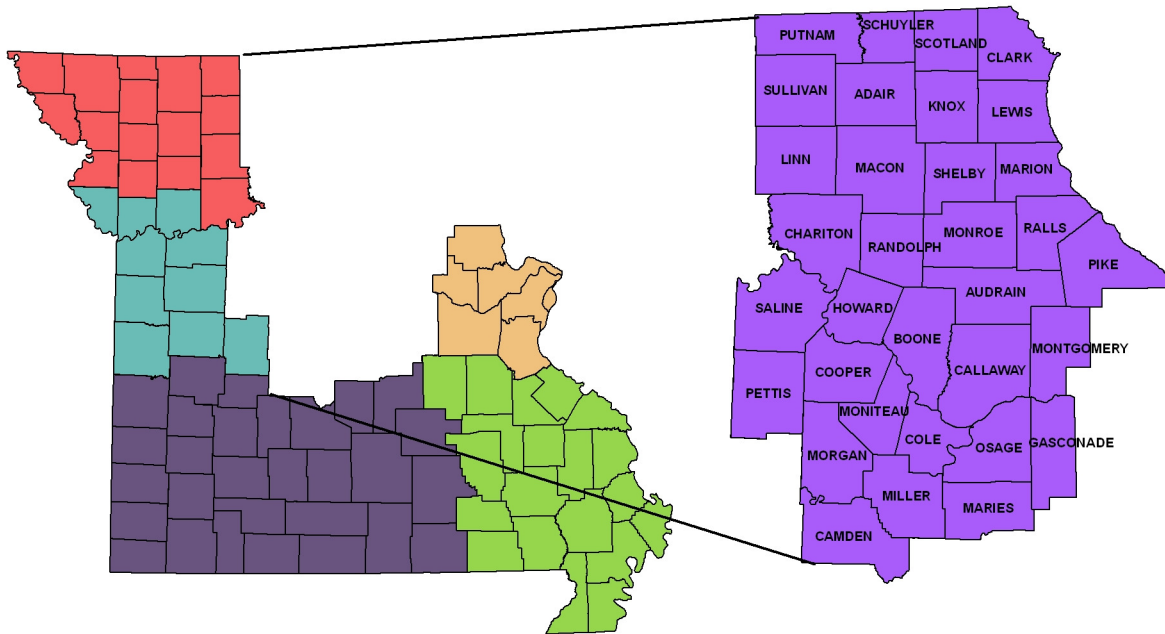


NORTH CENTRAL REGION



Population Estimates, North Central HIV Region, 2008

County	White		Black		Hispanic		Asian/Pacific Islander		American Indian/Alaskan Native		Two or More Races		Total
	Count	%	Count	%	Count	%	Count	%	Count	%	Count	%	
Adair County	23,301	93.4%	361	1.4%	494	2.0%	488	2.0%	66	0.3%	233	0.9%	24,943
Audrain County	23,072	88.6%	2,134	8.2%	372	1.4%	105	0.4%	85	0.3%	281	1.1%	26,049
Boone County	128,858	83.5%	13,304	8.6%	3,954	2.6%	4,990	3.2%	624	0.4%	2,635	1.7%	154,365
Callaway County	39,353	90.5%	2,278	5.2%	659	1.5%	392	0.9%	220	0.5%	562	1.3%	43,464
Camden County	38,882	95.6%	324	0.8%	637	1.6%	228	0.6%	192	0.5%	401	1.0%	40,664
Chariton County	7,357	95.1%	256	3.3%	53	0.7%	11	0.1%	14	0.2%	49	0.6%	7,740
Clark County	7,028	97.9%	20	0.3%	66	0.9%	5	0.1%	15	0.2%	46	0.6%	7,180
Cole County	63,072	84.9%	7,718	10.4%	1,378	1.9%	990	1.3%	239	0.3%	916	1.2%	74,313
Cooper County	15,442	88.1%	1,527	8.7%	243	1.4%	43	0.2%	65	0.4%	215	1.2%	17,535
Gasconade County	14,845	97.3%	68	0.4%	149	1.0%	33	0.2%	32	0.2%	134	0.9%	15,261
Howard County	8,940	90.1%	682	6.9%	121	1.2%	20	0.2%	36	0.4%	119	1.2%	9,918
Knox County	3,930	97.8%	5	0.1%	28	0.7%	4	0.1%	1	0.0%	52	1.3%	4,020
Lewis County	9,452	95.0%	270	2.7%	93	0.9%	25	0.3%	18	0.2%	93	0.9%	9,951
Linn County	12,126	96.4%	101	0.8%	165	1.3%	18	0.1%	52	0.4%	118	0.9%	12,580
Macon County	14,800	94.7%	387	2.5%	177	1.1%	27	0.2%	67	0.4%	163	1.0%	15,621
Maries County	8,639	95.5%	86	1.0%	150	1.7%	12	0.1%	50	0.6%	109	1.2%	9,046
Marion County	25,834	91.5%	1,448	5.1%	351	1.2%	101	0.4%	73	0.3%	418	1.5%	28,225
Miller County	24,031	96.3%	178	0.7%	323	1.3%	52	0.2%	111	0.4%	254	1.0%	24,949
Moniteau County	13,653	90.3%	611	4.0%	564	3.7%	51	0.3%	60	0.4%	182	1.2%	15,121
Monroe County	8,514	93.3%	369	4.0%	91	1.0%	24	0.3%	43	0.5%	86	0.9%	9,127
Montgomery County	11,154	94.5%	271	2.3%	116	1.0%	68	0.6%	35	0.3%	160	1.4%	11,804
Morgan County	20,051	96.1%	154	0.7%	232	1.1%	58	0.3%	132	0.6%	234	1.1%	20,861
Osage County	13,156	97.7%	38	0.3%	97	0.7%	21	0.2%	32	0.2%	121	0.9%	13,465
Pettis County	35,703	87.1%	1,224	3.0%	2,938	7.2%	312	0.8%	152	0.4%	677	1.7%	41,006
Pike County	15,977	86.5%	1,642	8.9%	557	3.0%	38	0.2%	48	0.3%	214	1.2%	18,476
Putnam County	4,772	98.1%	3	0.1%	48	1.0%	7	0.1%	5	0.1%	27	0.6%	4,862
Ralls County	9,517	96.8%	122	1.2%	89	0.9%	13	0.1%	20	0.2%	71	0.7%	9,832
Randolph County	22,972	89.3%	1,709	6.6%	393	1.5%	186	0.7%	122	0.5%	341	1.3%	25,723
Saline County	18,982	84.3%	1,188	5.3%	1,741	7.7%	173	0.8%	52	0.2%	369	1.6%	22,505
Schuyler County	4,013	97.6%	2	0.0%	30	0.7%	9	0.2%	13	0.3%	43	1.0%	4,110
Scotland County	4,700	98.0%	11	0.2%	42	0.9%	8	0.2%	8	0.2%	29	0.6%	4,798
Shelby County	6,209	96.8%	75	1.2%	51	0.8%	10	0.2%	21	0.3%	45	0.7%	6,411
Sullivan County	5,470	82.5%	11	0.2%	1,064	16.1%	16	0.2%	13	0.2%	55	0.8%	6,629
Region Total	663,805	89.6%	38,577	5.2%	17,466	2.4%	8,538	1.2%	2,716	0.4%	9,452	1.3%	740,554

Figure 1. HIV disease cases (living and deceased), by current HIV vs. AIDS status, North Central HIV Region, 1982—2009

