

**MASTER IN PHOTONICS**  
**MASTER EUROPHOTONICS**

**TIMETABLE**  
**ACADEMIC YEAR 2022-2023**

Last update: February 24th 2023



UNIVERSITAT POLITÈCNICA  
DE CATALUNYA

**UAB**  
Universitat Autònoma  
de Barcelona



UNIVERSITAT DE  
BARCELONA

**ICFO**  
Institut  
de Ciències  
Fotòniques

# Calendar. Academic Year 2022-2023

September '22						
M	Tu	W	Th	F	Sa	Su
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30		

October '22						
M	Tu	W	Th	F	Sa	Su
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30
31						

November '22						
M	Tu	W	Th	F	Sa	Su
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30				

December '22						
M	Tu	W	Th	F	Sa	Su
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30	31	

January '23						
M	Tu	W	Th	F	Sa	Su
						1
2	3	4	5	6	7	8
9	10	11	12	13	14	15
16	17	18	19	20	21	22
23	24	25	26	27	28	29
30	31					

February '23						
M	Tu	W	Th	F	Sa	Su
		1	2	3	4	5
6	7	8	9	10	11	12
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28					

March '23						
M	Tu	W	Th	F	Sa	Su
		1	2	3	4	5
6	7	8	9	10	11	12
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28	29	30	31		

April '23						
M	Tu	W	Th	F	Sa	Su
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30

May '23						
M	Tu	W	Th	F	Sa	Su
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

June '23						
M	Tu	W	Th	F	Sa	Su
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30		

July '23						
M	Tu	W	Th	F	Sa	Su
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30
31						

August '23						
M	Tu	W	Th	F	Sa	Su
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30	31			

September '23						
M	Tu	W	Th	F	Sa	Su
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30		

Block	Teaching Period
B1A	12 Sept - 7 Oct
B1B	10 Oct - 2 Dec
B2	12 Dec - 17 Feb
B3	20 Feb - 21 Apr
MSc Thes	24 April-...
Sci. Writing	1&2 June

Lab Days
Exams
Activity Days
Without activity
CARLA Camp Event

## Important dates and information

### REGISTRATION:

Master in Photonics: 1<sup>st</sup> week of September

### COURSE STARTS:

Master in Photonics: 13<sup>th</sup> September / Europhotonics: 10<sup>th</sup> October

**WELCOME SESSION:** 13<sup>th</sup> September, 11h30 at the UAB campus, room C5/408

### SPRING SCHOOL by Erasmus Mundus Europhotonics Master

Tentative date: March 26-29th 2023

(Master in Photonics students are also invited)

### TEACHING BLOCKS

Lectures are grouped into three teaching blocks plus a fourth block allocated for the Master Thesis

**Block 1A:** From 12 Sep to 7 Oct (**only MSc. in Photonics**). **Location:** Autonomous University of Barcelona, Bellaterra, Barcelona

**Block 1B:** From 10 Oct to 2 Dec. **Location:** Autonomous University of Barcelona, Bellaterra, Barcelona

**Block 2:** From 12 Dec to 22 Dec and from 09 Jan to 17 Feb. **Location:** UPC Campus Nord, Barcelona

**Block 3:** From 20 Feb to 21 Apr. **Location:** UPC Campus Nord, Barcelona

**Block 4:** From 23 Apr until September. **Location:** Advisor's institution.

**Christmas holidays:** From 23 Dec 2021 to 08 Jan 2022

**Holy Week holidays:** From 03 Apr to 10 Apr

## Block 1A: Universitat Autònoma de Barcelona

	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY
10:00-11:00			SEMINARS Room N/A		
11:00-12:00					
12:00-13:00					
13:00-14:00					
14:00-15:00		INTRODUCTION TO PHOTONICS Room C5/408* Code 230550	INTRODUCTION TO PHOTONICS Room C5/408* Code 230550	INTRODUCTION TO PHOTONICS Room C5/408* Code 230550	
15:00-16:00					
16:00-17:00		BEAM PROPAGATION AND FOURIER OPTICS Room C5/408 Code 230553	BEAM PROPAGATION AND FOURIER OPTICS Room C5/408 Code 230553	BEAM PROPAGATION AND FOURIER OPTICS Room C5/408 Code 230553	
17:00-18:00					

