# Manu Goyal

Operations and Information Systems
David Eccles School of Business
University of Utah
1655 E. Campus Center Drive #7235
Salt Lake City, UT 84112

Phone:801-585-5697 Fax:801-581-7731 manu.goyal@eccles.utah.edu

## POSITIONS HELD

Current (2017-): Associate Professor, David Eccles School of Business, University of Utah
2010-2017 Assistant Professor, David Eccles School of Business, University of Utah
2005-2010 Assistant Professor, R.H. Smith School of Business, University of Maryland

Industry Experience: Hindustan Petroleum Corporation Limited, Gillette

# **EDUCATION**

Ph.D. (2001-2005) The Wharton School, University of Pennsylvania

Department of Operations and Information Management

Dissertation Title: Managing operational flexibility under uncertainty

Advisor: Professor Serguei Netessine

B.E (1992-1996) Delhi College of Engineering, India.

# **TEACHING**

Teaching Interests: Operations Management, Supply Chain Management, Spreadsheet Modeling

# **Recent Teaching Evaluations:**

Course number	Name	Students	Rating (out of 6.0)
OIS 6160	Operations Management (Core)	Executive MBA	5.8
OIS 6062	Operations Management (Core)	Professional (evening) MBA	5.7
OIS 6061	Operations Management (Core)	Full-time MBA	5.3
OIS 5610	Practical Management Science	Undergraduate Operations Majors	5.8

### RESEARCH INTERESTS

## Supply Chain Management with focus on:

- Ethics
- Strategic Information Management
- Flexibility

# PUBLICATIONS AND COMPLETED RESEARCH

Total Google Scholar citations (including working papers): 653

### **Published Papers**

1. Anand, K.S. and M. Goyal. 2018. Ethics, Bounded Rationality and IP Sharing in IT Outsourcing. Management Science (Forthcoming).

This paper won the "Best Paper Award" at the 21<sup>st</sup> Conference on Information Systems and Technology (CIST), November 2016.

Teaching materials building on this paper won the Daniels Fund Leadership in Ethics Education Award (University of Utah), 2016.

2. Gopal, A., M. Goyal, S. Netessine and M. Reindorp. 2013. *The impact of new product introduction on plant productivity in the North American automotive industry. Management Science*, Vol 59(10).

Google Scholar citations: 45

In top 33% of the highest cited papers out of the 166 papers published that year in Management Science (Web of Science citation index).

This paper won the "Chan Hahn Best Paper Award" at the Academy of Management Annual Conference, 2011

3. Goyal, M. and S. Netessine. 2011. Volume flexibility, product flexibility or both: The role of demand correlation and product substitution. Manufacturing & Service Operations Management (M&SOM), Vol 13(2), Spring 2011, pp. 180-193.

Google Scholar citations: 124

In top 20% of the highest cited papers out of the 35 papers published that year in M&SOM (Web of Science citation index).

4. Anand, K.S. and M. Goyal. 2009. Strategic information management under leakage in a supply chain. *Management Science*, Volume 55 (3), pp. 438-452.

Google Scholar citations: 188

In top 20% of the highest cited papers out of the 142 papers published that year in Management Science (Web of Science citation index).

5. Goyal M. and S. Netessine. 2007. Strategic technology choice and capacity investment under demand uncertainty. *Management Science*, Volume 53 (2), pp. 192-207.

Google Scholar citations: 245

In top 15% of the highest cited papers out of the 135 papers published that year in Management Science (Web of Science citation index).

This paper was selected as one of top three papers by the INFORMS' Junior Faculty Interest Group (JFIG) in 2006.

### Completed Research (papers available on request)

- 6. M. Goyal, Anand, K.S., Elmaghraby W.J. 2016. Right-of-First-Refusal in Sequential Procurement Auctions.
- 7. Chen He, M. Goyal and Y. Xu. 2016. Competitive intelligence in R&D markets.
- 8. Goyal, M., S. Netessine and T. Randall. 2006. *Deployment of manufacturing flexibility: an empirical analysis of the North American automotive industry*. Working paper. (Google Scholar citations: 43)

#### SELECTED RESEARCH IN PROGRESS

- Ethics and the Hold-up problem (with K.S. Anand).
- Strategic retailers and information leakage: Sports Obermeyer Redux (with K.S. Anand and Yongjae Kim).
- Coordination Mechanisms for Humanitarian Relief Operations (with K.S. Anand)

# HONORS, AWARDS, AND GRANTS

Masters Teaching Excellence Award for EMBA and PMBA teaching in year 2017-18.

Best Paper Award for "Ethics, Bounded Rationality and IP Sharing in IT Outsourcing" at the 21<sup>st</sup> Conference on Information Systems and Technology (CIST), November 2016.

The Daniels Fund Leadership in Ethics Education Award, 2016.

David Eccles Emerging Scholar award, 2015.

Meritorious service award from Manufacturing and Service Operations Management (MSOM), 2013.

Chan Hahn Best Paper Award for the paper: "The impact of new product introduction on plant productivity in the North American automotive industry" at the 2011 Academy of Management annual conference.

Meritorious service award from Manufacturing and Service Operations Management (MSOM), 2009.