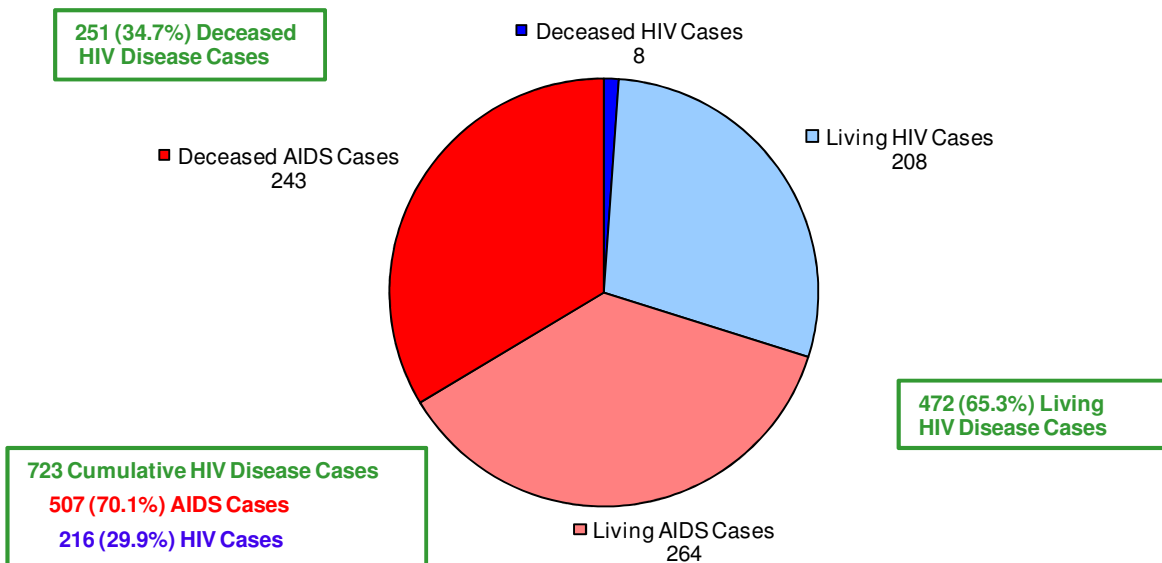
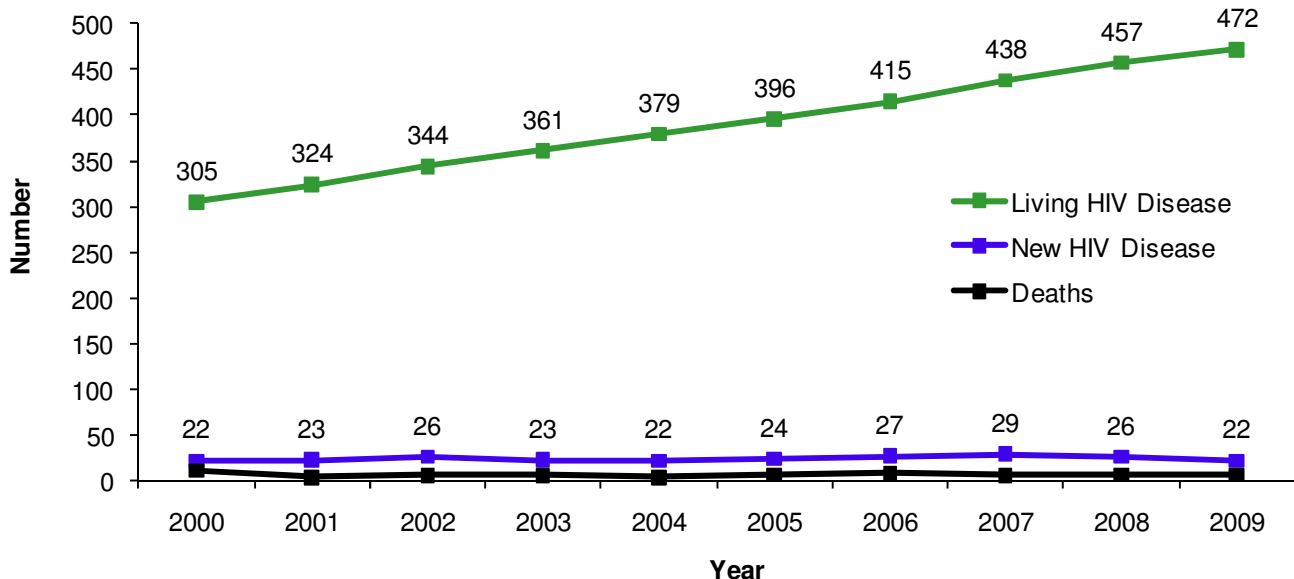


Figure 2. Living and new HIV disease cases and deaths by year*, North Central HIV Region, 2000—2009

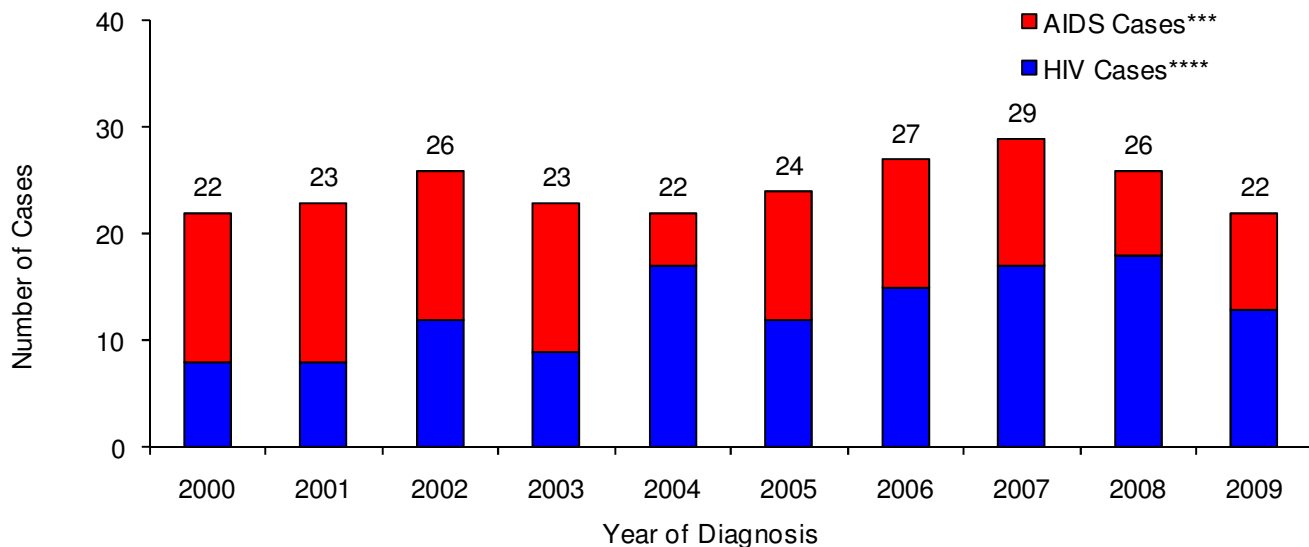


*For living HIV disease cases-the number of individuals living with HIV disease at the end of the year; For new HIV disease cases-the number of individuals newly diagnosed in the year, For HIV disease deaths-the number of individuals that died in the year.

From 1982 to 2009, there have been a total of 723 HIV disease cases diagnosed in the North Central HIV region and reported to MDHSS (Figure 1). Of the cumulative cases reported, 65% were still presumed to be living with HIV disease at the end of 2009. Among those living with HIV disease, 208 were classified as HIV cases at the end of 2009 and 264 were classified as AIDS cases.

At the end of 2009, there were 472 persons living with HIV disease whose most recent diagnosis occurred in the North Central HIV region (Figure 2). The number of people living with HIV disease increased every year from 2000 to 2009. There were 22 new HIV disease diagnoses in 2009. The number of new diagnoses and the number of deaths among persons with HIV disease has remained generally stable.

Figure 3. HIV disease cases, by current status* and year of diagnosis, North Central HIV Region, 2000—2009**



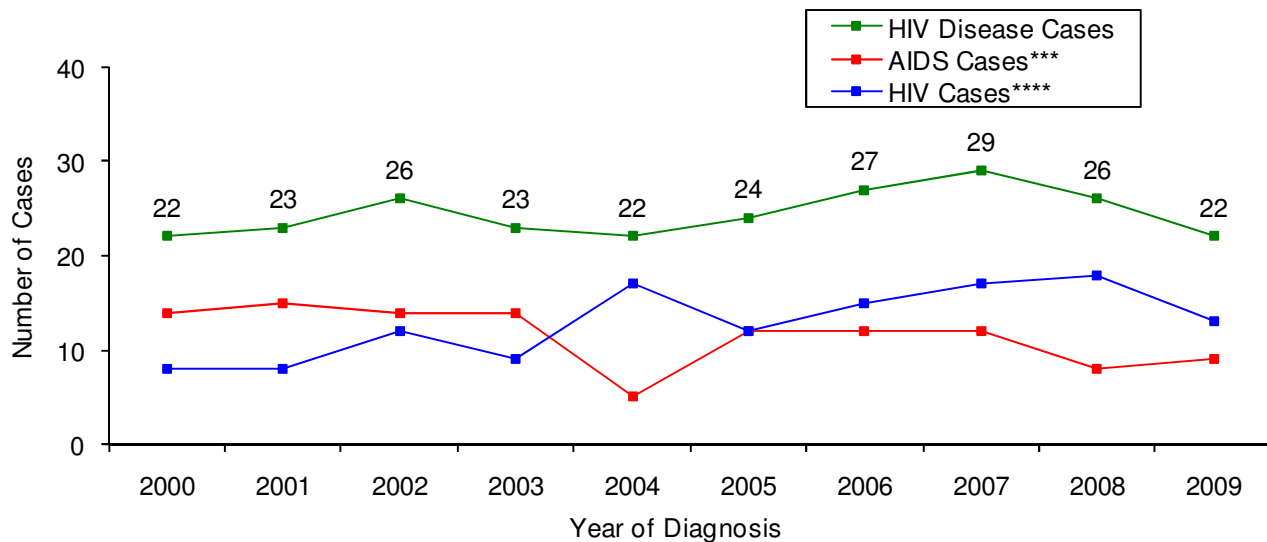
*HIV case vs. AIDS case

**Cases are indicated by year of initial diagnosis reported to MDHSS. (The year in which the first diagnosis of the person, whether as an HIV case or an AIDS case, was documented by the Department).

***These cases were either: 1) initially reported as HIV cases and then later reclassified as AIDS cases because they subsequently met the AIDS case definition; or 2) initially reported as AIDS cases.

****These cases were initially reported as HIV cases and have remained HIV cases. They have not met the case definition for AIDS as of December 31, 2009.

