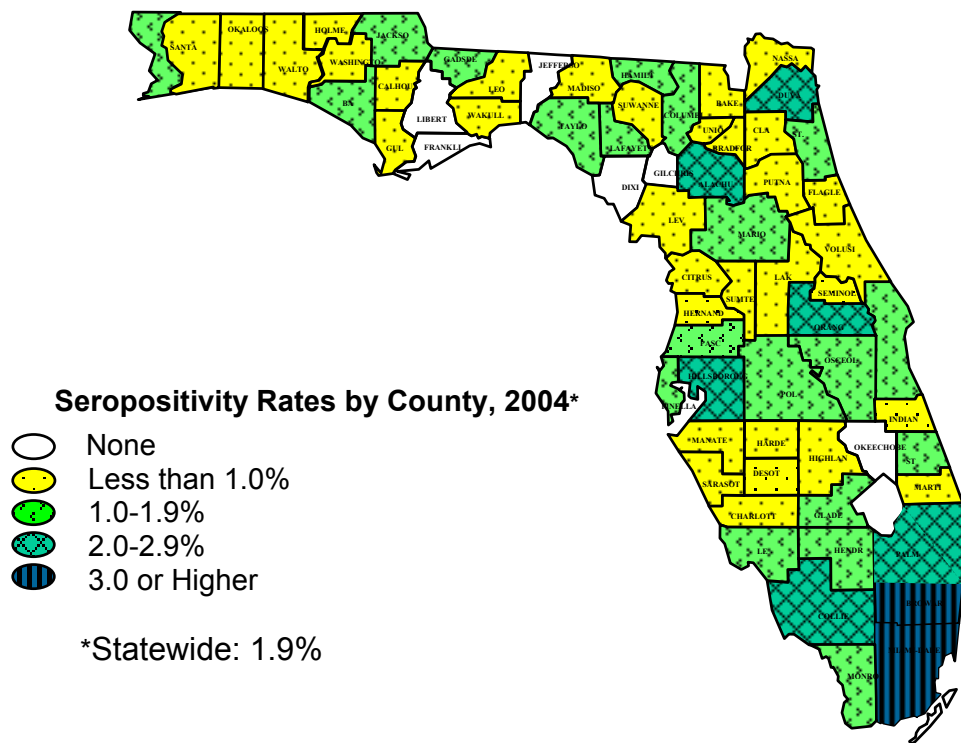




Florida Department of Health
Division of Disease Control
Bureau of HIV/AIDS

HIV Counseling and Testing Annual Report, 2004



For additional information regarding this report, please contact the Early Intervention Section of the Bureau of HIV/AIDS at (850) 245-4424, or SC 205-4424, or visit our website at www.doh.state.fl.us.



Executive Summary

In 2004, 295,602 HIV tests were conducted at Florida's registered testing sites, representing a 2.0% decrease (approximately 6,000 tests) over the previous year. This marks the 3rd consecutive year that the number of HIV tests performed in Florida exceeded 250,000. In 2004, HIV counseling and testing services were briefly interrupted in key counties due to the closing of a number of sites from hurricanes Charley, Frances, Ivan, and Jeanne.

Repeat HIV testers made up over 52% of the testing volume in 2004. Almost all tests were done confidentially, as anonymous testing declined. Increases in testing were recorded among Hispanics, and a substantial increase was recorded in the 20-29 age group. By far, persons who reported heterosexual sex as their highest risk accounted for the majority of the increase; other important increases in testing were reported in persons that had sexual relations with someone else at risk, and in the MSM group. From January to June 2004, approximately 60% of the negatives and 86.3% of the positives were post-test counseled. Testing with OraSure and rapid testing accounted for 21.4% and 8.1%, of all HIV tests conducted in 2004, respectively.

The number of positive HIV tests recorded decreased by 12.9% in 2004. The overall positivity rate also decreased from 2.2% in 2003 to 1.9% in 2004. MSM accounted for 29.3% of all positive tests reported in 2004, yielding a positivity rate of 9.0% (9.1% when combined with MSM/IDU). While heterosexuals accounted for 22.6% of positive tests, the positivity rate for this risk group was only 0.7%. Adults age 30 and older continue to record high positivity rates. Black MSM and IDU also continued to experience higher positivity rates than their white and Hispanic counterparts. The overall positivity rate with OraSure testing was 2.7% and with rapid testing 2.9%; however, analysis indicated that a decreasing number of counties were using OraSure to reach potentially inaccessible populations and rapid testing is not yet available in all areas.

Since 1985, when the Florida Department of Health began collecting data on HIV testing at registered testing sites across the state, almost 4.0 million anonymous and confidential tests have been conducted. Today, over 1,600 public and private sites are registered with the Department of Health to provide HIV counseling, testing, and linkage services. Social and demographic data, including risk behaviors, are collected at these sites, and are compiled along with test results by the Early Intervention Section of the Bureau of HIV/AIDS in Tallahassee. While this database is currently not unduplicated, and as such cannot be used to provide data on the number of individuals tested, it does constitute a record of the number of tests conducted. It is a crucial indicator about the nature and direction of the epidemic, and is used to inform and evaluate HIV prevention activities and policy making at the state and local level.

Trends in HIV Testing

Figures 1a and 1b show testing trends in Florida between 1987 and 2004. Testing levels increased rapidly through the early 1990s. During the mid-1990s the number of tests performed remained fairly steady, and peaked at just over 301,687 in 2003. The testing level dropped by over 6,000 (approximately 2.0%) in 2004. In contrast, positivity rates dropped sharply in the 1980s as more and more people at a relatively lower risk began to be tested, and have remained generally stable since 1996. The actual number of positive tests identified each year has also declined at a relatively steady rate since peaking in 1991, although increases were recorded from 1999 to 2003.

Figure 1a. HIV Tests Conducted in Florida and Seropositivity Rates, 1987-2004

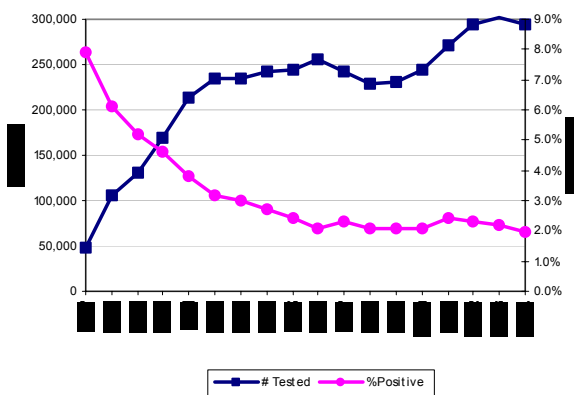


Figure 1b. HIV-Positive Tests in Florida and Seropositivity Rates, 1987-2004

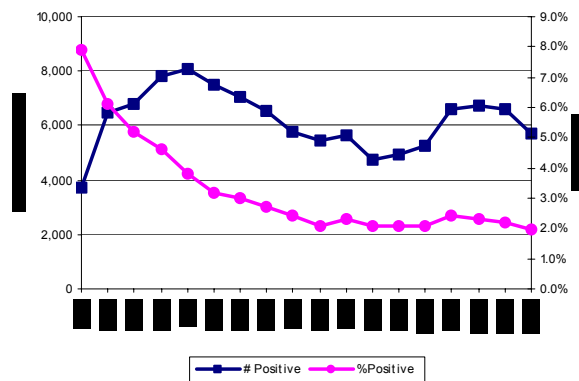


Figure 2 compares testing levels at anonymous and confidential sites by quarter, from January 2000 through December 2004. Some observable patterns may be seasonal or related to specific events; National HIV Testing Day occurs annually on June 27, and sharp increases in testing numbers have been recorded in the weeks around this event. Increasing levels of confidential testing are most apparent in the first two quarters of 2000, followed by stronger declines in the third and fourth quarters. In 2001, the late year downward trend was not as strong as first and second quarter gains, resulting in an overall increase in testing those years. In 2002 and 2003, large increases in the first three quarters were followed by a relatively moderate decline in the fourth quarter, while 2004 came back with increases in the first two quarters. Unlike in 2002 and 2003, a sharp decline in testing was observed in the third quarter of 2004, most likely related to the disruption in services caused by four major hurricanes. In contrast, quarterly levels of anonymous testing have remained fairly stable over most of this period, although a sizeable decline was observed in the last quarters of 2002, 2003, and 2004.

Anonymous testing accounted for 6.5% of all tests conducted in the last quarter of 2004, compared to 8.4% in the last quarter of 2003.

Figure 2. Number of HIV Tests Completed at Anonymous and Confidential Sites in Florida, January 2000-December 2004

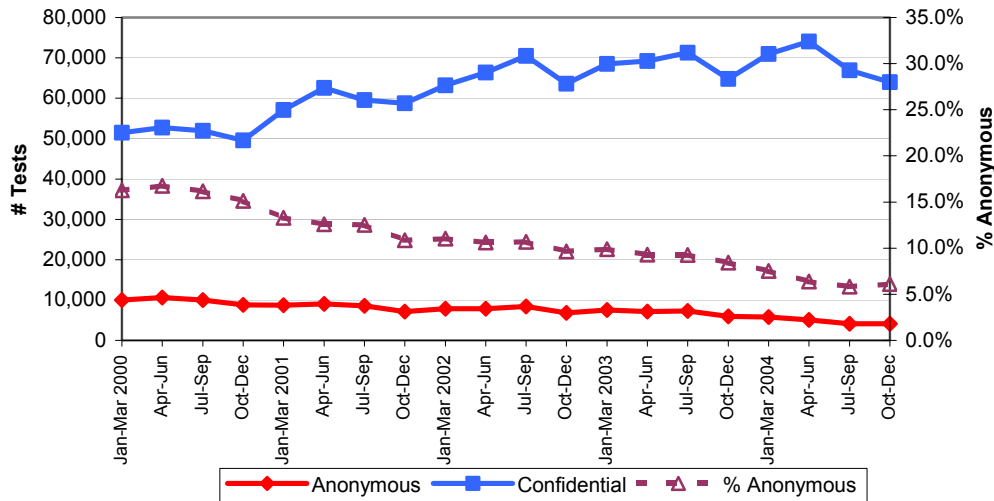


Figure 3 shows trends in testing among the seven largest counties in Florida. Broward, Duval, Hillsborough, Miami-Dade, Orange, Palm Beach, and Pinellas counties together account for 56% of all HIV tests conducted between 2000 and 2004. Between 2000 and 2002, the level of testing in these seven counties increased overall by almost 28% (over 35,000 tests), Miami-Dade and Broward peaked with 50% and 35% increases respectively. In 2003, statewide testing levels rose to an all-time high, with large contributions from all counties except Duval. By 2004, compared with 2003, the level of testing decreased by 5.5%. Orange, Broward, Palm Beach, and Pinellas experienced declines of 7.6%, 6.1%, 4.3%, and 1.0% respectively.

