



AmpliRun® Total Respiratory Viral Panel Control

AMPLIRUN® TOTAL RESPIRATORY VIRUS PANEL CONTROL (SWAB)

Each vial includes a pool of lyophilized respiratory viruses: Adenovirus 4, coronavirus, influenza A H3N2, influenza B, novel influenza A H1N1, parainfluenza 1, parainfluenza 2, parainfluenza 3, RSV (subtype A), RSV (subtype B)

Ref. MBTC020 · 10 Vials · 200 µL · Extraction + Reverse Transcription + Amplification Control

Product Features

- ✓ Independent external run controls, with great lot-to-lot consistency, to monitor the accuracy and precision of the **complete analytical process (extraction and amplification)**
- ✓ Controls that contain the **complete inactivated microorganism** in a matrix that **mimics human specimens**
- ✓ **Differential diagnosis** of respiratory infections- Control single and multiplex molecular assays (NAATS)
- ✓ **Lyophilized presentation** to ensure stability and avoid extra transport costs



Respiratory tract infections

Viral respiratory tract infections are a leading cause of hospitalization. The correct identification of the causative pathogen is difficult because similar clinical presentations can be caused by a heterogeneous group of viruses. Vircell has selected the most common viruses involved to develop a molecular virus control panel that includes 10 different viruses.

Importance of an accurate diagnosis

Recent outbreaks associated to respiratory viruses highlight the importance of a rapid and accurate laboratory diagnosis as it will greatly benefit infected patients.

Many factors can impact the performance of NAATs for respiratory viruses, such as specimen collection, transport conditions, nucleic acid extraction or amplification. For these reason, all NAATs, whether in-house or commercial, should be monitored regularly with positive controls to ensure that current strains are detected.

Virus	Cell Line	Strain
ADENOVIRUS 4	HEP-2	RI-67
CORONAVIRUS	MRC-5	229E
INFLUENZA A H3N2	MDCK	A/Perth/16/2009
INFLUENZA B	MDCK	B/Brisbane/60/2008
NOVEL INFLUENZA A H1N1	MDCK	A/California/7/2009
PARAINFLUENZA 1	LLC-MK2	Sendai/52
PARAINFLUENZA 2	LLC-MK2	Greer
PARAINFLUENZA 3	LLC-MK2	C 243
RESPIRATORY SYNCYTIAL VIRUS (subtype A)	HEP-2	Long
RESPIRATORY SYNCYTIAL VIRUS (subtype B)	HEP-2	9320

AMPLIRUN® TOTAL RESPIRATORY VIRUS PANEL CONTROL (SWAB) is intended to validate and control sample processing, amplification and detection in nucleic acid assays based on the molecular identification of respiratory viruses, using the product as an external run control.

Each virus is in a concentration that ranges from **500 to 2500 copies/vial** (precise information about the concentration is included in the product insert of the kit).

Viral particles were purified from supernatants of infected cells by differential centrifugation (see Table for cell-line used). Viruses were inactivated, rendering them non-infectious and diluted in viral transport medium containing cells obtained from epithelial human cell lines to simulate swab specimen.

Other features common to AmpliRun® Total Controls

The use of AmpliRun® Total Controls will enable your lab to:

- Enhance the quality of the whole testing process: extraction and amplification
- Monitor all aspects of sample testing and instrument performance in the long term
- Monitor variations in laboratory procedures, including batches of assay reagents
- Validate and verify new assays
- Obtain reliable and comparable results
- Train laboratory personnel/ trial purposes
- Take corrective actions prior assay failure and detect and troubleshoot suspect results
- Comply with lab accreditation requirements

Main features:

- Growing range of products
- Whole pathogen controls with complete genome
- Monodose format
- Quantified controls (low positive)
- Lyophilized presentation to ensure stability and avoid extra transport costs
- Validated with the most commonly used extraction platforms (manual & automatic)
- CE marked products