

Antoine Désir

CONTACT INFORMATION	Technology and Operations Management, INSEAD Boulevard de Constance, 77305 Fontainebleau Cedex, France	phone: (+33) 7 67 38 49 55 e-mail: antoine.desir@insead.edu webpage: https://faculty.insead.edu/antoine-desir
ACADEMIC APPOINTMENTS	INSEAD , France <i>The INSEAD Alumni Professorship in AI</i> Associate Professor (with tenure) of Operations and Technology Management Assistant Professor of Operations and Technology Management	2024 - 2018 - 2024
EDUCATION	Columbia University , New York, NY PhD in Operations Research Thesis: <i>Fundamental tradeoffs for modeling customer preferences in revenue management.</i> - Revenue management and pricing section dissertation prize, 2018 Columbia University , New York, NY MS in Operations Research Ecole Polytechnique , Palaiseau, France Diplôme d'ingénieur, Majored in Applied Mathematics	2012 - 2017 2012 2008 - 2011
RESEARCH INTERESTS	operations management, revenue management, online advertising, choice modeling, approximation algorithms	
JOURNAL PUBLICATIONS	- Désir A, Goyal V, Wei Y, and Zhang J (2016). Sparse process flexibility designs: Is the long chain really optimal?. Operations Research 64(2): 416-431. - Finalist in the George Nicholson student paper competition, 2014 - Finalist in the MSOM student paper competitions, 2014 - Désir A, Goyal V, Segev D, and Ye C (2020). Constrained assortment optimization under the Markov chain choice model. Management Science 66(2): 698-721. - Finalist in the George Nicholson student paper competition, 2015 - Désir A, Goyal V, Jagabathula S, and Segev D (2021). Mallows-smoothed distribution over rankings approach for modeling choice. Operations Research 69(4): 1206-1227. - Finalist in the MSOM student paper competitions, 2017 - Désir A, Goyal V, and Zhang J (2022). Capacitated assortment optimization: Hardness and approximation. Operations Research 70(2): 893-904. - Singal R, Besbes O, Désir A, Goyal V, and Iyengar G (2022). Shapley meets uniform: An axiomatic framework for attribution in online advertising. Management Science 68(10): 7457-7479. - Second place in the revenue management and pricing student paper competition (student: Raghav Singal), 2019 - Cohen M, Désir A, Korula N, and Sivan B (2023). Best of both worlds ad contracts: Guaranteed allocation and price with programmatic efficiency. Management Science 69(7): 4027-4050.	

7. Balseiro S and Désir A (2023). Incentive-compatible assortment optimization for sponsored products. **Management Science** 69(8): 4668-4684.
8. Désir A, Goyal V, Jiang B, Xie T, and Zhang J (2024). Robust assortment optimization under the Markov chain model. **Operations Research** 72(4): 1595-1614..
9. Atasu A, Ciocan F, and Désir A (2024). Price delegation with learning agents. **Management Science** 70(8): 5540-5556.
10. Bompaire M, Désir A, and Heyman B (2024). Fixed point label attribution for real-time bidding. **Manufacturing & Service Operation Management** 26(3): 1043-1061.
11. Auriau V, Aouad A, Désir A, and Malherbe E (2024). Choice-Learn: Large-scale choice modeling for operational contexts through the lens of machine learning. **Journal of Open Source Software**, 9(101), 6899.
12. Aouad A, and Désir A (2025) Representing random utility choice models with neural networks. Accepted for publication at **Management Science**.
- [Second place in the INFORMS JFIG paper competition, 2022](#)
- SUBMITTED /
UNDER REVISION 13. Chen L, Désir A, and Roels G. Pay Transparency in Heterogeneous Teams: Could Some Fairness Concerns Hurt Productivity?. Minor revision at **Production & Operations Management**.
- [Selected for MSOM SIG TIE, 2023](#)
- [Finalist for the DEI best student paper competition \(student: Lin Chen\), 2024](#)
14. Désir A and Liu M, The Impact of Multi-Selection in Ride-Hailing Platforms. Under review at **Manufacturing & Service Operation Management**.
- ONGOING
WORK 15. Urlu B, Atasu A, Désir A, and Van Wassenhove L. Direct versus delegated funding in humanitarian operations: A donor perspective.
16. Désir A and Parmentier A. Efficient methods for assortment optimization using neural networks.
17. Su Y, Désir A, and Parmentier A. Decision focused learning for dynamic pricing and inventory control of substitutable products
18. Amahihamedani A, Auriau V, Aouad A, Désir A. Learning multi-choice models with combinatorial layers.
- REFEREED
CONFERENCE
PROCEEDINGS 19. Singal R, Besbes O, Désir A, Goyal V, and Iyengar G (2019). Shapley meets uniform: An axiomatic framework for attribution in online advertising. *Proceedings of ACM World Wide Web Conference (WWW)*.
20. Désir A, Goyal V, Jagabathula S, and Segev D (2016). Assortment optimization under the Mallows model. *Proceedings of Neural Information Processing Systems (NIPS)*.
21. Désir A, Goyal V, and Segev D (2016). Assortment optimization under a random swap based distribution over permutations model. *Proceedings of ACM Conference on Economics and Computation (EC)*.
22. Désir A, and McEneaney W (2013). Games of network disruption and idempotent algorithms. *Proceedings of European Control Conference (ECC)*.

