



HIV in the Houston Area

2021 Epidemiologic Supplement for HIV Prevention and Care Services
Planning

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Produced Through a Partnership between:



**Houston Area Ryan
White Planning
Council**



**Houston Health
Department**

Disclaimer:

This document is a supplement to and should be used in conjunction with the *2019 Houston Area Integrated Epidemiologic Profile for HIV Prevention and Care Services Planning*. (December 2019). This document contains data on selected epidemiological measures of HIV disease for the jurisdictions of Houston/Harris County and the Houston Eligible Metropolitan Area (**EMA**) for the reporting period of January 1 to December 31, 2019 (unless otherwise noted). It is intended for use in HIV prevention and care services planning conducted in calendar year 2021. The separation of jurisdictions in the data presentation is intended to enhance the utility of this document as a tool for planning both HIV prevention and HIV care services. Data for the third geographic service jurisdiction in the Houston Area, the Houston Health Services Delivery Area (**HSDA**), are not presented here due to the overlap of data and data sources with the EMA, which makes the data virtually identical. The 2019 Epidemiologic Profile should be referenced for a comprehensive discussion of data pertaining to the epidemiological questions outlined in joint guidance from the Centers for Disease Control and Prevention and the Health Resources and Services Administration. More recent data may have become available since the time of publication.

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Contributors, reviewers and staff:

Houston Health Department

- Imran Shaikh, Supervisor – Data Services
- Rakshya Basnet, Epidemiologist – Data Services
- Beau Mitts, Chief - HIV/STD and Viral Hepatitis Prevention
- Kirstin Short, Chief - Epidemiology

Ryan White Planning Council Office of Support

- Tori Williams, Director
- Ricardo Mora, Health Planner

This document was reviewed by the Overall Responsible Parties for HIV/AIDS surveillance and prevention in Houston/Harris County: Dr. Shannon Bibbins, Deputy Director, Houston Health Department.

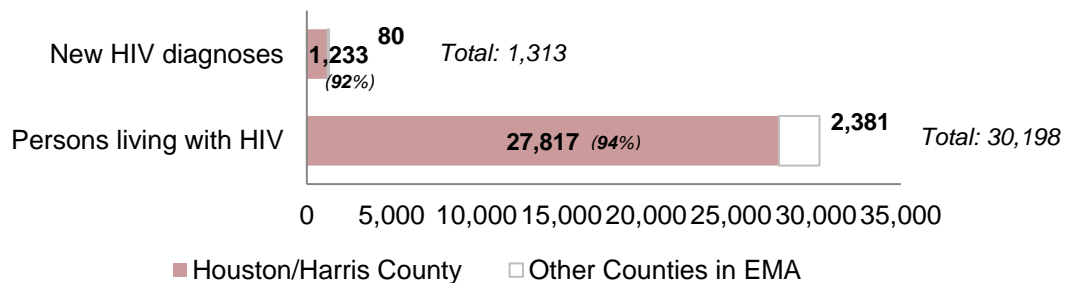
EXECUTIVE SUMMARY

Local communities use data on patterns of HIV, or HIV epidemiology, to better understand who is diagnosed and living with HIV. This helps local communities make informed decisions about HIV services, funding, and quality.

This document is a supplement to the Houston Area’s current epidemiological profile of HIV (published in December 2019) and provides updated data on core HIV indicators used in local planning, including new HIV diagnoses and cumulative people living with HIV (HIV prevalence), for the two local jurisdictions of Houston/Harris County and the Houston Eligible Metropolitan Area (EMA), a six-county area that includes Houston/Harris County.¹ A summary of key data is below:

- At the end of calendar year 2019, there were 30,198 diagnosed people living with HIV (PLWH) in the Houston EMA, a 4% increase from 2018 (2018 total = 29,078). In 2019, 92% of PLWH resided in Houston/Harris County.
- Also, in 2019, 1,313 new diagnoses of HIV were reported in the Houston EMA, a 3% decrease from 2018 (2018 total = 1,350). At the time of diagnosis, 94% resided in Houston/Harris County.

