

# Self Introduction

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- <https://josephcclin.github.io>

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National Taiwan Ocean University

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# Outline

## 1 Background

- Education
- Postdoctoral Experience (2011–2018)
- Industrial Experience (2018–2020)

## 2 Teaching

## 3 Research

# Education

- BS.: Mathematics (2002),  
National Cheng Kung University
- MS.: CSIE (2004),  
National Chi Nan University
  - Supervisor: R. C. T. Lee  
**Algorithms**
- Ph.D.: CSIE (2011),  
National Chung Cheng University
  - Supervisors: Maw-Shang Chang  
& Peter Rossmanith  
**FPT + Randomized Algorithms**



# DAAD-NSC Sandwich Program (2007–2008)

RWTH Aachen University (Funding: DAAD + NSC 96-2911-I-194-008-2.)



# Postdoc in Academia Sinica (2011–2018)

## 研發替代役 (2011–2014)

@Genomics Research Center, Academia Sinica  
• Bioinformatics,  
• Comparative Genomics  
PI: Trees-Juen Chuang



Academia Sinica  
Genomics Research Center



@Institute of Information Science, Academia Sinica  
• Machine Learning,  
• Game Theory  
PI: Chi-Jen Lu



# Industrial Experience (2018–2020)

- *Quantitative Analyst (intern) of Point72/Cubist Systematic Strategies (2018–2020).*
  - US Hedge Fund; Fintech; Data Science.
  - Taipei Branch (started since in 2019).
  - CEO & Chairman: Steven A. Cohen.
  - AUM: US\$27.2 billion (Jan. 2023).
  
- *Quantitative Analyst of Seth Technologies Inc. (2020–2021).*
  - High-Frequency Trading; Hedge Fund; Fintech; Data Science.
  - Taiwan based.



Photo: REUTERS/Lucy Nicholson  
<https://www.calcalistech.com/ctechnews/article/h1li1c3s>



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# Teaching in CSE, NTOU (2024 Fall)

- 2024 Fall:
  - Economics and Computation (經濟與計算; EMI)
    - TA: master students.
    - Game Theory, Mechanism Design, Social Choice, No-Regret Dynamics (Online Learning).
  - Data Structures (資料結構)
    - TA: undergraduates.
    - Space/Time Complexity, Recursion, Arrays, Matrices, Linked Lists, Trees, Graphs.



# Teaching in CSE, NTOU (2025 Spring) [待定]

- 2025 Spring:

- Mathematics for Machine Learning (機器學習數學; EMI)
  - TA: master students or senior undergraduates.

- Linear Algebra, Vector Calculus, Probability and Distributions, Continuous Optimization, Empirical Risk Minimization, Maximum Likelihood Estimation, Linear Regression, Gaussian Mixture Models, Support Vector Machines, etc.

- Randomized Algorithms (隨機演算法; EMI) (待定)

- TA: master students.

- Design and analysis of randomized algorithms.

- Programming Languages (II) (程式語言 (二)) (待定)



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# Research Interests

- Approximation/Randomized Algorithms
- Machine Learning (Theory)
- Algorithmic Game Theory
- Online Learning
- Mechanism Design

# With Prof. Guillaume Fertin, Nantes University, France

- Programme of Integrated Actions (PIA) ORCHID (TAIWAN)  
台法幽蘭計畫

Parameterized Online Learning for  
Min-Max Envy Resource Allocation  
and Team Formation.



# With Prof. Peter Rossmanith, RWTH Aachen, Germany



Invited Talk@NTOU, CSE, INS407 (Nov. 11, 2024)

Transformations between Probability Distributions.



# Independent Study (專題)

Maximizing Satisfied Clauses in a conjunctive-normal-form (CNF) formula

$$(x_1 \vee x_2 \vee x_3) \wedge (x_4 \vee \neg x_5) \wedge (x_6 \vee x_7) \wedge (\neg x_1 \vee x_3 \vee x_5) \wedge \dots$$

- Approach(es): Gradient Ascent method.

Wish You All the Best in NTOU CSE!