



## Würzburg GK 520 'Immunmodulation' Sommer Semester 2009 Programme

*Cellular and Molecular Immunology by AK Abbas, AH Lichtman and S. Pillai*

<b>Chapter 2: Innate Immunity</b>	<b>23 April 2009</b>	
Student Chairs: <b>Johanes Schnitzer</b> and <b>Tessa van Alen</b>		
Project leader Chair: <b>Dr. C. Krempl</b>		Student speaker:
Features of Innate Immune Recognition p20-26 NOT Box 2-1		<b>Carina Bäuerlein</b>
Components of the Innate Immune System Epithelial Barriers p27-29		<b>Christian Brede</b>
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Recruitment of Leukocytes to Sites of Infection p30-35 NOT Boxes 2-2, 2-3		<b>Jolly Deb</b>
Phagocytosis of Microbes, Killing of Phagocytosed Microbes and Other Functions of Activated Macrophages p35-38		<b>Anja Döhler</b>
Natural Killer Cells (NK) Cells p38-42 NOT Box 2-4		<b>Markus Fehrholz</b>
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Role of Innate Immunity in Stimulating Immune Responses p44-45		<b>Elena Hartmann</b>
<b>Chapter 3: Cells and Tissues of the Adaptive Immune Response</b>		<b>30 April 2009</b>
Student Chair: <b>Anja Matuschek</b> and <b>Elisa Monzon-Casanova</b>		
Project leader Chair: <b>Dr. A. Beilhack</b>		Student speaker:
Cells of the Adaptive Immune System- Lymphocytes p48-56 NOT box-3-1		<b>Elisa Monzón-Casanova</b>
Antigen Presenting Cells p56		<b>Daniela Langenhorst</b>
Anatomy and Functions of Lymphoid Tissues p56-57 Bone Marrow, Thymus and Lymph Nodes and the Lymphatic System p57-61		<b>Markus Junker</b>
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<b>Chapter 4: Antibodies and Antigens</b>		<b>7 May 2009</b>
Student Chairs: <b>Khalid Muhammad</b> and <b>Stefan Saremba</b>		Student speaker:
Project leader Chair: <b>Dr. T. Kerkau</b>		
Introduction p75 Features of Antigen Recognizing Molecules of the Immune System Table 4-1 p76 Natural Distribution and Production of Antibodies p76		<b>Katrien Pletinckx</b>
Molecular Structure of Antibodies p77-80 General Features of Antibody Structure p80-84 NOT Boxes 4-1, 4-2, 4-3		<b>Anoop Chandrian Premachandran</b>
Structural Features of Variable Regions and Their Relationship to Antigen Binding p84-85 Structural Features of Constant Regions and Their Relationship to Antigen Binding p85-88 Synthesis Assembly and Expression of Ig Molecules p88-89. NOT Box 4-3		<b>Dajana Reuter</b>
Antibody Binding of Antigens p89-92		<b>Simone Riedel</b>
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The Immunoglobulin Superfamily Box 4-2 p82-83		<b>Ahmed Seida</b>
Anti-Ig Antibodies: Allotypes and Idiotypes Box 4-3 p88		<b>Paula Tabares Gaviria</b>

<b>Chapter 5: The Major Histocompatibility Complex</b>		<b>14 May 2009</b>
Student Chairs: <b>Jianqiang Li</b> and <b>Elisa Monzón-Casanova</b>		Student speaker:
Project leader Chair: <b>Prof. J. Schneider-Schaulies</b>		
Discovery of the Mouse MHC p98-100 Identification and Nomenclature of MHC Genes in Mice Box 5-1 p100		<b>Hieu Tran-Van</b>
Discovery of the Human MHC incl. Fig 5-3 p100-101 Properties of MHC Genes p101		<b>Martin Väth</b>
Structure of MHC Molecules p102-104		<b>Josip Zovko</b>
Binding of Peptides to MHC Molecules p104-107		<b>Carina Bäuerlein</b>
Genomic Organisation of the MHC incl. Fig 5-9 p107-109		<b>Christian Brede</b>
Expression of MHC Molecules p109-110		<b>Monika Camara</b>

