

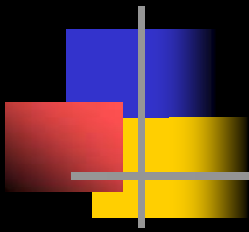
Integrating Rapid HIV Testing in Emergency Care Improves HIV Detection

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Robert Wood Johnson Medical School

New Brunswick, NJ

www.njhiv.org



Case Study

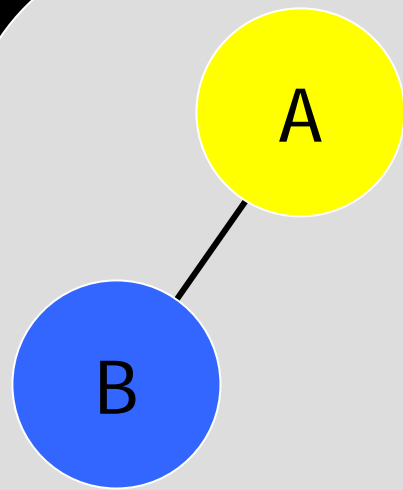
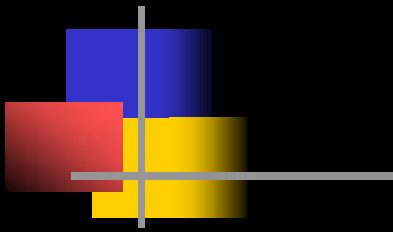


A

July 29:
Headache, fever

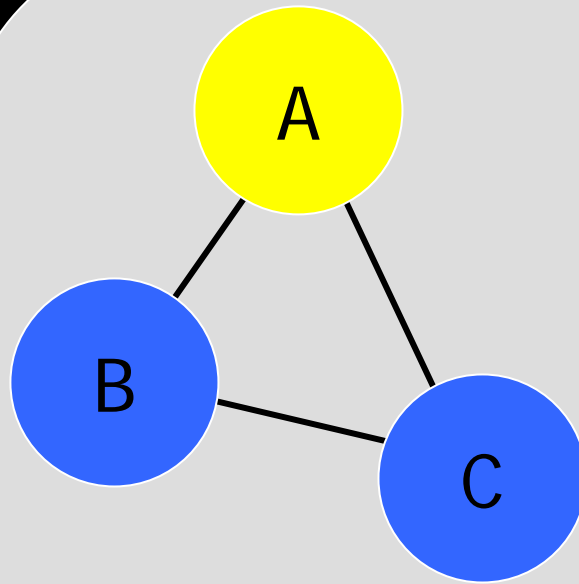
August 2; ED:
LP, ?RMSF

August 4; ED #2:
Nausea, vomiting
Dx: Aseptic Meningitis



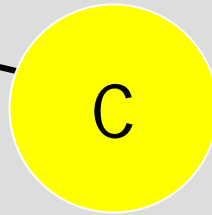
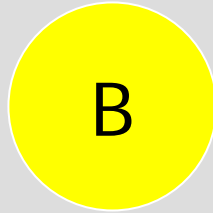
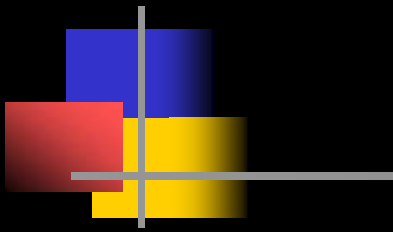
August 15:
Symptoms gone

