

# FluoroAMP Hi-DNA/RNA Kit

Cat. No.: HF315-T8

## Kit Contents

Contents	HF315-T8 (50 preps )
Buffer RLC	35 ml
Buffer GD	13 ml
Buffer RW	12 ml
Proteinase K	1 ml
RNase-Free Spin Column CA4	50
Collection Tube 2 ml	50
RNase-Free Centrifuge Tubes 1.5 ml	50
RNase-Free ddH <sub>2</sub> O (Bottle)	15 ml
Manual	1

## Storage

This kit can be stored dry at room temperature (15-25°C) for up to 12 months without showing any reduction in performance and quality. For longer storage, the kit can be stored at 2-8°C. If a precipitate has formed in Buffer under 2-8°C, please place the buffer at room temperature or warm at 37°C for 10 min to dissolve the precipitate.

## Introduction

This kit is suitable for extracting virus DNA/RNA from medical samples such as 300  $\mu$ l mouth swab samples by using a centrifugal column and a unique buffer system that can specifically bind virus DNA/RNA. The silica matrix material used in the centrifugal adsorption column is a unique new material of HMD, which can adsorb DNA/RNA efficiently and specifically, and can remove impurity protein to the maximum extent. The extracted virus DNA/RNA is of high purity, stable and reliable quality, and can be used in various downstream application experiments, such as reverse transcription and RT-PCR.

## Important Notes Please read these notes before using this kit.

1. All centrifuge steps should be carried out at room temperature (15-25°C).
2. Balance the sample to room temperature before use.
3. The RNase-Free Centrifuge Tubes (1.5 ml) provided by the kit is used for Step 11. Other centrifuge tubes in this protocol need to be prepared by users.

## Protocol

Please add 96-100% ethanol to Buffer GD and Buffer RW according to the instruction of the label on the bottle before use.

1. Add 300  $\mu$ l of plasma /serum /lymph /swab to the centrifuge tube (**the sample needs to be balanced to room temperature**).
2. Add 20  $\mu$ l Proteinase K and 600  $\mu$ l Buffer RLC. Vortex to mix and incubate at room temperature (15-25°C) for 10 min.
3. Add 600  $\mu$ l isopropanol or 96-100% ethanol to the tube, and vortex for 2 min to mix.
4. Carefully transfer the liquid in the centrifuge tube to a RNase-free Spin Column CA4 (the Spin Column CA4 is placed in a 2 ml Collection Tube), centrifuge at 12,000 rpm (13,400  $\times$  g) for 1 min, discard the waste liquid in the Spin Column CA4, and put the Spin Column CA4 back into the collection tube.
5. Apply the rest of the sample in the same Spin Column CA4 and repeat step 4
6. Add 500  $\mu$ l Buffer GD (**please check whether ethanol has been added before use**). Centrifuge at 12,000 rpm (13,400  $\times$  g) for 1 min, discard the waste liquid in the Spin Column CA4, and put the Spin Column CA4 back into the collection tube.
7. Add 500  $\mu$ l Buffer RW (**please check whether ethanol has been added before use**). Centrifuge at 12,000 rpm (13,400  $\times$  g) for 1 min, discard the waste liquid in the Spin Column CA4, and put the Spin Column CA4 back into the collection tube.
8. Repeat step 7 once.
9. Centrifuge at 12,000 rpm (13,400  $\times$  g) for 3 min to dry the membrane, discard the waste liquid in the Spin Column CA4.

**Note: Residue ethanol might affect the downstream experiments.**

10. Optional: Place the Spin Column CA4 back in the 2 ml collection tube, and open the cap of the Spin Column and leave at room temperature for 3 min to completely dry the membrane.
11. Place the Spin Column CA4 in a new 1.5 ml RNase-Free Centrifuge Tube. Add 50  $\mu$ l RNase-free ddH<sub>2</sub>O to the middle of the adsorption membrane, place it at room temperature for 5 min, and centrifuge at 12,000 rpm (13,400  $\times$  g) for 1 min.