# IDPH COVID-19 VACCINE UPTAKE:

A Community Assessment of Covid-19 Vaccination Disparities in Twelve Communities



**REGION 10** 

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# OVERVIEW OF THE COMMUNITY ASSESSMENT AND PROJECT PARTNERS

This report provides an analysis and evaluation of the current COVID-19 vaccination rates in 12 communities in the Chicagoland area. It documents the results of the community assessment for the first phase of the YMCA of Metropolitan Chicago's (the Y) initiative to increase COVID-19 vaccine confidence and uptake in the specified target areas. It also makes recommendations for building trust and knowledge toward prevention, testing and treatment. Funding for this project was made possible by the Office of Disease Control, through the Illinois Department of Public Health (IDPH).

COVID-19 is a virus that can spread very quickly through close interaction with infected people that is mainly transmitted by coughing or sneezing.<sup>1</sup> The first case was reported in China in 2019, and has since spread worldwide and caused a global pandemic.<sup>2</sup> The first case in Chicago was recorded on March 8, 2020.<sup>3</sup>

<sup>1</sup>Yüce, Meral, et al. "Diagnosis — A Review of Current Methods." *Biosensors and Bioelectronics*, vol. 172, Elsevier BV, Jan. 2021, p. 112752. *Crossref*, https://doi. org/10.1016/j.bios.2020.112752.

- <sup>2</sup> Wong, George N. et al. "Modeling Dynamics in Illinois Under Nonpharmaceutical Interventions." *Physical review. X* 10.4 (2020): 041033–. Web.
- <sup>3</sup> All executive orders related to issued by the State of Illinois Governor J. B. Pritzker are listed here: https://www2.illinois.gov/ government/executive-orders. The timeline of mitigation in Illinois is summa rized at https://en.wikipedia.org/wiki/\_pandemic\_ in\_ Illinois#Government\_response

When infected, symptoms include coughing, high fever, vomiting, and diarrhea. Acute respiratory distress syndrome (ARDS) occurs in more severe cases. Less common symptoms are headache, body aches, nausea, and phlegm production. However, in many cases, individuals are asymptomatic. Detection of asymptomatic cases is important to prevent the spread of COVID-19.<sup>4</sup>

Once an individual is infected with COVID-19, immunity wanes over time, allowing for reinfection. For maximum protection, vaccination and regular boosters are recommended.<sup>5</sup>

The rapid roll-out of the vaccine and the fear of possible side effects have led to hesitation about the vaccine. The thought that insufficient time was spent developing the vaccine has triggered distrust and reluctance toward the vaccine. Infection and hospitalization of vaccinated people has contributed to vaccine hesitancy.<sup>6</sup> The fact that the virus can mutate very quickly has made it difficult to measure the effectiveness of vaccines during studies.<sup>7</sup>

Despite the increase in vaccine availability and vaccine providers in Illinois, demographic inequalities in vaccination have been observed in the population. With funding from the IDPH, the Y launched a one-year project in 12 zip codes located in Suburban Cook County, Will County, and Lake County to identify driving factors behind vaccination rate disparities and develop interventions to address those disparities.

- <sup>4</sup> Pradhan, Madhulika, et al. ": Clinical Presentation and Detection Methods." *Journal of Immunoassay and Immunochemistry*, vol. 43, no. 1, Informa UK Limited, Aug. 2021. Crossref, https://doi. org/10.1080/15321819.2021.1951291.
- <sup>5</sup> Brüssow, Harald. "COVID-19: Vaccination Problems." *Environmental Microbiology*, vol.
   23, no. 6, Wiley, May 2021, pp. 2878–90.
   *Crossref*, https://doi.org/10.1111/1462-2920.15549.
- <sup>6</sup> Hamilton K, Hagger MS. The Vaccination Concerns in Scale (VaCCS): Development and validation. PLoS One. 2022 Mar 14;17(3):e0264784. doi: 10.1371/journal. pone.0264784. PMID: 35286331; PMCID: PMC8920277.
- <sup>7</sup> Li, Maochen, et al. "Vaccine Development: Milestones, Lesöm, https://doi.org/10.1038/ s41392-022-00996-y.

The Y has been a community partner since 1858. The Y serves over 200,000 individuals annually in Greater Chicagoland, as well as MI and WI. Their mission is to strengthen community by connecting people to their purpose, potential, and each other. Their work centers around youth development and academic readiness, building healthy communities, healthy living and fitness, violence prevention, and ensuring essential services, such as healthcare access, housing, food, and employment are open to all. With funds from IDPH, the Y is embarking on a one-year project in 12 suburban Chicago cities/ zip codes (map below) to advance COVID-19 vaccination uptake. With this work, the Y aims to:

- Understand why some areas have low vaccination rates, while other community areas have higher rates
- Develop and implement community-led COVID-19 transmission strategies
- Understand other top health-equity related issues within target communities
- Aid in development of a strong network of resources for individuals surrounding COVID-19 and common health issues in these communities

The Social Consult is an Executive Coaching and Consulting firm dedicated to the continuous growth and well-being of people and organizations. The Social Consult is reimagining success as humane and aims to set a standard where organizations and people grow together. The Social Consult served as an Evaluation Partner, providing support to the Y and ensuring the successful completion of a wide scale community assessment of all 12 zip codes.

