Cover Letter

Dear Sir or Madam:

I was very pleased to know the advertisement about 5th NBER Entrepreneurship Research Boot Camp (ERBC) from Professor Suzanne Scotchmer. I am interested in application for this program. I believe that this program would provide excellent environment in which to pursue my research. I hope my interests and qualifications fit the requirement of the program.

In support of my application I have enclosed my CV and an essay. Professor Suzanne Scotchmer, will email the recommendation letter to Brett Maranjian soon.

Please let me know if I may furnish any additional information.

Thank you in advance for your consideration.

Sincerely,

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Recommendation letter writer:

Professor Suzanne Scotchmer
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Berkeley, CA 94720-3880
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Junjie Zhou

Curriculum Vitae

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Education

Ph.D. Mathematics, University of California-Berkeley, May 2012 (expected)

B.S. Mathematics, University of Science and Technology of China, June 2007

Research Interests

Industrial Organization, R&D, Contract theory, Mathematical economics

Research Experience

Research Assistant to Professor Thomas Marschak, Haas School of Business, UC Berkeley, Fall 2009 – Fall 2011

Working Papers

- "Picking Winners in Rounds of Elimination" (with Suzanne Scotchmer), August 2011
- "Economics of Leadership and Hierarchy", February 2012
- "When Does More Information-Gathering Lead to More Production? The Case of the News-Vendor" (with Thomas Marschak, George Shanthikumar), November 2010

Fellowships and Awards

Guo Moruo Scholarship (Summa Cum Laude), University of Science and Technology of China, 2007

Outstanding Student Scholarship, University of Science and Technology of China, 2003-2007

Coursework

Economics
Graduate Microeconomics Sequence, Game Theory, Contract Theory, Industrial Organization, Mathematical Economics, Economics of Innovation, Economics of Institution, Economics of social networks etc

Mathematics
Partial Differential Equations, Probability, Functional Analysis, Differential Geometry, Algebraic Topology.

Seminar Presentations

Microeconomic Theory, Berkeley 2011

Theory Lunch, Berkeley 2011,2012

Personal

Born on December 12,1986.

China Citizen.

References

Available upon request

Why am I interested in 5th ERBC?
by Junjie Zhou

I was very excited when Professor Suzanne Scotchmer forwarded the email about the Entrepreneurship Research Boot Camp to me.

She was the lecturer of a course on incentives in Research& Development about two years ago, and I was one of the 7 or fewer attendants. The course was about how to use the fancy theorems I had just learned in Mechanism Design or in general Information Economics to study some real questions such as how to incentivize innovation, how to design the patent system ,etc. The course just opened my mind for me at that stage, because I was an outlier of mathematics and just shifted my interest to microeconomics. I had just taken some courses in economic theory and contract theory, but had no ideas how to conduct genuine research, even don't know how to start the first sentence of a research draft.

This reading course gave me some vivid examples about how to transfer a real, challenging problem into a economical question and how to model it and find the solution using the given knowledge we have. Since then, I became interested in R&D, entrepreneurship, patents et al. Also, Suzanne and I had been jointly working on a project about optimal ways to select projects or agents in environments where information arrives in well defined rounds. In the summer of 2011, the project turned into a working paper: "picking winners in rounds of elimination". The results in the paper can be applied to many settings such as venture capital protocols, aptitude tests, FDA testing, et al.

In the future, we would like to explore this research agenda further and work on how to optimally select agents when agents can exert hidden and costly efforts to affect the distribution of information arrived in each round. The setting is more realistic and prediction of the model should have some policy implications as well. The project seems promising and we are still working on it.

Beside this research project with Suzanne, I have a paper studying the optimal hierarchy under sequential leading by example in teams, another paper on leadership in games on social networks when players have preference over his direct neighbor's actions, such as peer effects. I show how the leader, who I model as a first mover or Stackelberg leader, affects the equilibrium efforts of others on a given social network, and how social network topology determines player's leadership. Also, I have two papers with

Thomas Marchak and George Shanthikumar on relationship between information acquisition and production (are they complement or substitute to each other?). In general, I have broad interest in IO, R&D, social networks, and information economics.

This research program is very important to me as I am still in the process of morphing from a mathematician to a real economics. This four-day camp would be the treasure on my path. I would be able to get in touch with leading economics in the field, and listen to their lectures, and get informed about the research frontier, learn and exchange research ideas with peers. All of these are all super essential for my future career path. I really hope that I had the chance to attend this fabulous program.