



## MEMO

**To:** All Regional Medical Laboratory (RML) Clients

**From:** Dr. Cindi Starkey, M.D., Ph.D., Chief of Molecular Diagnostics.  
Sonja Matthews MT (ASCP), SC, Director of Clinical Operations

**Date:** January 15, 2013

**Subject:** Parainfluenza virus 1, 2, and 3 Testing by Molecular Method

RML is pleased to announce we are **now offering Parainfluenza virus 1, 2, and 3 testing by PCR**. This may be ordered separately (**PARA FLU P**) or as part of the respiratory virus panel (**VRESP PCR**) which also includes testing for **RSV, Influenza A, Influenza B, and Adenovirus**, and will include **Metapneumovirus in February, 2013**. We will be utilizing the Focus Diagnostics real time (RT) PCR test which is a qualitative molecular test to detect the presence of these organisms.

Respiratory infections can cause significant morbidity in infants, young children and immunocompromised individuals. As a group, parainfluenza viruses 1, 2, and 3 (PIVs) cause 15-30% of the childhood nonbacterial respiratory diseases requiring hospitalization. A rapid, sensitive, and specific diagnostic tool is important in the management of these patients. The direct immunofluorescence assay (DFA) previously offered by our laboratory provided a rapid result, but lacked sensitivity. Also, the DFA test required increased specimen integrity and intact cells for analysis. PCR analysis, on the other hand, is a rapid and more sensitive method to directly detect these organisms and is less dependent on specimen integrity. Adding PIV 1, 2, and 3 to the molecular testing menu will enable the viral respiratory panel by DFA to be replaced by PCR testing, thus **the DFA test will no longer be available as of 01/21/13**.

Test Name	Parainfluenza virus types 1, 2, 3 PCR	Respiratory Virus Panel PCR
<b>Organisms detected</b>	Parainfluenza viruses types 1, 2, 3	Adenovirus, Respiratory Syncytial Virus, Influenza A and B, Parainfluenza Viruses 1, 2, 3, Metapneumovirus (coming 02/13)
<b>Mnemonic</b>	<b>PARA FLU P</b>	<b>VRESP PCR</b>
<b>Test Number</b>	<b>5504945</b>	<b>5568555</b>
<b>CPT Codes</b>	87631	87631 X 2, 87798 (X 2 in 02/2013)
<b>Method</b>	Real time PCR (RT-PCR)	Real time PCR (RT-PCR)
<b>Reference range</b>	Not Detected	Not Detected

### Specimen requirement:

The preferred specimen is mini-Flocked Swab in Universal Transport Media (UTM) (Comes as a kit: RML Supply# 50775) or Flexible shaft flocked swab in viral M4 media refrigerated or 3 mL (1mL) BAL, NP/nasal/tracheal aspirate in a sterile screw top tube. NOTE: do not use calcium alginate or wood shaft swabs. Ambient specimens stable for 4 hrs. Refrigerated specimens are stable up to 72 hrs or specimens may be frozen up to 72 hours.

If you have questions, please contact Cindi Starkey, MD, PhD, Clinical Pathologist and Chief of Molecular Diagnostics, Gerald Miller, PhD, Chief of Immunology and Microbiology, or Sonja Matthews, MT (ASCP), SC, Director of Clinical Operations, at 918-744-2553 or 800-722-8077.