Figure 3. HIV Testing Levels Among Florida Counties that Perform More than 10,000 HIV Tests per Year, 2000-2004

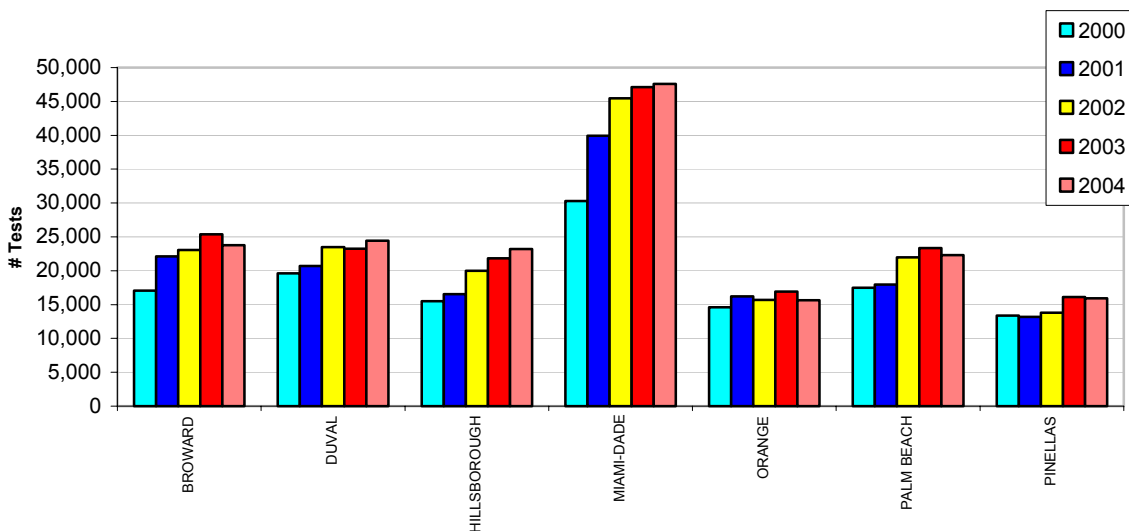


Figure 4a displays trends in anonymous and confidential testing within two high-risk groups: men who have sex with men (MSM)¹ and injection drug users (IDU). During the five years of analysis, MSM anonymous testing has consistently been much lower than confidential testing. Confidential testing in this risk group has increased except in 2002 with a slight decrease, while anonymous testing has decreased during the five years of comparison. The substantial increase in confidential testing in 2003 for MSM led to an overall increase in the number of tests, despite the decline in anonymous testing. In contrast in 2004, the number of confidential tests increased by 24%, but the 41.7% decrease in anonymous tests led to a decrease of 1.7% in the overall number of tests among MSM.

Among IDU, levels of anonymous testing have consistently been much lower than levels of confidential testing. In 2000, 2,084 anonymous tests were recorded; this decreased to 483 in 2004. Confidential testing among IDU peaked at over 13,000 tests in 2000. By 2004, testing levels dropped considerably compared with 2003.

Figure 4a. Number of HIV Tests Completed at Anonymous and Confidential Test Sites, MSM and IDU Risk Groups, 2000-2004

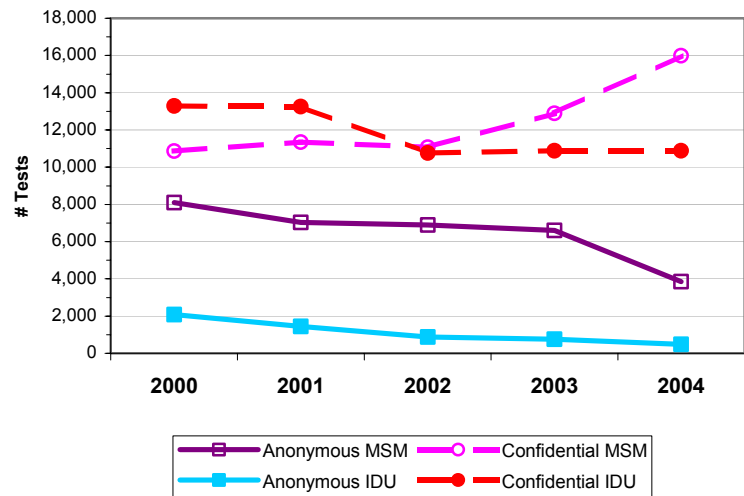


Figure 4b. Number of HIV Tests Completed at Anonymous and Confidential Sites, Heterosexual Risk Group, 1999-2004

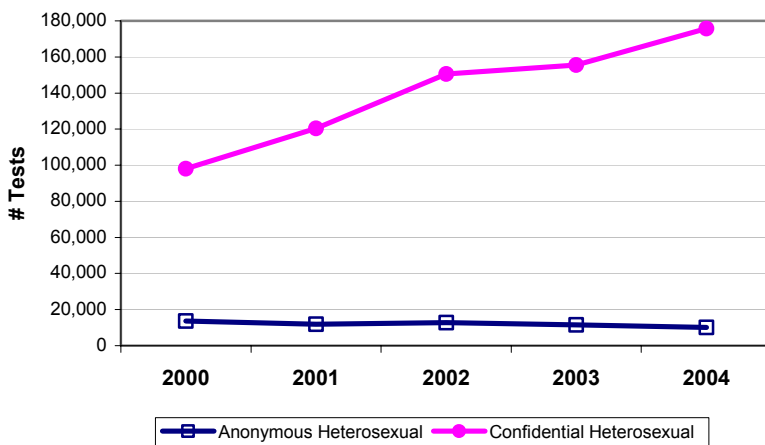


Figure 4b shows anonymous and confidential testing trends among those who identified heterosexual sex as their highest risk. The number of confidential tests administered in this risk group rose steadily throughout the years peaking in 2004 with 175,706 tests. The trend for heterosexuals testing anonymously has been steady with an average of 12,000 in the first four years of analysis, but dropped 13.3% in 2004. This high-volume, typically low-risk group annually accounts for a very large proportion of all HIV tests.

¹ The MSM category here includes MSM who are injection drug users (MSM/IDU).

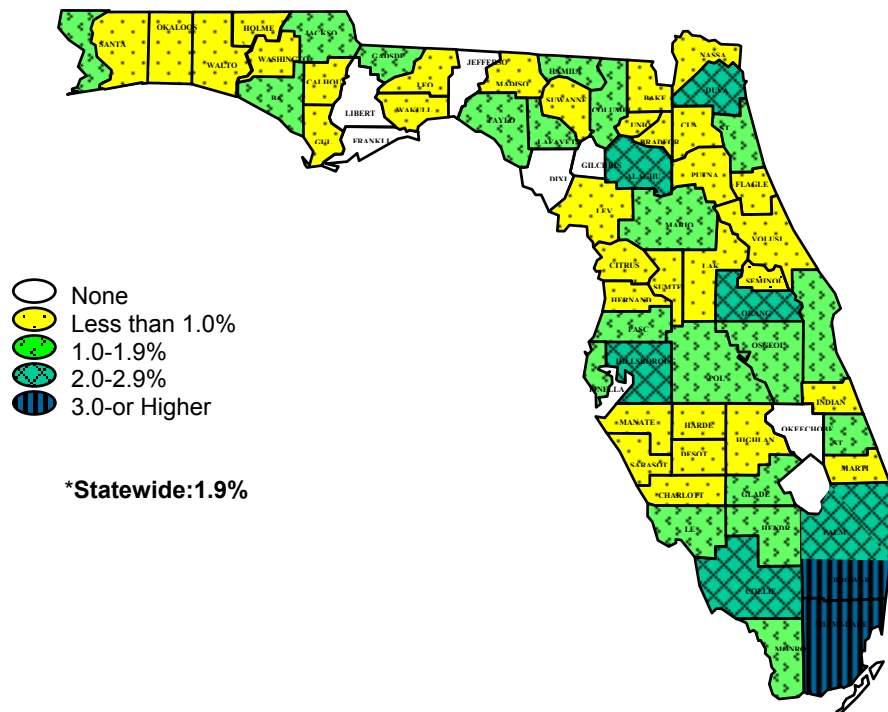
The accessibility and acceptance of HIV testing has changed considerably since the beginning of the epidemic. In the early years, a high proportion of HIV testing occurred in the health department. Over time, HIV testing became a routine procedure in more and more situations outside of the health department, such as blood donation, routine doctor visits, prenatal care, application for insurance, application for military service or employment. The increased presence of private laboratories and home testing methods has also diminished the untested population base from which the health department can draw. As a result, we have had to work harder to find those infected persons who do not know their HIV status.

At least 75% of persons with HIV in Florida know they are infected (based on estimates from the Centers for Disease Control and Prevention). Since 1999, the Department of Health has focused on increasing that proportion. A variety of strategies have been pursued, including: the increased use of OraSure and rapid testing in outreach settings; broader use of incentives; improved risk assessment and targeted testing; increased testing in correctional settings; increased emphasis on partner counseling and referral services; expansion of non-traditional, community-based testing programs; increased use of mobile vans; directly-funded CDC testing programs; and a social marketing campaign encouraging persons at risk for HIV to be tested. In early 2001, the Bureau of HIV/AIDS adopted several goals that will continue to guide our prevention, early intervention, and care efforts. One of those goals is to increase the proportion of HIV-infected persons who know their status from 75% to 95% by 2005. It is hoped that these strategies and initiatives will help us achieve that goal. These strategies may have led to the 28% increase in testing between 1999 and 2004.

