








# Tao Ma

CONTACT INFORMATION	 <a href="https://lse.ac.uk/statistics/people/tao-ma">lse.ac.uk/statistics/people/tao-ma</a>  <a href="mailto:t.ma9@lse.ac.uk">t.ma9@lse.ac.uk</a>	 <a href="https://linkedin.com/in/tao-ma-93642013a">linkedin.com/in/tao-ma-93642013a</a>  <a href="https://xiaobaobaochifan.github.io">xiaobaobaochifan.github.io</a>
EDUCATION	<b>London School of Economics and Political Science</b> Ph.D. Candidate in Statistics (Data Science Group)	Sep 2021 – Jan 2026 London
	<b>New York University   Courant Institute</b> Master of Science in Mathematics GPA 3.81/4.00 (Top 5)   Passed the Ph.D. Written Qualification Exam	Sep 2016 – Aug 2018 New York
	<b>Hong Kong Baptist University</b> Bachelor of Science in Statistics and Operations Research (Science Elite Program) GPA 3.87/4.00 (Rank 1/61 in the Math Department)	Sep 2012 – Aug 2016 Hong Kong
RELEVANT COURSEWORK	Reinforcement Learning, Game Theory, Stochastic Analysis, Survival Analysis, Nonparametric Statistics, Time Series, Categorical Data, Numerical Methods, Linear Programming, Topology, Differential Equations, Real/Complex/Functional Analysis, Information Theory, Mathematical Foundations of Computing, Natural Language Processing with Deep Learning	
PUBLICATIONS AND PREPRINTS	Ma, T., Yang, X., & Szabó, Z. (2024). To Switch or not to Switch? Balanced Policy Switching in Offline Reinforcement Learning. arXiv preprint arXiv:2407.01837. 	
	Ma, T., & Yang, X. (2024). A Framework for Policy Evaluation Enhancement by Diffusion Models. Tiny Papers <b>ICLR</b> . (Invite to present) 	
	Ma, T., Zhu, J., Cai, H., Qi, Z., Chen, Y., Shi, C., & Laber, E. B. (2023+). Sequential Knockoffs for Variable Selection in Reinforcement Learning. arXiv preprint arXiv:2303.14281. (SEEK) 	
SELECTED ACHIEVEMENTS	<ul style="list-style-type: none"><li>• LSE Class Teacher Award</li><li>• LSE PhD Studentship (the highest honor for graduate students)</li><li>• Best Teaching Assistant Award (HKUST)</li><li>• HKSAR Government Scholarship (the highest honor for undergraduates in HK)</li><li>• Outstanding Student Award (7/4134, by The Baptist Convention of HK)</li><li>• Scholastic Award</li><li>• APEC Scholarship (by Asia Pacific Economic Cooperation)</li><li>• Best Debater prize at The World Mandarin Debating Championship, HK</li><li>• Summer Undergraduate Research Fellowship</li><li>• Mr. Li Men Jan Prize in Mathematics</li><li>• Department of Mathematics Outstanding Academic Performance Award</li><li>• Sir Tseng Chi Lu Scholarship</li><li>• President's Honour Roll</li></ul>	<ul style="list-style-type: none"><li>2022 – 2023</li><li>2021 – 2025</li><li>2019 – 2020</li><li>2013 – 2016</li><li>2015 – 2016</li><li>2015 – 2016</li><li>2014 – 2016</li><li>2015 – 2016</li><li>2014 – 2015</li><li>2014 – 2015</li><li>2013 – 2014</li><li>2013 – 2014</li><li>2012 – 2016</li></ul>
SKILLS	Python, R, SAS, MATLAB, L <sup>A</sup> T <sub>E</sub> X, HTML, CSS, JavaScript, Bash, PyTorch, Jupyter Notebook, VS Code, Linux, Git, Google Cloud Platform, local high-performance computing management	

ACADEMIC SERVICE	<b>International Conference on Learning Representations (ICLR)</b> <i>Reviewer (main track submissions)</i>	Sep 2024 – Jan 2025
	<b>Neural Information Processing Systems (NeurIPS)</b> <i>Reviewer (main track submissions)</i>	Jun 2024 – Sep 2024
	<b>London School of Economics and Political Science</b> <i>Committee member</i> <ul style="list-style-type: none"> <li>Department Review Representative</li> <li>Department Teaching Committee</li> <li>Department Moving Plan Committee</li> </ul>	London 2024 2023 – Present 2023 – Present
ACADEMIC EXPERIENCE	<b>London School of Economics and Political Science</b> Class Teacher	Sep 2021 – Present London
	<ul style="list-style-type: none"> <li><b>Undergraduate courses:</b> <ul style="list-style-type: none"> <li>ST101 Programming for Data Science (Python) Numpy, Pandas, testing, object-oriented programming, functional programming</li> <li>ST107 Quantitative Methods Introductory statistics for students in social science</li> <li>ST102/109/110 Elementary Statistical Theory One-year rigorous course in probability and statistics</li> </ul> </li> </ul>	Sep 2022 – Present Jan 2022 – May 2022 Sep 2022 – Present
	<ul style="list-style-type: none"> <li><b>Graduate courses:</b> <ul style="list-style-type: none"> <li>ST445 Managing &amp; Visualizing Data (Python) Pandas, BeautifulSoup, Sklearn, Jupyter Notebook</li> </ul> </li> </ul>	Sep 2021 – Dec 2021
	<b>Hong Kong University of Science and Technology</b> Research Assistant	Oct 2018 – Nov 2019 Hong Kong
	<ul style="list-style-type: none"> <li>Mathematical physics, partial differential equations and signal processing of robots.</li> </ul>	
INDUSTRIAL EXPERIENCE	<b>New York University</b> Recitation Leader	Sep 2017 – Dec 2017 New York
	<ul style="list-style-type: none"> <li>MATH-UA 211 Mathematics for Economics: calculus with economic theory.</li> </ul>	
OTHER PROFESSIONAL EXPERIENCE	<b>Bank of China</b> Internship – Corporate Banking and Financial Institute	Dec 2014 – Jan 2015 Hong Kong
	<b>University Mandarin Debate Team</b> President, coach <ul style="list-style-type: none"> <li>Organized weekly training sessions, managed administrative tasks, participated in international competitions and gave 3-round interviews to around 100 applicants each year.</li> </ul>	Sep 2012 – Aug 2016 Hong Kong
LANGUAGES	<b>Professional Swimming</b> Individual Medley (200 meters), Breaststroke (100 meters), Butterfly Stroke (100 meters)	2004 – 2009 Beijing
	Mandarin (native), English (fluent), Cantonese (fluent)	
INTERESTS	Basketball, calligraphy and music	
GAMES	Poker, Mahjong, Pokémon, Mario, Kirby, Dragon Ball, NBA 2K, Asphalt, FIFA, Horizon 4, Zelda, GTA 5 and a lot of others	