

# Virology days 2023

Program of The 6th Russian-Chinese Symposium on Infectious Diseases



The Russian-Chinese Symposium is a part of the International Forum «Virology Days», and is organized as a part of the Decade of Science and Technology 2022 — 2031 in the Russian Federation. The event is supported by the Ministry of Education and Science of the Russian Federation as part of the implementation of the program of the World Class Research Center «Advanced Digital Technologies» (agreement of April 20, 2022, №075-15-2022-313 of the A.A.Smorodintsev Research Institute of Influenza of the Ministry of Health of Russia)







November 7 <sup>th</sup>, Tuesday



## **OPENING CEREMONY**

Venue: Smorodintsev Research Institute of Influenza, Saint Petersburg

- **10:00–10:10** welcome from the MoH Russian Federation
  - welcome from the Chinese Delegation
  - welcome from Smorodintsev Research Institute of Influenza
  - welcome from the Consulate General of the People's Republic of China in St. Petersburg







## SESSION 1: LESSONS LEARNED FROM 3 YEARS OF COVID-19 PANDEMIC

**MODERATORS:** 

Prof. Dong Xiaoping, Prof. Eduard Karamov

#### 10:10–10:30 EVOLUTION AND VARIATION OF SARS-COV-2 AND VACCINE DEVELOPMENT

**Prof. Dong Xiaoping,** Chief Virologist, Chinese Center for Disease Control and Prevention, Beijing, China

#### 10:30-10:50 PROBLEMS OF INFECTIOUS DISEASES IN THE 21<sup>ST</sup> CENTURY

**Prof. Eduard Karamov,** Gamaleya National Research Centre of epidemiology and microbiology, Moscow, Russia

#### 10:50–11:10 SARS-COV-2 VARIANTS GENETIC MONITORING IN RUSSIAN FEDERATION AND ITS IMPLEMENTATION TO PUBLIC HEALTH

**Andrey Komissarov,** Smorodintsev Research Institute of influenza, St. Petersburg, Russia

#### 11:10–11:30 THE EPIDEMIC OF SARS-COV-2 IN SIBERIAN FEDERAL DISTRICT IN 2020-2022

**Natalia Palyanova,** Institute of Virology, Federal Centre of Fundamental and Translational Medicine, Novosibirsk, Russia

#### 11:30–11:50 THE GENETIC DIVERSITY ANALYSIS OF SARS-COV-2 VARIANTS FOR SUBSEQUENT MODELING OF ITS EVOLUTION

**Andrey Palyanov,** A.P. Ershov Institute of Informatics Systems, Siberian Branch of the Russian Academy of Sciences, Novosibirsk, Russia

11:50–12:20 GROUP PHOTO AND COFFEE BREAK









## SESSION 2: INFLUENZA VIRUSES AS A CONSTANT THREAT TO HUMAN HEALTH

**MODERATORS:** 

Prof. Wang Dayan, Daria Danilenko

#### 12:20–12:40 INFLUENZA MONITORING AND CONTROL IN CHINA

**Prof. Wang Dayan,** Director, National Influenza Center, National Institute for Viral Disease Control and Prevention, Chinese Center for Disease Control and Prevention, Beijing, China

#### 12:40–13:00 INFLUENZA A(H1N1)PDM09 AS THE CAUSE OF THE MOST INTENSE SEASONAL EPIDEMICS IN RUSSIA

*Daria Danilenko,* Smorodintsev Research Institute of influenza, St. Petersburg, Russia

#### 13:00–13:20 SEVERE CASES OF SEASONAL INFLUENZA IN HUMANS

*Natalia Kolosova, VECTOR Research Centre of Virology and Biotechnology, Koltsovo, Novosibirsk region, Russia* 

#### 13:20–13:40 DEVELOPMENT OF SUBUNIT VACCINES AGAINST ACUTE RESPIRATORY VIRAL INFECTIONS BASED ON A CORPUSCULAR ADJUVANT

Igor Krasilnikov, Biotechnology Developments, LLC, St. Petersburg, Russia

13:40-14:50 LUNCH









## **SESSION 3: ZOONOTIC INFLUENZA**

MODERATORS:

Prof. Wang Dayan, Dr. Victor Irza

#### 14:50–15:10 HIGHLY PATHOGENIC AVIAN INFLUENZA IN RUSSIA. CURRENT STATE AND FUTURE PERSPECTIVES

*Alexey Danilenko,* VECTOR Research Centre of Virology and Biotechnology, Koltsovo, Novosibirsk Novosibirsk region, Russia

15:10–15:30 VETERINARY VACCINES: PROBLEMS AND PERSPECTIVES Nikolai Tarlavin, St. Petersburg State University of Veterinary Medicine, St. Petersburg, Russia