HIV Counseling and Testing in 2004

In 2004, 295,602 HIV tests were performed at registered HIV testing sites in Florida. Of these, 5,723 were positive, resulting in an overall positivity rate of 1.9%. Positivity rates for individual counties are shown in Figure 5. Broward and Miami-Dade counties recorded the highest positivity rate (3.2%), followed by Collier and Orange counties with 2.7%, and Palm Beach County (2.5%). Overall, eight counties reported positivity rates higher than the state average for 2004. Six counties reported no positive HIV tests in 2004. As always, these data should be viewed critically; while low positivity rates may be an accurate representation of HIV prevalence in a given area, they may also indicate that high-risk populations are not being reached. Conversely, high positivity rates could indicate access by high-risk populations, or they might be a result of operational factors, such as a standard recommendation that all clients receiving a positive result retest. Additional counseling and testing data for individual counties are available from the Early Intervention Section.

Figure 5. HIV Seropositivity Rates by County, 2004*



Race/Ethnicity

Approximately 39% of all tests (114,164) were performed on persons who identified themselves as non-Hispanic white, as compared to 105,270 (35.6%) for non-Hispanic blacks, and 64,264 (21.7%) for Hispanics (Figure 6a). However, whites only accounted for 25.6% (1,463) of all positive tests (Figure 6b), with a positivity rate of 1.3%. In contrast, blacks accounted for 52.8% (3,023) of positive tests, resulting in a positivity rate of 2.9%. Among the Hispanic population, the proportion of positive tests (1,009 or 17.6%) was more consistent with their testing level; the positivity rate for this group was 1.6%. Testing among Asians, Native Americans, and other racial/ethnic groups was minimal; the combined category of “other” accounted for 1.7% of all tests and 1.2% of positive tests.

Figure 6a.
Total HIV Tests by Race/Ethnicity,
Florida, 2004 (N=295,602)

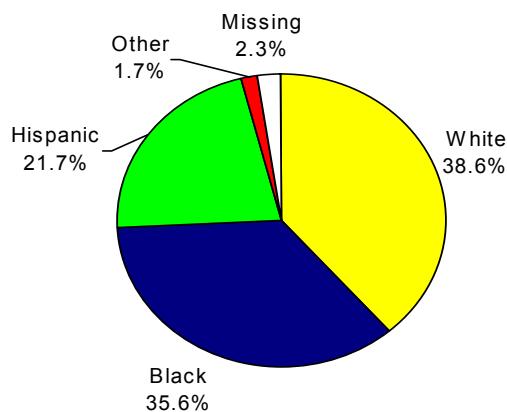
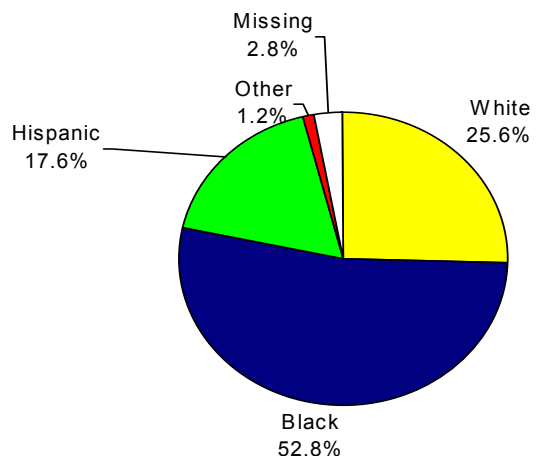
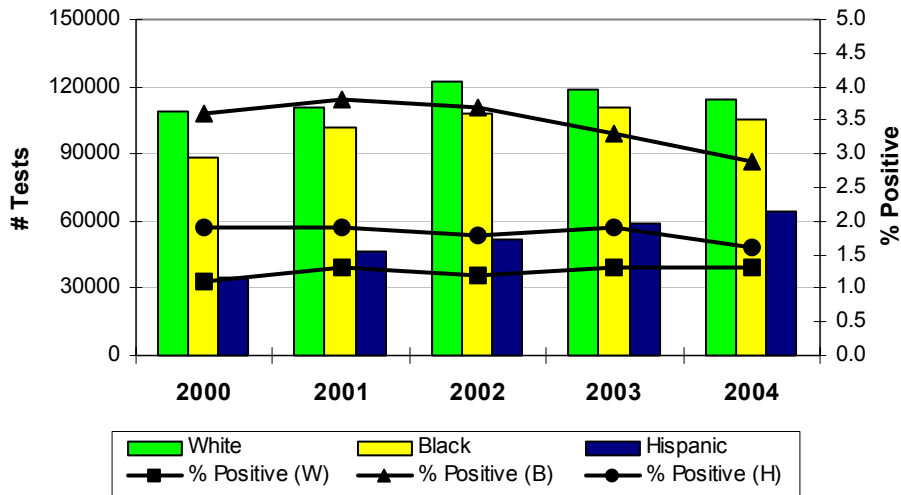


Figure 6b.
HIV Positive Tests by Race/Ethnicity,
Florida, 2004 (N=5,723)



As Figure 6c shows, testing levels among these three racial/ethnic groups increased considerably in 2002. Specifically, between 2001 and 2002, testing increased by 10.8% (11,822 tests) among whites, 12.0% (5,513 tests) among Hispanics, and 5.8% (5,925 tests) among blacks. By 2004, testing levels among Hispanics continued to increase by 9.7% (5,665), while testing levels for blacks and whites decreased by 4.8% (5,325), and 3.7% (4,434), respectively. Positivity rates for whites remained fairly stable for the five years of comparison; for blacks the rate remained stable the first three years but declined 21.6% since 2002, while for Hispanics the positivity rate which had been stable the first four years, declined in 2004 by 15.8%.

Figure 6c. Number of HIV Tests & Positivity Rates by Race/Ethnicity, Florida, 2000-2004



Gender

Figures 7a and 7b show the number of HIV tests by gender. In 2004, 181,434 HIV tests were performed on females (61.4%); 112,368 (38.0%) were performed on males (Figure 7a). However, males accounted for 64.4% of all positive tests, yielding a positivity rate of 3.3%, while females accounted for 34.6%, with a 1.1% positivity rate (Figure 7b).

Figure 7a.
Total HIV Tests by Gender,
Florida, 2004 (N=295,602)



Figure 7b.
HIV Positive Tests by Gender,
Florida, 2004 (N=5,723)

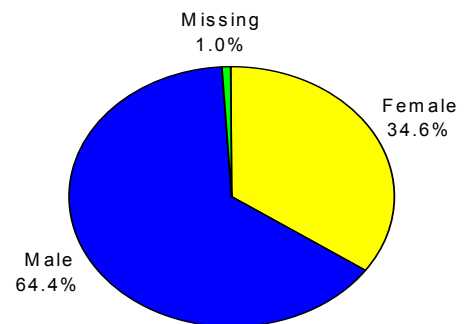
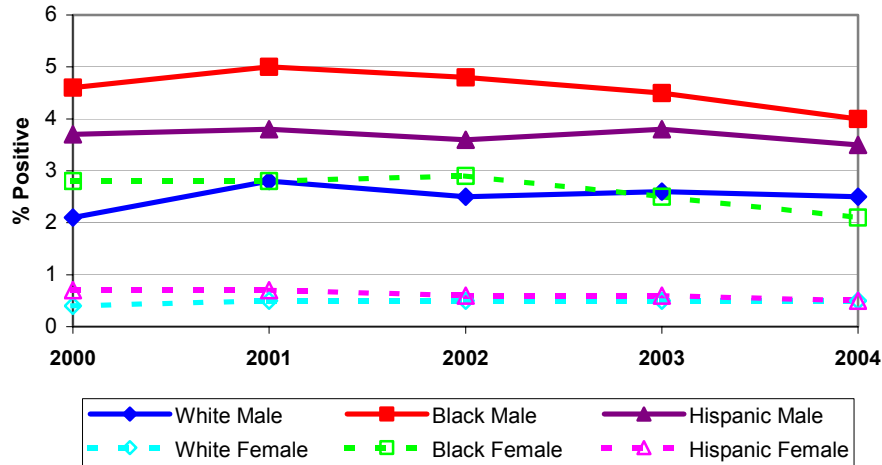


Figure 8 shows positivity rates for males and females by race/ethnicity from 2000 to 2004. Black males continue to have the highest positivity rates, followed by Hispanic males. In 2003, the positivity rate for black females was slightly surpassed by white males but this difference got bigger in 2004 when the positivity rate for whites males was 2.5% compared to 2.1% for black females. Over these five years, positivity rates for Hispanic females were low; however, white females exhibited the lowest positivity rates until 2004 when they had the same positivity rate as Hispanic females (0.5%).

Figure 8. HIV Seropositivity by Sex and Race/Ethnicity, Florida, 2000-2004



Age

Children under the age of 13 recorded 709 tests in 2004 and accounted for 0.2% of total and positive tests (Figures 9a and 9b). However, the positivity rate for this age group was 1.8% in 2004 (Figure 9c). Teenagers represented 19.1% (56,369) of all tests, but only 2.7% (156) of positive tests, resulting in a positivity rate of 0.3%. Persons between the ages of 20-29 continued to represent the highest proportion of tests (117,372 or 39.7%), yet only 19.7% of the positive tests (1,125), resulting in a positivity rate of 1.0%. With only 20.6% of tests conducted, the 30-39 age group accounted for the highest proportion of positive tests in 2004 (1,899 or 33.2%) and a positivity rate of 3.1%. The 40-49 age group accounted for only 13.0% of all tests in 2004, but 31.2% of positive tests and the highest positivity rate among all age groups (4.7%).