Number of New HIV Diagnoses and People Living with HIV in the Houston EMA, by County, 2019



Sources: Texas eHARS, as of 12/31/2019

Definitions: New HIV diagnoses = People diagnosed with HIV between 1/1/2019 and 12/31/2019, with residence at diagnosis in Houston EMA. People living with HIV = People living with HIV at the end of calendar year 2019.

- In both Houston/Harris County and the Houston EMA, the rates of new HIV diagnoses and prevalence continue to exceed rates both for Texas and the U.S. The rate of new HIV diagnoses in Houston/Harris County is almost twice the rate for the U.S.
- Compared to the general population in the Houston EMA, PLWH are disproportionately male, Black/African Americans, and ages 45 to 54. There is a larger proportion of people ages 25 to 34 among *new* HIV diagnoses.
- Among 30,149 HIV-diagnosed individuals ages 13 years or older in the Houston EMA in 2019, 75% had receipt of care (at least one CD4/VL test in year); 60% were retained in HIV care (at least two CD4/VL tests in year, at least three months apart); 59% maintained or reached viral load suppression (≤ 200 copies/mL); and 63% among the newly diagnosed were linked to care.

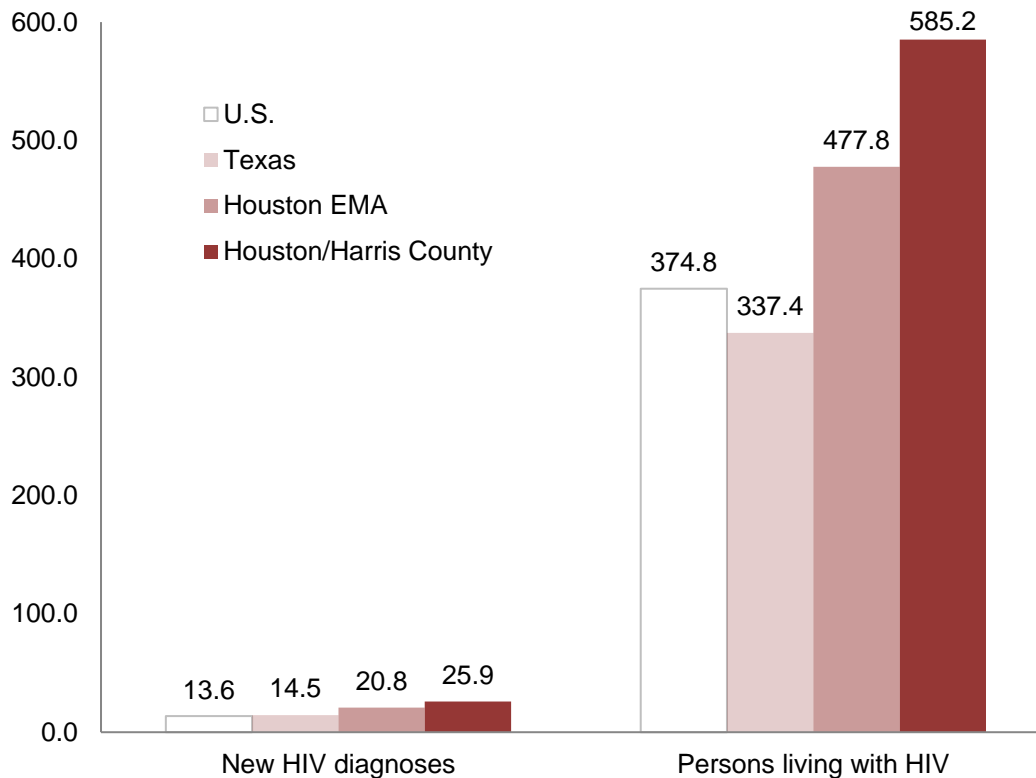
¹Pages marked "EMA" in the top left corner use 2019 Houston EMA HIV prevalence data, and pages marked "H/HC" in the top left corner use 2019 Houston/Harris County HIV prevalence data, unless otherwise noted.

COMPARISON OF HIV RATES IN HOUSTON, TEXAS, AND THE U.S.

A comparison of core HIV epidemiological indicators between the two Houston area jurisdictions (Houston/Harris County and the Houston EMA), the State of Texas, and the U.S. provides context for the local HIV burden data described in this document.