Figure 4. Reported HIV disease cases, by current status* and year of diagnosis, North Central HIV Region, 2000—2009**



*HIV case vs. AIDS case

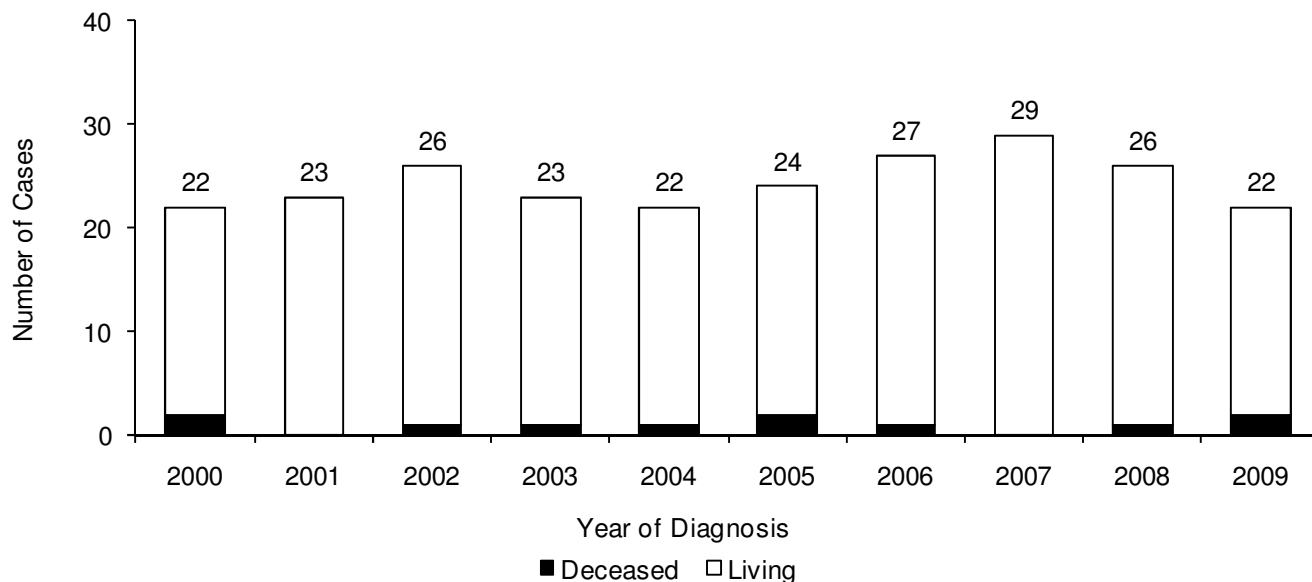
**Cases are indicated by year of initial diagnosis reported to MDHSS. (The year in which the first diagnosis of the person, whether as an HIV case or an AIDS case, was documented by the Department).

***These cases were either: 1) initially reported as HIV cases and then later reclassified as AIDS cases because they subsequently met the AIDS case definition; or 2) initially reported as AIDS cases.

****These cases were initially reported as HIV cases and have remained HIV cases. They have not met the case definition for AIDS as of December 31, 2009.

The number of new diagnoses was generally stable, with slight fluctuations seen from 2000-2009 in the North Central HIV region (Figures 3 and 4). Differences in the number of persons sub-classified as AIDS cases each year are due to the progression of the disease over time.

Figure 5. Persons diagnosed with HIV disease by current vital status* and year of diagnosis, North Central HIV Region, 2000—2009**



*Vital status on December 31, 2009.

**Cases are indicated by year of initial diagnosis reported to MDHSS. (The year in which the first diagnosis of the person, whether as an HIV case or an AIDS case, was documented by the Department).

Of the 22 persons diagnosed with HIV disease in 2000, two (9%) were deceased by the end of 2009 (Figure 5). Among the 22 persons first diagnosed in 2009, two (9%) were deceased at the end of 2009. The difference in the proportion of cases that are deceased is due to the length of time individuals have been living with the disease. Among persons diagnosed in 2001 and 2007, no deaths have been reported to MDHSS.

Table 1. Living[†] HIV, AIDS, and HIV disease cases, by sex, by race/ethnicity, by race/ethnicity and sex, and by current age, North Central HIV Region, 2009

	HIV*			AIDS**			HIV Disease***		
	Cases	%	Rate****	Cases	%	Rate****	Cases	%	Rate****
Sex									
Male	161	77.4%	43.9	203	76.9%	55.4	364	77.1%	99.3
Female	47	22.6%	12.6	61	23.1%	16.3	108	22.9%	28.9
Total	208	100.0%	28.1	264	100.0%	35.6	472	100.0%	63.7
Race/Ethnicity									
White	143	68.8%	21.5	181	68.6%	27.3	324	68.6%	48.8
Black	51	24.5%	132.2	68	25.8%	176.3	119	25.2%	308.5
Hispanic	11	5.3%	63.0	12	4.5%	68.7	23	4.9%	131.7
Asian/Pacific Islander	1	0.5%	11.7	1	0.4%	11.7	2	0.4%	23.4
American Indian/Alaskan Native	0	0.0%	0.0	1	0.4%	36.8	1	0.2%	36.8
Two or More Races/Unknown	2	1.0%	--	1	0.4%	--	3	0.6%	--
Total	208	100.0%	28.1	264	100.0%	35.6	472	100.0%	63.7
Race/Ethnicity-Males									
White Male	113	70.2%	34.7	148	72.9%	45.4	261	71.7%	80.1
Black Male	37	23.0%	176.7	44	21.7%	210.2	81	22.3%	386.9
Hispanic Male	9	5.6%	95.0	9	4.4%	95.0	18	4.9%	190.0
Asian/Pacific Islander Male	0	0.0%	0.0	1	0.5%	23.2	1	0.3%	23.2
American Indian/Alaskan Native Male	0	0.0%	0.0	1	0.5%	72.1	1	0.3%	72.1
Two or More Races/Unknown Male	2	1.2%	--	0	0.0%	--	2	0.5%	--
Total	161	100.0%	43.9	203	100.0%	55.4	364	100.0%	99.3
Race/Ethnicity-Females									
White Female	30	63.8%	8.9	33	54.1%	9.8	63	58.3%	18.6
Black Female	14	29.8%	79.4	24	39.3%	136.0	38	35.2%	215.4
Hispanic Female	2	4.3%	25.0	3	4.9%	37.5	5	4.6%	62.6
Asian/Pacific Islander Female	1	2.1%	23.7	0	0.0%	0.0	1	0.9%	23.7
American Indian/Alaskan Native Female	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
Two or More Races/Unknown Female	0	0.0%	--	1	1.6%	--	1	0.9%	--
Total	47	100.0%	12.6	61	100.0%	16.3	108	100.0%	28.9
Current Age[‡]									
<2	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
2-12	3	1.4%	3.0	1	0.4%	1.0	4	0.8%	4.0
13-18	1	0.5%	1.7	2	0.8%	3.4	3	0.6%	5.1
19-24	9	4.3%	12.2	3	1.1%	4.1	12	2.5%	16.3
25-44	113	54.3%	57.9	96	36.4%	49.2	209	44.3%	107.2
45-64	78	37.5%	41.9	151	57.2%	81.2	229	48.5%	123.1
65+	4	1.9%	3.7	11	4.2%	10.3	15	3.2%	14.0
Total	208	100.0%	28.1	264	100.0%	35.6	472	100.0%	63.7

[†]Includes persons diagnosed with HIV disease in the North Central HIV Region who are currently living, regardless of current residence.

*Cases which remained HIV cases at the end of 2009.

**Cases classified as AIDS by December 31, 2009.

***The sum of HIV cases and AIDS cases.

****Per 100,000 population based on 2008 MDHSS estimates.

[‡]Based on age as of December 31, 2009.

Note: Percentages may not total due to rounding.

Table 2. Diagnosed HIV, AIDS, and HIV disease cases, by sex, by race/ethnicity, by race/ethnicity and sex, and current age, North Central HIV Region, 2009

	HIV*			AIDS**			HIV Disease***		
	Cases	%	Rate****	Cases	%	Rate****	Cases	%	Rate****
Sex									
Male	11	84.6%	3.0	5	55.6%	1.4	16	72.7%	4.4
Female	2	15.4%	0.5	4	44.4%	1.1	6	27.3%	1.6
Total	13	100.0%	1.8	9	100.0%	1.2	22	100.0%	3.0
Race/Ethnicity									
White	9	69.2%	1.4	3	33.3%	0.5	12	54.5%	1.8
Black	4	30.8%	10.4	5	55.6%	13.0	9	40.9%	23.3
Hispanic	0	0.0%	0.0	1	11.1%	5.7	1	4.5%	5.7
Asian/Pacific Islander	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
American Indian/Alaskan Native	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
Two or More Races/Unknown	0	0.0%	--	0	0.0%	--	0	0.0%	--
Total	13	100.0%	1.8	9	100.0%	1.2	22	100.0%	3.0
Race/Ethnicity-Males									
White Male	8	72.7%	2.5	1	20.0%	0.3	9	56.3%	2.8
Black Male	3	27.3%	14.3	4	80.0%	19.1	7	43.8%	33.4
Hispanic Male	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
Asian/Pacific Islander Male	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
American Indian/Alaskan Native Male	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
Two or More Races/Unknown Male	0	0.0%	--	0	0.0%	--	0	0.0%	--
Total	11	100.0%	3.0	5	100.0%	1.4	16	100.0%	4.4
Race/Ethnicity-Females									
White Female	1	50.0%	0.3	2	50.0%	0.6	3	50.0%	0.9
Black Female	1	50.0%	5.7	1	25.0%	5.7	2	33.3%	11.3
Hispanic Female	0	0.0%	0.0	1	25.0%	12.5	1	16.7%	12.5
Asian/Pacific Islander Female	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
American Indian/Alaskan Native Female	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
Two or More Races/Unknown Female	0	0.0%	--	0	0.0%	--	0	0.0%	--
Total	2	100.0%	0.5	4	100.0%	1.1	6	100.0%	1.6
Current Age[†]									
<2	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
2-12	0	0.0%	0.0	0	0.0%	0.0	0	0.0%	0.0
13-18	1	7.7%	1.7	0	0.0%	0.0	1	4.5%	1.7
19-24	3	23.1%	4.1	0	0.0%	0.0	3	13.6%	4.1
25-44	7	53.8%	3.6	3	33.3%	1.5	10	45.5%	5.1
45-64	2	15.4%	1.1	5	55.6%	2.7	7	31.8%	3.8
65+	0	0.0%	0.0	1	11.1%	0.9	1	4.5%	0.9
Total	13	100.0%	1.8	9	100.0%	1.2	22	100.0%	3.0