\* Except for the following days: 13/09/2022 (C5/243), 15/09/2022 (C5/243), 22/09/2022 (C5/243), 27/09/2022 (C5/243) and 28/09/2022 (C5/247)

## Block 1A: Labs

	MONDAY 3 OCTOBER				FRIDAY 7 OCTOBER
15:00-19:00	LABORATORY SESSION 1  (UPC / UAB / UB)				LABORATORY SESSION 1  (UPC / UAB / UB)

**Notes:** Lecture Rooms: according to table, note exceptions.

# Block 1B: Universitat Autònoma de Barcelona

	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY
10:00-11:00			SEMINARS Room N/A		
11:00-12:00					
12:00-13:00					
13:00-14:00					
14:00-15:00	PHOTONICS MATERIALS AND METAMATERIALS Room C5/438 Code 230562	QUANTUM OPTICS, Room C5/438, Code 230555 / ACTIVE AND SPECTRAL IMAGING, Room C5/456, Code 230581	INTRODUCTION TO PHOTONICS Room C5/408 Code 230550	INTRODUCTION TO PHOTONICS Room C5/408 Code 230550	QUANTUM OPTICS, Room C5/438, Code 230555 / ACTIVE AND SPECTRAL IMAGING, Room C5/456, Code 230581
15:00-16:00					
16:00-17:00	FIBERS AND TELECOM Room C5/438 Code 230566	FROM COOLING AND TRAPPING ..., Room C5/438, Code 230579/ MEASURING WITH LIGHT, Room C5/456, Code 230573	BEAM PROPAGATION AND FOURIER OPTICS Room C5/408 Code 230553	BEAM PROPAGATION AND FOURIER OPTICS Room C5/408 Code 230553	FROM COOLING AND TRAPPING ..., Room C5/438, Code 230579/ MEASURING WITH LIGHT, Room C5/456, Code 230573
17:00-18:00					
18:00-19:00	FIBERS AND TELECOM Room C5/438 Code 230566	BEAM PROPAGATION AND FOURIER OPTICS Room C5/408 Code 230553	PHOTONICS MATERIALS AND METAMATERIALS Room C5/438 Code 230562		
19:00-20:00					

## Notes:

Courses that overlap in time (in red) cannot be chosen simultaneously (“Quantum Optics” and “Active and Spectral Imaging”, and “From Cooling and Trapping” and “Measuring with Light”)

# Blocks 1A and 1B: Exams, Labs and Activities

	MONDAY 21 NOVEMBER	TUESDAY 22 NOVEMBER	WEDNESDAY 23 NOVEMBER	THURSDAY 24 NOVEMBER	FRIDAY 25 NOVEMBER
<i>14:00-17:00</i>	<b>INTRODUCTION TO PHOTONICS</b>  Rooms C5/243 and C5B/027	QUANTUM OPTICS  Room C3/015	PHOTONICS MATERIALS AND METAMATERIALS  Room C3/036	FIBERS AND TELECOM  Room C3/036	FROM COOLING AND TRAPPING  Room C3/012
<i>17:00-20:00</i>		MEASURING WITH LIGHT  Room C3/015	ACTIVE AND SPECTRAL IMAGING  Room C3/036	<b>BEAM PROPAGATION AND FOURIER OPTICS</b>  Room C3/028	

	MONDAY 28 NOVEMBER	TUESDAY 29 NOVEMBER	WEDNESDAY 30 NOVEMBER	THURSDAY 1 DECEMBER	FRIDAY 2 DECEMBER	MONDAY 5 DECEMBER
<i>15:00-19:00</i>	LABORATORY SESSION 2  (UPC / UAB / UB)	ACTIVITIES DAY 1	ACTIVE & SPECTRAL IMAGING ACTIVITY	CARLA Camp	CARLA Camp	LABORATORY SESSION 2  (UPC / UAB / UB)

## Notes:

During the Activity days, several visits to research labs will be scheduled (including UPC, UAB, UB and ICFO)  
 Lecture rooms for exams still to be determined.