August 15-30:
Sex with B



August 15:
Symptoms gone

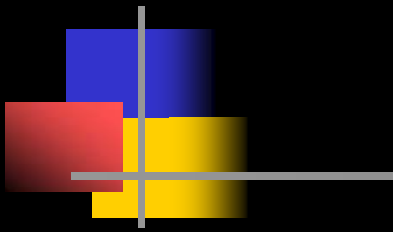
August 15-30:
Sex with B ... and C



August 15:
Symptoms gone

August 15-30:
Sex with B ... and C

August 30 – Sept 9:
Sex between B and C

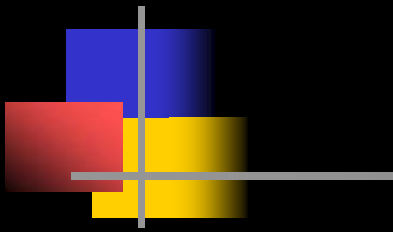


A

B

C

September 10:
Fever, fatigue, sore throat
Given Zithromax by PMD

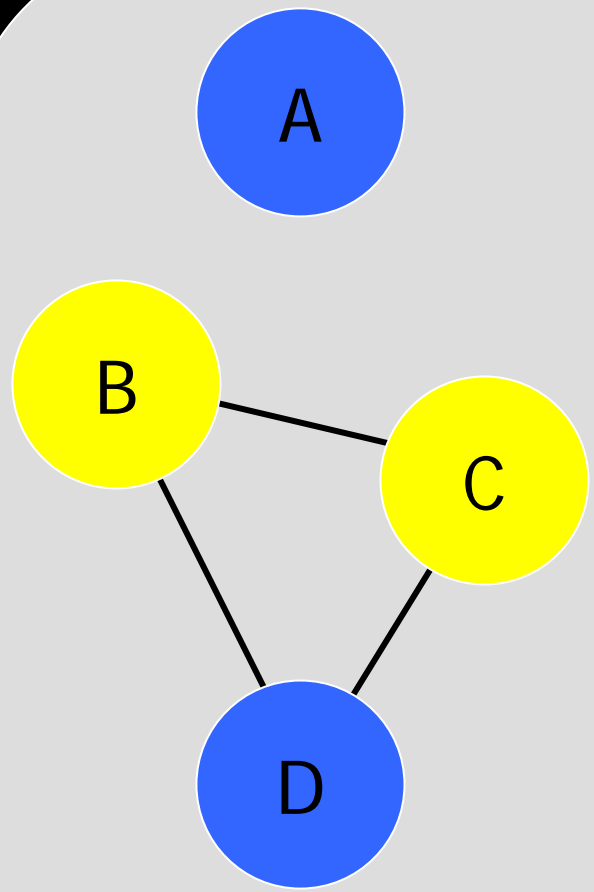
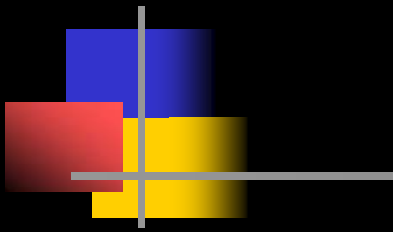


A

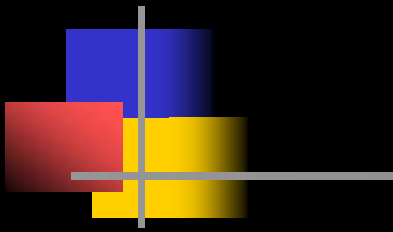
B

C

September 30:
Fever, sore throat, rash
Given Zithromax by PMD



October 15-20:
B and C: Sex with D



A

B

C

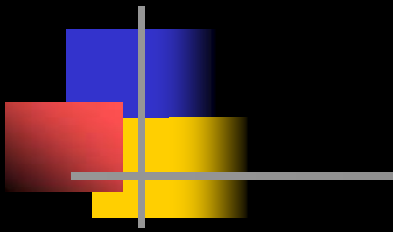
D

October 28-30:
Sore throat, fever, oral
ulcers, Thrush

October 31:
Requests STI workup

November 3:
Dx: Lymphoma
Requests HIV test

November 15:
HIV EIA: Positive



A

August 2: missed opportunity

B

Sept 10: missed opportunity

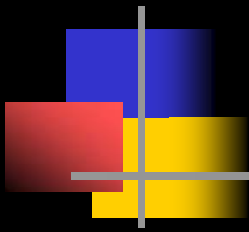
C

Sept 30: missed opportunity

D

October 31: missed opportunity

HIV Diagnosis: Nov 15



Timely diagnosis of HIV infection
requires awareness and availability
of testing.