Overall, both Houston/Harris County and the Houston EMA have higher rates of new HIV diagnoses and HIV prevalence (or PLWH per 100,000 population) than both Texas and the U.S. This indicates that the HIV burden in the Houston area is greater than the state and the nation, even when adjusted for population size. In 2019, the Houston EMA had the highest HIV diagnosis and prevalence rates of any EMA/Transitional Grant Areas in Texas, according to epidemiological data provided by the Texas Department of State Health Services (TDSHS). The Houston Metropolitan Statistical Area also had the ninth highest rate of new HIV diagnoses of all metropolitan areas in the nation.²

Rate of New HIV Diagnoses and of People Living with HIV for the U.S., Texas, and Houston Area Jurisdictions



*Rate is per 100,000 population in the respective jurisdiction.

Sources:

U.S.: Centers for Disease Control and Prevention. Diagnoses of HIV infection among adults and adolescents in metropolitan statistical areas—United States and Puerto Rico, 2018. HIV Surveillance Data Tables 2020;1(No. 3). <http://www.cdc.gov/hiv/library/reports/hiv-surveillance.html>. Published August 2020.

Texas: TDSHS, Epidemiology and Special Projects Unit. Texas HIV Surveillance Report, 2019 Annual Report. All data, 2021.

Houston EMA: Texas eHARS. All data, 2019;

Houston/Harris County: Houston/Harris County eHARS. Diagnoses, 2019; Prevalence, 2019.

² Centers for Disease Control and Prevention. Diagnoses of HIV infection among adults and adolescents in metropolitan statistical areas—United States and Puerto Rico, 2018. HIV Surveillance Data Tables 2020;1(No. 3). <http://www.cdc.gov/hiv/library/reports/hiv-surveillance.html>. Published August 2020.

NEW HIV DIAGNOSES IN HOUSTON/HARRIS COUNTY (H/HC)

In 2019, 1,233 new diagnoses of HIV disease (including stage 3 HIV/formerly AIDS) were reported in Houston/Harris County, an 1.82% increase from 2018 (2018 total = 1,211). The rate of new HIV and stage 3 HIV diagnoses in Houston/Harris County increased from 25.6 to 25.94, while the rate of stage 3 HIV remained approximately 6 new diagnoses for every 100,000 residents. When compared to 2018, small increases in new HIV rates occurred among males, Hispanic/Latinx and people of other or multiple races.

Proportionally, Black/African Americans made up the majority of new HIV diagnoses in 2019 at 43%, followed by Hispanic/Latinx at 39%. Male-to-male sexual contact or MSM accounted for the most transmission risk at 70%, followed by Sex with male/Sex with female (formerly heterosexual) at 22%.

New Diagnoses of HIV and Stage 3 HIV in Houston/Harris County by Sex assigned at Birth, Race/Ethnicity, Age, and Transmission Risk, 2019^a

	New HIV ^b			New stage 3 HIV		
	Cases	%	Rate ^c	Cases	%	Rate ^c
Total	1233	100.0	25.94	278	100.0	5.85
Sex assigned at Birth						
Male	992	80.45	42.06	230	82.73	9.75
Female	241	19.55	10.06	48	17.27	2.00
Race/Ethnicity						
White	143	11.60	10.60	30	10.79	2.22
Black/African American	535	43.39	59.66	101	36.33	11.26
Hispanic/Latinx	478	38.77	23.06	128	46.04	6.17
Other/Multiracial	77	6.24	17.72	19	6.83	4.37
Age at Diagnosis						
0 - 24 ^d	307	24.90	18.11	28	10.07	1.65
25 - 34	446	36.17	58.72	88	31.65	11.59
35 - 44	247	20.03	36.29	79	28.42	11.61
45 - 54	128	10.38	21.73	40	14.39	6.79
55 - 64	83	6.73	16.21	35	12.59	6.84
65+	22	1.78	4.26	8	2.88	1.55
Transmission Risk^e						
Male-to-male sexual contact (MSM)	867.9	70.39	*	187.1	67.30	*
Person who injects drugs (PWID)	56.3	4.57	*	16.1	5.79	*
MSM/PWID	32.9	2.67	*	5.9	2.12	*
Sex with male/Sex with female	274.9	22.30	*	68.9	24.78	*
Perinatal transmission	**	**	*	0	0	*

^aSource: Texas eHARS, analyzed by the Houston Health Department

^bHIV = People diagnosed with HIV, regardless of stage 3 HIV status, with residence at diagnosis in Houston/Harris County

^cRate per 100,000 population. Source: U.S. Census Bureau, 2019 American Community Survey 1-Year Estimates

^dAge group 0-12 years was combined with 13-24 years because 0-12 years category had less than 5 cases and could not be reported.

