

Regional HIV/AIDS Epidemiologic Profile of Hampden County, Massachusetts: 2013

Recent changes to the presentation of Massachusetts HIV/AIDS surveillance data

Effective January 1, 2011, the Massachusetts Department of Public Health (MDPH), Bureau of Infectious Diseases, HIV/AIDS fact sheets, epidemiologic reports and other HIV data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts. As of January 1, 2013, this resulted in the removal of 3,529 HIV/AIDS cases, of which 914 have died and 2,615 were living. These persons living with HIV/AIDS may still continue to reside and receive care in the Commonwealth. The total number of persons living with HIV/AIDS, irrespective of location at diagnosis, is the basis for MDPH service planning. This change is partially a result of increased activities required by the Centers for Disease Control and Prevention (CDC) for de-duplication among states in an effort to identify cases that are counted multiple times in the National HIV/AIDS Surveillance System. The cases are assigned to the state that reports the earliest date of AIDS diagnosis if available. If the case has not progressed to AIDS, the case is assigned to the state with the earliest HIV diagnosis date. Please note that previous HIV/AIDS fact sheets, data reports and presentations included cases that may have been first diagnosed in another state.

Also effective January 1, 2011, the MDPH HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to eliminate the presumed heterosexual exposure mode category for males; those cases have been reassigned to the no identified risk (NIR) exposure mode category. The presumed heterosexual exposure mode category was used with the intention of identifying HIV exposure mode for females when sex with males is the only reported risk factor, there is no evidence of current or past injection drug use (IDU), and behavioral risk and HIV status information about male sexual partners are unknown. Twenty-nine percent of females living with HIV/AIDS and 40% of recent female HIV diagnoses are reported in the presumed heterosexual exposure mode category. The application of the presumed heterosexual exposure mode category to males is overly inclusive in that female to male HIV transmission is biologically less probable, and there are alternate exposure modes that are possible for males, including sex with other men (MSM) or IDU. The CDC reports males diagnosed with HIV/AIDS who report sex with females as their only risk factor, without corresponding partner risk or HIV status information, in the NIR exposure mode category. This revision to report presumed heterosexual male HIV/AIDS cases as NIR will bring Massachusetts HIV/AIDS case reporting for males in alignment with CDC standards. The MDPH will maintain presumed heterosexual and heterosexual exposure mode categories for females.

Table 1. Total number of people reported with HIV infection or AIDS¹ by mortality status on December 31, 2012: Hampden County, Massachusetts²

	N	%
People Living with HIV/AIDS	1,681	56%
People Reported with HIV or AIDS who are Deceased	1,318	44%
Total Number of People Reported with HIV Infection or AIDS	2,999	100%

¹ Does not include individuals diagnosed with HIV infection (non-AIDS) who died prior to January 1, 1999 or who were not in care on January 1, 1999

² Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

Data Source: MDPH HIV/AIDS Surveillance Program, Data as of 1/1/13

Table 2. Average annual rate of HIV infection diagnosis from 2009 to 2011 and HIV/AIDS prevalence rate on 12/31/12¹: Hampden County, Massachusetts²

Average annual HIV diagnosis rate from 2009–2011	Average rate per 100,000	Average annual number of HIV diagnoses
Hampden County, MA	11.4	53.0
Massachusetts Total	10.3	664.7

HIV/AIDS prevalence rate on 12/31/12	Rate per 100,000	Number of people living with HIV/AIDS
Hampden County, MA	362.7	1,681
Massachusetts Total	277.5	18,170

¹ The denominators for rate calculations are from the MDPH Massachusetts Race Allocated Census 2010 Estimates (MRACE 2010), Massachusetts Department of Public Health, Bureau of Health Information, Statistics, Research, and Evaluation.

² Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

Data Source: MDPH HIV/AIDS Surveillance Program, Data as of 1/1/13

Table 3. People living with HIV/AIDS¹, deaths among people reported with HIV/AIDS, and newly diagnosed HIV infections by year²: 2002–2011, Hampden County, Massachusetts³

Year	HIV/AIDS Prevalence	Deaths among those with HIV/AIDS	Diagnosis of HIV Infection
2002	1338	45	93
2003	1375	50	87
2004	1434	47	106
2005	1472	45	83
2006	1511	37	76
2007	1531	37	57
2008	1554	35	58
2009	1564	38	48
2010	1598	27	61
2011	1626	22	50

¹ Number of people living with HIV/AIDS on 12/31 of each year

² Reflects year of HIV infection diagnosis among all individuals reported with HIV infection, with or without an AIDS diagnosis for the most recently available ten-year period after the implementation of HIV infection reporting in 1999.

³ Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

Data source: MDPH HIV/AIDS Surveillance Program, Data as of 1/1/13

Table 4. People diagnosed with HIV infection from 2009–2011¹ and people living with HIV/AIDS on December 31, 2012 by gender, place of birth, race/ethnicity, exposure mode, age at HIV infection diagnosis and current age: Hampden County, Massachusetts²

HIV Infection Diagnoses			PLWH/A	
Gender:	N	%	N	%
Male	110	69%	1,029	61%
Female	49	31%	652	39%
Place of Birth:	N	%	N	%
US	111	70%	1,108	66%
Puerto Rico/US Dependency ³	33	21%	479	28%
Non-US	15	9%	94	6%
Race/Ethnicity:	N	%	N	%
White (non-Hispanic)	42	26%	392	23%
Black (non-Hispanic)	32	20%	345	21%
Hispanic/Latino	81	51%	925	55%
Exposure Mode:	N	%	N	%
Male-to-male sex (MSM)	56	35%	371	22%
Injection Drug Use (IDU)	26	16%	520	31%
MSM/IDU	-- ⁷	-- ⁷	53	3%
Heterosexual Sex	21	13%	312	19%
Other	-- ⁷	-- ⁷	52	3%
Total Undetermined	52	33%	373	22%
• Presumed Heterosexual Sex ⁴	14	9%	152	9%
• Undetermined ⁵	38	24%	221	13%
Age:	N	%	N	%
	At Diagnosis		On December 31, 2012	
Under 13	-- ⁷	-- ⁷	-- ⁷	-- ⁷
13 to 19	-- ⁷	-- ⁷	-- ⁷	-- ⁷
20 to 24	15	9%	50	3%
25 to 29	13	8%	54	3%
30 to 34	20	13%	84	5%
35 to 39	22	14%	121	7%
40 to 44	17	11%	205	12%
45 to 49	31	19%	334	20%
50 to 54	15	9%	368	22%
55 to 59	8	5%	218	13%
60+	8	5%	234	14%
Total⁶	159	100%	1,681	100%

¹ Reflects year of HIV infection diagnosis among all individuals reported with HIV infection, with or without an AIDS diagnosis for the most recently available three-year period after the implementation of HIV infection reporting in 1999.

² Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

³ Ninety-eight percent of people diagnosed with HIV infection from 2009–2011 who were born in a US dependency were born in Puerto Rico, 1% were born in the US Virgin Islands, 1% were born in Guam and 1% were born in an unknown dependency.

⁴ Includes female sex with male of unknown HIV status or risk. This category is limited to females.

⁵ Includes male sex with female of unknown HIV status or risk, those still being followed up for risk information, those who have died with no determined risk, and those lost to follow-up.

⁶ Total includes Asian/Pacific Islander, American Indian/Alaska Native, other and unspecified race/ethnicity.

⁷ Values less than five are suppressed for populations less than 50,000 or for populations of unknown size. Additional values may be suppressed to prevent back calculation.

Data Source: MDPH HIV/AIDS Surveillance Program (percentages may not add up to 100% due to rounding), Data as of 1/1/13

Table 5. People living with HIV/AIDS on December 31, 2012 by gender and race/ethnicity: Hampden County, Massachusetts¹

Race/Ethnicity:	Male		Female	
	N	%	N	%
White (non-Hispanic)	286	28%	106	16%
Black (non-Hispanic)	190	18%	155	24%
Hispanic/Latino	539	52%	386	59%
Total²	1,029	100%	652	100%

¹ Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

² Total includes Asian/Pacific Islander, American Indian/Alaska Native, other and unspecified race/ethnicity.

Data Source: MDPH HIV/AIDS Surveillance Program (percentages may not add up to 100% due to rounding), Data as of 1/1/13

Table 6. People living with HIV/AIDS on December 31, 2012 by gender and exposure mode: Hampden County, Massachusetts¹

Exposure Mode:	Male		Female	
	N	%	N	%
Male-to-male sex (MSM)	371	36%	N/A	N/A
Injection drug use (IDU)	335	33%	185	28%
MSM/IDU	53	5%	N/A	N/A
Heterosexual sex	68	7%	244	37%
Other	28	3%	24	4%
Total Undetermined	174	17%	199	30%
• Presumed heterosexual sex ²	N/A	N/A	152	23%
• Undetermined ³	174	17%	47	7%
Total	1,029	100%	652	100%

¹ Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

² Includes female sex with male of unknown HIV status or risk. This category is limited to females.

³ Includes male sex with female of unknown HIV status or risk, those still being followed up for risk information, those who have died with no determined risk, and those lost to follow-up.