*HIV cases diagnosed during 2009 which remained HIV cases at the end of the year.

**AIDS cases initially diagnosed in 2009.

***The sum of newly diagnosed HIV cases and newly diagnosed AIDS cases. Does not include cases diagnosed prior to 2009 with HIV, which progressed to AIDS in 2009.

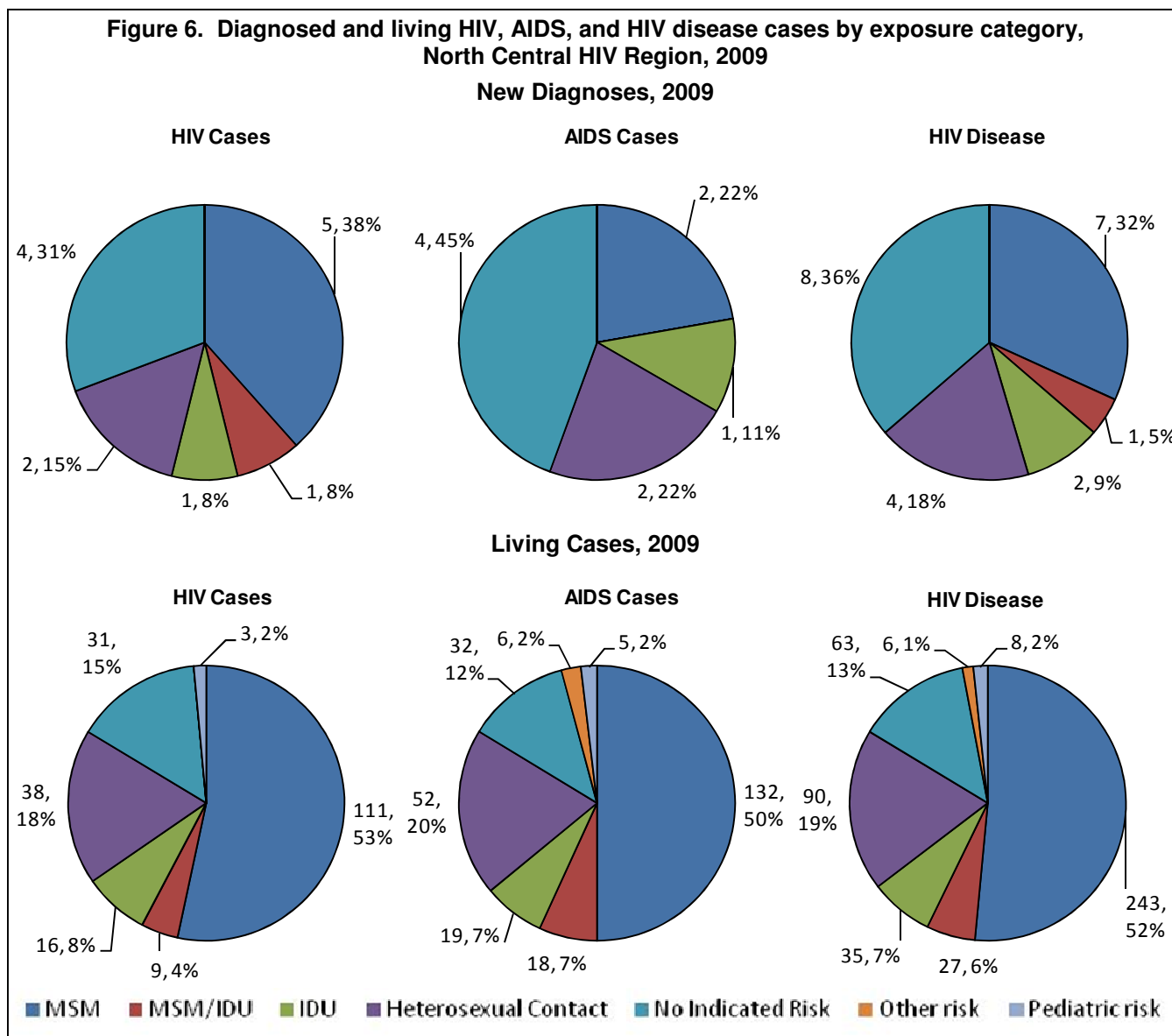
****Per 100,000 population based on 2008 MDHSS estimates.

[†]Based on age as of December 31, 2009.

Note: Percentages may not total due to rounding.

Of the 472 persons living with HIV at the end of 2009, 77% were males (Table 1). The rate of those living with HIV disease was 3.4 times greater among males than females. The difference in the rates between males and females was smaller than what was observed in Missouri overall. Although whites represented the largest proportion of living HIV disease cases (69%), the rate of those living with HIV disease was 6.3 times greater among blacks than whites. The rate was 2.7 times greater among Hispanics than whites. Among males, the rate of living cases was 4.8 times greater for blacks than whites, and 2.4 times greater for Hispanics than whites. Among females, the rate of those living with HIV disease was 11.6 times greater among blacks than whites, and 3.4 times greater among Hispanics than whites.

Of the 22 persons newly diagnosed with HIV disease in 2009, 41% were classified as AIDS cases by the end of 2009 (Table 2). Males represented 73% of new diagnoses. Whites represented the majority of all new HIV cases, and blacks represented the majority of all new AIDS cases diagnosed.



Among all categories, the largest proportion of cases with a known risk was attributed to MSM (Figure 6). The large proportion of cases with no indicated risk made trends difficult to interpret for all categories. The surveillance program examined methods to improve the identification and reporting of exposure category information.

Table 3. New and living HIV and AIDS cases and rates, by geographic area, North Central HIV Region, 2009

Geographic Area	HIV Cases						AIDS Cases					
	Diagnosed 2009*			Living			Diagnosed 2009**			Living		
	Cases	%	Rate***	Cases	%	Rate***	Cases	%	Rate***	Cases	%	Rate***
Boone County	7	53.8%	4.5	98	47.1%	63.5	4	44.4%	2.6	121	45.8%	78.4
Cole County	2	15.4%	2.7	27	13.0%	36.3	1	11.1%	1.3	17	6.4%	22.9
Callaway County	1	7.7%	2.3	10	4.8%	23.0	0	0.0%	0.0	9	3.4%	20.7
Marion County	0	0.0%	0.0	3	1.4%	10.6	1	11.1%	3.5	8	3.0%	28.3
Pettis County	0	0.0%	0.0	7	3.4%	17.1	0	0.0%	0.0	14	5.3%	34.1
Gasconade County	0	0.0%	0.0	3	1.4%	19.7	1	11.1%	6.6	5	1.9%	32.8
Remainder of Region	3	23.1%	0.8	60	28.8%	15.6	2	22.2%	0.5	90	34.1%	23.4
NORTH CENTRAL HIV REGION TOTAL	13	100.0%	1.8	208	100.0%	28.1	9	100.0%	1.2	264	100.0%	35.6

*HIV cases diagnosed and reported to the Department during 2009 which remained HIV cases at the end of the year.
 **Does not include HIV cases diagnosed prior to 2009 that progressed to AIDS in 2009.
 ***Per 100,000 population based on 2008 MDHSS estimates.
 Note: Percentages may not total due to rounding.

The number of persons newly diagnosed that remained classified as HIV cases at the end of 2009 was greatest in Boone County (7). The largest numbers of newly diagnosed persons classified as AIDS cases at the end of 2009 were also residents of Boone County (4) (Table 3). The rate of persons living with HIV disease among those classified as HIV cases and those classified as AIDS cases was highest in Boone County compared to other areas in the North Central HIV region.