^ePeople with no risk reported were recategorized into standard categories using the multiple imputation program of the Centers for Disease Control and Prevention (CDC).

**Cases less than 5 are suppressed.

*Population data are not available for risk groups; therefore, it is not possible to calculate rate by risk.

PEOPLE LIVING WITH HIV IN HOUSTON/HARRIS COUNTY (H/HC)

Data on the total number of people living with HIV (**PLWH**) in Houston/Harris County are available as of the end of calendar year 2019. At that time, there were 27,817 PLWH (regardless of progression) in Houston/Harris County. This is a prevalence rate of 585 PLWH for every 100,000 people in the jurisdiction.

Of those living with HIV in Houston/Harris County, 76% are male, 48% are Black/African Americans, 75% are people ages 35 and older, and 59% report MSM as their primary transmission risk.

People Living with HIV in Houston/Harris County by Sex assigned at Birth, Race/Ethnicity, Age, and Transmission Risk, 2019 ^a			
	Cases ^b	%	Rate ^c
Total	27817	100.0	585.19
Sex assigned at Birth			
Male	21096	75.84	894.47
Female	6704	24.1	279.92
Missing	17	0.06	*
Race/Ethnicity			
White	4434	15.94	328.70
Black/African American	13268	47.7	1479.67
Hispanic/Latinx	8578	30.84	413.76
Other/Multiracial	1537	5.53	353.63
Current Age (as of 12/31/2019)			
0 - 24	1152	4.14	67.94
25 - 34	5754	20.69	757.63
35 - 44	6493	23.34	954.04
45 - 54	6855	24.64	1163.85
55 - 64	5550	19.95	1083.98
65+	2013	7.24	389.48
Transmission Risk^d			
Male-to-male sexual contact (MSM)	16360	58.81	*
Person who injects drugs (PWID)	2196.9	7.9	*
MSM/PWID	1190.4	4.28	*
Sex with male/Sex with female	7645.7	27.49	*
Perinatal transmission ^e	250	0.9	*
Other adult risk	174	0.62	*

^aSource: Texas eHARS analyzed by the Houston Health Department

^bPLWH at end of 2019 = People living with HIV, regardless of stage 3 HIV status

^cRate per 100,000 population. Source: U.S. Census Bureau, 2019 American Community Survey 1-Year Estimates

^dPatients with no risk reported were recategorized into standard categories using the multiple imputation or risk program of the Centers for Disease Control and Prevention (CDC).

^ePerinatal transmission doesn't include perinatal exposure w/HIV age 13+ years.

*Population data are not available for risk groups; therefore, it is not possible to calculate rate by risk.

NEW HIV DIAGNOSES IN THE HOUSTON EMA

In 2019, 1,313 new HIV diagnoses were reported in the Houston EMA, 2% decrease from 2018. The rate of new HIV diagnoses for every 100,000 people in the Houston EMA decreased by 2% from 21.5 in 2018 to 20.8 in 2019.

Noticeable increases in rates compared to 2018 occurred among people ages 13 to 24, 35 to 44, and 65 and older.

Black/African Americans comprised the highest proportion of new HIV diagnoses in 2019 at 42%, followed by Hispanic/Latinx at 39%. MSM accounted for the majority of transmission risk at 71%, followed by Sex with male/Sex with female at 22%.