Figure 9a. Total HIV Tests by Age Group, Florida, 2004 (N=295,602)

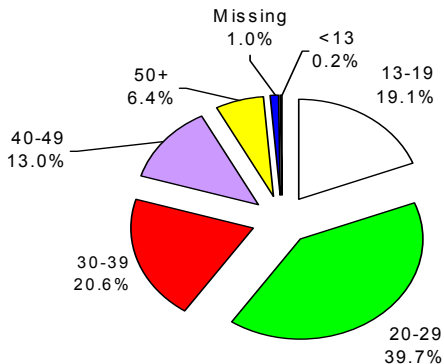
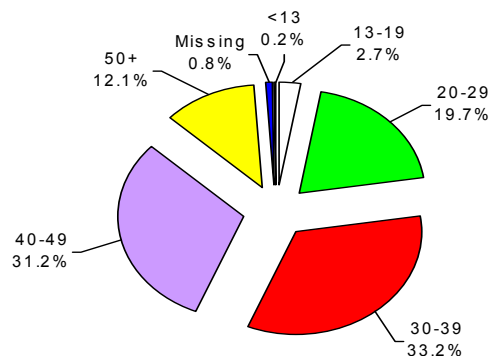


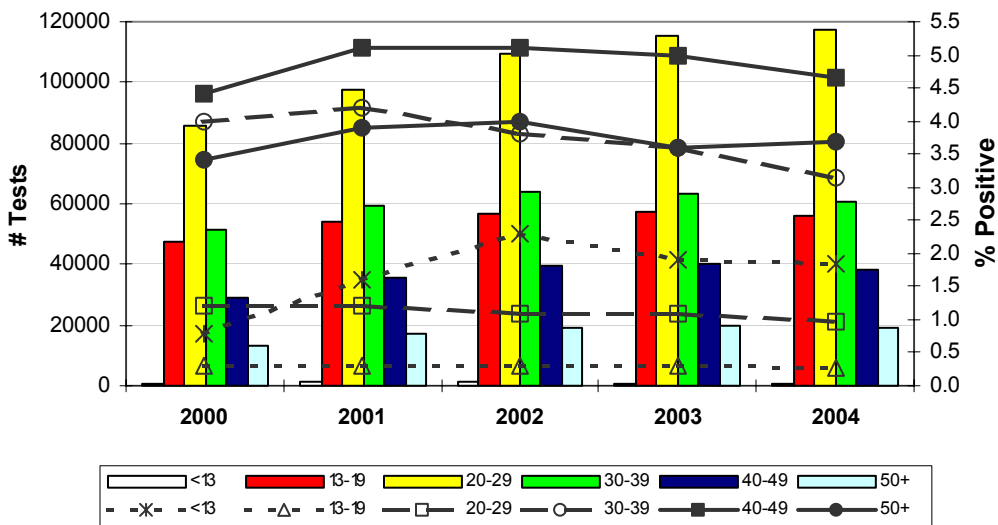
Figure 9b. HIV Positive Tests by Age Group, Florida, 2004 (N=5,723)



Although the 50+ age group was not tested in very high numbers (18,880 or 6.4%), they accounted for 12.1% of positive tests, giving this group a positivity rate of 3.7%.

Figure 9c shows testing patterns and positivity rates from 2000 to 2004. The distribution of testing across age groups has not changed significantly over time. In 2002, marked increases in testing were seen in all age groups. In 2004, there were slight decreases in all group ages except for 20-29 which showed an increase of 2,206 (1.9%) tests. Positivity rates for persons aged 13-29 were the least variable during the past five years. Between 2000 and 2004, positivity rates for children less than 13 years old fluctuated, although this variability is primarily attributed to the low volume of tests conducted. The 40-49 age group consistently recorded the highest positivity rates between 2000 and 2004.

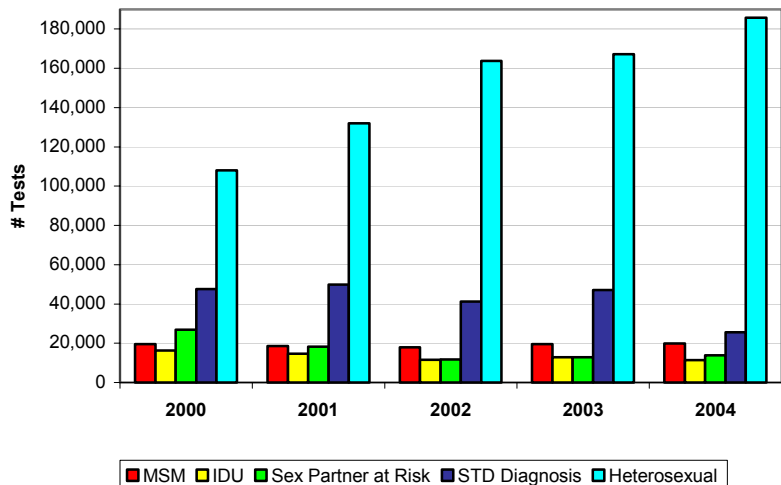
Figure 9c. Number of HIV Tests & Positivity Rates by Age Group, Florida, 2000-2004



Risk Exposure

Since individuals may engage in more than one risk behavior, each self reported exposure is categorized according to the highest level of risk. As Figure 10 shows, persons who identified heterosexual sex as their highest risk behavior comprise the majority of HIV tests conducted from 2000 to 2004. The total number of tests conducted in this risk group increased steadily throughout the mid-1990s and by 1999, approximately 65% of HIV tests were performed on persons who identified heterosexual sex as their highest risk. The

Figure 10. Number of HIV Tests Among Selected Risk Exposure Groups, Florida, 2000-2004



proportion of tests administered to heterosexuals dropped to a low in 2000, only 43.9% of all tests. In 2001, the testing volume increased substantially, but this risk group still accounted for less than 50% of all tests. By 2004, this proportion represented 55.4%. Three other risk groups with relatively large testing volumes experienced significant fluctuations over the past five years: testing levels among those identifying a current or past sexually transmitted disease (STD) diagnosis have generally risen from 2000 to 2001 but declined by 17.5% in 2002, rising again in 2003, and declining in 2004 by 45.8%. Testing levels among injection drug users and persons with a sex partner at risk varied over time but were relatively low compared with heterosexuals. Among MSM², testing levels fluctuated from 2000 to 2002 with a decrease of 2.9%, then increased again in 2003, and in 2004 with the highest level of the five-year period.

Figure 11. Positivity Rates by Self-Reported Risk Exposure, Florida, 2004

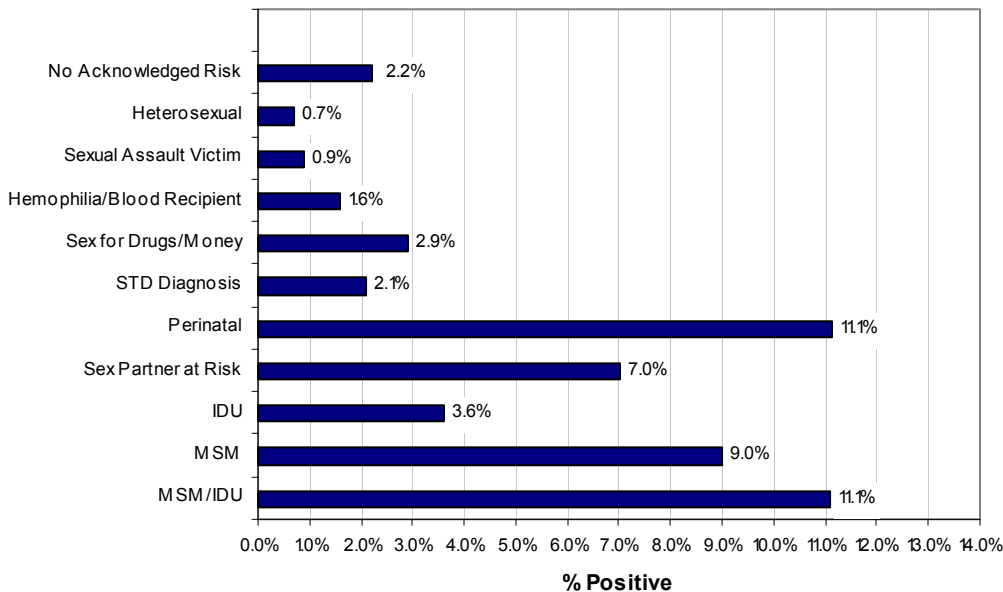


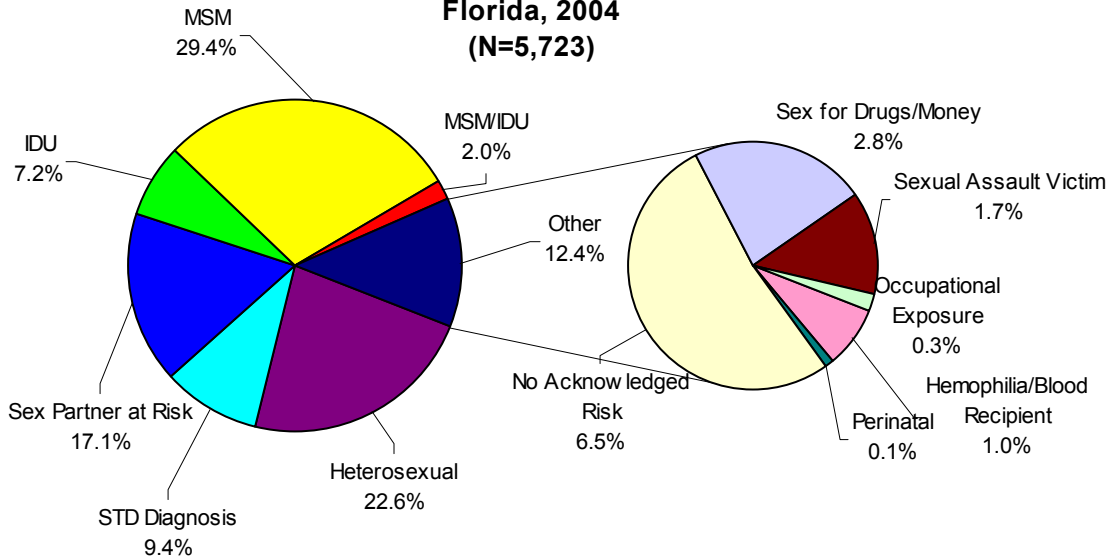
Figure 11 displays positivity rates for all risk exposure groups hierarchically, starting with the lowest risk level. In 2004 men who have sex with men continued to be a risk group with very high positivity rates (9.0%; 11.1% when combined with injection drug use). MSM/IDU and perinatal exposure accounted for the highest positivity rates (11.1%), this could be due in part to the small volume of tests conducted in these risk groups (925 and 63 tests, respectively). Positivity rates were also relatively high among the sex partner at risk (7.0%), IDU (3.6%), and sex for drugs or money (2.9%) categories. Alternatively, the positivity rate for the heterosexual risk group remained at less than 1.0% even though they accounted for the majority of tests conducted. Over 16,000 tests (2.2% positivity rate) were recorded in 2004 with no acknowledged risk.