Overall, 12 suburban Chicago zip codes were examined as a part of the community assessment process. These zip codes were identified by IDPH as having lower vaccination rates than others in the state. They fall in two regions– Region 9 and Region 10. The zip codes in Region 10 fell in two clustered areas. For this reason, Region 10 has been further divided into South and West subregions by the Y. This project aims to increase vaccine confidence and vaccination rates by better understanding the target communities

### **REGION 9**

- 1. Great Lakes
- 2. Mundelein
- 3. Round Lake
- 4. Waukegan

### **REGION 10 WEST**

- 5. Des Plaines
- 6. Elmwood Park
- 7. Niles
- 8. Riverside

### **REGION 10** SOUTH

- 9. Matteson
- 10. Park Forest
- 11. Richton Park
- 12. Steger







# STRENGTHS AND LIMITATIONS OF THE COMMUNITY ASSESSMENT

This community assessment leveraged partnerships in order to achieve it's aim. In addition to the partnership between the Social Consult and the Y, the following partners supported community assessment efforts: the Alliance for Human Services, Kids Above All, Family Services of Lake County, Joliet Area South Suburban Chapter of Delta Sigma Theta, Boys and Girls Club of Waukegan, Waukegan Public Library, Steger South Chicago Heights Public Library, District 63 Family Resource Center, and Members from the North, South, and West Community Health Equity Networks.

This community assessment was limited by poor attendance at town halls. More focus needed to be put on other planned data collection efforts such as interviews and surveys due to this limitation. Representation from Riverside and Elmwood Park in Region 10 was particularly limited. Unvaccinated individuals were also underrepresented in our Region 10 survey sample, especially in the West region. In Region 9, there were also accessibility restraints in the Great Lake community, in part due to it largely being a secured Navy base. Lastly, the amount of survey responses rate for the South totaled 52, which is less than an ideal sample size. These limitations were a result of time-restrictions. A community assessment of 12 communities would typically occur over a longer span of time.





# METHODS USED TO GATHER INFORMATION

The community assessment began with the development of the Y's Community Health Equity Network (CHEN). The CHEN is an external body of community leaders and members responsible for guiding the direction of COVID-19 vaccination uptake strategies and initiatives.

There were a total of two CHEN meetings held, where community representatives served to inform the Y and the Social Consult on how to best assess their community. The first CHEN meeting was an introductory meeting. The Y presented information about the project while the Social Consult presented information about their practices and methodology and facilitated a discussion around ways to best assess and understand their communities.

Next, a gap analysis exploring the vaccination rate disparities within the 12 target zip codes was completed. The full gap analysis can be found in Appendix B. Once the gap analysis was completed, the Social Consult presented the findings of the analysis to the CHEN and led a discussion with CHEN members related to additional data collection and best methods to assess the community. Following the CHEN meeting, The Social Consult evaluated the feedback from the CHEN and formulated a data collection plan while integrating the CHEN's feedback.

For Region 10 South, two town hall meetings were planned. A survey was also developed to gather additional information. Additionally, to address the possible lack of participants, a secondary plan to conduct interviews in the community was formulated. Training was conducted by the Social Consult with the Y team on the use of Appreciative Inquiry for the purposes of conducting interviews. Appreciative Inquiry is a change management method that focuses on identifying what is working sufficiently and analyzing why it is working sufficiently.<sup>8</sup> It helps understand the best approaches, design strategic plans, and build momentum for large-scale initiatives into the future.<sup>9</sup>

The Social Consult then began to develop interview and town hall questions using appreciative inquiry methodology. The town hall format was developed using the Art of Hosting and World Cafe format. The World Cafe format is a creative way to share knowledge by creating collaborative dialogue around essential questions.<sup>10</sup> Conversations are held in informal cafe settings with small groups to facilitate problem-solving.<sup>11</sup> Interview and town hall questions were then developed and sent to CHEN members for feedback. The survey was also sent to CHEN members for feedback was then integrated into the data collection tools.

The initial town hall for Region 10 was held, however, community members did not attend. In order to collect data, the Social Consult and the Y team used an emergent strategy, allowing them to pivot and still conduct interviews and poll community members, which mainly consisted of parents picking up their children at the town hall site and staff at the community center. The revised method was successful in collecting data and it was decided that the data collection tools would be updated to reflect the revised data collection process. In addition, the Y and the Social Consult decided to conduct 1:1 interviews for the remainder of the data collection process.