N/A=Not Applicable

Data Source: MDPH HIV/AIDS Surveillance Program (percentages may not add up to 100% due to rounding), Data as of 1/1/13

Table 7. People diagnosed with HIV infection by gender and year of diagnosis: Hampden County, Massachusetts¹, 2002–2011²

	Male		Female		Total
	N	%	N	%	
2002	59	63%	34	37%	93
2003	57	66%	30	34%	87
2004	63	59%	43	41%	106
2005	50	60%	33	40%	83
2006	45	59%	31	41%	76
2007	38	67%	19	33%	57
2008	39	67%	19	33%	58
2009	38	79%	10	21%	48
2010	41	67%	20	33%	61
2011	31	62%	19	38%	50

¹ Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

² Reflects year of HIV infection diagnosis among all individuals reported with HIV infection, with or without an AIDS diagnosis for the most recently available ten-year period after the implementation of HIV infection reporting in 1999.

Data Source: MDPH HIV/AIDS Surveillance Program (percentages may not add up to 100% due to rounding), Data as of 1/1/13

Table 8. People diagnosed with HIV infection by race/ethnicity and year of diagnosis: Hampden County, Massachusetts¹, 2002–2011²

	White Non-Hispanic		Black Non-Hispanic		Hispanic/Latino		Total ³
	N	%	N	%	N	%	N
2002	23	25%	20	22%	49	53%	93
2003	22	25%	17	20%	45	52%	87
2004	19	18%	31	29%	55	52%	106
2005	16	19%	21	25%	42	51%	83
2006	18	24%	13	17%	44	58%	76
2007	15	26%	13	23%	28	49%	57
2008	12	21%	15	26%	29	50%	58
2009	10	21%	11	23%	25	52%	48
2010	20	33%	10	16%	31	51%	61
2011	12	24%	11	22%	25	50%	50

¹ Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

² Reflects year of HIV infection diagnosis among all individuals reported with HIV infection, with or without an AIDS diagnosis for the most recently available ten-year period after the implementation of HIV infection reporting in 1999.

³ Totals include Asian/Pacific Islander, American Indian/Alaskan Native individuals, and those of other or undetermined race/ethnicity.

Data Source: MDPH HIV/AIDS Surveillance Program (percentages may not add up to 100% due to rounding), Data as of 1/1/13

Table 9. People diagnosed with HIV infection by place of birth and year of diagnosis: Hampden County, Massachusetts¹, 2002–2011²

	US		Puerto Rico/ US Dependency ³		Non-US		Total
	N	%	N	%	N	%	N
2002	60	65%	21	23%	12	13%	93
2003	63	72%	18	21%	6	7%	87
2004	64	60%	31	29%	11	10%	106
2005	49	59%	25	30%	9	11%	83
2006	48	63%	20	26%	8	11%	76
2007	34	60%	18	32%	5	9%	57
2008	39	67%	14	24%	5	9%	58
2009	35	73%	-- ⁴	-- ⁴	-- ⁴	-- ⁴	48
2010	44	72%	12	20%	5	8%	61
2011	32	64%	12	24%	6	12%	50

¹ Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

² Reflects year of HIV infection diagnosis among all individuals reported with HIV infection, with or without an AIDS diagnosis for the most recently available ten-year period after the implementation of HIV infection reporting in 1999.

³ Ninety-eight percent of all people diagnosed with HIV infection in MA who were born in a US dependency were born in Puerto Rico, 1% were born in the US Virgin Islands, <1% were born in American Samoa, <1% were born in Guam and 1% were born in an unknown dependency.

⁴ Values less than five are suppressed for populations less than 50,000 or for populations of unknown size. Additional values may be suppressed to prevent back calculation.

Data Source: MDPH HIV/AIDS Surveillance Program (percentages may not add up to 100% due to rounding), Data as of 1/1/13

Table 10. People diagnosed with HIV infection by exposure mode and year of diagnosis: Hampden County, Massachusetts¹, 2002–2011²

