

# Probability (機率)

## Syllabus

Instructor: Jung-Chun Kao (高榮駿)

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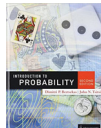
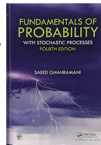
## Logistics

- Class time:
  - Wednesdays 10:10am - noon, 台達107
  - Fridays 10:10am - noon, 台達107
- Course webpage:
  - iLMS: <https://lms.nthu.edu.tw>
  - My homepage (only for syllabus): <http://www.cs.nthu.edu.tw/~jungchuk>
  - Instructor: Jung-Chun Kao (高榮駿)
  - Email: [jungchuk@cs.nthu.edu.tw](mailto:jungchuk@cs.nthu.edu.tw)
  - Office hour: Thursdays 4:30 - 5:30pm
- TAs: 林佑儒、王聖元、李承祐、李柏諺、李明哲、廖鳳汝、曹立元、邱靖豪
  - Office hour: **Mondays 5:30 - 6:30pm** (台達館 736)

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## Textbook and reference

- Textbook
  - Saeed Ghahramani, Fundamentals of Probability with Stochastic Processes
    - 4th Edition
- Reference book
  - Dimitri P. Bertsekas and John N. Tsitsiklis, Introduction to Probability
    - 2nd Edition



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## Tentative evaluation

- Assignments (10%)
  - No late homework is accepted
- Midterm and final exam (80%)
  - No make-up!
- Participation (10%)

## Course outline

- This course covers chapters 1-11
  - Axioms of Probability. (ch 1)
  - Combinatorial Methods. (ch 2, reading assignment)
  - Conditional Probability and Independence. (ch 3)
  - Distribution Functions and Discrete Random Variables. (ch 4&5)
  - Continuous Random Variables and Special Continuous Distributions. (ch 6&7)
  - Bivariate/Multivariate Distributions. (ch 8&9)
  - Expectations and Variances. (ch 10)
  - Sums of Independent Random Variables and Limit Theorems. (ch 11)

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## 關於板書

- 教師的另一疑慮，是教材中使用到別人著作的問題。著作權法第46條規定，依法設立之各級學校及其擔任教學之人，為學校授課需要，在合理範圍內，得重製他人已公開發表之著作。.....
- 此一合理使用僅限於校園內個別課堂活動之重製行為，不包括上網公開傳輸。.....
- 著作權法第46條規定僅限於教學現場之使用，其利用之時間與地點，範圍有限，至於上載網路教學平台，同學隨時、隨地均得自由利用，大大地超出本條合理使用的範圍，應該先取得授權。然而，教師或學生絕無能力獨立處理授權事務，學校必須指定專責單位，統一協助處理校園內合法使用著作之授權事務。

「教材上網所涉著作權議題之因應」 作者：章忠信  
<http://www.copyrightnote.org/ArticleContent.aspx?ID=2&aid=367>



## Online course

- University-wide online courses
  - Start at 5/18
  - End at 6/11?
- This class uses
  - Cisco Webex:  
<https://nthu.webex.com/meet/jungchuk>
    - Turn off your mic (and camera)
    - Chats/conversations by typing
  - Google drive:  
[https://drive.google.com/drive/folders/1uxLaNisJ0\\_MOLerIomIQziYxx4JxpH1D?usp=sharing](https://drive.google.com/drive/folders/1uxLaNisJ0_MOLerIomIQziYxx4JxpH1D?usp=sharing)
    - Needs GAPP NTHU account