## Block 2: Campus Nord, Universitat Politècnica de Catalunya (UPC)

	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY
10:00-11:00			SEMINARS Room A4 205		
11:00-12:00					
12:00-13:00					
13:00-14:00					
14:00-15:00	VISUAL OPTICS & BIOPHOTONICS, Room A4 205, Code 230582 / ADVANCED QUANTUM OPTICS ... , Room A4 206, Code 230558	NONLINEAR OPTICS Room A4 205 Code 230563	VISUAL OPTICS & BIOPHOTONICS, Room A4 205, Code 230582 / ADVANCED QUANTUM OPTICS ... , Room A4 206, Code 230558	NONLINEAR OPTICS Room A4 205 Code 230563	MACHINE LEARNING ON CLASSICAL AND QUANTUM DATA Room A4 205 Code 230584
15:00-16:00					
16:00-17:00	BUSINESS AND PATENTS IN PHOTONICS Room A4 205 Code 230552	MACHINE LEARNING ON CLASSICAL AND QUANTUM DATA Room A4 205 Code 230584	IMAGE PROCESSING IN BIOPHOTONICS Room A4 205 Code 230561	BUSINESS AND PATENTS IN PHOTONICS Room A4 205 Code 230552	QUANTUM SIMULATORS, Room A4 205, Code 230578 / OPTICAL DESIGN, Rom A4 206, Code 230587
17:00-18:00					
18:00-19:00	QUANTUM SIMULATORS, Room A4 205, Code 230578 / OPTICAL DESIGN, Rom A4 206, Code 230587				INTEGRATED PHOTONICS Room A4 205 Code 230567
19:00-20:00					

**Notes:** Courses that overlap in time (in red) cannot be chosen simultaneously (Visual Optics & Biophotonics / Advanced Quantum Optics, and Quantum Simulators/Optical Design)

## Block 2: Exams, Labs and Activities

	MONDAY 6 FEBRUARY	TUESDAY 7 FEBRUARY	WEDNESDAY 8 FEBRUARY	THURSDAY 9 FEBRUARY	FRIDAY 10 FEBRUARY
14:00–17:00	VISUAL OPTICS & BIOPHOTONICS Room A4 205  ADV. QUANTUM OPTICS WITH APPLICATIONS Room A4 206	INTEGRATED PHOTONICS Room A4 205	IMAGE PROCESSING IN BIOPHOTONICS Room A4 205	NONLINEAR OPTICS Room A4 205	QUANTUM SIMULATORS Room A4 205
17:00–20:00		OPTICAL DESIGN Room A4 205			MACHINE LEARNING ON CLASSICAL AND QUANTUM DATA Room A4 205

	MONDAY 13 FEBRUARY	TUESDAY 14 FEBRUARY	WEDNESDAY 15 FEBRUARY	THURSDAY 16 FEBRUARY	FRIDAY 17 FEBRUARY
15:00-19:00	LABORATORY SESSION 3  (UPC / UAB / UB)	ACTIVITIES DAY 3	ACTIVITIES DAY 4	ACTIVITIES DAY 5	LABORATORY SESSION 3  (UPC / UAB / UB)

### Notes:

The specific timetable for the activities days will be coordinated by the corresponding professors