Table 4. Newly diagnosed and living HIV and AIDS cases in men who have sex with men, by selected race/ethnicity, North Central HIV Region, 2009

Race/Ethnicity	HIV Cases*				AIDS Cases			
	Newly Diagnosed		Living		Newly Diagnosed**		Living	
	Cases	%	Cases	%	Cases	%	Cases	%
White	4	80.0%	80	72.1%	0	0.0%	106	80.3%
Black	1	20.0%	23	20.7%	2	100.0%	21	15.9%
Hispanic	0	0.0%	7	6.3%	0	0.0%	4	3.0%
Other/Unknown	0	0.0%	1	0.9%	0	0.0%	1	0.8%
NORTH CENTRAL HIV REGION TOTAL	5	100.0%	111	100.0%	2	100.0%	132	100.0%

*Remained HIV cases at the end of the year.
**Does not include HIV cases diagnosed prior to 2009 that progressed to AIDS in 2009.
Note: Percentages may not total due to rounding.

Table 5. Living HIV disease cases in men who have sex with men, by selected race/ethnicity, by current age group, North Central HIV Region, 2009

Age Group	White		Black		Hispanic		Total*	
	Cases	%**	Cases	%**	Cases	%**	Cases	%**
13-18	0	0.0%	1	2.3%	0	0.0%	1	0.4%
19-24	4	2.2%	2	4.5%	0	0.0%	6	2.5%
25-44	74	39.8%	22	50.0%	4	36.4%	100	41.2%
45-64	101	54.3%	19	43.2%	7	63.6%	127	52.3%
65+	7	3.8%	0	0.0%	0	0.0%	9	3.7%
NORTH CENTRAL HIV REGION TOTAL	186	100.0%	44	100.0%	11	100.0%	243	100.0%

*Row totals and percentages include cases in persons whose race/ethnicity is either unknown or not listed.
**Percentage of cases per age group.
Note: Percentages may not total due to rounding.

Table 6. Living HIV disease cases in men who have sex with men, by selected race/ethnicity, by geographic area, North Central HIV Region, 2009

Geographic Area	White		Black		Hispanic		Total*	
	Cases	%**	Cases	%**	Cases	%**	Cases	%***
Boone County	101	77.1%	23	17.6%	6	4.6%	131	53.9%
Cole County	6	37.5%	9	56.3%	1	6.3%	16	6.6%
Remaining Counties	79	82.3%	12	12.5%	4	4.2%	96	39.5%
NORTH CENTRAL HIV REGION TOTAL	186	76.5%	44	18.1%	11	4.5%	243	100.0%

*Row totals and percentages include cases in persons whose race/ethnicity is either unknown or not listed.
**Percentage of race/ethnicity in each area.
***Percentage of cases per area.
Note: Percentages may not total due to rounding.

There were a total of seven new HIV disease diagnoses attributed to men who have sex with men (MSM) in 2009 for the North Central HIV region (Table 4). Whites represented the largest number of total new HIV disease diagnoses. There were 243 living HIV disease cases attributed to MSM in the North Central HIV region. Whites represented a greater proportion among living AIDS cases (80%) compared to living HIV cases (72%).

The distribution of living HIV disease cases by current age varied by race/ethnicity among MSM (Table 5). Among white and Hispanic MSM living with HIV disease, the greatest proportions, 54% and 64% respectively, were between 45-64 years of age at the end of 2009. In contrast, only 43% of black MSM living with HIV disease were between 45-64 years old.

There were differences in the distribution of living cases by race/ethnicity among the geographic areas for MSM (Table 6). A greater proportion of MSM living with HIV disease were black in Cole County (53%) compared to Boone County (18%) and the remainder on the North Central HIV region (13%).

Table 7. Newly diagnosed and living HIV and AIDS cases in men who have sex with men and inject drugs, by selected race/ethnicity, North Central HIV Region, 2009

Race/Ethnicity	HIV Cases*				AIDS Cases			
	Newly Diagnosed		Living		Newly Diagnosed**		Living	
	Cases	%	Cases	%	Cases	%	Cases	%
White	1	100.0%	9	100.0%	0	--	14	77.8%
Black	0	--	0	0.0%	0	--	2	11.1%
Hispanic	0	0.0%	0	0.0%	0	--	2	11.1%
Other/Unknown	0	--	0	0.0%	0	--	0	0.0%
NORTH CENTRAL REGION TOTAL	1	100.0%	9	100.0%	0	--	18	100.0%

*Remained HIV cases at the end of the year.

**Does not include HIV cases diagnosed prior to 2009 that progressed to AIDS in 2009.

Note: Percentages may not total due to rounding.

Table 8. Living HIV disease cases in men who have sex with men and inject drugs, by selected race/ethnicity, by current age group, North Central HIV Region, 2009

Age Group	White		Black		Hispanic		Total*	
	Cases	%**	Cases	%**	Cases	%**	Cases	%**
13-18	0	0.0%	0	0.0%	0	0.0%	0	0.0%
19-24	1	4.3%	0	0.0%	0	0.0%	1	3.7%
25-44	9	39.1%	1	50.0%	2	100.0%	12	44.4%
45-64	13	56.5%	1	50.0%	0	0.0%	14	51.9%
65+	0	0.0%	0	0.0%	0	0.0%	0	0.0%
NORTH CENTRAL HIV REGION TOTAL	23	100.0%	2	100.0%	2	100.0%	27	100.0%

*Row totals and percentages include cases in persons whose race/ethnicity is either unknown or not listed.

**Percentage of cases per age group.

Note: Percentages may not total due to rounding.

Table 9. Living HIV disease cases in men who have sex with men and inject drugs, by geographic area, North Central HIV Region, 2009

Geographic Area	Cases	%
Boone County	12	44.4%
Cole County	2	7.4%
Marion County	2	7.4%
Pettis County	2	7.4%
Remaining Counties	9	33.3%
NORTH CENTRAL HIV REGION TOTAL	27	100.0%

There was one new HIV disease diagnosis attributed to men who have sex with men and inject drugs (MSM/IDU) in 2009 for the North Central HIV region (Table 7). There were 27 MSM/IDU living with HIV disease at the end of 2009 whose most recent diagnosis occurred in the North Central HIV region. The largest proportions of both living HIV and AIDS cases were white.

The distribution of living HIV disease cases by current age varied by race/ethnicity among MSM/IDU (Table 8). The number of living cases among whites was greatest among those 45-64 years of age. Among Hispanics whose infection was attributed to MSM/IDU, all living cases were between 25-44 years of age, although the number of cases was small.

The largest numbers of MSM/IDU living with HIV disease in the North Central HIV were most recently diagnosed in Boone County (12) (Table 9).

Table 10. Newly diagnosed and living HIV and AIDS cases in injecting drug users, by selected race/ethnicity and sex, North Central HIV Region, 2009

Race/Ethnicity and Sex	HIV Cases*				AIDS Cases			
	Newly Diagnosed		Living		Newly Diagnosed**		Living	
	Cases	%	Cases	%	Cases	%	Cases	%
White Male	1	100.0%	9	56.3%	0	0.0%	6	31.6%
Black Male	0	0.0%	0	0.0%	0	0.0%	7	36.8%
Hispanic Male	0	0.0%	0	0.0%	0	0.0%	0	0.0%
White Female	0	0.0%	6	37.5%	0	0.0%	3	15.8%
Black Female	0	0.0%	1	6.3%	0	0.0%	3	15.8%
Hispanic Female	0	0.0%	0	0.0%	1	100.0%	0	0.0%
NORTH CENTRAL HIV REGION TOTAL[†]	1	100.0%	16	100.0%	1	100.0%	19	100.0%

*Remained HIV cases at the end of the year.

**Does not include HIV cases diagnosed prior to 2009 that progressed to AIDS in 2009.

†Includes persons whose race/ethnicity is either unknown or not listed.

Note: Percentages may not total due to rounding.

Table 11. Living HIV disease cases in injecting drug users, by selected race/ethnicity, by current age group, North Central HIV Region, 2009

Age Group	White Males		Black Males		White Females		Black Females		Total*	
	Cases	%**	Cases	%**	Cases	%**	Cases	%**	Cases	%**
13-18	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
19-24	1	6.7%	0	0.0%	0	0.0%	0	0.0%	1	2.9%
25-44	7	46.7%	2	28.6%	5	55.6%	1	25.0%	15	42.9%
45-64	6	40.0%	5	71.4%	4	44.4%	3	75.0%	18	51.4%
65+	1	6.7%	0	0.0%	0	0.0%	0	0.0%	1	2.9%
NORTH CENTRAL HIV REGION TOTAL	15	100.0%	7	100.0%	9	100.0%	4	100.0%	35	100.0%

*Row totals and percentages include cases in persons whose race/ethnicity is either unknown or not listed.

**Percentage of cases per age group.

Note: Percentages may not total due to rounding.

Table 12. Living HIV disease cases in injecting drug users, by geographic area, North Central HIV Region, 2009

Geographic Area	Cases	%
Boone County	13	37.1%
Cole County	4	11.4%
Marion County	2	5.7%
Pettis County	1	2.9%
Remaining Counties	15	42.9%
NORTH CENTRAL HIV REGION TOTAL	35	100.0%

There were two new HIV disease diagnoses attributed to injecting drug users (IDU) in 2009 for the North Central HIV region (Table 10). There were 35 living HIV disease cases attributed to IDU at the end of 2009 in the North Central HIV region. Of persons living with HIV disease, 54% were classified as AIDS at the end of 2009. The largest proportion of living HIV cases were white males (56%), while black males represented the largest proportion of living AIDS cases (37%).