OTHER PUBLICATIONS	Boosting vaccine production needs the right degree of flexibility, November 3 2021, INSEAD Knowledge. (with Prashant Yadav) Making sense of attribution in online advertising, July 19 2022, INSEAD Knowledge.	
CASE STUDIES	Désir A, Satopää V A, Heely L, and Sibony E (2022). To catch a thief: Explainable AI in insurance fraud detection. INSEAD Case with Teaching Note. - Second place in the INFORMS case competition, 2022 Désir A, Ovchinnikov A, Cloudinary: AI-powered image optimization. INSEAD Case with Teaching Note.	
AWARDS	Research Finalist for the DEI best student paper competition (student: Lin Chen), 2024 Second place INFORMS JFIG paper competition, 2022 Second place revenue management and pricing student paper prize (student: Raghav Singal), 2019 Revenue management and pricing section dissertation prize, 2018 Finalist MSOM student paper competition, 2017 Finalist George Nicholson student paper competition, 2015 Finalist George Nicholson student paper competition, 2014 Finalist MSOM student paper competition, 2014 Teaching Dean's commendation for excellence in MBA teaching, 2026 Dean's commendation for excellence in MBA teaching, 2025 Second place INFORMS case competition, 2022 Dean's commendation for excellence in MBA teaching, 2020 Service Operations Research meritorious service award, 2025 MSOM meritorious service award, 2022 Management Science distinguished service award, 2022 Management Science meritorious service award, 2018, 2020, 2021, 2023	
TEACHING EXPERIENCE	INSEAD • Hands-On Deep Learning (MBA elective) • GenAI for products and businesses (MBA elective) • Process and Operations Management (MBA core) • Social Media Analytics (MBA elective) • Foundations of Optimization (PhD) • Linear Optimization (PhD) Columbia University • Introduction to Probability and Statistics (Instructor)	2018 - Fall 2013
INDUSTRY EXPERIENCE	Google, New York, NY <i>Postdoctoral Research Scientist</i> <i>Research Intern</i>	Aug 2017 - Aug 2018 Summer 2016