Meritorious service award from Manufacturing and Service Operations Management (MSOM), 2008.

Top 15% Teaching Award from the Robert H. Smith School, for core MBA teaching in 2006-2007.

Meritorious service award from Manufacturing and Service Operations Management (MSOM), 2006.

Finalist of the Junior Faculty Interest Group (JFIG) Best Paper Competition, 2006.

Graduate Research Board (GRB) Summer Award (2006) for \$8750 from the University of Maryland.

Outstanding Scholar Award in year 2004 from the Department of Operations and Information Management of The Wharton School. This award recognizes excellence in research, teaching and course-work, and it includes a summer research grant of \$4000.

Appointed Research Fellow for summer 2004 as part of the Lehigh-Wharton NSF Grant on Distributed and Collaborative Supply Chain Integration.

Doctoral Fellowship, 2001-2005 from the Wharton School, University of Pennsylvania.

### INVITED TALKS AND CONFERENCE PRESENTATIONS

#### **Invited Talks**

2004: University of Rochester, Indian School of Business

2005: Indiana University, University of North Carolina at Chapel Hill, University of Maryland, New York University, University of California at Irvine, University of California at Santa Cruz.

2007: University of Texas, Austin

2008: Cornell University, University of Washington at St. Louis

2009: University of California at Davis

2010: University of Utah, University of Minnesota, George Mason University, Southern Methodist University

2016: University of Texas at Dallas

### Conference Talks (Invited and/or Refereed)

- Anand K.S., M. Goyal. Ethics, Bounded Rationality and The Hold-up Problem. INFORMS Annual Meeting, Houston, October 2017.
- 2. Anand K.S., H. Chen and M. Goyal. Honesty, Ethical Free Agency and The Hold-up Problem. INFORMS Annual Meeting, Nashville TN, November 2016.
- 3. Anand, K.S. and M. Goyal. Ethics, Bounded Rationality And IP Sharing In Knowledge-based Outsourcing. INFORMS Annual Meeting, Nashville TN, November 2016.
- 4. Anand, K.S. and M. Goyal. Ethics, Bounded Rationality And IP Sharing In IT Outsourcing. Conference on Information Systems and Technology, Nashville TN, November 2016.
- Chen H., Goyal, M. and Y. Xu Competitive intelligence in R&D Markets. Invited talk, INFORMS Annual Meeting, San Francisco CA, November 2014.
- 6. Elmaghraby W, M. Goyal and A. Pilehvar. Right-of-first-refusal in sequential procurement auctions. Invited talk, INFORMS Annual Meeting, San Francisco CA, November 2014.
- 7. Anand, K.S., H. Chen and M. Goyal. Honesty in Incomplete Supply Chain contracts. Invited talk, INFORMS Annual Meeting, San Francisco CA, November 2014.
- 8. Chen H., Goyal, M. and Y. Xu Competitive intelligence in R&D Markets. Invited talk, POMS Annual Conference, Atlanta, GA. May 2014
- 9. Chen H., Goyal, M. and Y. Xu. Information Acquisition Strategies in Competitive R&D Markets: Market Research Vs. Competitive Intelligence. Invited talk, INFORMS Annual Meeting, Minneapolis MN, October 2013.
- Chen H., Goyal, M. and Y. Xu. Information Acquisition Strategies in Competitive R&D Markets: Market Research Vs. Competitive Intelligence. MSOM Annual Meeting, INSEAD FR, 28-30 July, 2013.