- <sup>8</sup> https://positivepsychology.com/appreciativeinquiry/#appreciative-inquiry
- <sup>9</sup> https://www.investopedia.com/terms/a/ appreciative-inquiry.asp
- <sup>10</sup> https://artofhosting.org/what-is-aoh/ methods/world-cafe/
- <sup>11</sup> https://involve.org.uk/resources/methods/ world-cafe

### DATA COLLECTION OUTSIDE OF SURVEYS FELL INTO THREE CATEGORIES:

### **1** Access Questions

Yes or No questions developed to assess the community's access to the vaccination and personal protective equipment

### 2 Poll Questions

Yes or No questions created to quickly capture valuable insight about trusted sources of information regarding COVID-19

### 3 Interview Questions

Guided questions developed to assess the community member's feelings, thoughts and perceptions about COVID-19, COVID-19 immunizations and boosters and other community related health matters

The Social Consult and the Y team went into the community and visited locations that community members would frequent in order to collect additional data. Additionally, the teams reached out to their community networks and were able to get connected with community members to interview. Lastly, the survey was sent electronically to the Social Consult's and Y's community networks consisting of organizations and people with whom the two teams had pre-existing relationships. There were a total of 10 data collectors conducting surveys, polls, and interviews between the Y and the Social Consult teams, including community partners.

In this assessment, vaccination data from IDPH was analyzed. Region 10 survey, poll, and access question responses were also analyzed for trends. Interviews were analyzed using the narrative analysis and thematic analysis methodology. Narrative analysis is used to understand how participants construct stories and narratives from their personal experiences.,<sup>12,13</sup> Thematic analysis, one of the most popular qualitative analyses, is a method of searching a dataset for analysis that contains repeating patterns.<sup>14</sup>

The table below summarizes direct data collection that occurred broken down by target community.

<sup>12</sup> https://www.sciencedirect.com/topics/ social-sciences/narrative-analysis

13 https://delvetool.com/blog/narrativeanalysis

<sup>14</sup> https://www.sciencedirect.com/topics/ social-sciences/thematic-analysis

### **DATA COLLECTION COUNT**

Table 1. Data Collection Count Region 10 (South)

REGION (South)	INTERVIEWS	POLLS	SURVEYS	ACCESS QUESTIONS	TOTAL DATA POINTS
Steger	4	6	0	4	19
Richton Park	2	6	6	6	20
Matteson	5	15	17*	15	48
Park Forest	2	1	2	2	8
TOTAL	13	28	27**	27	96

\* Nine of 17 surveys categorized under Matteson came from a zip code that straddles Richton Park and Matteson \*\* Two surveys were from other, non-target commnities in region 10 near the South subregion

REGION (West)	INTERVIEWS	POLLS	SURVEYS	ACCESS QUESTIONS	TOTAL DATA POINTS
Niles	2	2	3	2	7
Riverside	0	N/A	7	0	7
Des Plaines	11	9	6	11	42
Elmwood Park	0	0	6	0	6
TOTAL	13	12	25*	13	62

Table 2. Data Collection Count Region 10 (West)

\*Three surveys were from other, non-target communities in region 10 near the West subregion



# BRIEF DESCRIPTION OF COMMUNITIES

Region 10 West includes Elmwood Park, Niles, Des Plaines, and Riverside, located west/northwest of Chicago. Region 10 South includes Matteson, Steger, Richton Park, and Park Forest located south of Chicago. For maps and detailed community level data on vaccination, transmission, testing as well as demographics, languages spoken, socio-economic status, and political affiliation, see Appendix A.

Target zip codes in Elmwood Park, Niles and Riverside have a Social Vulnerability Index (SVI) of .54. Des Plaines, Steger and Park Forest zip codes have slightly lower SVIs of .51, whereas Richton Park zip codes has a slightly higher SVI at .55. Each of these scores would be considered as an above average score based on the SVI Index's scoring system. That means the community is more likely to be affected by and suffer after a disaster. The SVI for Matteson's target zip codes was .39, a low score based on the SVI scoring system, meaning this community is more likely to be stable after a disaster.

Elmwood Park is located in the northwest part of Chicago, a village in Cook County.<sup>15</sup> Elmwood Park is a sister city to Frosinone, Italy.<sup>16</sup> The community has many Italian cultural schools and organizations.<sup>17</sup> The total population of Elmwood Park is 29,597.<sup>18</sup> <sup>15</sup>https://www.citytowninfo.com/places/illinois/ elmwood-park

<sup>16</sup> http://en.sistercity.info/sister-cities/ Frosinone.html

<sup>17</sup>http://www.italiansofchicago.com/DVD/ RESOURCES.pdf

<sup>18</sup>IDPH database

Niles is located northwest of Chicago in Cook County. Niles has a firm industrial and commercial ground.<sup>19</sup> Niles established a free ambulance service in 1946, becoming one of the first communities in America to provide this service.<sup>20</sup> Also, Niles is the only Chicago suburb to offer free bus service to major shopping and recreational facilities.<sup>21</sup> The total population of Niles is 53,389.<sup>22</sup>