Overall, the largest numbers of persons living with HIV disease among IDU in the North Central HIV region were between 45-64 years of age at the end of 2009 (18), and were followed closely by individuals 25-44 years old (15) (Table 11).

The largest numbers of IDU living with HIV disease in the North Central HIV were most recently diagnosed in Boone County (13) (Table 12).

Table 13. Newly diagnosed and living HIV and AIDS cases in heterosexual contacts, by selected race/ethnicity and sex, North Central HIV Region, 2009

Race/Ethnicity and Sex	HIV Cases*				AIDS Cases			
	Newly Diagnosed		Living		Newly Diagnosed**		Living	
	Cases	%	Cases	%	Cases	%	Cases	%
White Male	1	50.0%	6	15.8%	0	0.0%	6	11.5%
Black Male	0	0.0%	4	10.5%	1	50.0%	6	11.5%
Hispanic Male	0	0.0%	0	0.0%	0	0.0%	0	0.0%
White Female	0	0.0%	18	47.4%	1	50.0%	27	51.9%
Black Female	1	50.0%	7	18.4%	0	0.0%	9	17.3%
Hispanic Female	0	0.0%	1	2.6%	0	0.0%	2	3.8%
NORTH CENTRAL HIV REGION TOTAL†	2	100.0%	38	100.0%	2	100.0%	52	100.0%

*Remained HIV cases at the end of the year.

**Does not include HIV cases diagnosed prior to 2009 that progressed to AIDS in 2009.

†Includes persons whose race/ethnicity is either unknown or not listed.

Note: Percentages may not total due to rounding.

Table 14. Living HIV disease cases in heterosexual contacts, by selected race/ethnicity and sex, by current age group, North Central HIV Region, 2009

Age Group	White Males		Black Males		White Females		Black Females		Total*	
	Cases	%**	Cases	%**	Cases	%**	Cases	%**	Cases	%**
13-18	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
19-24	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%
25-44	5	41.7%	5	50.0%	24	53.3%	9	56.3%	48	53.3%
45-64	7	58.3%	5	50.0%	19	42.2%	7	43.8%	40	44.4%
65+	0	0.0%	0	0.0%	2	4.4%	0	0.0%	2	2.2%
NORTH CENTRAL HIV REGION TOTAL	12	100.0%	10	100.0%	45	100.0%	16	100.0%	90	100.0%

*Row totals and percentages include cases in persons whose race/ethnicity is either unknown or not listed.

**Percentage of cases per age group.

Note: Percentages may not total due to rounding.

Table 15. Living HIV disease cases in heterosexual contacts, by selected race/ethnicity, by geographic area, North Central HIV Region, 2009

Geographic Area	White		Black		Hispanic		Total*	
	Cases	%**	Cases	%**	Cases	%**	Cases	%***
Boone County	17	54.8%	13	41.9%	1	3.2%	31	34.4%
Cole County	8	57.1%	5	35.7%	0	0.0%	14	15.6%
Remaining Counties	32	71.1%	8	17.8%	2	4.4%	45	50.0%
NORTH CENTRAL HIV REGION TOTAL	57	63.3%	26	28.9%	3	3.3%	90	100.0%

*Row totals and percentages include cases in persons whose race/ethnicity is either unknown or not listed.

**Percentage of race in each area.

***Percentage of cases per area.

Note: Percentages may not total due to rounding.

There were a total of four new HIV disease diagnoses attributed to heterosexual contact in 2009 for the North Central HIV region (Table 13). There were 90 persons living with HIV disease attributed to heterosexual contact at the end of 2009 in the North Central HIV region. White females represented the largest proportion of both living HIV and AIDS cases among heterosexual contact cases.

At the end of 2009, the majority of heterosexual contact cases living with HIV disease were between 25-44 years of age among black males and black females (Table 14). Among white males, the majority were 45-64 years of age. An equal number of white females living with HIV disease attributed to heterosexual contact were between 25-44 and 45-64 years of age.

There were differences in the distribution of persons living with HIV disease by race/ethnicity among the geographic areas for heterosexual contact cases (Table 15). In Boone County, black heterosexual contact cases comprised a larger proportion of persons living with HIV disease compared to other areas.

Figure 7. Reported P&S syphilis cases, by race and sex, by age group at diagnosis, North Central Region, 2009

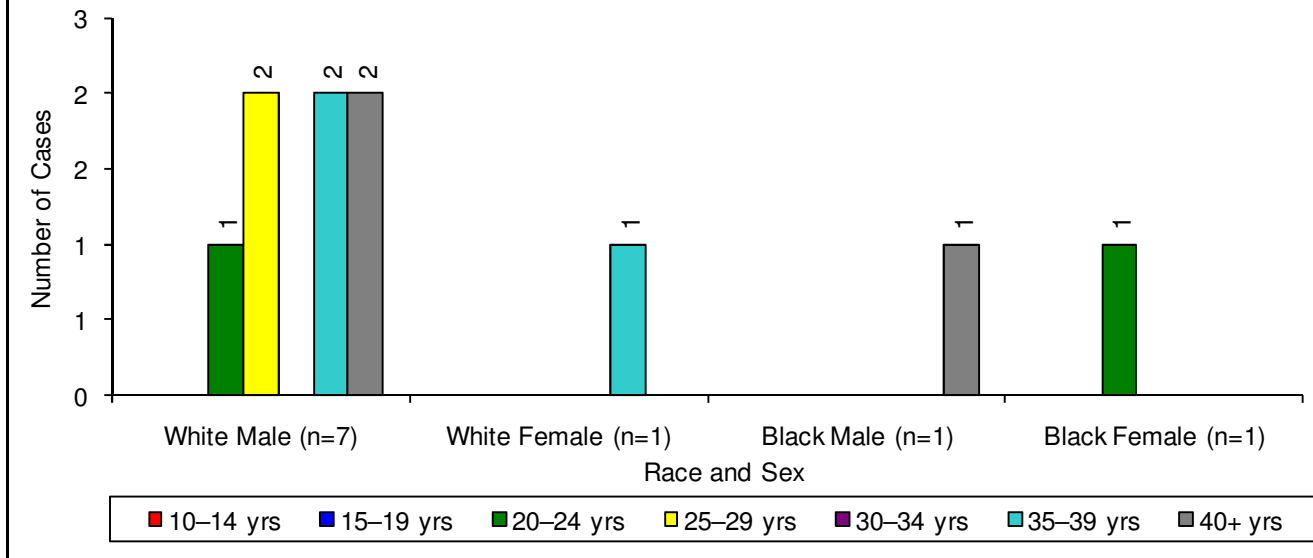
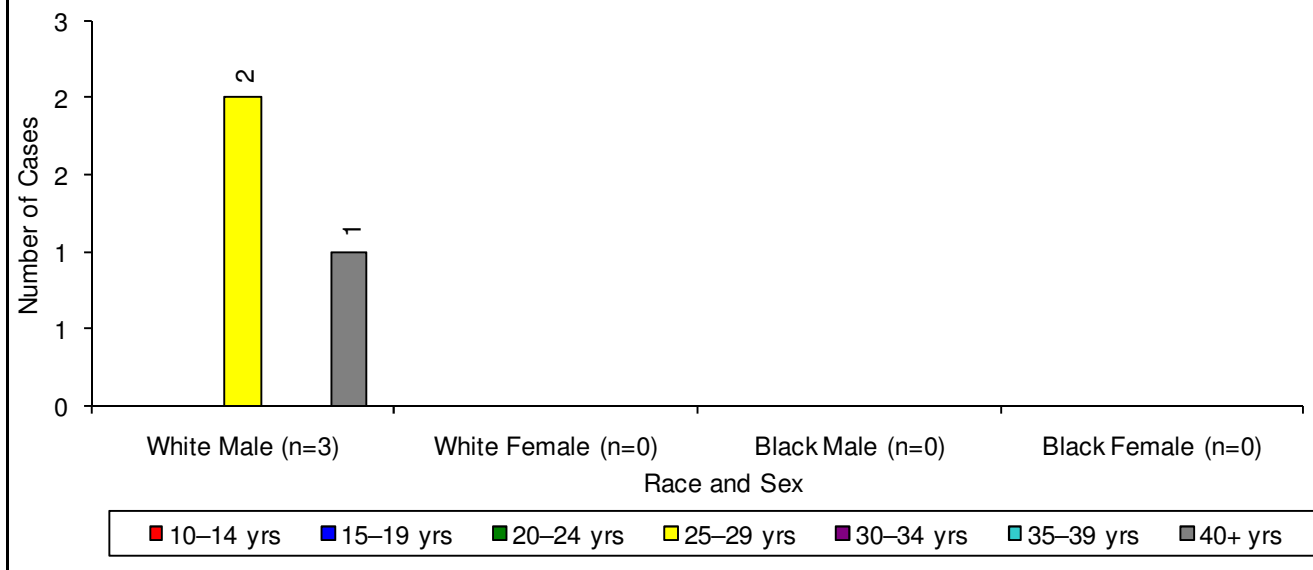


