



**DOCTORAL SCHOOL OF THE INSTITUTE
OF IMMUNOLOGY AND EXPERIMENTAL THERAPY
POLISH ACADEMY OF SCIENCES**

Rudolfa Weigla 12, 53-114 Wrocław, Poland szkoladoktorska.hirsfeld.pl

Doctoral School Syllabus

Course Title	Immunology
Form of classes	Lecture
Main lecturer	Prof. dr hab. Anna Chelmonska-Soyta
Lecturers	Dr hab. Małgorzata Cebrat, prof. dr hab. Marcin Czerwiński, prof. dr hab. Katarzyna Bogunia-Kubik, dr hab. Izabela Nowak, dr Mariola Paściak, dr hab. Beata Orzechowska, prof. dr hab. Aleksandra Klimczak, prof. dr hab. Sabina Górńska, dr hab. Tomasz Niedziela, dr Anna Sławek, dr Agnieszka Szczygiel, dr Beata Filip-Psurska
Number of hours	30
Subject status	Mandatory
Languages of classes	English
Entry requirements	None
Course description	The course is consisted of monographic lectures concerning the contemporary topics in basic immunology: Immune response. Communication and migration of cells in the immune system. Immune recognition. Mechanism of V(D)J recombination and T-cell maturation. Antibodies, antibody engineering. Histocompatibility, antigen presentation, immune tolerance. NK cell biology. Antibacterial immunity. Blood group antigens. Skin immunology. Mucosal immunity. Microbiome. Defending Against Viruses: Understanding Anti-Viral Immunity Vaccines and vaccination. Pregnancy immunology. Tumor immunology. Animal models in immunology
Learning outcomes	P8S_WG, P8S_WK, P8S_UW
Method of verification of learning outcomes	Active discussion during lectures, individual essays
Supplementary literature	1.Cellular and Molecular Immunology – Abbas, Lichtman, Pillai, Henrickson, Elsevier, 11th ed, 2026 2.Janeway's Immunobiology , K.M.Murphy, C.Weaver, L.J Berg Ed. W. W. Norton & Company, 10th ed. 2022 3.Current review and original articles provided by lecturers

