

# Hoang Nguyen

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## Contact Information

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Production Economics  
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## Personal Information

Nationality: Vietnam  
Date of birth: 29 Jan 1989  
Marital Status: Married

**Current Position** Senior lecturer at Department of Management and Engineering (IEI),  
Linköping University 08/2023-Now

Postdoctoral researcher at School of Business, Örebro University 2019-2023

## Education

PhD. Business and Quantitative methods, Universidad Carlos III de Madrid  
*Bayesian inference for high dimensional factor copula models*  
Supervisors: **Prof. M. Concepción Ausín** and **Prof. Pedro Galeano** 2019  
Visiting PhD student at Ca' Foscari University of Venice,  
Invited by **Prof. Roberto Casarin**, Oct - Dec, 2017  
  
MSc. Business and Quantitative methods, Universidad Carlos III de Madrid 2015  
  
BA in Banking and Finance, National Economics University, Vietnam (NEU) 2011

## Publication

11. **Hoang Nguyen**, Farrukh Javed (2023), *Dynamic relationship between Stock market and Bond market: A GAS MIDAS copula approach*, Journal of Empirical Finance (Paper - Codes)
10. **Hoang Nguyen** and Audronė Virbickaitė (2023), *Modeling stock-oil co-dependence with Dynamic Stochastic MIDAS Copula models*, Energy Economics. (Paper - Codes)
9. Sune Karlsson, Stepan Mazur, **Hoang Nguyen** (2022), *Vector autoregression models with skewness and heavy tails*, Journal of Economic Dynamics and Control. (Paper - Codes - Appendix - Slides)
8. Tamás Kiss, Stepan Mazur, **Hoang Nguyen** and Pär Österholm (2022), *Modelling the Relation between the US Real Economy and the Corporate Bond-Yield Spread in Bayesian VARs with non-Gaussian Disturbances*, Journal of Forecasting. (Paper - Codes)
7. Tamás Kiss, **Hoang Nguyen** and Pär Österholm (2022), *Modelling Okun's Law—Does non-Gaussianity Matter?*, Empirical Economics. (Paper - Codes)
6. Tamás Kiss, **Hoang Nguyen**, and Pär Österholm (2021), *Modelling Returns in US Housing Prices—You're the One for Me, Fat Tails*, Journal of Risk and Financial Management. (Paper)

	5. <b>Hoang Nguyen</b> , Trong-Nghia Nguyen, Minh-Ngoc Tran (2021), <i>A dynamic leverage stochastic volatility model</i> , Applied Economics Letters. (Paper - Slides)
	4. Tamás Kiss, <b>Hoang Nguyen</b> , and Pär Österholm (2021), <i>The Relation between the High-Yield Bond Spread and the Unemployment Rate in the Euro Area</i> , Finance Research Letters. (Paper)
	3. Tamás Kiss, Stepan Mazur, and <b>Hoang Nguyen</b> (2021), <i>Predicting returns and dividend growth - the role of non-Gaussian innovations</i> , Finance Research Letters. (Paper)
	2. <b>Hoang Nguyen</b> , M. Concepción Ausín and Pedro Galeano (2020), <i>Variational Inference for high dimensional structured factor copulas</i> , Computational Statistics & Data Analysis. (Paper - Code - Appendix - Slides - Poster)
	1. <b>Hoang Nguyen</b> , M. Concepción Ausín and Pedro Galeano (2019), <i>Parallel Bayesian inference for high dimensional dynamic factor copulas</i> , Journal of Financial Econometrics, 17(1), 118-151. (Paper - Code - Appendix - Slides - Poster)
<b>Working paper</b>	Audronė Virbickaitė, <b>Hoang Nguyen</b> and Minh-Ngoc Tran, <i>Bayesian predictive distributions of oil returns using Mixed Data Sampling volatility models</i> (Paper - Codes)
	Taras Bodnar, Stepan Mazur, <b>Hoang Nguyen</b> (2022), <i>Estimation of optimal portfolio compositions for small sample and singular covariance matrix</i> (Paper)
	Hien Nguyen Thi, <b>Hoang Nguyen</b> and Minh-Ngoc Tran (2023), <i>Deep Learning Enhanced Volatility Modelling with Covariates</i> (Paper - Codes)
<b>Ongoing work</b>	Sune Karlsson, Tamás Kiss, <b>Hoang Nguyen</b> and Pär Österholm, <i>Hybrid time varying parameter VAR models with fat tails</i> (Paper - Codes)
	<b>Hoang Nguyen</b> , Audronė Virbickaitė, M. Concepción Ausín and Pedro Galeano, <i>Variational Inference for extended factor copulas</i>
<b>Other Publications</b>	Sune Karlsson, Tamás Kiss, <b>Hoang Nguyen</b> , and Pär Österholm (2022), <i>Svensk ekonomi är inte normal (och oberoende) – fakta om makroekonomiska variablers tidsserieegenskaper</i> , Ekonomisk Debatt. (Paper)
<b>Teaching Experience</b>	<b>Instructor</b> , Statistics Unit, Örebro University Independent Project I - II, Statistics 2019 - 2022 Economics, Methods for Analysis in Economics and Finance 2022 Data mining and business analytics 2022  <b>Teaching Assistant</b> , Statistics Department, UC3M Course: <i>Optimization and simulation for business</i> - Web content 2019 Course: <i>Statistics for Business and Administration II</i> - Web content 2018 Course: <i>Statistics for Social Sciences I</i> - Web content 2018 Course: <i>Optimization and simulation for business</i> - Web content 2018 Course: <i>Statistics for Social Sciences I</i> - Web content 2017 Course: <i>Statistics for Social Sciences III</i> - Web content 2017 Course: <i>Statistics for Business Administration</i> - Web content 2016

