

## Commercial testing for Influenza - Information for Providers

The following commercial tests can be used for diagnosis of influenza. Testing can be helpful in clinical decision-making, including use of antivirals or antibiotics, infection control, and duration of isolation or restriction from work or school. Providers should familiarize themselves with test characteristics and choose wisely among available options.

Adapted from **Clinical Infectious Diseases 2009; 48:1003–32** For information on specimen collection, check with your laboratory.

Test	Time to results	Comments
<b><u>RT-PCR</u></b>	2-4 h	High sensitivity and specificity. Highly recommended. Tests can detect and distinguish influenza A and B and influenza A subtype.
<b><u>Immunofluorescence</u></b>		Moderately high sensitivity and high specificity. Recommended.
<b>Direct fluorescent antibody (DFA)</b>	2-4 h	Tests can distinguish influenza A and B and other respiratory viruses.
<b>Indirect fluorescent antibody (IFA)</b>	2-4 h	
<b><u>Rapid influenza diagnostic tests</u></b>		Low to moderate sensitivity and high specificity. Recommended, but limitations of the test should be recognized when interpreting results.
<b>Antigen detection (EIA)</b>	10-20 min	Depending on the test chosen, will either detect influenza A only, will detect and distinguish between influenza A and B, or will detect but not distinguish between influenza A and B.
<b>Neuraminidase detection assay</b>	20-30 min	
<b><u>Viral culture</u></b>		Moderately high sensitivity and highest specificity; this test is important for confirming screening test results and for public health surveillance, but it is not useful for timely clinical management.
<b>Shell vials</b>	48-72 h	
<b>Isolation in cell culture</b>	3-10 days	
<b><u>Serologic tests</u></b>	weeks	Not recommended for timely clinical management. Requires paired acute and convalescent sera; may be useful for retrospective diagnosis.

### Infectious Disease Epidemiology

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