

PASTEUR COURSE

Vaccines and Antibodies for Pandemic Preparedness and Global Health



Education Center
Institut Pasteur, Paris



June 14-25, 2027



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INSTITUT
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Course Directors

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SUMMARY

This intensive two-week advanced course provides a comprehensive overview of modern vaccinology and antibody discovery, integrating immunology, structural biology, clinical development, regulatory science, manufacturing, and global policy. Designed for PhD scientists, clinicians, pharmacists, veterinarians, and global health professionals, VAPPGH bridges fundamental science and real-world implementation to accelerate next-generation vaccines and antibodies for pandemic preparedness.

THURSDAY, JUNE 12TH

12:30 - 13:15 Mandatory Pre-start via Zoom  Visio Education Center

MONDAY, JUNE 14TH

9:00 - 9:30 **Education Center Presentation**

9:30 - 12:30 **Course introduction** **Guillemette MASSE-RANSON**
(Institut Pasteur, France)
Emanuele ANDREANO
(Fondazione Biotechnopolo di Siena, Italie)

14:00 - 15:15 **Vaccine history & evolution of vaccine platforms in the clinics** **Odile LAUNAY**
(Université Paris Cité, France)

15:45 - 17:00 **Vaccinology in the artificial intelligence era** **Rino RAPPUOLI**
(Fondazione Biotechnopolo di Siena, Italia)

17:00 - 17:30 **Round table History and evolution**

TUESDAY, JUNE 15TH

9:00 - 10:15 **Influenza biology and strain selection for pandemic preparedness** **Kanta SUBBARAO**
(Université Laval, Canada)

10:45 - 12:00 **Immune responses, vaccines and monoclonal antibodies against influenza** **Florian KRAMMER**
(Krammer laboratory, Vienna)

13:30 - 14:45 **CHIM: clinical acceleration and knowledge about MoA** **Marie Astrid HOOGERWERF**
(Leiden University, Netherlands)

15:00 - 16:20 **Vaccine development phases clinical trials : example of influenza** **Audino PODDA**
(Novartis vaccine, United Kingdom)

16:30 - 17:30 **Round table Flu vaccines: what's next?**

WEDNESDAY, JUNE 16TH

9:00 - 10:15 **Smallpox history & Mpox evolution, clinical trials** **Bernard MOSS**
(National Institute of Allergy & Infectious Diseases, United states)

10:45 - 12:00 **Mpox immune responses & preclinical** **Asisa VOLZ**
(Stiftung Tierärztliche Hochschule Hannover, Germany)

13:30 - 14:45 **Coronavirus outbreaks & clinical trials** **Carole HENRY**
(Moderna, United states)

15:00 - 16:20 **SARS-CoV-2 vaccine platforms and focus on mRNA** **Bali PULENDRAN**
(Stanford Medicine, United states)
Norbert PARDI
(Penn Institute for RNA Innovation, United states)

16:30 - 17:30 **Round table mRNA vaccine breakthrough**

THURSDAY, JUNE 17TH

9:00 - 10:15	Novel approaches to tackle AMR	Mariagrazia PIZZA (Pfizer, Italy)
10:45 - 12:00	Establishing a vaccine immune response protective threshold licensure: pneumoccal conjugate vaccine	Mark FLETCHER (Pfizer, Italy)
13:30 - 14:45	AMR Vaccines & Immunology	Laurence MULARD (Institut Pasteur, France)
15:00 - 16:20	Glycoconjugates Vaccines	Speaker to be confirmed
16:30 - 17:30	Round table What are the key steps to inform vaccine protection and decision making invaccines?	

FRIDAY, JUNE 18TH

9:00 - 10:15	Acceleration of malaria vaccines by the emergence of mRNA vaccines	Chetan CHITNIS (Institut Pasteur, France)
10:45 - 12:00	Innovation in arboviruses countermeasures: a vector approach?	Anna-Bella FAILLOUX (Institut Pasteur, France)
13:30 - 14:45	Flavivirus outbreaks and countermeasures	Giovana BARBA SPAETH (Institut Pasteur, France)
15:00 - 16:20	Flavivirus structural vaccinology	Felix REY (Institut Pasteur, France)
16:30 - 17:30	Round table Neglected diseases and One Health: how to persue innovation and fund low income countries innovation and trials	

MONDAY, JUNE 21ST

9:00 - 10:15	mAbs & reverse vaccinology 3.0	Emanuele ANDREANO (Fondazione Biotechnopolo di Siena, Italie)
10:45 - 12:00	Structural antigen design for vaccine developments	Jason MCLELLAN (the University of Texas, United states)
13:30 - 14:45	Immunomonitoring & systems immunology	Arnaud MARCHANT (Plotkin Institute for Vaccinology, Belgium)
15:00 - 16:20	Correlates of protection	Miles DAVENPORT (UNSW, Australia)
16:30 - 17:30	Round table How translational are the Correlates of immunity between animal models, clinical trials and cohort studies? Is there a standard to identify CoP?	

TUESDAY, JUNE 22ND

9:00 - 10:15	Manufacturing: vaccines & antibodies	Speaker to be confirmed
10:45 - 12:00	mRNA industrial manufacturing	Sotiris MISSAILIDIS (Institut Pasteur, France)
13:30 - 14:45	Adjuvant	Nicolas COLLIN (Vaccine Formulation Institute, Switzerland)
15:00 - 16:20	Evolution of the vaccine regulatory landscape for preparedness against emerging viruses and AMR pathogens	Isabelle BEKEREDJIAN-DING (Marburg University, Germany)
16:30 - 17:30	Round table Regulatory and manufacturing: what are the key steps you need to think when you start vaccine discovery?	

WEDNESDAY, JUNE 23RD

9:00 - 10:15	Pandemic lessons & epidemiology	Arnaud FONTANET (Institut Pasteur, France)
10:45 - 12:00	Pandemic policy & prioritization	Cristina CASSETI (Institut Pasteur, France)
13:30 - 14:45	Hemorrhagic fevers vaccines and BSL4 capacities	Sylvain BAIZE (Institut Pasteur, France)
15:00 - 16:20	Vaccine hesitancy	Peter J HOTEZ (Institut Pasteur, France)
16:30 - 17:30	Round table How to reconcile human/environment/animal health and innovation ? What are the needs to fight the next pandemic threats?	

THURSDAY, JUNE 24TH

9:00 - 17:00 **Exam Preparation + Course Survey**

FRIDAY, JUNE 25TH

9:00 - 12:00 **Final Exam**

14:00 - 17:00 **Closing remarks & networking. Visit of Pasteur campus?**

18:00 - 23:00 **La Seine river cruise and dinner**