Des Plaines is located in Lake County, northeast of Chicago. There has been a significant increase in Des Plaines population after the opening of O'hare Airport at Orchard Place. Des Plaines is a growing, diverse community that continues to develop.<sup>23</sup> The total population of Des Plaines is 106,742.<sup>24</sup>

Riverside is a suburban village located west of Chicago in Cook County.<sup>25</sup> Riverside village is considered as one of the first planned villages with its unique architecture and city layout. In 1869, as Chicago became increasingly crowded and corrupted, a group of businessmen moved to Riverside to offer a wealthy alternative.<sup>26</sup> The city's development, designated a National Historic Landmark in 1970, is seen as one of the most successful railway-oriented developments.<sup>27</sup> The total population of Riverside is 45,507.<sup>28</sup>

Matteson is a village in Cook County that is located south of Chicago. In the early 1800s, Matteson began as a German-populated settlement. Between 2000 and 2010, the Black population increased by 85%.<sup>29</sup> Now, the proportion of African Americans is 81.94%.<sup>30</sup> The total population of Matteson is 46,431.<sup>31</sup>

Steger is located on the border between Cook County and Will County, north of Chicago. The village was named after John Steger, who founded a piano factory.<sup>32</sup> The total population of Steger is 13,942.<sup>33</sup>

Richton Park, founded in 1926, is a small village located south of Chicago. When first established, it was a rapidly growing German immigrant community. In 1980, only 7% of the population was Black; now 85.5% of the total population is Black.<sup>34, 35</sup> The total population of Richton Park is 14,063.<sup>36</sup>

Park Forest is a village located south of Chicago in Cook County and partly in Will County. Park Forest was designed to provide housing for veterans returning from World War 2.<sup>37</sup> The total population of Park Forest is 18,413.<sup>38</sup> <sup>19</sup>https://www.ntdse.org/about\_us/ community\_profil

- <sup>20</sup>https://www.vniles.com/919/Niles-History
- <sup>21</sup>http://www.encyclopedia.chicagohistory. org/pages/1328.html
- <sup>22</sup>IDPH database
- <sup>23</sup>https://www.desplaines.org/explore-our-city/ history
- <sup>24</sup>IDPH database
- <sup>25</sup>https://www.riverside.il.us/101/Community
- <sup>26</sup>https://interactive.wttw.com/ten/towns/ riverside
- <sup>27</sup>https://www.achp.gov/preserveamerica/community/riversideillinois#:~:text=Riverside%2C%20 Illinois%2C%20(population%20 8%2C995,of%20the%20Des%20 Plaines%20River.
- <sup>28</sup>IDPH database
- <sup>29</sup>https://www.citytowninfo.com/places/illinois/ matteson
- <sup>30</sup>https://www.illinois-demographics.com/ matteson-demographics#:~:text=The%20 largest%20Matteson%20 racial%2Fethnic,Two%20or%20More%20 (3.4%25).
- <sup>31</sup>IDPH database
- <sup>32</sup>Steger, Piano Man, Dead. The (Chicago) Day Book:8. June 12,1916.
- <sup>33</sup>IDPH database
- 34 https://datausa.io/profile/geo/richton-park-il
- <sup>35</sup>https://richtonpark.org/292/History-of-Richton-
- <sup>36</sup>IDPH database
- <sup>37</sup>https://www.villageofparkforest.com/354/ About-Park-Forest#:~:text=Park%20 Forest%20began%20life%20in,for%20 towns%20throughout%20the%20world
- <sup>38</sup>IDPH database



# **RESULTS SUMMARY**

Results are derived from an analysis of the data collected and are organized by key findings in the categories and subcategories of:

### RATES

Testing and Transmission of COVID-19, Vaccination Rates, Boosters, Unemployment

### ACCESS

Access to Information

### **THOUGHTS, FEELINGS, AND PERCEPTIONS**

COVID-19 Impact, Trust, Feelings about COVID-19 Vaccinations, Feelings about COVID-19 Vaccination Requirements, Factors Leading to Decisions about Being Vaccinated/Unvaccinated, Vaccinated/Unvaccinated Community Member Divide

### **OTHER TOP HEALTH CONDITIONS**

In total, over 150 data points were collected and analyzed. The Summary of Findings does not include the totality of findings; however, it presents critical findings imperative to the objectives of the assessment. Additional analysis related to the survey can be found in Appendix C. Recommendations from all data sources can be found in the recommendations section.

