

# Week 1

## IMMUNOMETABOLISM: FROM BASICS TO THERAPY

Braga, May 16 – June 3, 2022

Monday (16/05)

Tuesday (17/05)

Wednesday (18/05)

Thursday (19/05)

Friday (20/05)

Introduction to the course	Immunometabolism I	Immunometabolism II	Immunometabolism III	Methodological Approaches
<p>9:00 – 10:00 <b>Course presentation</b> <i>Ricardo Silvestre, ICVS, UM</i></p> <p>10:30 – 11:30 <b>Basic Principles of metabolic studies I</b> <i>Fernando Rodrigues, ICVS, UM</i></p> <p>11:30-12:00 <b>Coffee break</b></p> <p>12:00 – 13:00 <b>Basic Principles of metabolic studies I</b> <i>Fernando Rodrigues, ICVS, UM</i></p>	<p>09:00 – 10:15 <b>Metabolic reprogramming of immune cells I</b> <i>Ricardo Silvestre, ICVS, UM</i></p> <p>10:15 – 10:45 <b>Coffee break</b></p> <p>10:45-12:00 <b>Metabolic reprogramming of immune cells II</b> <i>Ricardo Silvestre, ICVS, UM</i></p> <p>12:00-13:00 <b>Recap session</b> <i>Ricardo Silvestre &amp; Fernando Rodrigues, ICVS, UM</i></p>	<p>09:00 – 10:30 <b>Interaction between the immune system and cell metabolism during homeostasis I</b> <i>Bhaskar Saha, National Centre for Cell Science, India</i></p> <p>10:30-11:00 <b>Coffee break</b></p> <p>11:00 – 12:30 <b>Interaction between the immune system and cell metabolism during homeostasis II</b> <i>Jérôme Estaquier, University of Paris, France</i></p>	<p>9:00 – 10:15 <b>Clinical implication of immunometabolism I</b> <i>Massimiliano Mazzone, VIB KU Leuven Center for Cancer Biology, Belgium</i></p> <p>10:15-10:45 <b>Coffee break</b></p> <p>10:45 – 12:00 <b>Cancer metabolism and tumor microenvironment</b> <i>Barbara Kofler, Paracelsus Medical University, Austria</i></p> <p>12:00-13:00 <b>Recap session</b> <i>Fátima Baltazar and Sara Granja, ICVS, UM</i></p>	<p>09:00 – 10:30 <b>Methodological approaches to immunometabolism</b> <i>Coral Barbas-Arribas, University Foundation San Pablo CEU, Spain</i></p> <p>10:30-11:00 <b>Coffee break</b></p> <p>11:00 – 12:00 <b>Selection of the thematic for the work group</b> <i>Ricardo Silvestre, Fátima Baltazar and Tiago Gil Oliveira, ICVS, UM</i></p>
<b>Lunch</b>				
<i>Self Study</i>	<i>Self Study</i>	<i>Self study</i>	<i>Self study</i>	<b>Flash talks</b>
				<p>14:00 – 18:00 <b>Flash Talks (Students)</b> <i>Ricardo Silvestre, Fátima Baltazar and Fernando Rodrigues, ICVS, UM</i></p>

# Week 2

## IMMUNOMETABOLISM: FROM BASICS TO THERAPY

Braga, May 16 – June 3, 2022

Monday (23/05)

Tuesday (24/05)

Wednesday (25/05)

Thursday (26/05)

Friday (27/05)