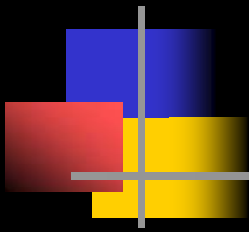
MMWR™

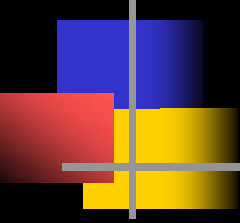
Morbidity and Mortality Weekly Report

Recommendations and Reports

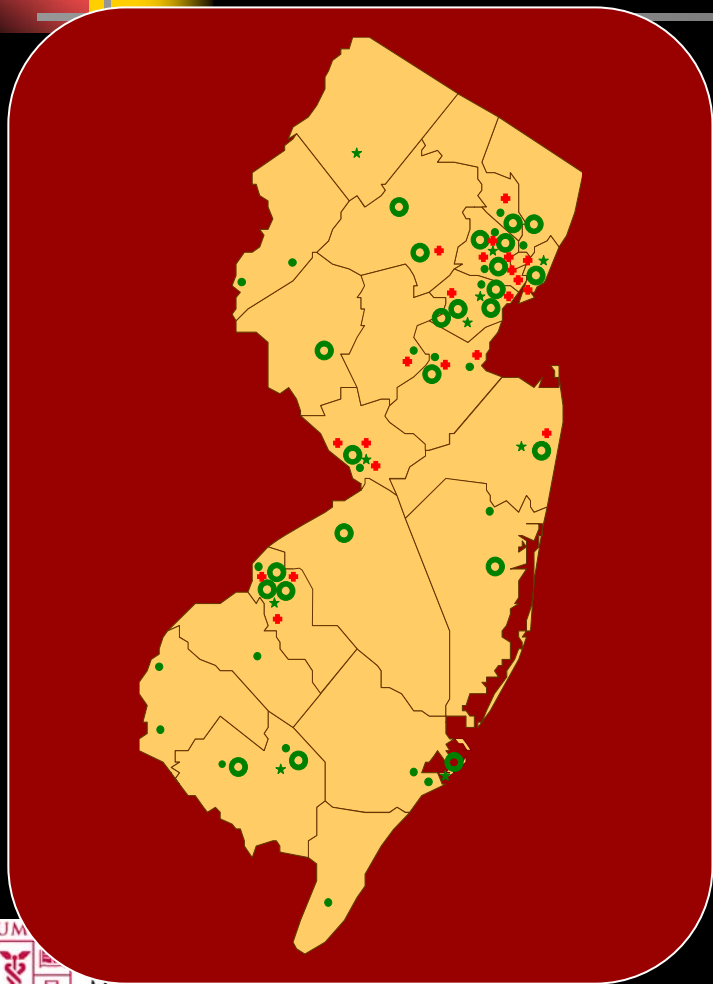
September 22, 2006 / Vol. 55 / No. RR-14

Revised Recommendations for HIV Testing of Adults, Adolescents, and Pregnant Women in Health-Care Settings

- 
-
- Knowledge of HIV status reduces high-risk behavior and reduces transmission
 - Counseling is more effective when HIV status is known
 - Disease progression is slowed with early intervention