New Diagnoses of HIV in the Houston EMA by Sex assigned at Birth, Race/Ethnicity, Age, and Transmission Risk, 2019^a			
	Cases	%	Rate^c
Total	1,313	100%	20.8
Sex assigned at Birth			
Male	1,056	80.4%	33.1
Female	257	19.6%	8.2
Race/Ethnicity			
White	172	13.1%	8.0
Black/African American	554	42.2%	49.0
Hispanic/Latinx	509	38.8%	20.6
Other/Multiracial	78	5.9%	13.9
Age			
0 - 12	**	**	**
13 - 24	339	25.8%	32.6
25 - 34	457	34.8%	48.0
35 - 44	257	19.6%	28.4
45 - 54	144	11.0%	18.0
55 - 64	92	7.0%	13.2
65+	23	1.8%	3.2
Transmission Risk^b			
Male-male sexual contact (MSM)	928	70.7%	*
Person who injects drugs (PWID)	64	4.8%	*
MSM/PWID	30	2.3%	*
Sex with male/Sex with female	291	22.1%	*
Perinatal transmission	**	**	*
Other adult risk	0	0%	*

^a Source: Texas eHARS, new HIV diagnoses in the Houston EMA between 1/1/2019 and 12/31/2019.

^b Cases with unknown transmission risk have been redistributed based on historical patterns of risk ascertainment and reclassification

^c Rate per 100,000 population. Source: Texas Department of State Health Services, 2019 Houston EMA Population Denominators.

**Data has been suppressed to meet cell size limit of 5.

*Population data are not available for risk groups; therefore, it is not possible to calculate rate by risk.

PEOPLE LIVING WITH HIV IN THE HOUSTON EMA

At the end of calendar year 2019, there were 30,198 people living with HIV in the Houston EMA, a 4% increase from 2018 (29,078 cases). The rate of HIV prevalence also increased in 2019 to 478 PLWH for every 100,000 people in the Houston EMA, up from 465 in 2018.

Noticeable increases in prevalence rates in 2019 compared to 2018 occurred among males, females, Black/African Americans, Hispanic/Latinx, people of other or multiple races and people ages 25 to 34, 35 to 44, 55 to 64, and 65 and older.

Black/African Americans comprised the highest proportion of PLWH in 2019 at 48%, followed by Hispanic/Latinx at 30%. MSM accounted for the majority of transmission risk at 59%, followed by Sex with male/Sex with female at 28%.

People Living with HIV in the Houston EMA by Sex assigned at Birth, Race/Ethnicity, Age, and Transmission Risk, 2019^a				
		Diagnosed PLWH		
		Cases	%	Rate^c
Total		30,198	100.0%	477.8
Sex assigned at Birth				
	Male	22,736	75.3%	713.1
	Female	7,462	24.7%	238.3
Race/Ethnicity				
	White	5,176	17.1%	239.7
	Black/African American	14,398	47.7%	1273.6
	Hispanic/Latinx	9,065	30.0%	367.1
	Other/Multiracial	1,559	5.2%	277.9
Age				
	0 - 12	49	0.2%	4.1
	13 - 24	1,221	4.0%	116.4
	25 - 34	6,202	20.5%	651.3
	35 - 44	6,956	23.0%	767.4
	45 - 54	7,522	24.9%	939.6
	55 - 64	6,040	20.0%	865.1
	65+	2,218	7.3%	311.2
Transmission Risk^b				
	Male-male sexual contact (MSM)	17,717	58.7%	*
	Person who injects drugs (PWID)	2,398	7.9%	*
	MSM/PWID	1,253	4.1%	*
	Sex with male/Sex with female	8,473	28.1%	*
	Perinatal transmission	342	1.1%	*
	Other adult risk	16	0.1%	*

^a Source: Texas eHARS, diagnosed PLWH in the Houston EMA between 1/1/2019 and 12/31/2019.

^b Cases with unknown transmission risk have been redistributed based on historical patterns of risk ascertainment and reclassification

^c Rate per 100,000 population. Source: Texas Department of State Health Services, 2019 Houston EMA Population Denominators.

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*Population data are not available for risk groups; therefore, it is not possible to calculate rate by risk.

