is higher in poor countries, only small R&D investments have taken place in these states connected with the drug production imbalance: over 3/4th of the

world population is concentrate in developing world that produce less than 1/10th of the drug output. Also there is a gap between urban and rural population the first one is a minority, but receives $\frac{3}{4}$ or more of medical services and product and this phenomenon is emphasized in least-developed countries where often the “ social security umblella” is missing.

Pharmaceutical sector in India

In early years the market share was dominated by foreign companies with a relative absence of Indian companies, but in the 1970 an importante step for the local industry was made: the Indian Patent Act, modeled to promote the industrial process development and to achieve a fair balance between private and public interests. Implemented from 20th April 1972 this legislation made pharmaceuticals product innovations unpatentable in India: in this way innovations patented elsewhere could be freely copied and marketed into the indian market. This legislation further restricted the import of finished formulations and imposed high tariff rates, giving a boost to the local industry.

Akshay Lal (2006), vice-president of an important local firm, individuate 5 phases for the pharmaceutical evolution in India:

before 1970: early years

1970-1980: government control

1980-1990: development phase

1990-2000: growth phase

after 2000: innovation and research

Under the government control the local industry has been able to affirm and in development phase the process has been developed, the production infrastructure has been created and export initiatives started. In the growth phase we can see a rapid expansion of domestic market, a development to international market and a research orientation. The actual phase have to consider the new IP law and need to implement discovery research.

TRIPs and its impact on Indian pharmaceutical industry

We can analyze the impact of TRIPs on the indian market by steps: the impact on Pharmaceutical R&D, the impact on Pharmaceutical Prices and the impact on drugs availability.

The indian private sector began investing in R&D after implementation of TRIPs in mid-1990s.

However Chaudhuri (2007) observed that the eleven most important indian companies together spent in R&D about the 5% of Pfizer alone, and also that indians firms doesn't have the skills for a start-to-finish process, but the model adopted is to develop new molecules up to a certain stage and then licence out to partners from developed countries. R&D expenditures in India has increased, but

Subramanian (1995) estimated the welfare losses from TRIPs implementation between US \$ 2. 4 billion and US \$ 8. 9 billion and an higher price of 67% for indians following patents products.

Thanks to the initially protection the local industry has been able to moving up the value chain, starting from the generics products to specialty products and in the end to an innovative production and so will be more competitive in the future, but the price payed consist in welfare losses and an higher price for drugs.