Figure 12 shows the distribution of HIV-positive test results by self-reported risk exposure for 2004. MSM accounted for the greatest number of positive tests (1,682 or 29.4% and 1,799 or 31.4% when combined with IDU). Persons who identified heterosexual sex as their highest risk behavior comprised 22.6% (1,292) of all positive tests. Those who reported that they had sexual relations with someone else at risk for HIV accounted for 17.1% (976) of all positive tests. The proportion of positive tests among individuals having a current or prior STD diagnosis was 9.4%

² The MSM category here includes MSM who are injection drug users (MSM/IDU).

(536). Persons who reported injection drug use as their highest risk accounted for 7.2% (411) of all positive tests. Although no other risk group accounted for more than 3% of positive tests in Florida in 2004, 11.9% of the positive tests (681) were reported with no acknowledged risk or missing risk data.

Figure 12. Distribution of HIV-Positive Tests by Self-Reported Risk Exposure, Florida, 2004 (N=5,723)



Focus on Minorities

According to projections from the Census Bureau³, currently 17.4 million people reside in the state of Florida. The racial composition of this population is as follows: 65.1% white, 15% black, 17.6% Hispanic, and 2.3% "other". However, blacks and Hispanics comprised 69% (50% blacks and 19% Hispanics) of HIV cases and 71% (53% blacks and 18% Hispanics) of AIDS cases reported cumulatively through 2003 in Florida. Analysis of HIV counseling and testing data has also revealed disproportionately higher positivity rates among blacks. Further specification of the distribution of HIV testing and positivity rates across racial/ethnic populations can provide useful insights into the nature and course of the epidemic in Florida's minority communities.

The Intersection of Race/Ethnicity, Gender, and Age

One way to obtain a more specific description of HIV testing patterns and positivity rates in a population is to look at the intersection of race/ethnicity, sex, and age. Figure 8 shows that over time, black males have experienced the highest positivity rates, followed by Hispanic males, white males, or black females. White and Hispanic females consistently recorded positivity rates below 1.0%. This pattern has been further specified for 2004 by the incorporation of age.

The overall positivity rate for black males in 2004 was 4.0% (Figure 8). However, as Figure 13a shows, this rate varied considerably by age. The highest positivity rate was found among black males age 40-49 (7.4%), followed by those aged 50+(6.5%) and 30-39 (6.1%). This is

³ <http://www.census.gov/popest/counties/tables/CO-EST2004-01-12.xls>

particularly informative because 20-29 year olds accounted for the largest proportion of HIV tests conducted among black males (35.1%, data not shown), and yet their positivity rate was relatively low (2.0%). Significant variation in positivity rates by age also exists among Hispanic males, whose overall positivity rate in 2004 was 3.5% (Figure 8). The highest positivity rate was found in the 40-49 age group (5.9%); the lowest in the 13-19 age group (0.5%).

The overall positivity rate for black females in 2004 was 2.1% (Figure 8). However, Figure 13b shows that black females over the age of 30 are experiencing much higher positivity rates. Fewer tests were administered to black females aged 30 and older, yet positivity rates were quite high: 3.4% for those in the 30-39 age group, 6.0% for those aged 40-49, and 4.7% for those aged 50 and over. While 65.0% of black females tested were between the ages of 13 and 29 (data not shown), the corresponding positivity rates were only 0.4% for 13-19 year olds and 1.2% for 20-29 year olds. Among Hispanic females, positivity rates were low, however, the positivity rates for Hispanic females in the 40-49 and 50+ age groups were 1.9% and 1.8%, respectively, slightly higher than the 0.5% reported for all Hispanic females (Figure 8). These figures suggest that increased HIV testing of older minority men and women is needed.

Compared with the year 2000, testing levels among blacks have increased by 11.3% (over 4,000 tests) for males and 24.8% (over 12,000 tests) for females (data not shown). While actual numbers are much smaller, testing levels among Hispanics have increased by an even larger margin over the past five years, 57.5% (about 8,000 tests) for males, and 97.3% (about 20,000 tests) for females. These trends signal a growing awareness of HIV prevention among minority populations and increased accessibility of testing through outreach. The data presented here indicate that prevention

efforts must continue to be directed toward older blacks and Hispanics in order to limit new infections and to ensure that access to education and care is maintained or improved.

Figure 13a. Seropositivity Among Males, by Age and Race/Ethnicity, Florida, 2004

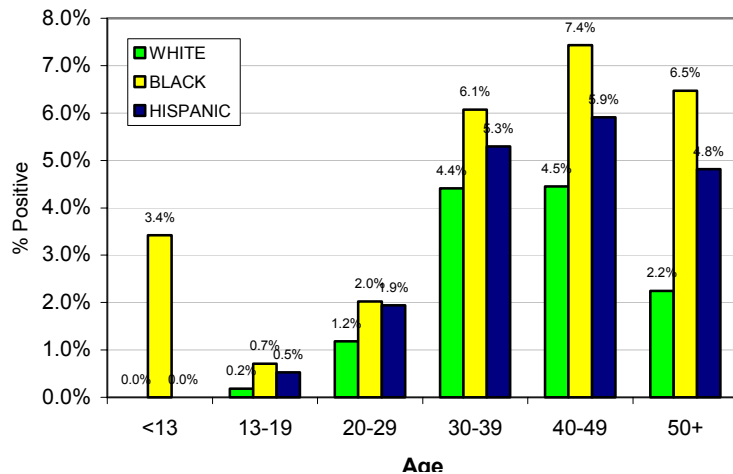
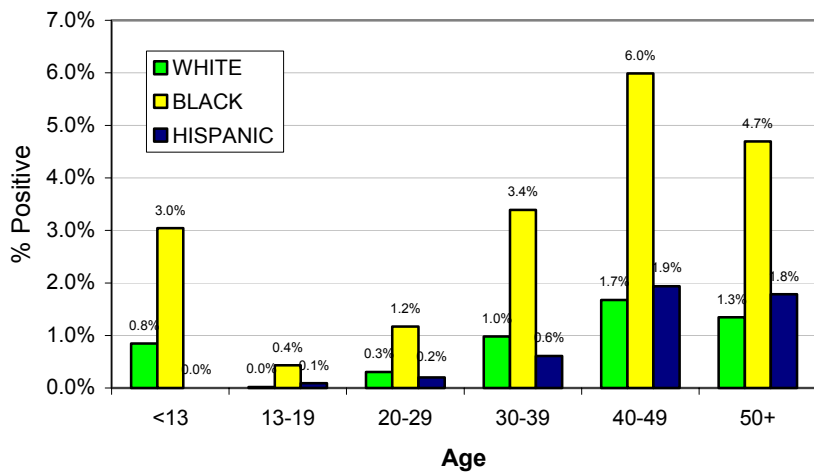


Figure 13b. Seropositivity Among Females, by Age and Race/Ethnicity, Florida, 2004



The Intersection of Race/Ethnicity and Risk

Male-to-male sex and injection drug use (separately or in combination) are behavioral practices that place individuals at high risk for HIV infection. In 2004, 31,198 HIV tests (10.6%) were performed on persons who identified themselves as MSM, IDU, or both MSM and IDU. As shown in Figure 11, the positivity rate among MSM/IDU in 2004 was 11.1%, 9.0% among MSM, and 3.6% among IDU. However, sharp differences in testing patterns and positivity rates are evident across racial/ethnic categories within these risk groups.

Figures 14 to 16 illustrate the distribution of HIV tests and HIV-positive tests by race/ethnicity for MSM/IDU, MSM, and IDU in 2004. Individuals identifying themselves as non-Hispanic white accounted for the largest proportion of HIV tests in all three of these risk groups: 66.6% of MSM/IDU, 50.7% of MSM, and 72.8% of IDU. Whites also accounted for the majority of positive HIV tests among MSM/IDU (60.7%) and MSM (45.0%), suggesting that racial/ethnic disparities among minorities might not be particularly high in these risk groups. However, the proportion of positive tests was still greater than the proportion of tests conducted for black men in both of these risk groups.

Racial/ethnic disparities appear to be stronger among injection drug users. Black females, who accounted for only 6.0% of tests among IDU in 2004, comprised 18.8% of positive tests in this risk group. Similarly, black males accounted for just 8.7% of tests, but 26.4% of the positives. In contrast, white males and females together accounted for over two-thirds of tests among IDU (38.4% for females and 34.4% for males), yet their combined share of positive tests was substantially lower (34.0%). The proportion of positive tests among Hispanic male IDU in 2004 was also fairly high (15.2%), although there was no substantial difference between the share of all tests and the share of positive tests among Hispanic females.