## Block 3: Campus Nord, Universitat Politècnica de Catalunya (UPC)

	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY
10:00-11:00			SEMINARS Room A4 205		
11:00-12:00					
12:00-13:00					
13:00-14:00					
14:00-15:00	MANAGING LIGHT WITH DEVICES, Room A4 205, Code 230572/ QUANTUM LIGHT-MATTER INTERFACES, Room A4 206, Code 230588	ULTRAFAST AND ULTRAINTENSE LIGHT Room A4 205 Code 230565	MANAGING LIGHT WITH DEVICES, Room A4 205, Code 230572/ QUANTUM LIGHT-MATTER INTERFACES, Room A4 206, Code 230588	ULTRAFAST AND ULTRAINTENSE LIGHT Room A4 205 Code 230565	EXPERIMENTAL OPTICAL TECHNIQUES IN BIOLOGY (ICFO) Code 230554
15:00-16:00					
16:00-17:00	BUSINESS AND PATENTS IN PHOTONICS Room A4 205 Code 230552	LASER SYSTEMS AND APPLICATIONS Room A4 205 Code 230570	BUSINESS AND PATENTS IN PHOTONICS Room A4 205 Code 230552	LASER SYSTEMS AND APPLICATIONS Room A4 205 Code 230570	
17:00-18:00					
18:00-19:00	NANOPHOTONICS Room A4 205 Code 230564	OPTOELECTRONICS & PHOTOVOLTAIC TECHNOLOGY Room A4 205 Code 230569	NANOPHOTONICS Room A4 205 Code 230564	OPTOELECTRONICS & PHOTOVOLTAIC TECHNOLOGY Room A4 205 Code 230569	
19:00-20:00					

**Notes:** Courses that overlap in time (in red) cannot be chosen simultaneously (Managing Light with Devices / Quantum Light-Matter Interfaces)

## Block 3: Exams, Labs and Activities

	MONDAY 10 APRIL	TUESDAY 11 APRIL	WEDNESDAY 12 APRIL	THURSDAY 13 APRIL	FRIDAY 14 APRIL
14:00-17:00	HOLIDAY NO EXAMS	ULTRAFAST & ULTRAINTENSE LASER LIGHT Room A4 205	MANAGING LIGHT WITH DEVICES Room A4 205  QUANTUM LIGHT MATTER INTERFACES Room A4 206	LASER SYSTEMS AND APPLICATIONS Room A4 205	EXPERIMENTAL OPTICAL TECHNIQUES IN BIOLOGY
17:00-20:00		OPTOELECTRONICS & PHOTOVOLTAIC TECHNOLOGY Room A4 205	NANOPHOTONICS Room A4 205		

	MONDAY 17 APRIL	TUESDAY 18 APRIL	WEDNESDAY 19 APRIL	THURSDAY 20 APRIL	FRIDAY 21 APRIL
15:00-19:00	LABORATORY SESSION 4  (UPC / UAB / UB)	Visit to MONOCROM (Morning)  LASER SYSTEMS AND APPLICATIONS ACTIVITY	BUSINESS AND PATENTS IN PHOTONICS ACTIVITY (14h-18h)	ACTIVITIES DAY 8	LABORATORY SESSION 4  (UPC / UAB / UB)

**Notes:** The specific timetable for the activities days will be coordinated by the corresponding professors.  
Monday April 10<sup>th</sup> is a holiday so there will be no exams that day.

## Block 4: Master Thesis (24 Apr to 9 Sep, 2023)

**BLOCK 4** is devoted to the Master Thesis work.

The presentations will be scheduled in 2 sessions in **July and September 2022**.

## Notes

### **SEMINARS:**

A **3 hours/week slot** is reserved for *seminars*. These seminars will be organized occasionally and will be announced few weeks in advance and held in Campus Nord, when possible. They are part of the Master program and the assistance is compulsory.

### **EXAMS AND EVALUATION PRECEDURE:**

Professors of each course decide the assessment procedure, as pointed out in the Course Contents. Exams are scheduled at the end of each teaching block.

Exceptionally, other examination activities might be performed outside the exams week schedule.

### **OTHER POSSIBLE CIRCUMSTANCES**

Under unexpected circumstances, lectures may be cancelled. In this case, reschedule will be carried out provided that both students and professors agree.

All courses will be taught in-classroom unless the health circumstances advice otherwise.