### RATES

### **Testing and Transmission of COVID-19**

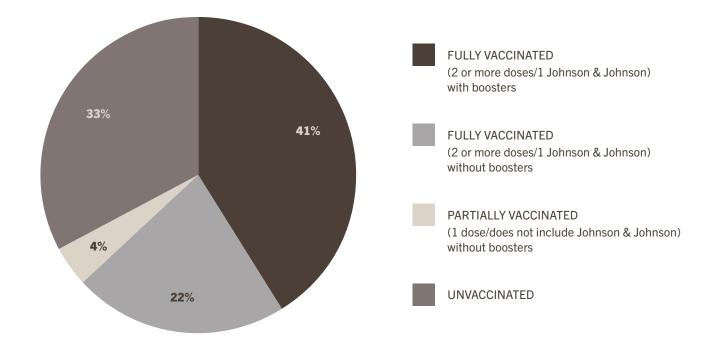
- 38% of survey respondents reported having tested positive for COVID-19 at least once.
  - Respondents seldomly reported transmission from going to school or being in a public place.
  - The highest rate of transmissions occurred through close contact with friends or family at 25%, attending a gathering at 25%, and going to work at 20%.
  - 20% of respondents who tested positive for COVID-19 were unsure of how it was transmitted.
- 11.5% of survey respondents reported being unsure if they had COVID-19, indicating they did not test for it.
- No significant variance by race/ethnicity or ages in transmission rates was found.

### **Vaccination Rates**

Rates by Zip Code, Age, Ethnicity (See Appendix A)

- A longitudinal analysis using IDPH Equitable Vaccine Administration Database shows that vaccination rates have steadily increased over time. With a current average vaccination rate of about 80% across all four of Region 10 West's target communities.
- Although increasing, South Region Vaccination Rates continue to fall below those of West Region, reaching approximately 60%.
- Vaccinated individuals were overrepresented in the South region survey responses, with 67% of respondents fully vaccinated compared with 59% vaccination rates at the community level. Vaccinated individuals were highly overrepresented for the West region, given that 96% of respondents were fully vaccinated compared with 77% vaccination rates at the community level.
- Four percent (4%) of survey respondents from the South region were partially vaccinated (received one dose of a two-dosage series). No survey respondents from the West region were partially vaccinated.

#### **Vaccination Responses**



#### **Vaccinated Participants' Reason for Being Vaccinated**

- Of those vaccinated, the majority reported that being "required" was the impetus behind them being vaccinated. After "required," "safety" was the second reason this group was vaccinated.
- Thirty-five percent (35%) of the group cited safety as the driver of being vaccinated.
- Of those who reported "required," 50% cited that it was a job requirement and another 25% mentioned the requirement related to travel.

#### **Unvaccinated Participants Reasons for Being Unvaccinated**

- A total of 10 respondents reported being unvaccinated.
- Only one respondent from the West Region reported being unvaccinated.
- The most common response given was "lack of reliable information" which was reported by 40% of respondents.
- Surprisingly, of the unvaccinated group, 50% claimed they never had COVID-19.

#### Boosters

- Fear of the impact of boosters on personal health was a recurring theme across the interviews.
- In six instances, participants indicated they were concerned about getting booster shots, as they were unaware of the harm continuing vaccination interventions would cause.

### Unemployment

- 15% of survey respondents in the South region reported being unemployed.
- In the South communities, 68% of employed respondents (n=15) were at least partially vaccinated, compared to 75% of unemployed respondents (n=3).
- Employment was one of the driving forces behind residents being vaccinated.

### ACCESS

- Most vaccinated participants reported that the process for receiving their first shot was either extremely easy or somewhat easy at 80% between both South and West regions.
- Six percent (6%) of vaccinated respondents expressed difficulties in vaccination; however, they managed to navigate the process and ultimately received their vaccines.
- Eleven percent (11%) of unvaccinated respondents in the South region reported getting to a vaccination site as somewhat difficult.
  - There was no indication that the level of difficulty in locating a vaccination site had any impact on the choice to remain unvaccinated. However, the reported level of difficulty in getting to a vaccination site is notably higher in the unvaccinated group.
- Twenty two percent (22%) reported understanding vaccination requirements as extremely difficult or somewhat difficult.
- Thirty four percent (34%) of respondents in the South region and 42% of West region respondents are unaware of the IDPH's or the CDC's Facebook pages, Instagram, or tik tok.
- Approximately 15% of respondents in the South region reported not having access to COVID-19 vaccines.
- Community Members in Matteson represent the totality of the 15% of respondents in the South region who do not have access to COVID-19 vaccinations.
- The one unvaccinated respondent in the West region did not report difficultly in accessing a vaccination site.

# *"I do not want to keep putting that in my body."*

– South Region Community Member

### **Access to Information**

- There were mixed responses to receiving additional information.
- Those uninterested in receiving additional information:
  - Reported being overwhelmed by the experience of living through COVID-19.
  - Stated that they were already decided and their decision would not change.
  - Already had access to the information.
- Interviewed community members in the South region were generally more apprehensive than the West region about whom they trust to provide them with vaccination information.
- Community members sometimes stated that they collect information from various sources and use their research to make informed decisions about vaccinations and boosters.
  - Community members in the West region stated they receive information from the Center for Disease Control (CDC), IDPH, hospitals, online sources (Google was mentioned at least once) and their employer. The CDC and physicians were among the top trusted sources in the West region; scientists and other medical professionals followed this.
  - Community members in the South region stated they receive information from the CDC, online sources and the news. At least three community members said they trust no one to provide them with information about COVID-19 vaccinations and boosters. Others said they trusted doctors or the CDC.
  - South region interview participants also mentioned God and spirituality amongst their rationale for having a positive or negative outlook on the vaccination, Churches and spiritual communities were discussed as trusted sources of information.

