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# Region 8 HIV Quarterly Report Volume 2 Issue 4

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### New HIV Diagnoses by Month, Region 8, Ohio (January 2019 - December 2020)

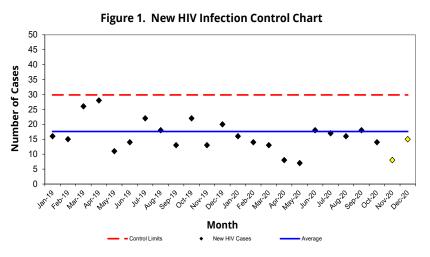
Table 1. Region 8 New HIV Infections						
Month	New Cases of HIV 2019	New Cases of HIV 2020				
January	16	16				
February	15	14				
March	26	13				
April	28	8				
May	11	7				
June	14	18				
July	22	17				
August	18	16				
September	13	18				
October	22	14				
November	13	8				
December	20	15				
Total	218	164				

This report was created as a surveillance effort to help prevent new cases of HIV within Region 8 counties (Brown, Butler, Clermont, Clinton, Hamilton, Highland, Warren). Table 1 displays the breakdown of new HIV cases for Region 8 residents for January 2019 through December 2020 on a monthly basis. Only HIV cases where the resident was identified as a new HIV infection by a disease investigation specialist were counted for analysis purposes in this report. In 2019, the highest number of cases was seen in April (28 cases). In 2020, the highest number of new HIV cases occurred in June and September (18 cases). The average number of new HIV cases per month was 18.2 and 13.7 for the years 2019 and 2020, respectively. The 2020 monthly counts may change in future reports, as lag times in disposition of cases directly affect the case counts presented. Some HIV cases are unable to be located for follow-up with partner services, which may impact total number of cases.

New HIV cases are derived from partner services data in the Ohio Disease Reporting System and may not fully represent all new HIV infections. These data are provisional and subject to change when additional information is gained. Cases are selected based on address at diagnosis. Source: Ohio Department of Health (ODH), Ohio Disease Reporting System (ODRS). Data reported as of 2/27/2021.

## Surveillance of New HIV Cases Diagnosed in Region 8, Ohio (January 2019 - December 2020)

One way to monitor HIV infections within Region 8 is through the use of surveillance control charts. Factors that these control charts show are the number of new HIV cases for each month (black diamonds), control limit (red dashed lines), and the average number of cases (solid blue line). Yellow diamonds indicate data that are most likely to change in future reports. Control charts are used to detect unexpected events, such as a single point outside of the control limit, many consecutive points above or below the average line, or two or three consecutive points near a control limit. When anomalies such as these occur, it may be beneficial to examine events



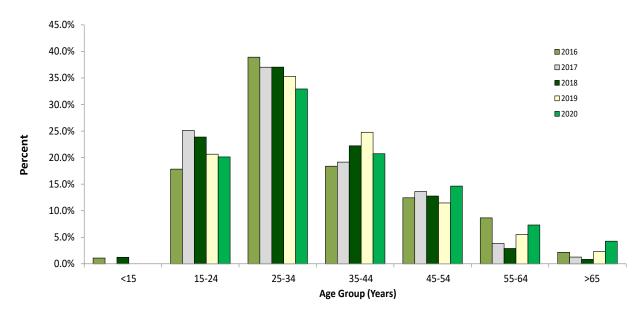
surrounding the anomalies in order to devise a strategy to reduce the number of cases in subsequent months or see which strategies already in place are working. Figure 1 illustrates the control chart for new HIV infections from January 2019 to December 2020. All of the monthly counts in this time frame fell below the upper control limit for number of new HIV infections.

New HIV cases are derived from partner services data in the Ohio Disease Reporting System and may not fully represent all new cases of HIV. These data are provisional and subject to change when additional information is gained. Cases are selected based on address at diagnosis. Source: ODH, ODRS. Data reported as of 2/27/2021.



# Demographics and Social Factors Associated with High Risk for HIV Infection

Figure 2, below, illustrates the distribution of age among new HIV diagnoses in Region 8 From 2016 to 2020, 25-34 year olds made up the largest percentage of cases. Table 2 compares the race, sex, and risk behavior groups for new HIV infections from January 2019 through December 2020. The data reflect confirmed HIV cases designated as newly testing positive and residing in Region 8. A large disparity in the sex of cases was apparent in 2019 and 2020 as males constituted over 70% of cases in both years. As Table 2 illustrates, the men who have sex with men (MSM) population accounted for over 30 percent of new HIV cases in 2019 and 2020, respectively. Table 2 also illustrates, injection drug use (IDU) population accounted for over 25% of new cases in 2019, and only 12% in 2020. Understanding these demographics and high-risk factors that contribute most to new HIV infections, is vital in formulating specific and effective prevention strategies.