	MSM		IDU		MSM/ IDU		HTSX		Other		Pres. HTSX ³		Undeter- mined ⁴		Total
	N	%	N	%	N	%	N	%	N	%	N	%	N	%	N
2002	19	20%	26	28%	-- ⁵	-- ⁵	21	23%	-- ⁵	-- ⁵	10	11%	12	13%	93
2003	22	25%	21	24%	-- ⁵	-- ⁵	13	15%	-- ⁵	-- ⁵	13	15%	14	16%	87
2004	19	18%	27	25%	-- ⁵	-- ⁵	21	20%	-- ⁵	-- ⁵	14	13%	19	18%	106
2005	20	24%	25	30%	-- ⁵	-- ⁵	13	16%	-- ⁵	-- ⁵	10	12%	14	17%	83
2006	19	25%	22	29%	-- ⁵	-- ⁵	9	12%	-- ⁵	-- ⁵	13	17%	12	16%	76
2007	13	23%	13	23%	0	0%	7	12%	0	0%	8	14%	16	28%	57
2008	19	33%	10	17%	-- ⁵	-- ⁵	8	14%	-- ⁵	-- ⁵	7	12%	13	22%	58
2009	20	42%	5	10%	-- ⁵	-- ⁵	-- ⁵	-- ⁵	0	0%	-- ⁵	-- ⁵	16	33%	48
2010	20	33%	10	16%	-- ⁵	-- ⁵	10	16%	-- ⁵	-- ⁵	6	10%	13	21%	61
2011	16	32%	11	22%	-- ⁵	-- ⁵	7	14%	-- ⁵	-- ⁵	6	12%	9	18%	50

¹ Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

² Reflects year of HIV infection diagnosis among all individuals reported with HIV infection, with or without an AIDS diagnosis for the most recently available ten-year period after the implementation of HIV infection reporting in 1999.

³ Includes female sex with male of unknown HIV status or risk. This category is limited to females.

⁴ Includes male sex with female of unknown HIV status or risk, those still being followed up for risk information, those who have died with no determined risk, and those lost to follow-up.

⁵ Values less than five are suppressed for populations less than 50,000 or for populations of unknown size. Additional values may be suppressed to prevent back calculation.

MSM = Male-to-Male Sex; IDU = Injection Drug Use; MSM/IDU = Male-to-Male Sex and Injection Drug Use; HTSX = Heterosexual Sex; Pres. HTSX = Presumed Heterosexual Sex

Data Source: MDPH HIV/AIDS Surveillance Program (percentages may not add up to 100% due to rounding), Data as of 1/1/13

Table 11. People diagnosed with HIV infection and AIDS within two months and all people diagnosed with HIV infection by year of diagnosis: Hampden County, Massachusetts¹, 2002–2011²

	HIV and AIDS diagnosed within two months	All HIV infection diagnoses	% diagnosed with HIV and AIDS within two months
Year:	N	N	%
2002	27	93	29%
2003	26	87	30%
2004	31	106	29%
2005	32	83	39%
2006	18	76	24%
2007	20	57	35%
2008	14	58	24%
2009	12	48	25%
2010	21	61	34%
2011	15	50	30%

¹ Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

² Reflects year of HIV infection diagnosis among all individuals reported with HIV infection, with or without an AIDS diagnosis for the most recently available ten-year period after the implementation of HIV infection reporting in 1999.
Data Source: MDPH HIV/AIDS Surveillance Program, Data as of 1/1/13

Table 12. People diagnosed with HIV infection and AIDS within two months and all people diagnosed with HIV infection by gender, race/ethnicity, and place of birth: Hampden County, Massachusetts,¹ 2009–2011²

	HIV and AIDS diagnosed within two months	All HIV infection diagnoses	% diagnosed with HIV and AIDS within two months
Gender:	N	N	%
Male	34	110	31%
Female	14	49	29%
Race/Ethnicity:	N	N	%
White (non-Hispanic)	13	42	31%
Black (non-Hispanic)	12	32	38%
Hispanic/Latino	21	81	26%
Asian/Pacific Islander	-- ⁵	-- ⁵	-- ⁵
Other/Undetermined ³	-- ⁵	-- ⁵	-- ⁵
Place of Birth:	N	N	%
US	34	111	31%
Puerto Rico/US Dependencies ⁴	9	33	27%
Non-US	5	15	33%
Total	48	159	30%

¹ Effective January 1, 2011, the Massachusetts Department of Public Health HIV/AIDS fact sheets, epidemiologic reports, and other data presentations have been updated to remove all HIV/AIDS cases that were first diagnosed in another state before being reported in Massachusetts.

² Reflects year of HIV infection diagnosis among all individuals reported with HIV infection, with or without an AIDS diagnosis for the most recently available three-year period after the implementation of HIV infection reporting in 1999.

³ Includes American Indian/Alaska Native, other and unspecified race/ethnicity.

⁴ Ninety-eight percent of people diagnosed with HIV infection from 2009–2011 who were born in a US dependency were born in Puerto Rico, 1% were born in the US Virgin Islands, 1% were born in Guam and 1% were born in an unknown dependency.

⁵ Values less than five are suppressed for populations less than 50,000 or for populations of unknown size. Additional values may be suppressed to prevent back calculation.

Data Source: MDPH HIV/AIDS Surveillance Program (percentages may not add up to 100% due to rounding), Data as of 1/1/13