Research use of patented inventions



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R*EPJOL* YPF



About RepsolYPF:

- RepsolYPF: a regionally integrated oil and gas company.
- Operating in more than 28 countries.
- Leader in Spain and Argentina.
- About 30.000 employees.
- Refining capacity of more than 1.2 million barrels/day.
- EBITDA(2005): 9,139 Million Euro.



Technology in RepsolYPF

- Around 100 patents and utility models.
- Patents mostly related to Chemical Technology.
- Patent strategy focused on protecting and assuring our freedom to operate.
- About 200 R&D contracts with Universities and Academic Institutions.
- 16% of R&D budget dedicated to collaborations.







RepsolYPF experience regarding exception use for research purposes

- We have not detected this concern within the academic groups we collaborate with.
- We have not experienced a situation where a third party considers that RepsolYPF research activities are infringing the exceptions in force in the law.
- We are neither aware of such a situation in the petrochemical industry, at least within our areas of interest.
- We believe that exception use for research purposes is a basic condition in patent law that is beneficial for the advancement of science and to the patent system as well.



Other related issues

- Difficulties in accessing inventions protected by patents may also not exclusively be related to legal aspects.
- The problem may also be associated with the patent itself, viewed as scientific document.
- One of the aims of the patents system is to promote scientific and technical progress by disclosing inventions.
- Does the academic community makes proper use of the patent system to search, assess or publish scientific information?



Patents: Views from industry and academy

RepsolYPF

- Patents contain mainly technological information.
- But patents contain also valuable scientific information.
- Patents determine the scope and development line of a research project.
- A scientist can learn how to extract scientific information from patents.

Academy

- Patents are difficult to understand.
- The scientific information in patents is not reliable.
- Patents are not so recognized as scientific papers in CV's for the purpose of assessing merits.

 Patents cause delays in publication of scientific papers.



Patents and papers are not so different

A patent is a legal document: contains scientific and technological information written in a formal way.

Similarities of patents and scientific papers:

- \Box Contains a state of the art \rightarrow Background.
- □ Citation of most relevant previous art → Could allow for a citation index.
- A patent must pass an exam in order to be granted \rightarrow Referees.
- **\Box** It must be novel and not obvious \rightarrow Condition for publication.
- □ Opposition process at the disposal of third parties to revoke a patent → Letters of objections



Industry-University collaboration: an example

A research collaboration can result in patents, publications and PhD thesis.

- □ Patent EP 1325924: "Chromium catalysts active in olefin polymerisation"
 - Filling: 03.01.2002 Publication: 09.07.2003
- M.A. Esteruelas, A.M. López, L. Méndez, M. Oliván, E. Oñate
 "Synthesis, X-ray structure, and polymerization activity of a bis(oxazolinyl)pyridine chromium(III) complex" New J. Chem., 2002, <u>26</u>, 1542-1544
 - Published: 07.10.2002
- M.A. Esteruelas, A.M. López, L. Méndez, M. Oliván, E. Oñate "Preparation, Structure, and Ethylene Polymerization Behavior of Bis(Imino)Pyridyl Chromium(III) Complexes" Organometallics 2003, <u>22</u>, 395-406
 - Published: 01.01.2003



Patents as a valuable scientific records

- There is a need to transfer knowledge from academy to industry and create technology.
- Governments encourage Universities to collaborate with industry.
- Universities encourage Professors to collaborate with industry.
- Some Professors still have the view that collaboration with industry distract them from their research goals.
- There is a need of policies to promote patents as valuable scientific achievements in the academic community.
- Patents should have more weight in scientific Cv's