#### 15:30–15:50 EPIZOOTIC SITUATION WITH AVIAN INFLUENZA IN RUSSIAN FEDERATION

Victor Irza, Federal Centre for Animal Health, Vladimir, Russia

15:50–16:20 COFFEE BREAK









### SESSION 4: DIAGNOSTICS, TREATMENT AND PROPHYLAXIS OF ACUTE RESPIRATORY VIRAL INFECTIONS

#### MODERATORS:

Prof. Andrey Vasin, Daria Danilenko

#### 16:20–16:40 APPLICATION OF CATIONIC LIPOSOMES 2X3-DOPE FOR THE DELIVERY OF MRNA-BASED VACCINE AGAINST INFLUENZA

**Prof. Andrey Vasin**, Institute of Biomedical Systems and Biotechnologies Peter the Great St. Petersburg Polytechnic University, Smorodintsev Research Institute of Influenza, St. Petersburg, Russia

#### 16:40–17:00 THE ROLE OF RAPID DIAGNOSTIC TESTS (RDTS) DEVELOPMENT IN CONTEMPORARY DIAGNOSTICS APPROACH OF ACUTE RESPIRATORY VIRAL INFECTIONS IN RUSSIA

German Khunteev, Rapid Bio, LLC, Moscow, Russia

#### 17:00–17:20 RECENT ADVANCES IN THE DEVELOPMENT OF LIVE INFLUENZA VACCINES WITH BROAD SPECTRUM OF PROTECTION

*Irina Isakova-Sivak,* Corresponding member of RAS, Institute of Experimental Medicine, St. Petersburg, Russia

#### 17:20–17:40 EFFECTIVENESS OF INFLUENZA VACCINATION DURING THE COVID-19 PANDEMIC PERIOD

*Aristitsa Kostinova,* I.M. Sechenov First Moscow State Medical University, Moscow, Russia

17:40–17:50 DISCUSSION AND WRAP-UP OF DAY 1







November 8<sup>th</sup>, Wednesday



## SESSION 5: FIFTY YEARS OF BROAD-SPECTRUM ANTIVIRALS: FROM RESEARCH TO CLINICAL APPLICATIONS



Online, stream available at https://vk.com/rii\_influenza

**MODERATORS:** 

Prof. Dmitry Lioznov, Smorodintsev Research Institute of Influenza, St. Petersburg, Russia Artem Poromov, Mechnikov Research Institute of Vaccines and Sera, Moscow, Russia

08:00-08:10 INTRODUCTION AND WELCOME FROM SMORODINTSEV RESEARCH INSTITUTE OF INFLUENZA

#### 08:10-08:30 RUSSIAN KEYS TO SUCCESS IN THE FIGHT AGAINST PANDEMICS: THE VIEW OF AN INFECTIOUS DISEASE SPECIALIST

**Prof. Natalia Pshenichnaya,** FBSI "Central Research Institute of Epidemiology" Rospotrebnadzor, Moscow, Russia







#### 08:30-08:50 A 52-WEEK MULTICENTER, RANDOMIZED, DOUBLE-BLIND, PLACEBO-CONTROLLED, PROSPECTIVE STUDY TO EVALUATE THE EFFICACY AND SAFETY OF ARBIDOL HYDROCHLORIDE CAPSULES IN REDUCING THE FREQUENCY OF MODERATE OR SEVERE ACUTE EXACERBATIONS IN PATIENTS WITH CHRONIC OBSTRUCTIVE PULMONARY DISEASE

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**Prof. Li Zhao,** Director of the Department of Respiratory and Critical Care Medicine, Shengjing Hospital Affiliated to China Medical University, Shengjing, China

#### 08:50-09:10 THE ROLE OF ARBIDOL IN THE TREATMENT OF COVID-19 AND INFLUENZA FROM CHINESE CLINICAL STUDIES

**Prof. Rongmeng Jiang,** Infectious Disease Department, Vice President of Beijing Ditan Hospital Capital Medical University, Beijing, China

09:10–09:20 THE UPS AND DOWNS OF ANTIVIRAL DRUG DEVELOPMENT Anna Shtro, Smorodintsev Research Institute of Influenza, St. Petersburg, Russia

#### 09:20-09:40 ARBIDOL INCREASES THE SURVIVAL RATE BY MITIGATING INFLAMMATION IN SUCKLING MICE INFECTED WITH HUMAN CORONAVIRUS OC43

**Prof. Zifeng Yang,** Research Fellow First Affiliated Hospital Of Guangzhou Medical University, Guangzhou, China

#### 09:40-10:00 ANTIVIRAL ACTIVITY OF BROAD-SPECTRUM ANTIVIRALS IN VITRO AND IN VIVO

**Prof. Irina Leneva,** Mechnikov Research Institute of Vaccines and Sera, Moscow, Russia

10:00-10:10 OVERALL DISCUSSION ON NON-CLINICAL AND CLINICAL ASPECTS





## **SESSION 6: TUBERCULOSIS**

Venue: Smorodintsev Research Institute of Influenza, Saint Petersburg

#### **MODERATORS:**

Prof. Zhao Yanlin , Prof. Irina Vasilyeva

#### 10:00–10:20 THE TRUNCATED MUTATIONS OF DDN DRIVE HIGH LEVELS OF PRETOMANID RESISTANCE IN MYCOBACTERIUM TUBERCULOSIS

**Prof. Zhao Yanlin,** Director, National Center for TB Control and Prevention, Chinese Center for Disease Control and Prevention, Beijing, China