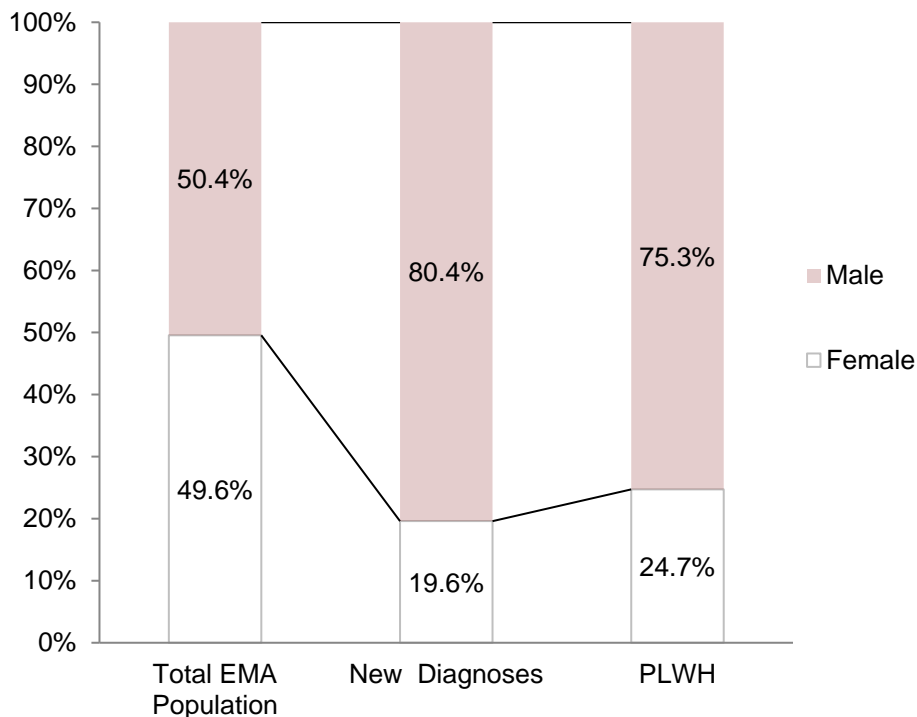
COMPARISON OF THE HOUSTON EMA POPULATION TO THE POPULATION LIVING WITH HIV

By Sex assigned at Birth: In 2019, the Houston EMA population was divided almost equally between males and females. However, more males than females were both newly diagnosed with HIV (80% vs. 20%) and living with HIV (75% vs. 25%) at the end of 2019.

By Race/Ethnicity: The newly diagnosed population and those living with HIV in the Houston EMA are more racially diverse than the general EMA population. While Black/African Americans, Hispanic/Latinx, and people of other or multiple races account for 66% of the total Houston EMA population, these groups comprised 87% of all new HIV diagnoses in 2019 and 83% of all PLWH at the end of 2019. Black/African Americans account for 18% of the total Houston EMA population, but comprised 42% of new HIV diagnoses in 2019 and close to half of all PLWH (48%) in the region at the end of 2019.

By Age: People ages 25 to 34 accounted for a much larger proportion of new HIV diagnoses (35%) than their share of the Houston EMA population (15%) in 2019. Similarly, people ages 45 to 54 accounted for a much larger proportion of those living with HIV (25%) at the end of 2019 than their share of the population (13%).

Comparison of Total Population^a in the Houston EMA to People Living with HIV^b by Sex assigned at Birth,^c 2019