Figure 14a.
 HIV Tests among MSM/IDU by
 Race/Ethnicity, Florida, 2004 (N=1,058)

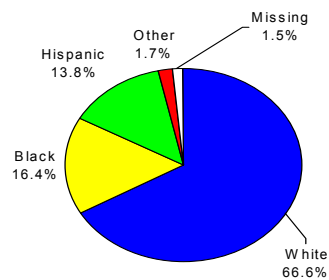


Figure 14b.
 HIV-Positive Tests among MSM/IDU by
 Race/Ethnicity, Florida, 2004 (N=117)

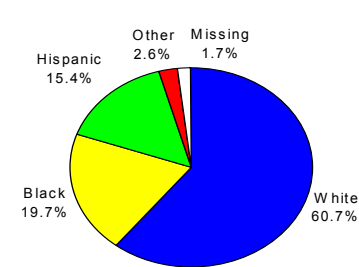


Figure 15a.
 HIV Tests among MSM by Race/Ethnicity,
 Florida, 2004 (N=18,771)

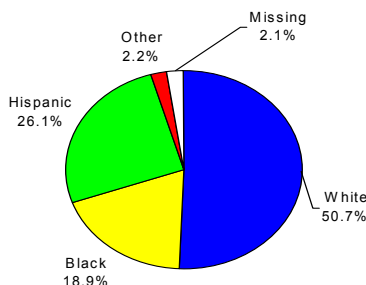
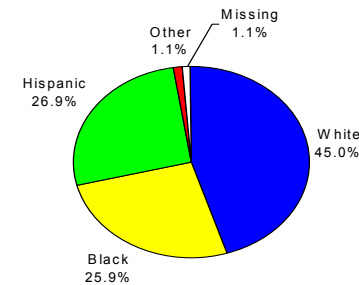


Figure 15b.
 HIV-Positive Tests among MSM
 by Race/Ethnicity, Florida, 2004 (N=1,682)



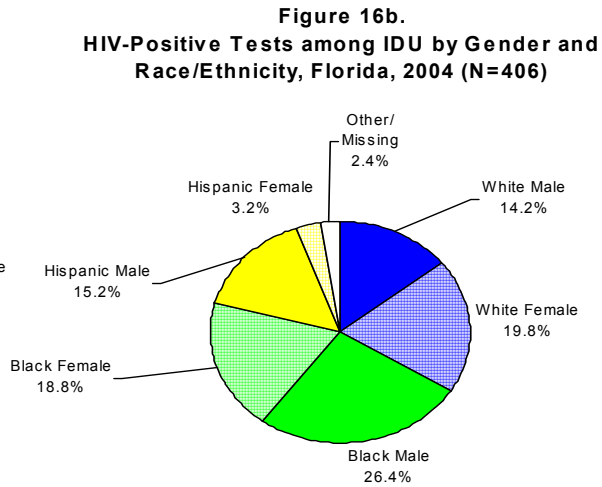
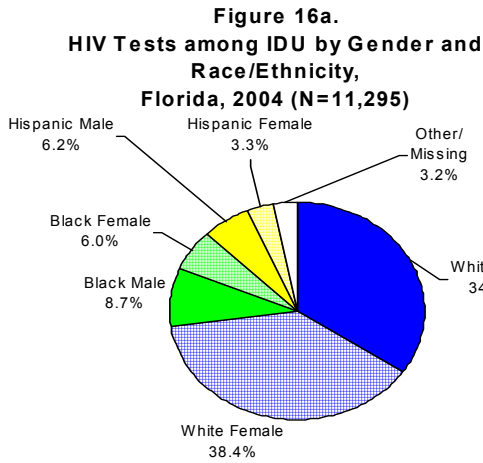


Figure 17 shows that aggregate positivity rates for MSM/IDU, MSM, and IDU mask important and occasionally dramatic differences between racial/ethnic groups. The relatively high volume of testing by whites combined with their generally lower positivity rates, reduce the average positivity rate for the whole population in each of these risk groups. For example, in 2004, the positivity rate for black MSM was 12.3%, approximately 3 percentage points higher than that for all MSM (9.0%). The difference is also apparent for black female IDU, whose positivity rate in 2004 (11.4%) was 8.8 points higher than the 2.6% reported for all IDU. This figure shows that blacks experienced significantly higher positivity rates in these three risk exposure groups.

Together MSM, IDU, and MSM/IDU accounted for 29,973 HIV tests in 2004, 18.0% were blacks, 20.4% were Hispanics and 61.6% were whites. However, of the 2,153 positive tests for these three risk groups, 29.9% were blacks, 25.1% were Hispanics and 45.0% were whites (data not shown). The data presented here indicate that there is a continuing need to increase testing and prevention education among individuals that engage in very-high-risk behaviors.

Figure 17. Seropositivity Among Selected Risk Exposure Groups by Gender and Race/Ethnicity, Florida, 2004

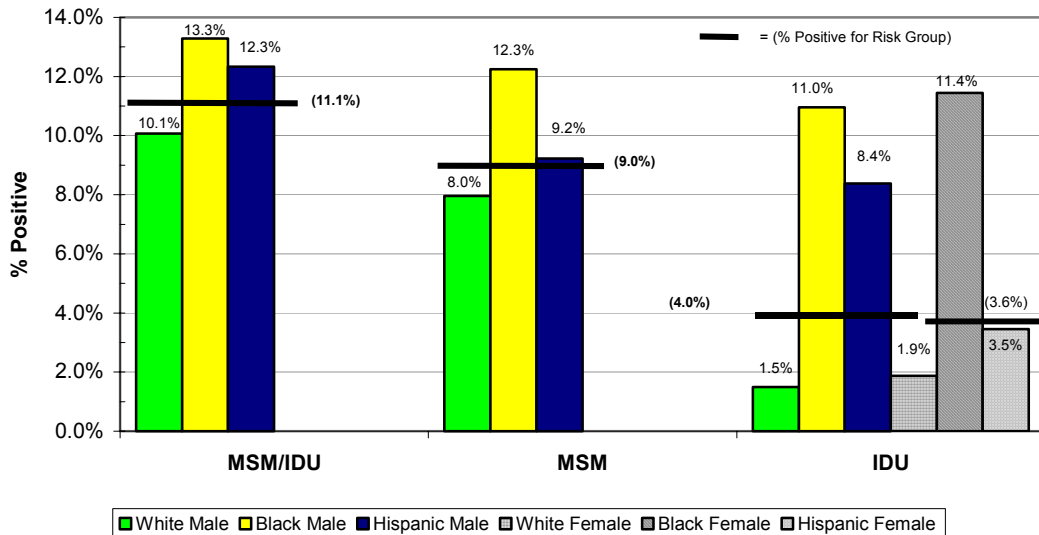
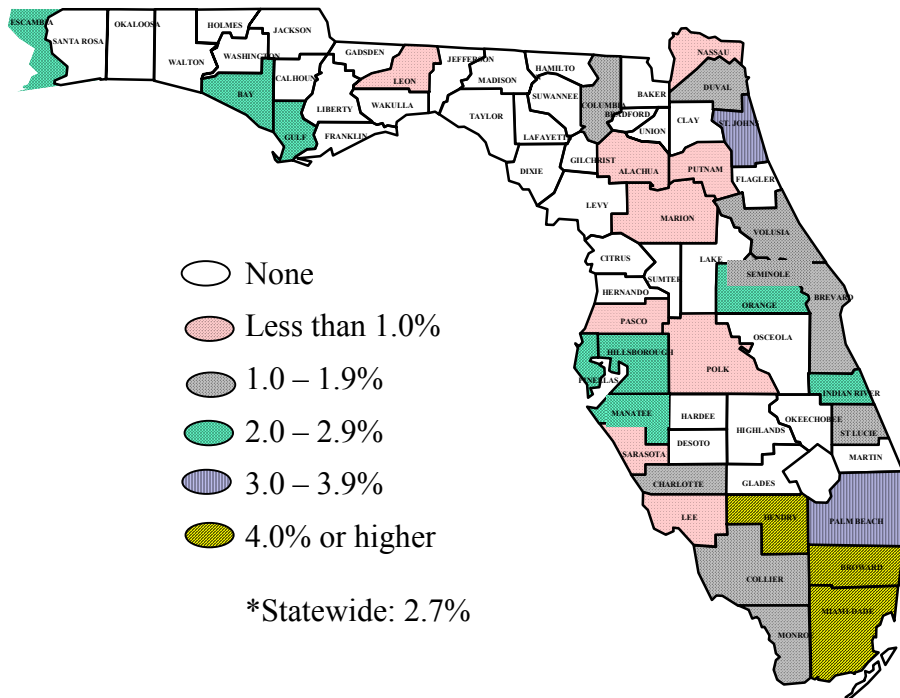


Figure 18. HIV Seropositivity Rates Using OraSure by County, 2004*



Focus on OraSure

The Bureau of HIV/AIDS has been providing Florida counseling and testing programs with OraSure Oral HIV-1 Antibody Testing Systems since February 1998. To receive OraSure, providers must complete a request form documenting their need, proposed usage, and target populations. This testing method, which tests for antibodies in oral mucosal transudate, is as accurate as a blood test for diagnosis in public health and clinical settings. In Florida, OraSure is primarily for use in outreach settings, to reach high-risk persons who are less likely to access health care system and less accepting of conventional testing methods (e.g., persons who are homeless, drug users, younger, or those who live in rural areas)

In 2004, 63,293 HIV test were administered with OraSure in select counties in Florida, a 19.2% and 8.0% decline in usage compared with 2003 (78,378) and 2002 (68,766), respectively. There were 63,015, and 43,764 OraSure tests administrated in 2001 and 2000, respectively. The statewide positivity rate using OraSure also decreased from 2.8% in 2000 to 2.7% in 2004. Positivity rates for individual counties are illustrated in Figure 18. Compared to the overall positivity rates shown in Figure 5, some counties were able to achieve higher positivity rates using OraSure. These differences may result from the success of using OraSure in outreach settings. Among the 35 counties that used more than 100 OraSure tests in 2004, Miami-Dade County had the highest positivity rate (4.4%), followed by Broward (4.0%), and Palm Beach (3.5%) counties. Twenty-four counties performed fewer than 100 tests in 2003; eight counties did not administer OraSure tests.

Non-Hispanic blacks accounted for the majority of OraSure tests conducted in 2004 (27,339 or 43.2%), as compared to non-Hispanic whites (22,051 or 34.8%), and Hispanics (10,944 or 17.3%). Males accounted for a slightly higher proportion than females (51.6% vs. 47.7%).