#### Region 10 West Top Trust and Receipt of Information

Who do you trust	Where do you	Who do you trust	Where do you
to provide you	receive information	to provide you	receive information
with vaccination	about the	with vaccination	about the
information and	vaccination and	information and	vaccination and
boosters?	boosters?	boosters?	boosters?
Center for Disease Control <b>6</b> Physicians <b>6</b> Scientists <b>2</b> Medical Professionals <b>2</b>	Center for Disease Control 4 Illionois Department of Public Health 2 Hospital 2 Online 2 Job 2	No One 3 Doctors 2 Center for Disease Control 2	Center for Disease Control 2 Online 2 News 2 Google 6

### "Nobody. I will get it from the pharmacy and the National Guard, but I still do not trust it."

Region 10 South Top Trust and Receipt of Information

–South Region Community Member asked who they trust to provide them with information about COVID vaccination

### THOUGHTS, FEELINGS, AND PERCEPTIONS

### **COVID-19 Impact**

- Death/Illness surfaced up in interview responses a total of 12 times.
- The second most common impact theme that surfaced was work-related, including a decrease in wages, loss of jobs, and other financial impacts.
- A mental health impact was seen across responses seven times.
- The social-emotional well-being of children
  - The impact of COVID-19 on children was captured in many responses, including fearful and anxious children.
  - Community members expressed concerns about their children being unable to attend school. They felt as though there were limited resources for online learning and, when provided, that they could have been more effective.
  - Children are apprehensive when returning to socialization and show decreased social development.
  - A decline in grades and an increase in conflict with peers were reported.
- Other stand-out responses include adult social well-being affected and the positive impact of social bonding between family members.

"My son had depression due to not being able to go outside; we were scared of coming out of the house."

> – West Region Community Member



#### Vaccinated vs. Unvaccinated Community Member Divide

- A divide between unvaccinated and vaccinated community members was noted.
- An unvaccinated participant implied that they felt vaccinated community members were unwilling to openly listen to their reasons for being unvaccinated.
- Some vaccinated community members recognized the decision of being vaccinated or unvaccinated as a personal choice, while others wanted to deliver a message of urgency.
- Vaccinated individuals reported wanting to inform unvaccinated people of the harm and risks being unvaccinated would cause unvaccinated individuals and others.
- When vaccinated members were asked what they would want to communicate with unvaccinated members of the community, participants shared:
  - Getting vaccinated will save lives.
  - "This COVID-19 is not a Hoax."
  - Continue to do research.
  - It is for the greater Good.

### Feelings about COVID-19 Vaccinations

- Although there were mixed feelings related to vaccinations, more often, vaccinations were supported by interviewed community members.
  - Common Positive Perception
    - Important for the safety of the overall community
  - Common Negative Perceptions
    - Too "...new and fresh "/Not enough time for testing
    - Pointless People still get vaccinations and die
- A participant mentioned race as a deciding factor against being vaccinated, expressing a history of the harmful use of vaccinations on Black people.
  - "They studied the vaccination on Black people to save white people and continue to take over the world."

### Feelings about COVID-19 Vaccination Requirements

- Community members had mixed feelings about Covid-19 Vaccination Requirements
  - Positive Perceptions
    - It should be required/Okay with the requirement was noted five times
      - For the greater good
      - Saves lives
  - Negative Perceptions
    - Four community members stated that the vaccine should not be required and mentioned the following reasons:
      - Personal choice
      - Infringement on rights
        - A community member stated she would join a class action lawsuit to sue the mayor for infringing on her rights.
      - Too many obstacles to getting vaccinated and scheduling appointments
      - "Extreme and radical"

"You do not need to push people. It is a personal and private decision."

> – West Region Community Member

### "They are disrespectful. They are good and evil..."

South Region Community Member



#### Factors Leading to Decisions about Being Vaccinated/Unvaccinated

- Vaccinated
  - When deciding to vaccinate, the safety of family members was of utmost importance to participants.
    - Caring for elderly parents
    - Children
      - Parents indicated that they made decisions around children being vaccinated based on health concerns, risks, and their ability to be involved in social settings like school.
  - Public health
  - The greater good
  - Personal safety/health
    - A powerful statement was made by a community member who was a transplant patient. She spoke of urgently deciding to receive the vaccination because her immune system was compromised.
  - Work and school obligations
  - Religion
  - After contracting COVID-19
    - Symptoms were too severe and participant did not want to experience them again
- Unvaccinated
  - Disbelief in the effectiveness of the vaccination
    - A participant shared that while working in the healthcare field, she would see vaccinated patients ventilated and die from COVID-19.
  - Religion and general resistance to mandates
    - "God has the right to choose, not the government...The government is not God..."