#### 10:20–10:40 THE PROBLEM OF MULTIDRUG-RESISTANT TUBERCULOSIS IN THE RUSSIAN FEDERATION

**Prof. Irina Vasilyeva,** National Medical Research Center of Phtisiopulmonology and Infectious Diseases, Chief TB Expert of the Russian Ministry of Health, President of the Russian community of physicians, Moscow, Russia

#### 10:40–11:00 SIGNALLING MOLECULES AS BIOMARKERS FOR PERSONALIZED DIAGNOSIS AND TARGETED THERAPY OF TUBERCULOSIS AND COMORBID PATHOLOGY

**Prof. Igor Kvetnoy,** Center for Molecular Biomedicine, St. Petersburg Institute of Phthisiopulmonology, Ministry of Health of the Russian Federation, St. Petersburg, Russia

#### 11:00–11:20 GENOME-WIDE SEARCH FOR GENETIC MARKERS ASSOCIATED WITH MYCOBACTERIUM TUBERCULOSIS RESISTANCE

**Anastasia Kazulina,** National Medical Research Center of Phtisiopulmonology and Infectious Diseases, Moscow, Russia

11:20–11:50 COFFEE BREAK









## SESSION 7: HIV. HEPATITIS C

**MODERATORS:** 

Prof. Liu Ying, Stefan Raichich

#### 11:50–12:10 THE DESIGN AND CLINICAL TRIAL OF HIV VACCINE BASED ON REPLICATION COMPETENT VACCINIA VECTOR

**Prof. Liu Ying,** National Center for AIDS/STD Control and Prevention, Chinese Center for Disease Control and Prevention, Beijing, China

#### 12:10–12:30 RECENT ADVANCES IN THE DEVELOPMENT OF HIV VACCINES AND NEW OPPORTUNITIES FOR THEIR PRECLINICAL TESTING

**Ekaterina Bayurova,** Chumakov Federal Scientific Center for Research and Development of Immune-and-Biological Products of Russian Academy of Sciences, Moscow, Russia

#### 12:30–12:50 AAV VECTOR-MEDIATED DELIVERY OF BROADLY NEUTRALIZING ANTIBODIES AGAINST HIV

Felix Urusov, Moscow, Russia

#### 12:50–13:10 CLINICAL AND IMMUNOLOGIC EVALUATION OF ANTIVIRAL THERAPY EFFICACY IN THE TREATMENT OF CHRONIC VIRAL HEPATITIS C

*Alexandra Gabrant,* St. Petersburg State Pediatric Medical University, St. Petersburg, Russia

#### 13:10–13:30 EPIDEMIOLOGICAL TRENDS OF HEPATITIS B AND C IN AN ACTIVE EPIDEMIC TERRITORY: A MODERN PERSPECTIVE

**Stefan Raichich,** I.M. Sechenov First Moscow State Medical University, Moscow, Russia

13:30-14:40 LUNCH







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**MODERATORS:** 

Prof. Liu Ying, Aleksandra Zhilenkova

#### 14:40–15:00 THE IMPACT OF COMORBIDITY ON THE RISK OF DEATH FROM COVID-19

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**Artur Sakhautdinov,** Institute of Clinical Medicine named after N.V. Sklifosovsky of I.M. Sechenov First Moscow State Medical University, Moscow, Russia

#### 15:00–15:20 TIME-RELATED CHANGES IN THE TITER OF VIRUS NEUTRALIZING ANTIBODIES AGAINST SARS-COV-2 AFTER COVID-19 IN PATIENTS WITH HIV INFECTION

Olga Pobegalova, First Pavlov State Medical University, St. Petersburg, Russia

#### 15:20–15:40 THE EPIDEMIOLOGICAL, CLINICAL, AND IMMUNOLOGICAL FEATURES OF COVID-19 IN DECEASED HIV-POSITIVE PATIENTS

*Aleksandra Zhilenkova, Moscow City Centre for AIDS Prevention and Treatment, Moscow, Russia* 

15:40–16:00 DISCUSSION AND CLOSING REMARKS



#### List of Authors:

# • Effectiveness of influenza vaccination during the COVID-19 pandemic period

Aristitsa Kostinova, M.P. Kostinov

I.M. Sechenov First Moscow State Medical University, Moscow, Russia

## • Clinical and immunologic evaluation of antiviral therapy efficacy in the treatment of chronic viral hepatitis C

Alexandra Gabrant, M.K. Zambrzhitckaia St. Petersburg State Pediatric Medical University, St. Petersburg, Russia

# • Epidemiological Trends of Hepatitis B and C in an Active Epidemic Territory: A Modern Perspective

*Stefan Raichich,* I.M. Sechenov First Moscow State Medical University, Moscow, Russia

*N.A. Magomedova,* Center of hygiene and epidemiology in the Republic of Dagestan, Makhachkala, Russia

# • The Epidemiological, Clinical, and Immunological Features of COVID-19 in Deceased HIV-Positive Patients

Aleksandra Zhilenkova, E.V. Tsyganova, N.V. Glukhoedova Moscow City Centre for AIDS Prevention and Treatment, Moscow, Russia

