

Schedule of the Course 'Immunology and Genetics at the Organismal and Molecular Levels' 15 HP (BI1280), 2021-08-31 to 2021-11-01

Obligatory sessions are in bold script.

OBL = Obligatorisk aktivitet i klass; **obl** = obligatorisk aktivitet på valfri plats

Date and time	Room	Attendance	Activity	Group	Teacher
Week 35 (course week 1) Tuesday Aug 31					
09.15-10.00	Zoom	obl	Course introduction Distribution/selection of projects		ES
10.00-10.15	Zoom	obl			ES
13.15-15.30	Zoom	obl	Library introduction Project		JP
15.30-17.00	Zoom or home	obl			
Wednesday Sep 1 10.15-12.00	Zoom		L2. Immune system 1		JM
Thursday Sep 2 09.00-12.00	Zoom or home	obl	Project		
13.00-14.45	Zoom		L2. Immune system 2		JM
Friday Sep 3 10.15-12.00	Zoom		L3. Generation of antibodies		JM
13.15-15.00	Zoom		L4. Application of antibodies, application of antibodies in food science		AK
Week 36 (course week 2) Monday Sep 6					
09.15-10.00	Zoom	obl	Introduction to lab report writing	All	DK, SM
10.00-12.00	digital	obl	P1. Purification of antibodies	all	DK, SM

12.00-17.00	digital	obl	P1. Purification of antibodies		DK, SM
Tuesday Sep 7 10.15-12.00	Zoom		L5. Food allergies		IW
13.15-16.00	Zoom	obl	Group exercise	Group A	ES
Wednesday Sep 8 10.15-12.00	Zoom		L6. Recent Immunological Techniques; Applications of Immunoassays in Food Analysis		ES
Thursday Sep 9 09.15-12.00	Zoom	obl	Group exercise	Group B	ES
13.15-17.00	digital	obl	P2. ELISA step 1	All	IM, SM
Friday Sep 10 09.15-12.00	digital	obl	P2. ELISA step 2	All	IM, SM
13.15-15.30	digital	obl	P2. ELISA step 3	All	IM, SM
Week 37 (course week 3) Monday Sep 13 09.00-17.00	home	obl	Individual studies – exam preparation		
Tuesday Sep 14 09.00-17.00	home	obl	Individual studies – exam preparation		
Wednesday Sep 15					

09.00-12.00	home	obl	Individual studies – exam preparation		
Thursday Sep 16 09.00-17.00	home	obl	Individual studies – exam preparation		
Friday Sep 17 10.15-12.00	Zoom		L7. Mitosis and Meiosis, chap.2		PI
13.00-17.00	home	obl	Individual studies – exam preparation		
Week 38 (course week 4) Monday Sep 20 09.00-12.00	home	obl	Individual studies – exam preparation		
13.00-17.00	Audhumbla	OBL	Immunology exam	all	
Tuesday Sep 21 09.00-12.00	Zoom or home	obl	Project		
13.00-17.00	home		Writing lab reports		
Wednesday Sep 22 09.15-11.00 11.15-12.00	Zoom Zoom	obl	L8. Mendelian Genetics, chap. 3 Case study, chap. 3		PI
Thursday Sep 23 10.15-12.00	Zoom		L9. Modifications of Mendelian Ratios, chap.4		PI

14.15-15.15 15.30-17.00	Zoom Zoom or home	obl	L10. Sex chromosomes, chap. 5 Project		GMA
Friday Sep 24 09.15-12.00	Zoom	obl	Cross-group discussions		ES
13.00-17.00	Zoom or home	obl	Project		
Week 39 (course week 5) Monday Sep 27 09.45-12.00	Zoom		L11. DNA structure and analysis, chap. 9 L12. DNA sequence organization, chap. 11		ES
13.15-14.45	Zoom		L13. DNA replication, chap.10		JS
15.00-17.00	Zoom or home	obl	P3. Mutation lab (step 1)		AM, DK, FD
Tuesday Sep 28 09.15-12.00	digital	obl	P3. Mutation lab (step 2)	all	AM, DK, FD
13.15-17.00	digital	obl	P3. Mutation lab (step 2 continue)	all	AM, DK, FD
Wednesday Sep 29			Educational information day		
Thursday Sep 30 09.15-12.15	digital	obl	P3. Mutation lab (step 3)	all	AM, DK, FD
13.00-17.00	Zoom or home	obl	Project		

