HIV Testing Algorithm
(Fourth-Generation Screening Assay),
Including Follow-up of Reactive
Rapid Serologic Test Results

Reactive results from:
- Rapid HIV-1 antibody test (serum, plasma, or whole blood)
- Rapid HIV-1/-2 antibody test (serum, plasma, or whole blood)
- Rapid HIV-1 antigen/antibody test (whole blood)

STOP
Repeat HVCP or HVDX (depending on which was originally ordered) in 2 to 4 weeks for at-risk patients

HIV-1 infection

HIV-2 infection

Possible HIV-1 and HIV-2 coinfecion

Newborn infants with HIV-infected mothers
If suspecting acute HIV infection in high-risk patient
Reactive results for HIV antigen only for rapid or laboratory-based HIV antigen/antibody screening tests
Order: HVQD / HIV-1 and HIV-2 Antibody Confirmation and Differentiation, Plasma

ALTERNATIVE

Suspect possible HIV-1 strain variants
Order: HVTQ / HIV-1 RNA Detection and Quantification, Plasma

Detected

Undetected

HIV-1 infection

At risk for HIV-2 infection?
NO
YES

Detected

Undetected

HIV-2 infection

Repeat serologic testing HVCP in 2 to 4 weeks if clinically indicated

1 For verification, submit new specimen for HVQDN
2 For verification, submit new specimen for FHQ2O
3 Contact Mayo Clinic Laboratories for testing advice
* Plasma specimens from individuals with reactive results from rapid HIV antigen/antibody, 3rd generation HIV-1/-2 antibody, or 5th generation HIV antigen/antibody screening tests can enter this testing algorithm at HVDP with applicable downstream testing.

Note: For diagnostic and screening for HIV-2 infection only, Testing see HIV-2 Testing Algorithm: Screening (Nonsymptomatic) and Diagnostic (Symptomatic)