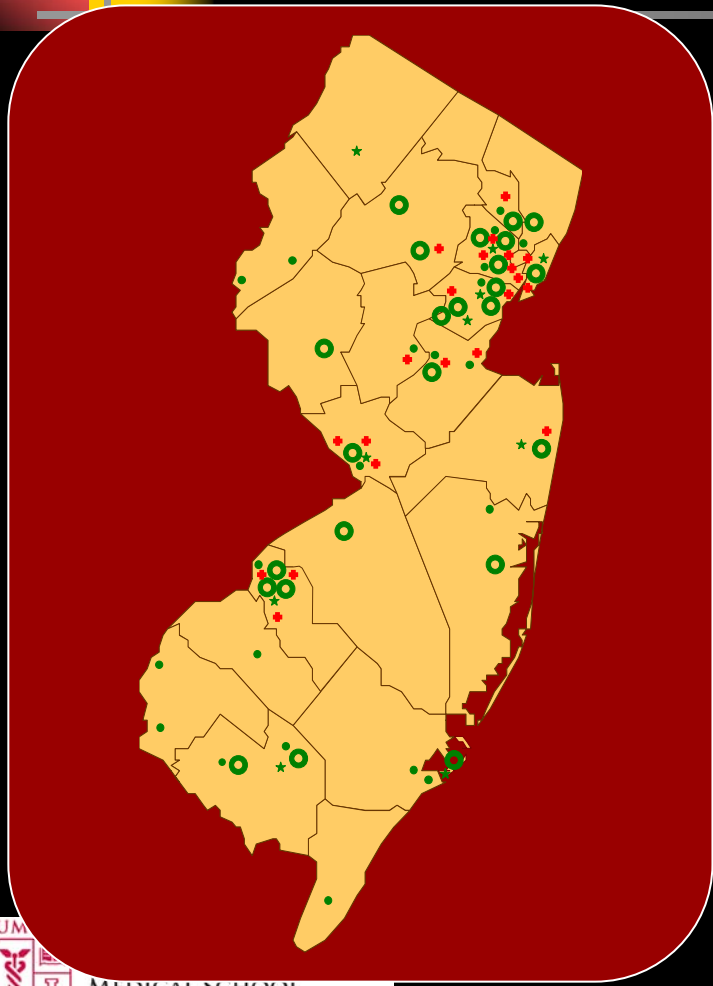
- 
-
- Rapid testing is indicated if immediate clinical intervention would be needed or if result delivery would be compromised:
 - Women in labor
 - Occupational exposure
 - Patients likely to be lost to follow-up

New Jersey Rapid HIV Testing



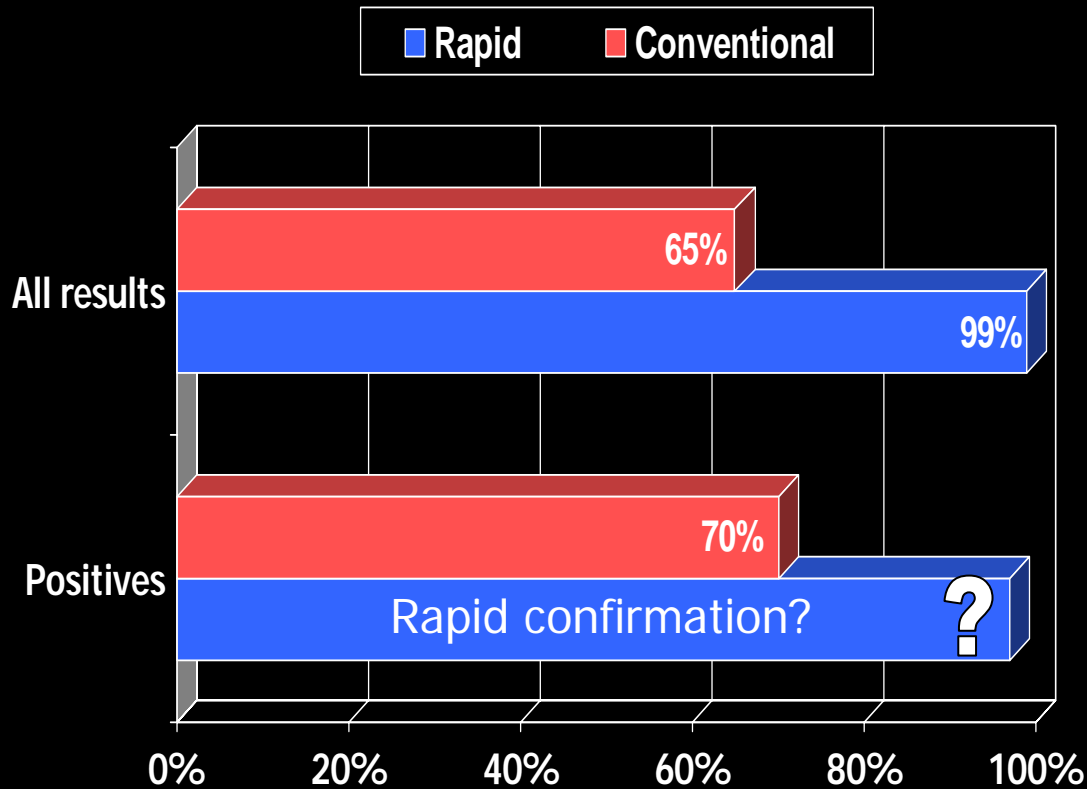
- Counseling sites started in mid-1980s
- Testing added in late 1980s
- Rapid testing added in 2003
- 70 laboratory licenses
Health Departments, STD clinics, CBOs, Faith-based initiatives, Hospitals, Mobile vans, Field counselors
- 23 Emergency Departments
- 2006 ASTHO Vision Award