Friday Oct 1 09.15-12.15 13.00-17.00	digital home	obl obl	P3. Mutation lab (step 4) Writing lab reports	all	AM, DK, FD
Week 40 (course week 6) Monday Oct 4 10.15-12.15 13.00-17.00	Zoom Zoom or home		L14. Gene Mutation, transposition, and DNA repair, chap. 14 Project		CD
Tuesday Oct 5 09.15-11.30 13.15-17.00	Zoom home	obl	L15. Transcription, chap. 12 L16. Translation, chap.13 Writing lab reports		ES
Wednesday Oct 6 09.15-12.15	digital	obl	P4. RT-PCR lab (step 1)	all	SM, DK
Thursday Oct 7 09.15-12.15 13.15-17.00	digital	obl	L17. Regulation of gene expression, chap. 15 P4. RT-PCR lab (step 2)	all	ES SM, DK
Friday Oct 8 09.15-12.00	digital	obl	P4. RT-PCR lab (step 3)	all	SM, DK

13.15-17.00	digital	obl	P4. RT-PCR lab (step 4 and 5)	all	SM, DK
Week 41 (course week 7) Monday Oct 11 09.15-11.00 11.15-12.15 13.00 13.15-17.00	Zoom Zoom e-mail home	obl obl obl obl	L18. Quantitative Genetics, chap.21 (old book chap.22) Case study, chap.21 (old book chap.22) Deadline to submit your project to the supervisor and the reviewing group Writing lab reports	all	PI PI
Tuesday Oct 12 09.00-17.00	home	obl	Preparations for project presentation		
Wednesday Oct 13 09.15-12.15	home	obl	Preparations for project presentation		
Thursday Oct 14 09.15-12.00 13.15-16.15	home Zoom	obl obl	Writing lab reports Cross-group discussions		ES
Friday Oct 15 09.00-17.00	Zoom or home	obl	Preparations for project presentation		
Week 42 (course week 8) Monday Oct 18 09.10-12.00	Zoom or home	obl	Project		

13.15-17.00	Zoom	obl	Presentation of the project		ES
Tuesday Oct 19 09.15-12.00	Zoom	obl	Presentation of the project		ES
13.00-17.00	home	obl	Writing lab reports		
Wednesday Oct 20 09.15-11.00	Zoom	obl	L19. Plant breeding for improved food: quantitative aspects		PI
Thursday Oct 21 09.15-11.00 13.00-17.00	Zoom home	obl	L20. Plant breeding for improved food: qualitative aspects Writing lab reports		RA
Friday Oct 22 09.15-12.15	Zoom	obl	Cross-group discussions	all	ES
16.00		obl	Deadline to submit final version of lab reports (labs P3 and P4)		
Week 43 (course week 9) Monday Oct 25 09.00-17.00	home	obl	Individual studies – exam preparation		
Tuesday Oct 26 09.00-17.00	home	obl	Individual studies – exam preparation		

Wednesday Oct 27 10.15 -12.00	Zoom		Student questions		teachers
Thursday Oct 28 09.00 -17.00	home	obl	Individual studies – exam preparation		
Friday Oct 29 13.00-17.00	Tentamens sal 1	OBL	Genetics exam	all	

Course textbooks:

1). Understanding Immunology, 3rd edition (2011), Peter Wood Pearson Education Ltd. ISBN-10: 0273730681; ISBN-13: 9780273730682

<http://www.bokus.com/bok/9780273730682/understanding-immunology/>

2). Klug, W.S., Cummings, M.R., Spencer, C.A. and Palladino, M.A. Essentials of Genetics, Ninth Edition (2016) Pearson Education Ltd. ISBN 9781292108865 or earlier editions

<https://www.adlibris.com/se/bok/essentials-of-genetics-global-edition-9781292350424>

<https://www.bokus.com/bok/9781292350424/essentials-of-genetics-global-edition/>

Examination

To pass the course you have to complete lab reports, project presentation and pass the exams.

Course administrator

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Lecturers and lab supervisors

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Number of students registered this year: 18