	Course: <i>Statistics for Telecommunication</i> - Web content	2016
	Course: <i>Financial Risk Management</i> - Web content	2015
Conference & seminar	<b>Parallel Bayesian inference for high dimensional dynamic factor copulas</b>	
	Presenter, CFE-CMStatistics 2016	Seville 2016
	Presenter, Workshop in Bayesian Econometrics, UC3M	Madrid 2016
	Poster presenter, International Society for Bayesian Analysis (ISBA)	Cagliari 2016
	<b>What are drivers of Swedish sustainable development path?</b>	
	Presenter, XX Applied Economics Meetings	Valencia 2017
	<b>Variational Inference for high dimensional structured factor copulas</b>	
	Presenter, 49th Meeting of the Working Groups “Statistical Computing” and “Biostatistics”	Gunzburg 2017
	Presenter, University Ca’ Foscari Internal research seminar	Venice 2017
	Presenter, Workshop on Financial Econometrics	Örebro 2018
	Presenter, CFE-CMStatistics 2018	Pisa 2018
	Poster presenter, International Society for Bayesian Analysis (ISBA)	Edinburgh 2018
	Poster presenter, Bayesian Statistics in the Big Data Era	Marseille 2018
	<b>Variational Inference for extended factor copulas</b>	
	Presenter, The 2nd workshop on Multivariate Data and Software	Cyprus 2019
	Presenter, 39th International Symposium on Forecasting	Thessaloniki 2019
	Presenter, CFE-CMStatistics 2019	London 2019
	<b>Vector autoregression models with skewness and heavy tails</b>	
	Presenter, Instituto Tecnológico Autónomo de México external seminar	Virtual 2020
	Presenter, 40th International Symposium on Forecasting	Virtual 2020
	Presenter, 2nd Vienna Workshop on Economic Forecasting	Virtual 2020
	Presenter, Stockholm University Matstat seminar	Virtual 2020
	Presenter, ISBA world meeting	Virtual 2021
	<b>Dynamic relationship between Stock market and Bond market</b>	
	Presenter, CFE-CMStatistics 2020	Virtual 2020
	Presenter, 41th International Symposium on Forecasting	Virtual 2021
	Presenter, ISI world statistics congress 2021	Virtual 2021
	Presenter, 27th International Conference on Computing in Eco&Fin	Virtual 2021
	<b>A dynamic leverage stochastic volatility model</b>	
	Poster presenter, 11th European Seminar on Bayesian Econometrics	Hybrid 2021
	<b>Modeling stock-oil co-dependence with DSM Copula models</b>	
	Presenter, 2022 NBER-NSF SBIES Conference	Hybrid 2022
	Presenter, Swedish Conference in Economics	Stockholm 2022
	Poster presenter, ISBA world meeting	Montreal 2022
	<b>Hybrid time varying parameter VAR models with fat tails</b>	
	Poster presenter, ESOBE 2022	Salzburg 2022
	<b>Bayesian predictive distributions of oil returns using Mixed Data Sampling volatility models</b>	
	Presenter, 2023 NBER-NSF SBIES Conference	Philadelphia 2023

<b>Awards</b>	NBER-NSF SBIES travel grant	2023
	Siamon Foundation travel grant	2022
	ISBA World meeting travel grant	2018&2022
	ISF travel grant	2019
	CRoNoS travel grant	2019
	UC3M mobility grant	2017
	ALDE travel grant	2017
<b>Computer Skills</b>	Languages: R, C++, Python, Matlab	
	Software: Latex, Open Office.	
	OS: Linux.	
<b>Languages</b>	Vietnamese (Native), English (Advanced); Spanish (Elementary); Swedish (Elementary);	