New Jersey Rapid HIV Testing



- Centrally administered
 - 2 MD, 1PhD, manager, 4 techs
 - Inventory control & /validation
 - Training
 - Ongoing QA
 - Temperature monitoring
 - QC quality control
 - Proficiency Testing
 - Regular monitoring
 - Review of logs
 - Site visits
 - "Report card"

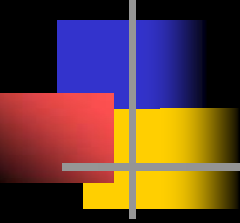
CTS clients receiving post-test counseling



Marked improvement with introduction of rapid testing

Preliminary positives:

- 7.1% refused blood draw for confirmation
- 25.8% of those drawn did not return for results
- 70.1% of confirmed positives got their results and post-test counseling

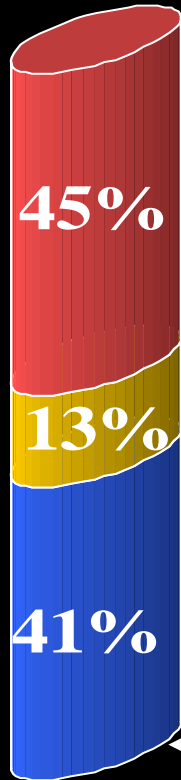


ED Seroprevalence: Urban Teaching Hospital

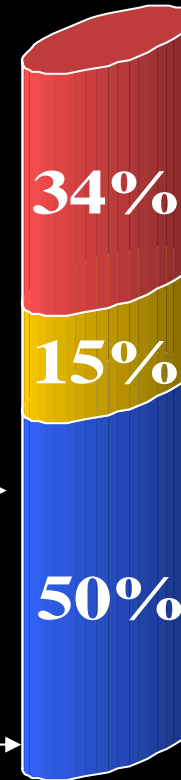
- Anonymous, unlinked survey
- 2 ½ month study
- Persons \geq 18 years of age
- 332/3,193 (10.4%) positive
- 198/332 (60%) knew they were positive

Knowledge of HIV Status

Men



Women



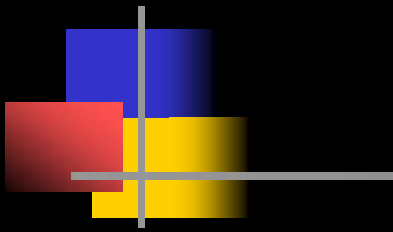
Undiagnosed HIV

Diagnosed HIV
Antiretrovirals used

Diagnosed HIV
No antiretrovirals

Opt-In Rapid HIV Pilot

- 56% agreed to be tested
- All 1054 tested received results and post-test counseling
- 99.2% negative
- 6 confirmed positives
- 5 of 6 were new diagnoses
- All new infections were referred for care and treatment
- 2 discordant (Western Blot negative)



