

1142 Semester

「醣質生物學」 Glycobiology

課號：BChem 7019

課程識別碼：B46 M1240

授課老師：邱繼輝 (Khoo)、安形高志 (Angata)、呂桐睿 (Todd)

上課時間：每星期三 15:30 PM – 17:20 PM

上課地點：生化館 N101 教室

目標：本課程旨在讓學生了解醣科學的基礎概論，包含醣生物學與醣化學的層面，進而使他們能夠：

1) 自信地深度閱讀此領域的文獻，2) 為以後深入此領域的研究做好準備。

Goals: This course intends to give students an overview of the fundamental aspects of glycoscience, including both glycobiology and chemistry, enabling them to: 1) read literature in this area with confidence and 2) be prepared for future more in-depth study of the area.

評分：學生將依學期末的口頭報告被評分。此外，學生必須出席所有的課程，包括其他同學的報告。

曠課超過兩節課的學生，其等第被降低的細節如下：三次曠課–降低三分之一個等第（如 A–至 B+）；四次曠課–降低一個完整的等第（如 A–至 B–）；五次曠課–降低兩個等第（如 A–至 C–）；六次或以上曠課–課程不及格。

Assessment: Students will be evaluated on the basis of a presentation at the end of the semester. In addition, attendance in all classes, including student presentations, is required. Students who miss more than two classes will have their grades reduced as follows: three absences – reduction of one-third a letter grade (*e.g.*, A– to B+); four absences – reduction of a full letter grade (*e.g.*, A– to B–); five absences – reduction of two letter grades (*e.g.*, A– to C–); six or more absences – failure in course.

週次	日期	授課教師	授課內容
1	2/25	Todd	A Primer on Carbohydrate Structure and Conformation
2	3/04	Khoo	A Primer on Protein Glycosylation
3	3/11	Todd	Chemical Glycosidic Bond Formation
4	3/18	Todd	Glycoenzymes
5	3/25	Todd	Microbial Glycans and Biophysical Methods
6	4/01	Khoo	Mucin type O-glycosylation and Host-Microbe Interplay
7	4/08	Khoo	Glycomic Diversity and GlycoInformatics
8	4/15	Khoo	Glycoproteomics and Analytical Approaches
9	4/22	Angata	General Aspects of GBP and Galectins
10	4/29	Angata	C-type lectins

11	5/06	Angata	Siglecs
12	5/13	Angata	Integrative Systems Glycobiology
13	5/20	All	Student Presentations
14	5/27	All	Sialoglyco
15	6/03	All	Student Presentations
16	6/10	All	Student Presentations (If needed)