### **OTHER TOP HEALTH CONDITIONS**

- Community members were asked what other health conditions most impact their community.
- South Region
  - Mental health
  - Heart disease
  - Obesity
- West Region
  - Flu
  - Poverty
  - Mental health
    - The emotion of fear emerged throughout the participants' responses. In its most fervent form, fear was even stated as a health condition affecting the community.
  - Access to healthcare, as it relates to other health conditions, was also mentioned as a concern in the community.

*"I do not believe it helps. It is just like the flu. I do not believe it works."* 

South Region
 Community
 Member

"Some people can not access good health care or a good education system, and are likely to get sick."

> – West Region Community Member

# Vaccination Confidence/Uptake Recommendations



# Vaccination Confidence/Uptake Recommendations



# Other Health Condition Recommendations

A

2 Build capacity to lead interventions related to other health issues such as

3 Consider flu vaccination uptake for future evaluation

(4) Develop interventions that assess and address the impact of COVID-19 on the social-emotional well-being of youth

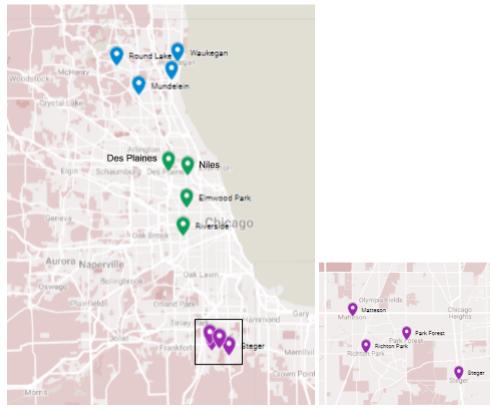


# CONCLUSION

Although 33.3% of the South region and 25% of poll participants in the West region believe the pandemic is over, information from trusted sources such as the CDC and IDPH states differently. The information in this summary is intended to be used to drive immediate action, with the ultimate objective of keeping our communities safe. Although sample size was limited, a rich collection of information was gathered via survey and by meeting with participants face to face. It is our hope that CHEN members will use the data in this report to advise the Y such that the most needed and effective-interventions can be implemented. The aim of these interventions is to increase vaccine confidence and vaccine uptake.

### **APPENDIX A: COMMUNITY DATA**

Target zip codes identified by IDPH in Region 9 and Region 10 fall in the 12 communities shown below.

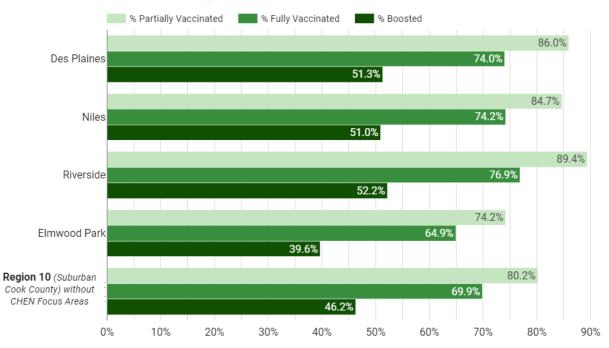


### **Vaccination rates**

Vaccination rates for target communities in region 10 from the end of 2022 range from 51% to 77%. In Region 10, the communities that fall in the South region generally have lower vaccination rates than those that fall in the West region, with Steger having the lowest vaccination rate at 51%. In fact all four target communities in the South region have lower fully vaccinated rates than the West region with the lowest vaccination rate (Elmwood Park at 65%). Riverside has the highest vaccination rate at 77%.

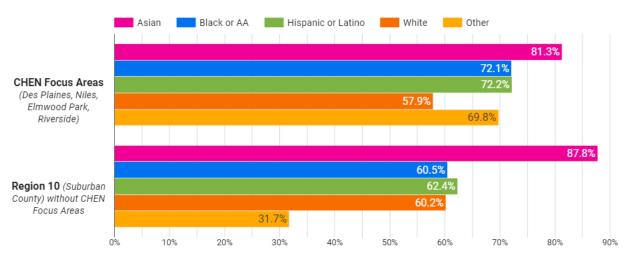
In the South and the West regions, whites are least likely to be fully vaccinated, at 48% and 58% respectively. The only exception is that those who identify with "other" races in the South region have a slightly lower fully vaccinated rate at 43%.