Immunometabolism in disease Infectious and inflammation	Self study	Immunometabolism in disease Neurological and Autoimmune	Immunometabolism in disease Cancer and Metabolic disorders	Self study
<p>Host: <i>Ricardo Silvestre and Fernando Rodrigues</i></p> <p>09:00 – 10:30 <b>Targeting immunometabolism in host-directed therapies to fungal disease</b> <i>Agostinho Carvalho, ICVS, UM</i></p> <p>10:30-11:00 <b>Coffee break</b></p> <p>11:00 – 12:30 <b>Immunometabolism in autoinflammation and severe infection and potential interventions</b> <i>Frank van de Veerdonk, Radboud University Medical Center, The Netherlands.</i></p>		<p>Host: <i>Tiago Gil Oliveira, Fernanda Marques and João Bessa</i></p> <p>10:30 – 12:00 <b>Microglia in brain development and disease – the power of metabolic flexibility</b> <i>Rosa Paolicelli, University of Lausanne, Switzerland.</i></p>	<p>Host: <i>Fátima Baltazar, Sara Granja and Julieta Afonso</i></p> <p>09:00 – 10:30 <b>TBA</b> <i>Maria José Oliveira, I3S, Portugal</i></p> <p>10:30-11:00 <b>Coffee break</b></p> <p>11:00 – 12:30 <b>Interplay between tumor- and immune cell metabolism</b> <i>Marina Kreutz, University Hospital Regensburg, Germany</i></p>	
<h3>Lunch</h3>				
Immunometabolism in disease Infectious and inflammation	Immunometabolism in disease Neurological and Autoimmune	Immunometabolism in disease Neurological and Autoimmune	Immunometabolism in disease Cancer and Metabolic disorders	Self study
<p>14:00 – 15:30 <b>The role of immunometabolism in infectious diseases and inflammation</b> <i>Mireille Laforge, University of Paris, France</i></p> <p>15:30-16:00 <b>Coffee break</b></p> <p>16:00 – 17:30 <b>Metabolic regulation of immune cells</b> <i>Luciana Berod, Johannes Gutenberg University, Mainz, Germany</i></p> <p>17:30-18:00 <b>Recap session</b> <i>Ricardo Silvestre &amp; Agostinho Carvalho</i></p>	<p>Host: <i>Tiago Gil Oliveira, Fernanda Marques and João Bessa</i></p> <p>14:00 – 15:30 <b>Dual role of microglia in lysosomal storage disorders</b> <i>Maria Dolores Ledesma, Centro Biología Molecular Severo Ochoa (CSIC-UAM), Spain.</i></p> <p>15:30-16:30 <b>Coffee break</b></p> <p>16:30 – 18:00 <b>From human genetics and functional genomics to the neuroimmunological basis of Alzheimer's diseases</b> <i>Edoardo Marcora, Icahn School of Medicine at Mount Sinai, USA.</i></p>	<p>15:00 – 16:30 <b>Role of Microglia in Alzheimer's Disease</b> <i>Gilbert Di Paolo, Denali Therapeutics, USA.</i></p> <p>16:30-17:00 <b>Coffee break</b></p> <p>17:00-17:30 <b>Recap session</b> <i>Tiago Gil &amp; Fernanda Marques</i></p>	<p>14:00 – 15:30 <b>TBA</b> <i>Marcia Haigis, Harvard Medical School, USA</i></p> <p>15:30-16:00 <b>Coffee break</b></p> <p>16:00 – 17:00 <b>Targeting Monocarboxylate transporters to trigger anti-tumor immunity</b> <i>Sara Granja, ICVS, UM</i></p> <p>17:00-18:00 <b>Recap session</b> <i>Fátima Baltazar, Julieta Afonso &amp; Sara Granja</i></p>	

# Week 3

IMMUNOMETABOLISM: FROM BASICS TO THERAPY

Braga, May 16 – June 3, 2022

Monday (30/05)

Tuesday (31/05)

Wednesday (01/06)

Thursday (02/06)

Friday (03/06)

<i>Group Project work</i>	<i>Group Project work</i>	<i>Group Project work</i>	<i>Written exam</i>	<i>Project presentation</i>
			10:00 – 12:00 <b>Written examination</b> <i>Ricardo Silvestre, ICVS, UM</i>	9:00 – 10:30 <b>Project presentation</b>  10:30-11:00 <b>Coffee break</b>  11:00 – 12:30 <b>Project presentation</b>
<b>Lunch</b>				
<i>Group Project work</i>	<i>Group Project work</i>	<i>Group Project work</i>	<i>Group Project work</i>	<i>Project presentation</i>
				14:00 – 15:30 <b>Project presentation</b>  15:30-16:00 <b>Coffee break</b>  16:00 – 17:30 <b>Project presentation</b>