

# 4<sup>th</sup> World Congress on **Virology**

October 06-08, 2014 Hilton San Antonio Airport, TX, USA

## **Molecular characterization of infectious bronchitis virus and avian Influenza H9N2 circulating in Middle East**

**Ziad W Jaradat<sup>1</sup> and Mustafa M Ababneh<sup>2</sup>**

<sup>1</sup>Fatima College of Health Sciences, Al Ain, UAE

<sup>2</sup>Department of Basic Veterinary Sciences, Jordan University of Science and Technology, Irbid Jordan

Infectious bronchitis virus (IBV) and Avian Influenza subtype H9N2 are very dynamic and evolving viruses, causing major economic losses to the global poultry industry. Respiratory disease outbreaks affecting different poultry farms were investigated. Two IBV isolates (JOA2, JOA4) along with two H9N2 isolates were detected by RT-PCR. Strain identification was done by sequencing and phylogenetic analysis of the amplified hypervariable region of the spike 1 (S1) gene of IBV and complete HA sequencing for H9N2 isolates. These two IBV isolates were found to be of the IBV strain CK/CH/LDL/97I of the J2 group, while the HA gene of the two H9N2 isolates were found to be of the new group B. The presence of these new IBV and H9N2 isolates may account for vaccination failure against IBV and H9N2, since all these viral isolates were from vaccinated chicken flocks.

[ziad.jaradat@fchs.ac.ae](mailto:ziad.jaradat@fchs.ac.ae)