Academic Entrepreneurship between Scientific Career and Technology Transfer: Case Studies from Italy

Matteo Serafini (PhD, CIS Centre - University of Bologna, matteo.serafini@unibo.it)

Drawing on a definition of 'academic entrepreneurship' broader than the simple economic exploitation of academic research (*e.g.* Franzoni and Lissoni, 2009), the general aim of this study is to explore how the transfer activities of the Italian academicians are intertwined with their careers as scientists or engineers, in order to obtain a contextualized examination of their transfer practices. Reporting the first phase of an ongoing project, the paper presents a preliminary exploratory exercise of the dataset I developed regarding the academic inventors of one of the major Italian universities (i.e. the University of Bologna). The dataset enlists the patent applications submitted world-wide that involved as inventors the professors who were employees of the UniBo's science & engineering departments in the a.y. 2009/2010. The data retrieved cover the period 1960-2009.

The paper refers the in-depth qualitative analysis of ten cases of UniBo's academic entrepreneurs, carried out in order to highlight useful issues for the definition of research lines to apply to the entire dataset. The professors selected are active respectively in chemistry (4), medicine & pharmaceutics (3), electric & electronic engineering (2), agro-food mechanical engineering (1). Through the reconstruction of their "scientific biographies", based on miscellaneous public documents, I consider: a) which transfer strategies they have developed; b) how these strategies foster their academic activities; c) which "hybrid" research spaces within and outside university emerged thanks to their entrepreneurship.

First of all, their transfer activities are not simply attempts of exploiting economically academic research, but rather initiatives functional to the development of their careers as scientists and engineers. In fact, technology transfer provides them both tangible (*e.g.* funds, samples) and intangible (*e.g.* complementary expertise, learning opportunities)

resources for their researches. Secondly, the patenting initiatives in which they were involved are just a part of broader transfer strategies (especially, collaborative research and consulting activities). In many of the cases these transfer strategies received the support of the working groups/communities to which the analysed professors belong. Finally, the traditional departmental laboratories emerge as hybrid research spaces, shaped in this sense by the hybrid entrepreneurship of the researchers who use them. Overall, these preliminary results suggest that the transfer strategies and interests of the individual academicians deserve appropriate attention to understand how to harmonize the top-down institutional measures with their bottom-up entrepreneurship.