

## Frequency of Influenza A&B in Pharyngeal Secretion of Children with Upper Respiratory Infection

### Noor bakhsh.S (MD)

Associate professor of Children Infectious Disorders' Research Center, Iran University of Medical Sciences

### Brati.M (MD)

Assistant professor of Children Infectious Disorders' Research Center, Iran University of Medical Sciences

### Tabatabae.A (MSc)

Instructor of Children Infectious Disorders' Research Center, Iran University of Medical Sciences

### Ebrahimi Taj.F (MD)

Assistant professor of Children Infectious Disorders' Research Center, Iran University of Medical Sciences

### Keshavarz Roohi.M (MD)

Pediatrics Resident,  
Iran University of Medical Sciences

**Corresponding Author:** Noor bakhsh.S

**E.mail:** samileh\_noorbakhsh@yahoo.com

### Abstract

**Background and objectives:** Influenza virus is the sixth cause of death in the world. We cannot differentiate it from other respiratory viruses upon clinical signs alone. This study was aimed at determining the frequency of influenza A&B antigen in pharyngeal secretion of children with upper Respiratory Infection (URI).

**Materials and methods:** This cross sectional -descriptive study was done in pediatrics clinic of Rasoul hospital and Shahid Heidari clinic, Tehran (2006-2007). We studied the immunochromatography 149 children aged less than 14 years with URI. Rapid test was performed on pharyngeal samples of all cases. We used independent T test to compare the means of variables. (CI 95%,  $p < 0.05$ ).

**Results:** The Signs of the studied children are fever (58.4%), sore throat (60.4%), coughing, runny nose and hoarseness (45%) and gastric signs ( $< 20\%$ ) while in Influenza cases, they are 86.7%, 40% and 40% respectively. Fifteen (10.1%) of the subjects have positive rapid influenza test. The average age of the influenza case is 80 months, which is not significantly different from non-influenza cases. While no under one-year-old child has Positive influenza test, by increasing age the number of positive test is increased. As the frequency in children, aged over 10 is increased to 15.4%. There is significant difference between positive influenza test and signs such as fever, sore throat and previous antibiotic usage ( $p < 0.05$ ).

**Conclusion:** Although this study was not done in epidemic period for influenza, it indicated Influenza as the etiology of 10.1% of URI. Since the cost for prevention and treatment of influenza is high and drug resistance is problematic, we can decrease the URI in non-epidemic period by mass vaccination in children, at least in high-risk cases.

**Key words:** URI (upper respiratory infection), Influenza virus, rapid Immunochromatography Influenza test, Influenza vaccine