A

August 4: HIV Ab Negative

B

September 10: not tested

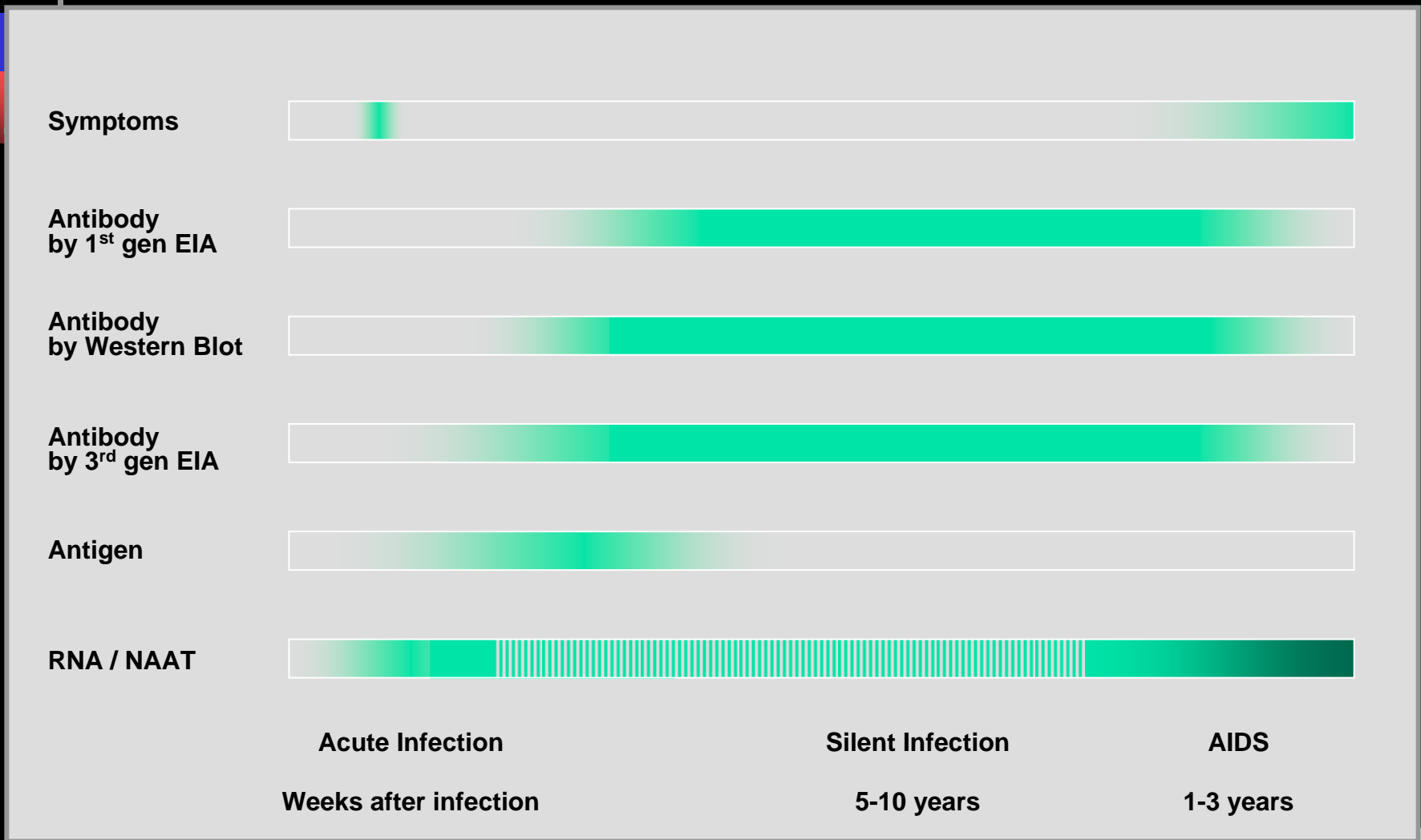
C

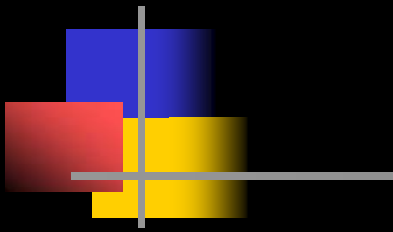
September 30: not tested

D

October 31:
HIV EIA Positive;
Western Blot indeterminate

HIV Infection





A

August 4: **If NAAT Positive**

B

Infection avoided

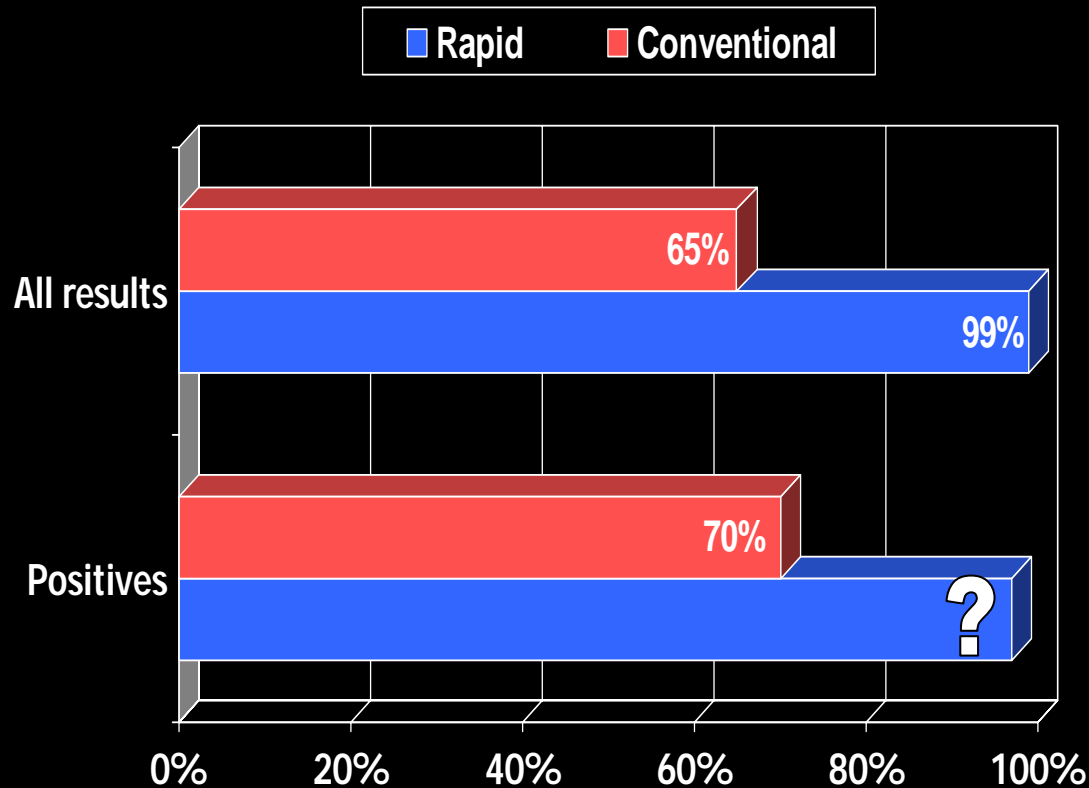
C

Infection avoided

D

Infection avoided

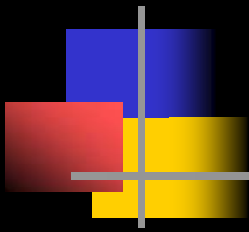
Clients receiving post-test counseling



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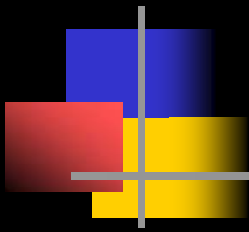
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Timely diagnosis of HIV infection requires awareness and availability of testing.

Rapid nucleic acid testing could confirm rapid antibody tests and could diagnose Acute HIV Infections (AHI).



Thank you