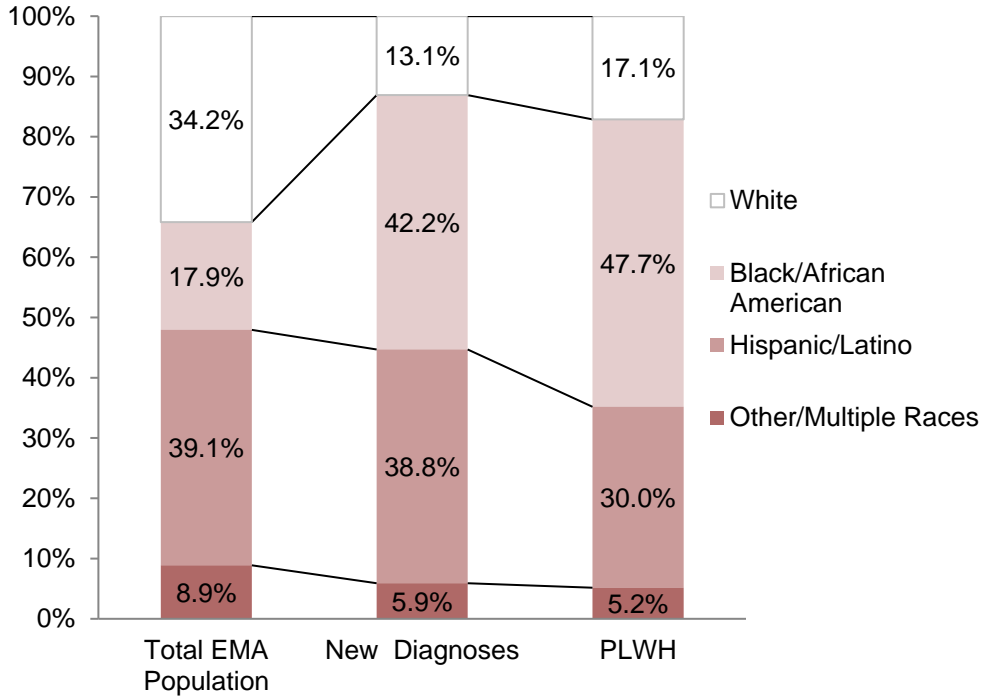


^aSource: TDSHS EMA/HSDA Population Denominators, 2019

^bTexas eHARS, Diagnosed PLWH in the Houston EMA as of 12/31/2019; new HIV diagnoses in the Houston EMA between 1/1/2019 and 12/31/2019.

^cTransgender people are reflected in data by sex assigned at birth due to underreporting.

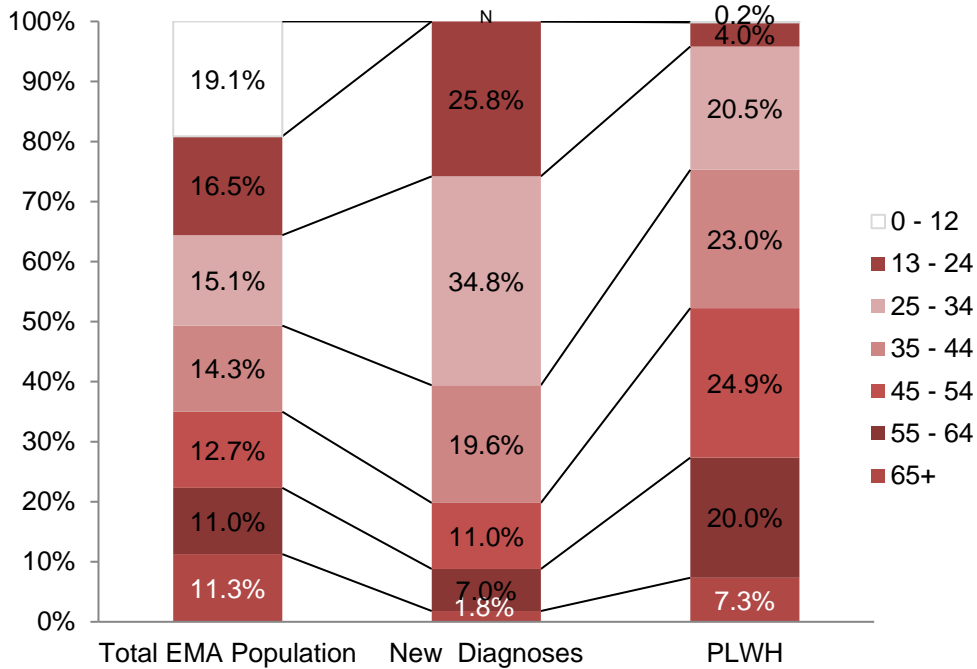
Comparison of Total Population^a in the Houston EMA to People Living with HIV^b by Race/Ethnicity, 2019



^aSource: TDSHS EMA/HSDA Population Denominators, 2019

^bTexas eHARS, Diagnosed PLWH in the Houston EMA as of 12/31/2019; new HIV diagnoses in the Houston EMA between 1/1/2019 and 12/31/2019.