Focus on Rapid Testing

In July 2003, the first Rapid HIV Testing program was implemented in the Duval County Jail. The OraQuick Rapid HIV-1/2 Antibody Test is a screening test that produces very quick results, usually in 20-40 minutes, and can be performed using whole blood through fingerstick or venipuncture or with an oral specimen. It is extremely accurate and non-reactive (negative) results are final. Reactive results must be confirmed by a standard HIV test, which could be done using blood or OraSure.

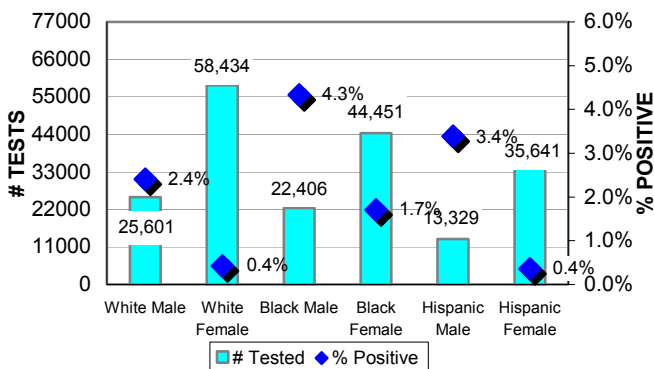
In 2004, 23,926 tests were recorded using rapid testing, up from 3,790 in 2003 when the program started. The statewide positivity rate using rapid testing increased from 2.2% in 2003 to 2.9% in 2004. Positivity rates for individual counties are illustrated in Table 1. Among counties that used more than 100 rapid tests in 2004, Hillsborough had the highest positivity rate (5.9%) with 99.8% of the tests done in the CHD STD clinics, followed by Alachua (5.7%), and Broward (2.6%) with almost all tests recorded in correctional facilities. One county Pinellas had 39 tests.

Table 1. Total Number of Rapid Tests and Positivity Rates

	Total Tests	No. Negatives	No. Confirmed Positives	Positivity Rate
Duval	7,497	7,345	151	2.0
Broward	5,053	4,924	129	2.6
Miami-Dade	4,908	4,806	101	2.1
Hillsborough	4,485	4,221	264	5.9
Orange	1,154	1,139	15	1.3
Alachua	298	281	17	5.7
Monroe	188	184	4	2.1
Brevard	152	150	2	1.3
Seminole	148	145	3	2.0
Pinellas	39	30	5	12.8
Total	23,926	23,231	689	2.9

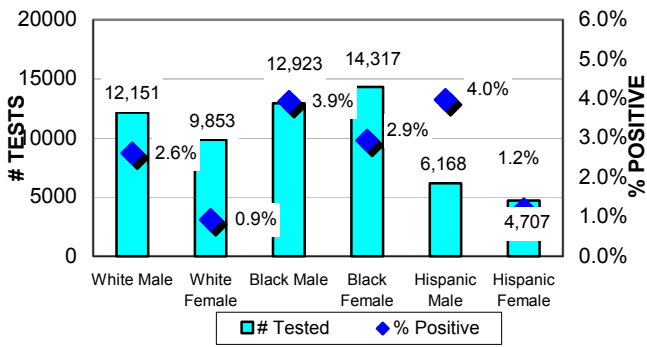
Non-Hispanics blacks recorded a large proportion of rapid tests conducted in 2004 (10,917 or 45.6%), non-Hispanics whites recorded 7,958 or 33.3%, and Hispanics 4,181 or 17.5%.

Figure 19a. HIV Blood Tests by Race and Gender, Florida, 2004



Figures 19a, 19b and 19c compare testing levels and positivity rates by race/ethnicity and gender for blood, OraSure and rapid testing in 2004. While white females had the highest number of blood tests, the highest levels of OraSure and rapid testing were among blacks, with more females testing with OraSure and more males by rapid testing. White and Hispanic males were also tested in higher numbers than their female counterparts for OraSure and rapid testing. Compared to blood testing, much higher positivity rates were

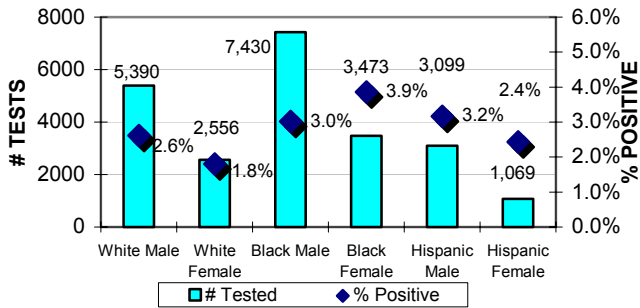
Figure 19b. HIV OraSure Tests by Race and Gender, Florida, 2004



recorded among black females using OraSure or rapid testing (2.9% and 3.9% vs. 1.7%). Substantial increases were also recorded for Hispanic females (1.2% and 2.4% vs. 0.4%).

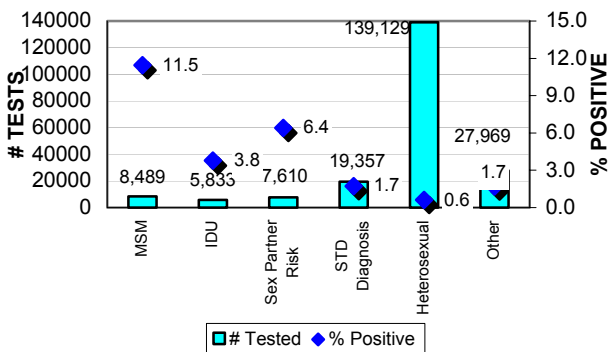
Conversely, the positivity rate for black men using OraSure or rapid testing was slightly lower than the rate obtained from blood tests (3.9% and 3.0% vs. 4.3%).

Figure 19c. HIV Rapid Testing by Race and Gender, Florida, 2004



Figures 20a, 20b, and 20c compare testing levels and positivity rates by risk groups for blood, OraSure and rapid testing in 2004. Regardless of the type of test, the majority of tests were administered to persons who identified heterosexual sex as their highest risk. Compared to blood testing, the positivity rate for MSM using OraSure or rapid testing was lower (11.5%, vs. 7.2% and 5.6%). Higher positivity rates using OraSure or rapid testing were recorded for the sex partner at risk (8.0% and 10.1% vs. 7.0%), STD diagnosis (2.8% and 4.6% vs. 1.8%), and heterosexual (1.0% and 0.7% vs. 0.6%) exposure categories.

Figure 20a. HIV Blood Tests by Risk, Florida 2004



These data indicate that OraSure and rapid testing have become a valuable asset to HIV prevention programs throughout Florida. Growing evidence from the field suggests that the availability of OraSure and rapid testing have increased test acceptance in a variety of outreach settings, including housing projects, homeless shelters, rural communities, jails and high-risk youth programs. In 2004, OraSure and rapid testing accounted for over 30% of all HIV tests conducted at registered HIV counseling and testing sites, up from 26% in 2003, and 23% in 2002 and 2001. The effectiveness as an outreach tool has been demonstrated in larger counties, where the growth of street outreach and community-based testing sites demands faster, easier, and less threatening means of testing for HIV. OraSure has been very successful in uncovering HIV-positive cases in several rural counties with historically low positivity rates. Rapid testing has been extremely valuable in jails, where inmates are often released and lost to follow-up before traditional test results are available. OraSure and rapid testing are an important part of ongoing efforts to increase access and

Figure 20b. HIV OraSure Tests by Risk, Florida 2004

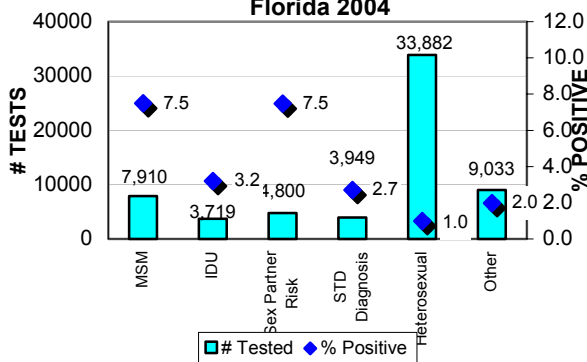
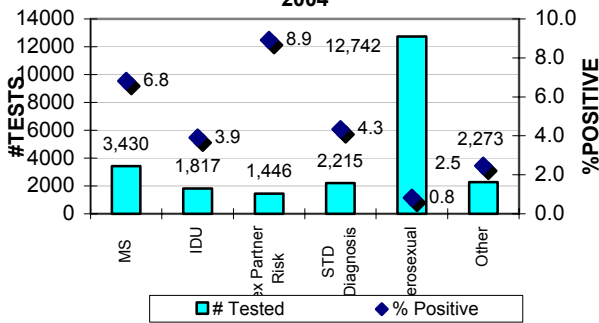


Figure 20c. HIV Rapid Testing by Risk, Florida
2004



availability of HIV testing and counseling services among high-risk populations, and will continue to increase the proportion of HIV-infected persons in Florida who know their status.

Focus on Repeat HIV Testers

Persons who have tested at least once before make up over 52% (152,502) of the HIV tests conducted in 2004⁴. The majority of these repeat testers were among clients who previously tested negative (145,593 or 95.5%), while 2,630 (1.7%) previously tested positive, and 4,279 (2.8%) had an inconclusive or unknown previous test result.

Among the 5,723 positives in 2004, 20.4% (1,167) previously tested negative and 36.2% tested positive (some may have tested positive in previous years). Persons who identified MSM as their highest risk behavior accounted for the largest proportion (460 or 39.4%) of those who previously tested negative. Another 26.2% (306) of the positives that previously tested negative were identified as heterosexual, while 10.1% (118) had partners at risk (data not shown).

Table 2 shows positives in 2004 that previously tested negative by gender and race/ethnicity. Black males accounted for the highest number of positives and the highest number of previously negative testers; however, the proportion of positive white males who previously tested negative was the highest (24%). Positive white females also have a high proportion of those who previously tested negative (22.8%). In 2004, the 30-39 age group accounted for 33.9% (396, and 185 of which were MSM) of the positives that previously tested negative, followed by the 40-49 and 20-29 age groups (data not shown).