- 11. Anand, K.S., H. Chen and M. Goyal. Honesty in Incomplete Supply Chain contracts. Invited talk, INFORMS Annual Meeting, Minneapolis MN, October 2013.
- 12. Chen H., Goyal, M. and Y. Xu. Information Acquisition Strategies in Competitive R&D Markets: Market Research Vs. Competitive Intelligence. Invited talk, POMS Annual Conference, Denver Co. May 3-6, 2013.
- 13. Anand K.S., H. Chen and M. Goyal. Trembling into myopia: Honesty in the dynamic hold-up problem. Invited talk, INFORMS Annual Meeting, Phoenix 2012.
- 14. Chen H., Goyal, M. and Y. Xu. Strategic information management in competitive R&D. Invited talk, INFORMS Annual Meeting, Charlotte NC, November 2011.
- 15. Anand K.S., H. Chen and M. Goyal. Trembling into myopia: Honesty in the dynamic hold-up problem. *Manufacturing and Service Operations Management* (M&SOM), University of Michigan, June 2011.
- Anand K.S., H. Chen and M. Goyal. Trembling into myopia: Honesty in the dynamic hold-up problem. Invited talk, POMS Annual Meeting, RENO NV, April 2011.
- 17. Anand K.S., H. Chen and M. Goyal. Trembling into myopia: Honesty in the dynamic hold-up problem. Invited talk, Utah Operations Conference, Snowbird UT, February 2011.
- 18. Gopal, A., M. Goyal, S. Netessine and M. Reindorp. The impact of new product introduction on plant productivity in the North American automotive industry. Invited talk, INFORMS Annual Meeting, Austin TX, November 2010.
- 19. Goyal, M. and S. Netessine. Volume flexibility with multiple products and the tradeoff with product flexibility. POMS Annual Meeting Vancouver, May 2010.
- 20. Elmaghraby W, M. Goyal and A. Pilehvar. Right-of-first-refusal in sequential procurement auction. POMS Annual Meeting Vancouver, May 2010.
- 21. Goyal, M. and Y. Xu. Influencing tailgators through strategically managing information in R&D projects. POMS Annual Meeting Vancouver, May 2010.
- 22. Goyal, M. and S. Netessine. Capacity investment and the interplay between volume flexibility and product flexibility. INFORMS Annual Meeting, San Diego, October 2009.
- 23. Elmaghraby W, M. Goyal and A. Pilehvar. Right-of-first-refusal in sequential procurement auction. INFORMS Annual Meeting, San Diego, October 2009.
- 24. Goyal, M. and Y. Xu. Strategic information disclosure in competitive R&D projects. INFORMS Annual Meeting, San Diego, October 2009.
- 25. Elmaghraby W, M. Goyal and A. Pilehvar. Fishing for information in procurement auctions. POMS Annual Meeting, Orlando, May 2009
- 26. Anand, K.S. and M. Goyal. Strategic information management under leakage in a supply chain. M&SOM Annual Meeting under SIG (Supply Chain), College Park (MD), June 2008.
- 27. Goyal, M. and S. Netessine. Capacity investment and the interplay between volume flexibility and product flexibility. INFORMS Annual Meeting, Seattle, November 2007
- 28. Goyal M, S. Netessine and M. Reindorp. The impact of new product introduction on assembly productivity in the North American automotive industry. INFORMS Annual Meeting, Seattle, November 2007

- 29. Anand, K.S. and M. Goyal. 2006. Strategic information management under leakage in a supply chain. INFORMS Annual Meeting, Seattle, November 2007.
- 30. Anand, K.S. and M. Goyal. 2006. Strategic information management under leakage in a supply chain. POMS Annual Meeting, Dallas, May 2007.
- 31. Goyal, M. and S. Netessine. Strategic technology choice and capacity investment under demand uncertainty. INFORMS Annual Meeting, Pittsburgh, November 2006
- 32. Goyal M, S. Netessine and M. Reindorp. The impact of new product introduction on assembly productivity in the North American automotive industry. INFORMS Annual Meeting, Pittsburgh, November 2006
- 33. Anand, K.S. and M. Goyal. 2006. Strategic information management under leakage in a supply chain. *Conference on Information System and Technology (CIST), Pittsburgh.*
- 34. Deployment of manufacturing flexibility: an empirical analysis of the automotive industry. *Manufacturing and Service Operations Management* (M&SOM) Annual Meeting, Atlanta, GA. June 19-20, 2006.
- 35. Capacity Investment and the Interplay between Volume Flexibility and Product Flexibility. *Manufacturing and Service Operations Management* (M&SOM), Northwestern University, Evanston IL. June 27-28, 2005.
- 36. Anand, K.S. and M. Goyal. 2004. Information leakage in vertical contracts. *Workshop on Information Systems and Economics, Maryland* (WISE).

# **GRADUATE STUDENTS**

- Dissertation Co-advisor for Matthew Reindorp, University of Maryland. Placed at Eindhoven University of Technology, Netherlands.
- Joint research advisor for Yongjae Kim and He Chen, University of Maryland. Yongjae Kim placed at KISDI, South Korea.

## PROFESSIONAL EXPERIENCE

### Consulting

(With Marshall Fisher) Optimizing the correct assortment and inventory at the size level: 2002-2003 a joint project with Kurt Salmon Associates, Nine West and Federated Department Stores Inc.

### Work Experience

Hindustan Petroleum Corporation Ltd., India

Marketing Manager

1999-2001

Hindustan Petroleum Corporation Ltd., India
1998-1999
Operations Manager

### Professional Activities and Service

#### Academic Service

Judge for the *Manufacturing and Service Operations Management* (MSOM) Society's "Student Best Paper Competition", 2016, 2013, 2012, 2011, 2010, 2009, 2008, 2007, 2006

Referee for Management Science, Manufacturing and Service Operations Management, Operations Research, Production and Operations Management, European Journal of Operational Research, Environment and Development Economics, Naval Research Logistics

Associate Editor for special issue of *Production and Operations Management Journal (POMS)* on "Operations Management in Business-to-Business Markets: Practice and Research"

### **Professional Activities**

Secretary of Junior Faculty Interest Group (JFIG) from 2007-2008.

# Departmental Service (University of Utah)

OM Seminar coordinator, 2010-2015; 2017 -

Member Faculty Council, 2015 –

Co-Chair Utah Operations Winter (OM) Conference, 2017-

# Departmental Service (University of Maryland)

- (i) Programs, Curriculum and Courses (PCC) Committee: Lead initiative to streamline portfolio of MBA electives offered by department for OM/MS concentrations. Conducted a thorough analysis of:
- (a) content of various electives to identify curricular gaps and unintended overlap, and
- (b) student response to various earlier offerings (enrollment and teaching evaluations)