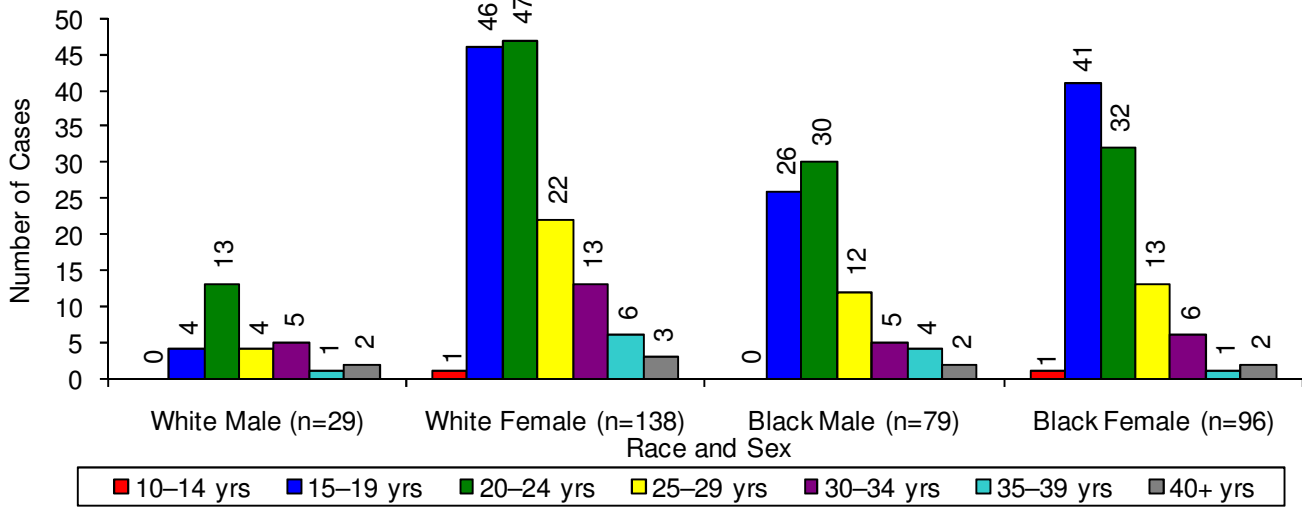
Figure 8. Reported early latent syphilis cases, by race and sex, by age group at diagnosis, North Central Region, 2009



The largest number of P&S syphilis cases was reported among white males (7) (Figure 7). The number of reported cases increased from 2008 to 2009 among white females (0 to 1) and black females (0 to 1), and decreased among black males (2 to 1) and white males (8 to 7).

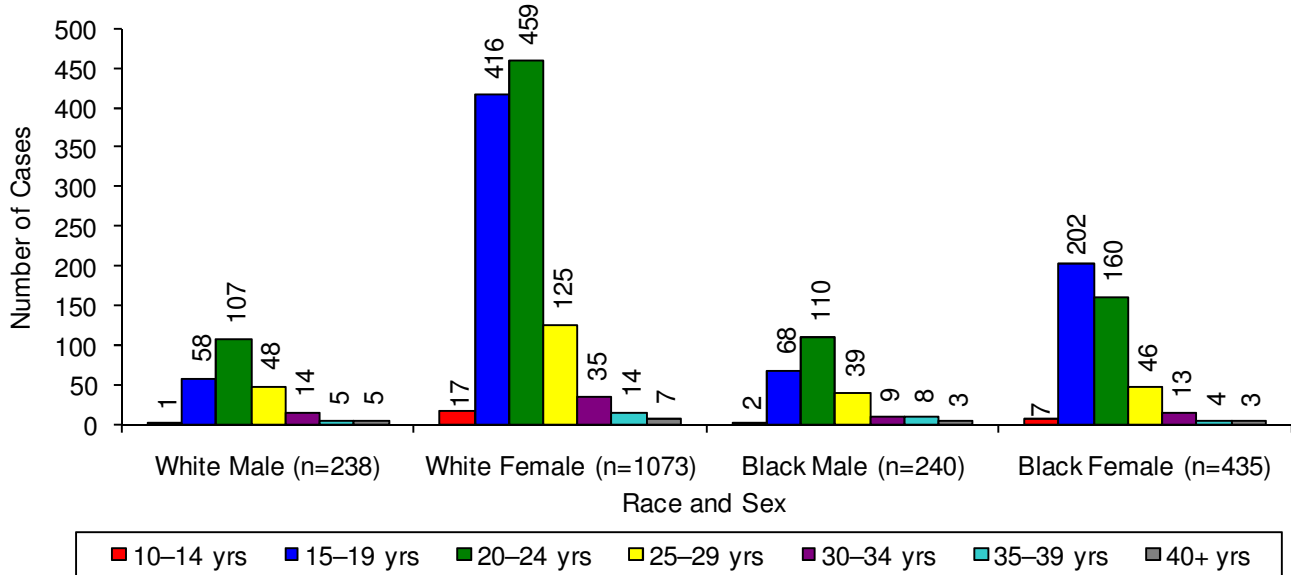
Early latent syphilis cases were only reported among white males in 2009 (Figure 8). The number of reported early latent syphilis cases decreased from 2008 to 2009 among white males (6 to 3) and black females (1 to 0), and remained the same among white females and black males

Figure 9. Reported gonorrhea cases, by race and sex, by age group at diagnosis, North Central Region, 2009



Note: Totals include persons diagnosed at <10 years of age or whose age at diagnosis is unknown.

Figure 10. Reported chlamydia cases, by race and sex, by age group at diagnosis, North Central Region, 2009

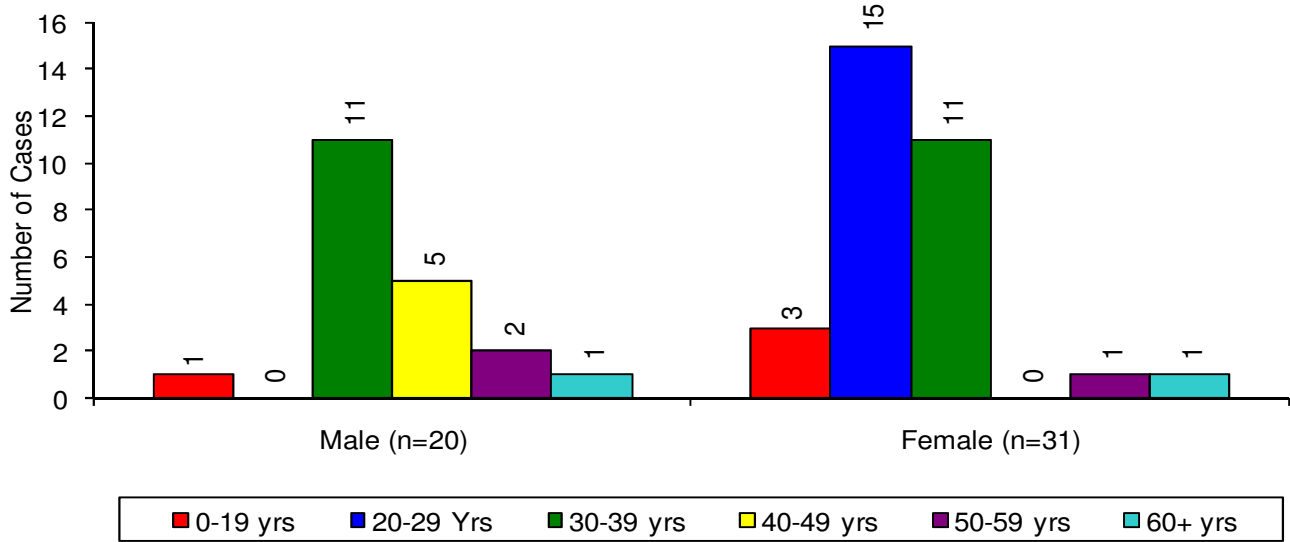


Note: Totals include persons diagnosed at <10 years of age or whose age at diagnosis is unknown.

The largest number of gonorrhea cases was reported among white females (138) followed by black females (96) (Figure 9). The number of reported cases decreased from 2008 to 2009 among all race/ethnicity and sex categories presented. Among black females, the largest number of reported cases was diagnosed between 15-19 years of age. Among all other race/ethnicity and sex categories presented the largest number of reported cases was diagnosed between 20-24 years of age.