<b>Chapter 6: Antigen Processing and Presentation to T Lymphocytes</b>	
<b>28 May 2009</b>	
Student Chairs: <b>Anja Matuschek</b> and <b>Tessa van Alen</b>	
Project leader Chair: <b>Prof. H. Moll</b>	Student speaker:
Properties of Antigens Recognised by T Lymphocytes p114-116	<b>Jolly Deb</b>
Discovery of Antigen-Presenting Cells and Their Role in Immune Responses p.116-117 Incl. Fig. 6-3 and Table 6-2	<b>Anja Doler</b>
Antigen Presentation to Naïve T Lymphocytes: Role of Dendritic Cells in Initiating T cell Responses Antigen Presentation to Differentiated Effector T Lymphocytes p117-122. NOT Box 6-1	<b>Markus Fehrholz</b>
Dendritic Cell Subsets Box 6-1	<b>Evelyn Gassert</b>
Cell Biology of Antigen Processing incl. Fig 6-7 & Table 6-3 p122-123	<b>Elena Hartmann</b>
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<b>Chapter 7: Antigen Receptors and Accessory Molecules of T Lymphocytes</b>	
<b>4 June 2009</b>	
Student Chairs: <b>Jianqiang Li</b> and <b>Elisa Monzón-Casanova</b>	
Project leader Chair: <b>Prof. T. Hünig</b>	Student speaker:
Identification of the TCR Box 7-1 p139	<b>Susanne Köthe</b>
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Role of the $\alpha\beta$ TCR in the Recognition of MHC-Associated Peptide Antigen p140-142	<b>Michaela Kruhm</b>
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Costimulatory and Inhibitory Receptors of the CD28 Family p146-147	<b>Dajana Reuter</b>
CD2 and the SLAM Family if Costimulatory Receptors p147-148	<b>Simona Riedel</b>
Other Accessory Molecules on T cells p 148	<b>Paula Römer Roche</b>

<b>Chapter 8: Lymphocyte Development and the Rearrangement and Expression of Antigen Receptor Genes</b>	<b>18 June 2009</b>	
Student Chairs: <b>Khalid Muhammad</b> and <b>Johanes Schnitzer</b>		
Project leader Chair: <b>Prof. T. Hünig</b>		Student speaker:
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<b>Chapter 9: Activation of T Lymphocytes</b>	<b>25 June 2009</b>	
Student Chairs: <b>Anja Matuschek</b> and <b>Elisa Monzón-Casanova</b>		
Project leader Chair: <b>Dr. N. Beyersdorf</b>		Student speaker:
Overview T Lymphocyte Activation p189-191		<b>Jolly Deb</b>
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<b>Chapter 10: B Cell Activation and Antibody Production</b>	<b>2 July 2009</b>	
Student Chairs: <b>Kahlid Muhammad</b> and <b>Stefan Saremba</b>		
Project leader Chair: <b>Dr. I. Berberich</b>		Student speaker:
General Features of Humoral Immune Responses p215-218		<b>Markus Junker</b>
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<b>Chapter 11: Immunological Tolerance</b>	<b>9 July 2009</b>	
Student Chairs: <b>Anja Matuschek</b> and <b>Johanes Schnitzer</b>		
Project leader Chair: <b>Prof. M. Lutz</b>		Student speaker:
General Features and Mechanisms of Immunological Tolerance p244-246		<b>Simona Riedel</b>
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<b>Chapter 12: Cytokines</b>		<b>Wednesday 15 July 2009, lecture room</b>	
Student Chairs: <b>Jianqiang Li</b> and <b>Stefan Sarembea</b>		Student speaker:	
Project leader Chair: <b>Prof. T. Hünig</b>			
General Properties of Cytokines p268-273			<b>Martin Väh</b>
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<b>Chapter 13: Effector Mechanisms of Cell-Mediated Immunity</b>		<b>23 July 2009</b>	
Student Chairs: <b>Johanes Schnitzer</b> and <b>Tessa van Alen</b>		Student speaker:	
Project leader Chair: <b>Prof. S. Schneider-Schaulies</b>			
Types of Cell-Mediated Immune Reactions p303-304			<b>Markus Fehrholz</b>
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<b>Chapter 14: Effector Mechanisms of Humoral Immunity</b>	<b>30 July 2009</b>	
Student Chairs: <b>Khalid Muhammad</b> and <b>Stefan Saremba</b>		
Project leader Chair: <b>Prof. Hans-Peter Tony</b>		Student speaker:
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