Comparison of Total Population^a in the Houston EMA to People Living with HIV^b by Age, 2019



^aSource: TDSHS EMA/HSDA Population Denominators, 2019

^bTexas eHARS, Diagnosed PLWH in the Houston EMA as of 12/31/2019; new HIV diagnoses in the Houston EMA between 1/1/2019 and 12/31/2019.

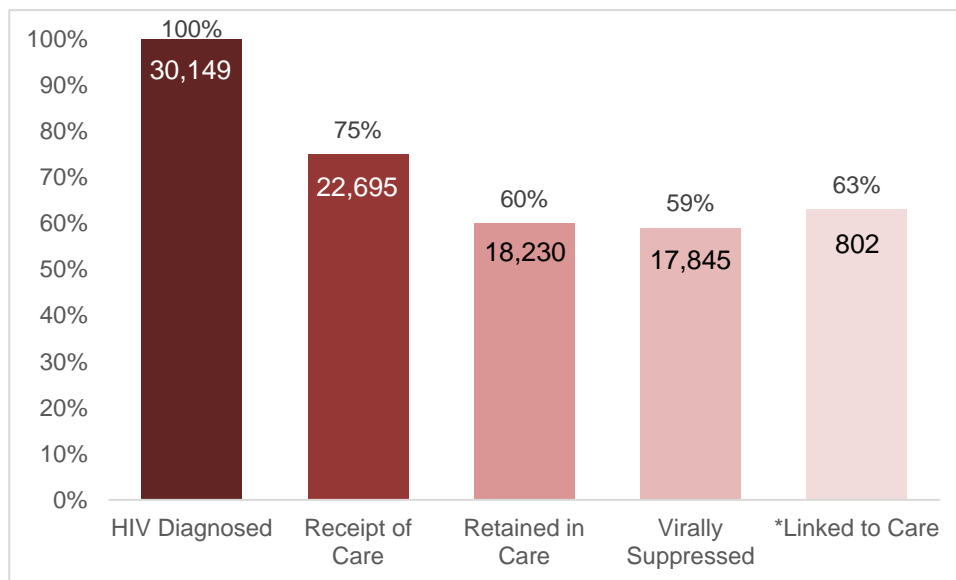
^NData suppressed as case number was fewer than 5.

THE HOUSTON EMA HIV CARE CONTINUUM

The Houston EMA HIV Care Continuum depicts the number and percentage of PLWH in Harris, Fort Bend, Waller, Montgomery, Liberty and Chambers counties at each stage of HIV care, from being diagnosed with HIV to viral suppression then linkage to care. Stakeholders use this analysis to measure the extent to which PLWH have community-wide access to care and identify potential service gaps. The methodology follows the CDC definition for a diagnosis-based HIV care continuum.

Among 30,149 HIV-diagnosed individuals ages 13 years or older in the Houston EMA in 2019, 75% had receipt of care (at least one CD4/VL test in year); 60% were retained in HIV care (at least two CD4/VL tests in year, at least three months apart); 59% maintained or reached viral suppression (≤ 200 copies/mL); and 63% among the newly diagnosed were linked to care.

The Houston EMA HIV Care Continuum, 2019



Methodology of CDC diagnosis-based HIV Care Continuum:

HIV Diagnosed: No. of HIV-diagnosed people ages 13+ residing in the Houston EMA, 2019.

Receipt of Care: No. of HIV-diagnosed people ages 13+ who had a care visit as documented by a CD4 or viral load in 2019.

Retained in Care: No. of HIV-diagnosed people ages 13+ who had at least two care visits documented by a CD4 or viral load at least 90 days apart in 2019

Virally Suppressed: No. of HIV-diagnosed people ages 13+ whose last viral load test of the year was ≤ 200 copies/mL.

*Linked to Care: No. of HIV-diagnosed people ages 13+ who were linked to care within one month of diagnosis as documented by a CD4 or viral load. *Denominator (1,269): No. of people ages 13+ with newly diagnosed HIV during the calendar year (updated Texas eHARS as of August 2021)

Source: TDSHS HIV Unmet Need Project (incl. eHARS, ELR, ARIES, ADAP, Medicaid, private payer data)