These data indicate that a large proportion of positive tests are being identified among persons who previously tested negative. Many individuals may be concerned because of their continued practice of high-risk behaviors, and thus return often for testing. Further assessment is necessary to understand reasons for repeat testing practices.

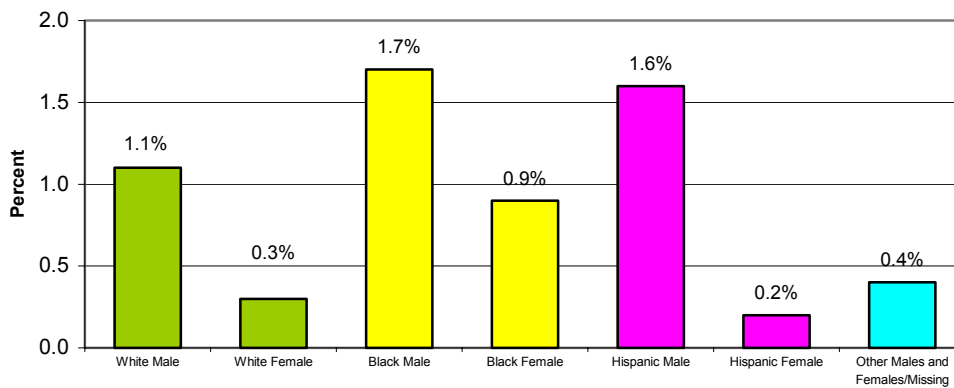
Table 2. Total Number of HIV-Positive Tests and Number (%) of HIV-Positive Tests Among Persons who Previously Tested Positive, and Negative by Gender and Race/Ethnicity, Florida, 2004

Race/Ethnicity and Gender	Total Positives	# (%) Previously tested Positive	# (%) Previously tested Negative
White Male	1,075	402 (37.4)	258 (24.0)
White Female	387	135 (34.9)	88 (22.8)
Black Male	1,701	586 (34.5)	339 (19.9)
Black Female	1,312	491 (37.4)	257 (19.6)
Hispanic Male	794	288 (36.2)	174 (21.9)
Hispanic Female	212	90 (42.3)	28 (13.3)
Other Males and Females/Missing	242	78 (32.2)	23 (9.5)
TOTAL POSITIVE	5,723	2,070 (36.2)	1,167 (20.4)

⁴ There were a total of 295,602 HIV tests conducted in 2004; 152,502 were repeat testers, 63,227 (21.4%) had not been tested before, 453 (0.2%) indicated they did not remember or other, and there were 79,421 (26.9%) tests with missing information.

Figure 21 shows HIV positivity rates by race/ethnicity and gender for those who tested positive for the first time in 2004. Of the 5,723 positive tests results obtained in 2004, 560 (9.8%) were among persons who had never been tested before. Another 1,167 (20.4%) were among persons who had previously tested negative. These groups combined represent “new” positives in 2004. The positivity rate among the new positives was highest for black males (1.7%), followed by Hispanic males (1.6%), and white males (1.1%). These positivity rates are substantially lower than those presented in Figure 8 and may be more reflective of the true prevalence among persons who receive voluntary HIV testing. Positivity rates, presented elsewhere in this report are influenced by the large number of duplicate positives within the database, as persons receiving a positive test result are very likely to repeat the test.

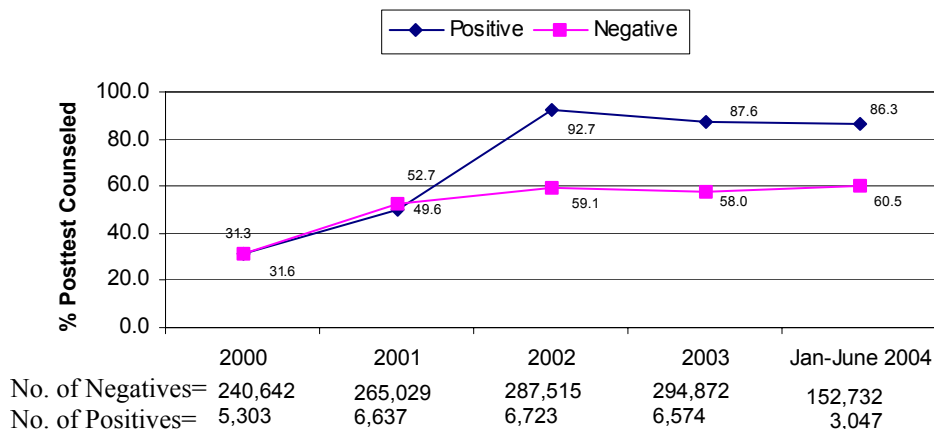
Figure 21. Positivity Rates Among Those Testing Positive for the First Time, by Race/Ethnicity and Gender, Florida 2004 (N= 1,727)



Focus on Post-Test Counseling

The post-test counseling (PTC) session provides an opportunity to inform the client of their HIV test result, to assess the patients’ understanding of the results, to assess the need for follow up and care; and to discuss the importance of risk-reducing behavior regardless of the test results. From 2001 to June 2004, more than 50% of negatives were post-test counseled. In June 2004, statewide post-test counseling rates for positives was 86.3%, a decrease of 1.5% compared with 2003 (Figure 22).

Figure 22. Percentage of Clients Post-test Counseled, Florida, 2000-2003



In Table 3, the number of clients with a positive or negative test result who received post-test counseling in the first half of 2004 is shown. College/University sites recorded the highest post-test counseling rate for negatives (80.4%), followed by special projects (69.5%), community-based organizations (68.5%), anonymous (67.4%), and prenatal/OB with 66.4%. Family planning and TB had the highest post-test counseling rate for positives (94.7% and 94.1% respectively). However, high post-test counseling rates were also recorded among special projects, adult health, and health department field visit. Anonymous sites recorded a much lower post-test counseling rate for positives (66.1%), as did jail/prison, 79.1%, colleges 79.2%, and private providers 83.9%.

Table 3. HIV Test and Post-test Counseling Sessions for Negatives and Positives by Site Type, Florida, January-June 2004

Site Type	No. Negative	No. Post-test Counseled	(%)	No. Positive	No. Post-test Counseled	(%)
Anonymous	10,581	7,128	67.4	224	148	66.1
STD	35,218	18,796	53.4	725	628	86.6
Drug Treatment	6,348	4,189	66.0	83	74	89.2
Family Planning	31,133	18,796	60.4	57	54	94.7
Prenatal/OB	15,198	10,091	66.4	39	35	89.7
TB	1,806	963	53.3	34	32	94.1
Adult Health	8,730	5,234	60.0	450	419	93.1
Jail/Prison	10,591	5,684	53.7	258	204	79.1
College	883	710	80.4	24	19	79.2
Private MD	3,214	1,660	51.6	124	104	83.9
Special Projects	1,609	1,119	69.5	46	43	93.5
Community-based Organization	19,718	13,507	68.5	759	669	88.1
Health Department Field Visit	7,512	4,588	61.1	219	198	90.4
Unknown	191	2	1.0	5	2	40.0
Total	152,732	92,467	60.5	3,047	2,629	86.3

Table 4. HIV Test and Post-test Counseling Sessions by Gender, Age, and Race/Ethnicity

	No. Negative	No. Posttest Counseled (negative)	(%)	No. Positive	No. Posttest Counseled (positive)	(%)
Gender						
Male	57315	34115	59.5	1972	1685	85.4
Females	94081	57585	61.2	1040	917	88.2
Other/or missing	1,336	767	57.4	35	27	77.1
Age						
Less than 13	428	224	52.3	6	3	50.0
13-19	29993	17896	59.7	80	74	92.5
20-29	60677	36635	60.4	578	493	85.3
30-39	30897	18803	60.9	1073	911	84.9
40-49	19238	11769	61.2	922	814	88.3
50+	9689	6107	63.0	362	313	86.5
Missing	1810	1033	57.1	26	21	80.8
Race/Ethnicity						
White	62336	38311	61.5	816	706	86.5
Black	53468	31169	58.3	1625	1405	86.5
Hispanic	29984	18878	63.0	484	413	85.3
Other/Missing	6,944	4,109	59.2	122	105	86.1
Total	152,732	92,467	60.5	3046	2,629	86.3

In January-June 2004 there were some differences by gender, age, and race/ethnicity in post-test counseling rates. As shown in Table 4, while there was not a substantial difference in post-test rates by gender for negatives; there was a slight difference for positives, 88.2% of the positive females had post-test counseling compared with 85.4% of males. Only 52.3% of negative children and 50.0% of the positive children received post-test counseling, compared with 63.0% of negatives in the 50+ group of age and 92.5% of positives in the 13-19 age group.

Only 58.3% of negative blacks had their post-test counseling session, compared with 63.0% of negative Hispanics. There were no differences between positive whites and blacks, both with a rate of 86.5%.

Acknowledgement

The Bureau of HIV/AIDS would like to acknowledge the dedication and commitment of the many individuals who have worked so hard over the past year to make Florida's public HIV counseling, testing and linkage system one of the best in the nation. Although too numerous to list, these individuals include: our CHD administrators, HIV/AIDS Program Coordinators, nursing directors and the many health department staff who perform HIV counseling, testing and linkage services and oversee those programs; STD staff who have the difficult job of notifying the newly infected and conducting partner counseling and referral services; our 501 trainers who ensure that future counselors are prepared; our health educators and outreach workers who educate and inform; our colleagues in the state laboratories, without whom we would not have a testing

program; our partners in community agencies, faith-based organizations, and correctional facilities who reach out to those we cannot reach; staff within the bureau who work tirelessly on this program; and finally, our Early Intervention Consultants, those front line staff who have worked so diligently to ensure the success of CTL in Florida. We look forward to our continued collaboration as we strive to ensure that all Floridians have the opportunity to learn their HIV status and take steps to protect themselves and those they love.