

Respiratory infections

Virological characterization of 2014-2015 influenza season based on molecular analysis of biological material from I-MOVE study

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The main goal of the international project I-MOVE(Influenza Monitoring of Vaccine Effectiveness)implemented in Poland is to identify and evaluate the activity types of influenza virus and to determine the effectiveness of vaccination against influenza in the 2014-2015 influenza season. The study is based on selecting patients with flu symptoms and collecting biological samples for laboratory examination. Detection, typing and subtyping of the influenza viruses were carried out by the National Centre for Influenza Virus Research at National Institute of Public Health - National Institute of Hygiene, serving as a reference center, and also in selected laboratories of the Regional Sanitary Epidemiological Stations.

Molecular biology methods, such as RT-PCR and real-time RT-PCR, were applied in this study. In total 218 samples were collected. 126 samples, representing 57,8% of the total, were confirmed with influenza virus infection. Influenza type A virus was detected in 27 samples, which include the 16 samples of sub-type A / H1N1 / pdm09 and 11 samples of sub-type A / H3N2 / . Remaining 27 samples positive for

influenza were not subtyped. In 64 samples influenza type B virus was detected, which appeared to be the dominant strain in this study. Furthermore, several cases of coinfection with Influenza type B virus and subtypes: A / H1N1 / pdm09 or A / H3N2 / were observed: 7 from Łódź Province and 8 from Mazovia Province.

Keywords: Influenza, Laboratory testing, Type, Subtype, Vaccine