Mediaocean, New York, NY
Software Engineer Intern

Summer 2013, Summer 2014

INVITED
SEMINARS

Chinese University of Hong Kong	May 2026
Shenzhen School of Data Science	Nov 2025
London Business School	May 2024
HEC Paris	Nov 2023
INSEAD School Wide Seminar Series	May 2023
NEOMA Business School	Mar 2023
NUS, IORA	Feb 2023
Imperial Business School, Analytics and Operations	June 2022
HKUST, ISOM	Aug 2021
Workshop Information Learning at IESE	July 2021
Yale, School of Management	May 2021
European TOM Series	Nov 2020
Criteo (Beer and Tech series)	Nov 2019
SPO (Seminaire d'Optimisation Parisien)	Mar 2019
New York University, Stern School of Business	May 2018
Google Research, NYC	Mar 2017
HEC Montreal	Feb 2017
UCLA, Anderson School of Management	Feb 2017
University of Pittsburgh, Industrial Engineering Department	Feb 2017
Carnegie Mellon University, Tepper School of Business	Feb 2017
HEC Paris	Feb 2017
INSEAD, Technology & Operations Management	Feb 2017
University of Chicago, Booth School of Business	Jan 2017
Harvard Business School, TOM	Jan 2017
Duke University, Fuqua School of Business	Jan 2017
Michigan University, Ross School of Business	Jan 2017
University of British Columbia, Sauder School of Business	Jan 2017
University of Illinois at Urbana-Champaign	Jan 2017
Cornell University, ORIE Department	Jan 2017
Northwestern University, Kellogg School of Management	Jan 2017
MIT, Sloan School of management	Dec 2016
Young Researchers Workshop at Cornell ORIE	Oct 2015

CONFERENCE
PRESENTATIONS

Revenue Management and Pricing Conference, New York, NY	July 2025
MSOM, London	June 2025
INFORMS, Phoenix, AZ	Oct 2023
MSOM, Montreal, Canada	June 2023
MSOM, Munich, Germany	June 2022
Revenue Management and Pricing Conference (Virtual)	June 2021
MSOM (Virtual)	June 2021
INFORMS, Seattle, WA	Nov 2019
POMS, Washington DC	May 2019
INFORMS, Phoenix, AZ	Nov 2018
ISMP, Bordeaux, France	Jul 2018
Revenue Management and Pricing Conference, Toronto, Canada	Jun 2018
INFORMS, Houston, TX	Oct 2017
INFORMS, Nashville, TN	Nov 2016
MSOM, Auckland, NZ	Jun 2016
Revenue Management and Pricing Conference, New York, NY	May 2016
INFORMS Annual Meeting, Philadelphia, PA	Nov 2015

	MSOM, Toronto, ON	Jun 2015
	Revenue Management and Pricing Conference, New York, NY	May 2015
	ISMP, Pittsburg, PA	Jul 2015
	INFORMS Annual Meeting, San Francisco, CA	Nov 2014
	MSOM, Seattle, WA	Jun 2014
	INFORMS Annual Meeting, Minneapolis, MN	Nov 2013
PROFESSIONAL SERVICE	Associate Editor at Operations Research, Markets, Platforms, and Revenue Management Area, 2026-	
	Associate Editor at Management Science, Operations Management Area, 2025-	
	Associate Editor at Manufacturing & Service Operations Management, 2024-	
	Cluster co-chair, Revenue Management and Pricing, INFORMS 2024	
	Board member for the INFORMS Revenue Management and Pricing section, 2025-2027	
	Reviewer (journals): <i>Operations Research</i> , <i>Management Science</i> , <i>Manufacturing & Service Operations Management</i> , <i>Production and Operations Management</i> , <i>Stochastic Systems</i> , <i>INFORMS Journal on Optimization</i> , <i>Operations Research Letters</i>	
	Reviewer (conferences): ACM Conference on Economics and Computation (EC), Web Conference, Neural Information Processing Systems (NeurIPS)	
	Session chair: INFORMS 2018-2026	
	Program committee member for the Web Conference in 2019-2021	
	Judge for MSOM student paper competition in 2020-2025	
	Judge for MSOM SIG in 2020-2025 (Supply Chain Management, Service, TIE)	
	Judge for Nicholson student paper competition in 2022-2023	
	Judge for INFORMS Applied Probability Society Student Paper Competition 2025-2027	
	Judge for 2026 JFIG Paper Competition	
	Committee member for the Jeff McGill student paper award (presented by the INFORMS Revenue Management and Pricing section) 2024-2025	
INTERNAL SERVICE	Research and Service seminar serie	2018-2020
	TOM area seminar coordinator	2020-2024
	AI in DP committee	2025-2026