#### Figure 2. Percentage of New HIV Diagnoses by Age, Region 8, 2016-2020

Table 2. Region 8 HIV Demographics						
	Jan - Dec 2019		Jan - De	c 2020		
	#	%	#	%		
Race						
Black	95	43.6%	79	48.2%		
White	109	50.0%	65	39.6%		
Other	14	6.4%	20	12.2%		
Sex						
Male	156	71.6%	124	75.6%		
Female	62	28.4%	40	24.4%		
Risk Groups						
MSM	74	33.9%	64	39.0%		
HRH	90	41.3%	44	26.8%		
IDU	58	26.6%	19	11.6%		

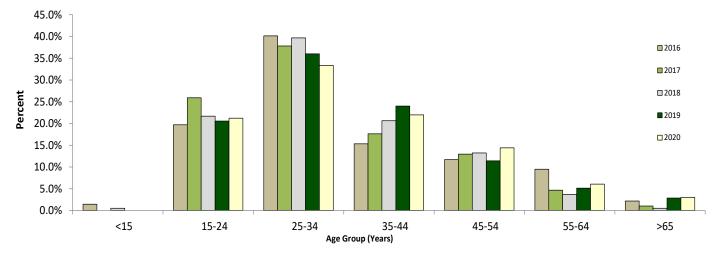
These data are provisional and subject to change when additional information is gained. New HIV positive cases between January 2019 and December 2020 were used for analysis. Cases were selected based on address at diagnosis. Source: ODH, ODRS. Data reported as of 2/27/2021. Percentages may not total to 100 due to rounding. Percentages are based on availability of data for all cases. High risk heterosexuals (HRH) are residents who are not MSM but participate in risky behaviors such as having sex with men who have sex with men (MSM), HIV+, intravenous drug user (IDU), or anonymous people. HRH status is also determined from factors such as having sex while intoxicated, exchanging sex for drugs, or having previous STIs.



# **Overview of HIV in Hamilton County**

Table 3 displays the breakdown of new HIV cases for Hamilton County residents for January 2019 through December 2020 on a monthly basis. Only HIV cases where the resident was identified as a new HIV infection by a disease investigation specialist were counted for analysis purposes in this report. Figure 3, below, illustrates the distribution of age among new HIV diagnoses in Hamilton County. From 2016 to 2020, 25-34 year olds made up the largest percentage of cases. Table 4 compares the race, sex, and risk behavior groups for new HIV infections from January 2019 through December 2020. Table 5 and 6 displays the breakdown of new HIV cases for select counties in Region 8 and the demographic makeup of these newly identified HIV cases.

Table 3. Hamilton County New HIV Infections			Table 4. Hamilton County HIV Demographics				
Tuble 5. Humilton county New Hiv Intections				Jan - Dec 2019		Jan - Jun 2020	
Month	New Cases of HIV 2019	New Cases of HIV 2020		#	%	#	%
January	11	13	Race	1	1	[	1
February	13	12	Black	86	49.1%	73	55.3%
			White	78	44.6%	44	33.3%
March	19	9	Other	11	6.3%	15	11.4%
April	22	8	Sex				
May	8	7	Male	119	68.0%	101	76.5%
June	11	13	Female	56	32.0%	31	23.5%
July	21	11	Risk Groups				
August	15	13	MSM	55	31.4%	50	37.9%
0	10	16	HRH	81	46.3%	38	28.8%
September			IDU	53	30.3%	16	12.1%
October	17	11		,	1	I	
November	13	7					
December	15	12					
Total	175	132					



## Figure 3. Percentage of New HIV Diagnoses by Age, Hamilton County, 2016-2020



# **Overview of HIV in Select Counties in Region 8**

Table 5. Select Counties in Region 8 New HIV Infections by Quarters, 2019-2020						
	Brown	Butler	Clermont	Clinton	Highland	Warren
2019-Q1	0	8	2	1	0	3
2019-Q2	1	4	5	0	1	1
2019-Q3	0	4	3	0	0	7
2019-Q4	0	5	1	1	1	2
2020-Q1	0	5	2	0	0	2
2020-Q2	0	2	2	0	0	1
2020-Q3	0	5	1	0	1	4
2020-Q4	0	3	1	1	1	1

Table 6. Select Counties in Region 8 New HIV Demographics								
	Jan - Dec 2019		Jan - Dec 2020					
	#	%	#	%				
Race								
Black	9	20.9%	6	18.8%				
White	31	72.1%	21	65.6%				
Other	3	7.0%	5	15.6%				
Sex	Sex							
Male	37	86.0%	23	71.9%				
Female	6	14.0%	9	28.1%				
Risk Group								
MSM	19	44.2%	15	46.9%				
HRH	9	20.9%	6	18.8%				
IDU	5	11.6%	3	9.4%				

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