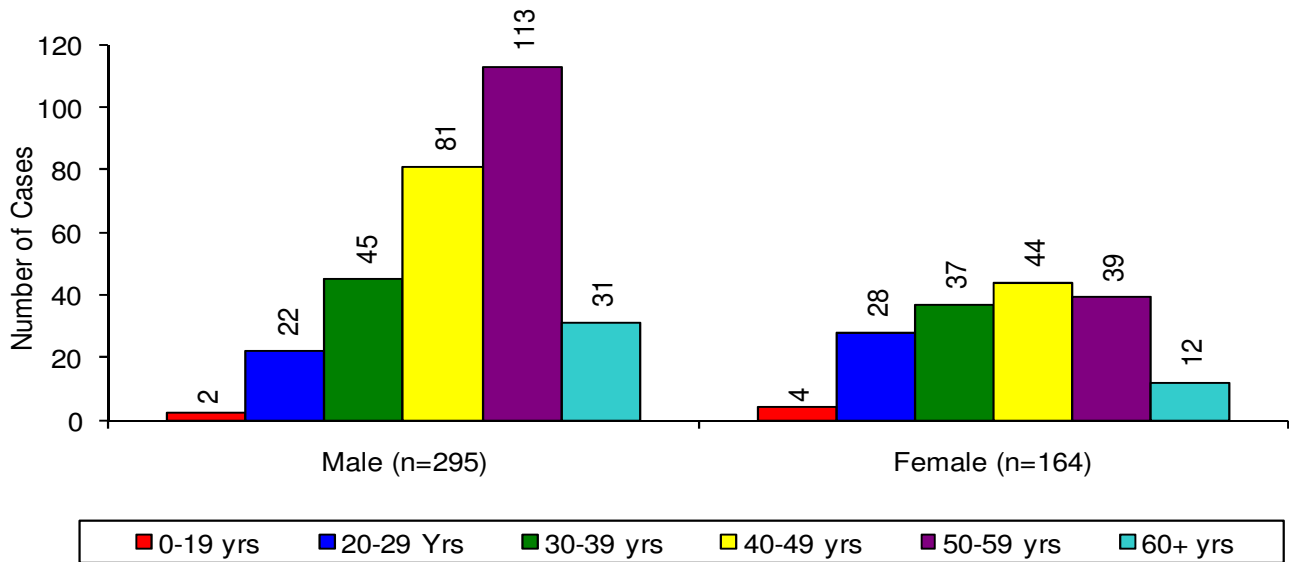
The largest number of chlamydia cases was reported among white females (1,073) followed by black females (435). The number of reported chlamydia cases decreased from 2008 to 2009 among white males (248 to 238), but increased among all other race/ethnicity and sex categories presented. Among black females, individuals 15-19 years of age represented the largest number of reported cases. Among all other race/ethnicity and sex categories presented the largest number of reported cases was diagnosed between 20-24 years of age.

Figure 11. Reported Hepatitis B cases, by sex and by age group at diagnosis, North Central Region, 2009



Note: Totals include persons whose age at diagnosis is unknown.

Figure 12. Reported Hepatitis C cases, by sex and by age group at diagnosis, North Central Region, 2009



Note: Totals include persons whose age at diagnosis is unknown.

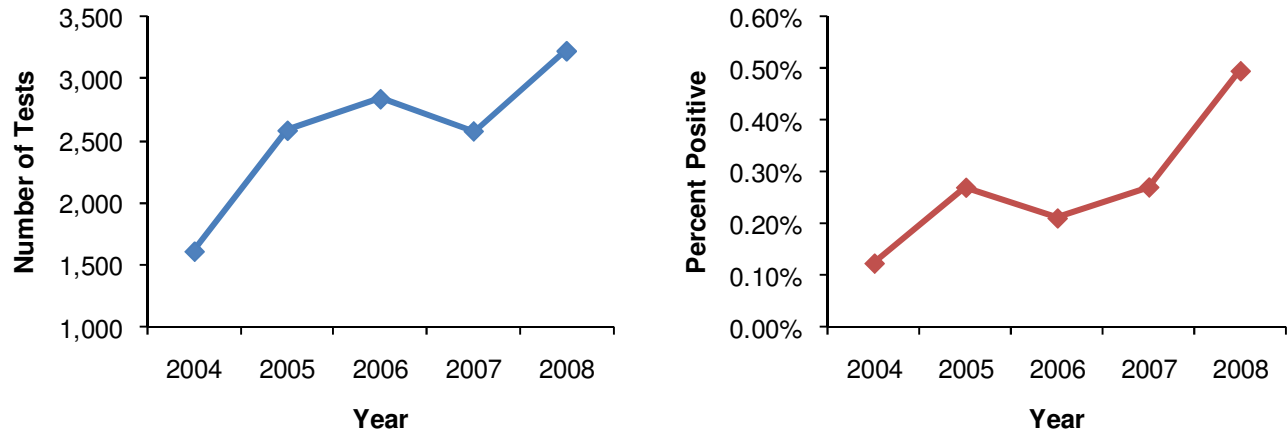
There were 51 reported cases of Hepatitis B in the North Central HIV region during 2009 (Figure 11). Females represented 61% of reported Hepatitis B cases. There were differences in the age distribution of reported Hepatitis B cases by sex. Persons 30-39 years of age represented the largest proportion of male cases, and those 20-29 accounted for the largest proportion of female cases.

In 2009, there were 459 Hepatitis C cases reported in the North Central HIV region (Figure 12). Of the reported Hepatitis C cases, 64% were male. There were differences in the age distribution of reported Hepatitis C cases by sex. A greater proportion of females were diagnosed at less than 40 years of age (42%) compared to males (23%).

Table 16. Number of HIV tests* and positive tests among counseling, testing and referral program sites, by current gender, race/ethnicity, age, exposure category, and test method, North Central HIV Region, 2008				
	Total Tests		Positive Tests	
	N	N	%	
Total	3,225	16	0.5%	
Current Gender				
Male	1,565	14	0.9%	
Female	1,644	2	0.1%	
Transgender	1	0	0.0%	
Unknown	15	0	0.0%	
Race/Ethnicity				
White	1,693	9	0.5%	
Black	1,303	7	0.5%	
Hispanic	133	0	0.0%	
Other/Unknown	96	0	0.0%	
Age at Test				
<13	3	0	0.0%	
13-18	244	0	0.0%	
19-24	1,281	6	0.5%	
25-44	1,282	7	0.5%	
45-64	377	3	0.8%	
65+	28	0	0.0%	
Unknown	10	0	0.0%	
Exposure Category				
MSM	352	12	3.4%	
MSM/IDU	4	0	0.0%	
IDU	84	0	0.0%	
Heterosexual Contact**	85	1	1.2%	
Presumed Heterosexual Contact***	1,457	1	0.1%	
Unknown	1,243	2	0.2%	
Test Method				
Rapid	673	10	1.5%	
Conventional	2,548	6	0.2%	
Unknown	4	0	0.0%	
*Includes only tests where a result was available and where the individual did not self-report a previously positive HIV test and reported residing in the North Central HIV Region.				
**Includes males and females who reported no injection drug use and reported high risk heterosexual behaviors with the opposite gender; corresponds with the CDC definition of high risk heterosexual contact.				
***Includes females who reported no history of injection drug use and reported sex with males without additional risk behaviors.				
Source: Missouri Counseling and Testing data				

Table 16 presents testing characteristics only among those tests performed at MDHSS counseling and testing sites among persons testing residing in the North Central HIV region where the results were available and for tests where the individual did not report a previously positive HIV test; there were 3,225 tests that met these criteria. Overall, less than one percent of tests were positive for HIV disease.

The number of tests and positive results generally increased from 2004-2008 among persons residing in the North Central HIV region who were tested at MDHSS counseling and testing sites (Figure 13). More targeted testing of high risk groups may explain the increase observed in the percent of positive cases. A true increase in HIV disease burden may also explain the increase in positive test results.

Figure 13. Number of HIV tests and percent positive results at Missouri counseling and testing sites, North Central HIV Region, 2004-2008

Source: Missouri Counseling and Testing data

There were variations in the distributions of case management enrollment, ADAP enrollment, and persons living with HIV disease by current gender, race/ethnicity and current age (Table 17). Males, minorities, and persons 25-44 years of age tended to represent a greater proportion of persons enrolled in case management and ADAP compared to all persons living with HIV disease in the region. Differences in demographic information may exist because data regarding persons living with HIV disease were obtained from a different source (eHARS) than information on persons enrolled in case management or ADAP (FACTORS).

Table 17. Demographic characteristics of persons enrolled in HIV medical case management, persons enrolled in ADAP, and persons living with HIV disease, North Central HIV Region, 2009

	<u>Enrolled in Case Management</u>		<u>Enrolled in ADAP*</u>		<u>Living HIV Disease</u>	
	N	%	N	%	N	%
Current Gender						
Male	219	80.2%	131	82.4%	364	77.1%
Female	54	19.8%	28	17.6%	108	22.9%
Transgender	0	0.0%	0	0.0%	0	0.0%
Unknown	0	0.0%	0	0.0%	0	0.0%
Total	273	100.0%	159	100.0%	472	100.0%
Race/Ethnicity						
White	179	65.6%	92	57.9%	324	68.6%
Black	74	27.1%	50	31.4%	119	25.2%
Hispanic	16	5.9%	14	8.8%	23	4.9%
Asian/Pacific Islander	1	0.4%	1	0.6%	2	0.4%
American Indian/Alaskan Native	3	1.1%	2	1.3%	1	0.2%
Two or More Races/Unknown	0	0.0%	0	0.0%	3	0.6%
Total	273	100.0%	159	100.0%	472	100.0%
Current Age[‡]						
<13	0	0.0%	0	0.0%	4	0.8%
13-18	2	0.7%	0	0.0%	3	0.6%
19-24	7	2.6%	5	3.1%	12	2.5%
25-44	126	46.2%	88	55.3%	209	44.3%
45-64	136	49.8%	64	40.3%	229	48.5%
65+	2	0.7%	2	1.3%	15	3.2%
Unknown	0	0.0%	0	0.0%	0	0.0%
Total	273	100.0%	159	100.0%	472	100.0%

*ADAP=AIDS Drug Assistance Program

‡As of December 31, 2009

Source: FACTORS and eHARS