### **Region 10 West**

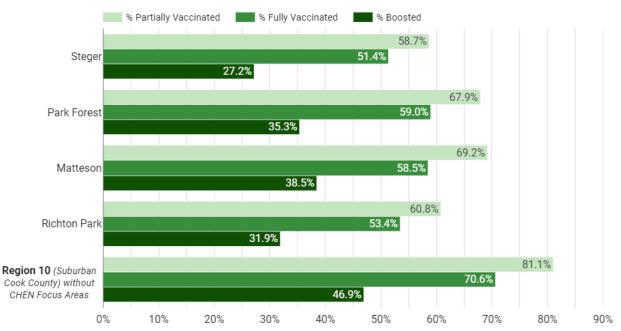


**Region 10 West - Vaccination Rates** 

### Fully Vaccinated Rate by Race/Ethnicity - Region 10 West

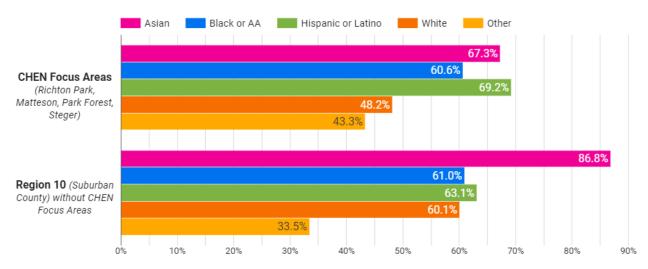


### **Region 10 South**



### **Region 10 South - Vaccination Rates**

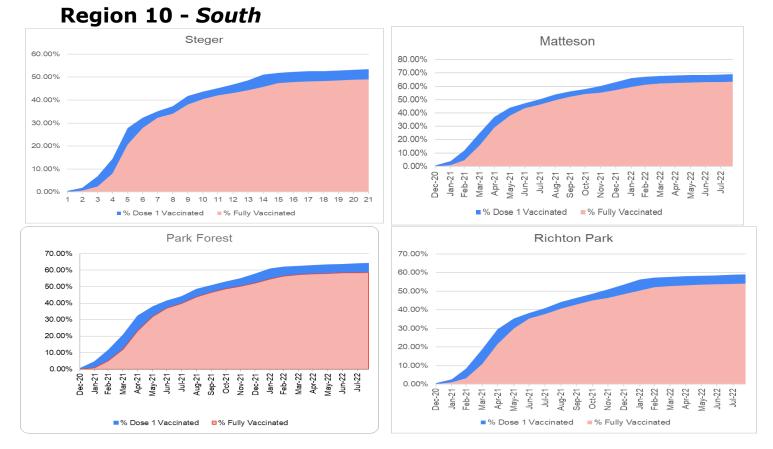
### Fully Vaccinated Rate by Race/Ethnicity - Region 10 South



YMCA Community COVID-19 Vaccination Community Assessment Executive Summary

### **Longitudinal Analysis of Vaccination Rates**

Rates of full vaccination in the target communities over time can be seen in the graphs below. Across each community, fully vaccinated rates have increased, with noticeable spikes in the onset of vaccine roll-out as well as smaller spikes between November 2021 and January 2022.



Changes in vaccination rates across demographic populations for the target communities from October 2022 to January 2022 were also analyzed. Increases and decreases in vaccination rates as provided in the table below are not directly related to any intervention efforts. In fact, some changes may be tied to data clean-up (particularly, decreasing rates). It is important to note the limitations of the analysis when reviewing the findings.

In the Y's target communities within Region 10 South, the largest increases in vaccination rates came from the Black/African American population, particularly increasing in boosted rates. In fact, apart from the Asian population, all racial/ethnic groups with sufficient data were found to have the highest increases in their boosted rates. The same trend continued across age groups, with the 65 and older

group having the highest rates of increased vaccination in the boosted category. The lowest increases were found in the 18-49 year old, the Asian, and the Hispanic/Latino populations. The 0-4 population also showed limited increases, but data for this population is limited. It is possible that interventions which encourage those getting their boosters to bring their friends and family may be effective.

Changes in Vaccination Rates since October 2022 The following table shows current vaccination rates for each age group with a comparison to the rate that was first pulled at the beginning of October 2022. The changes indicated below are not directly related to the actions/interventions of the YMCA team. They may be related to a variety of factors including data cleanup/validation from IDPH and increased vaccination response to other factors/motivations. While these changes can not be correlated to YMCA efforts, it may show signs of where efforts may be working or alternative strategies could be put in place.							
	Asian	Black or AA	Hispanic or Latino	White	Other		
Fully Vaccinated	67.3% # -1.23%	60.6% * -1.06%	69.2% 1 0.08%	48.2% • -0.46%	43.3% # -3.65%		
Partially Vaccinated	74.3% • -0.82%	65.2% 1 0.40%	74.9% 1 0.23%	50.7% 1 0.17%	52.2% # -0.48%		
Boosted	45.9% • -0.14%	<b>35.2%</b>	<b>28.8%</b> <b>1</b> 0.71%	31.5% <sup>* 0.85%</sup>	15.3% 10.72%		

### **Changes in Vaccination Rates since October 2022**

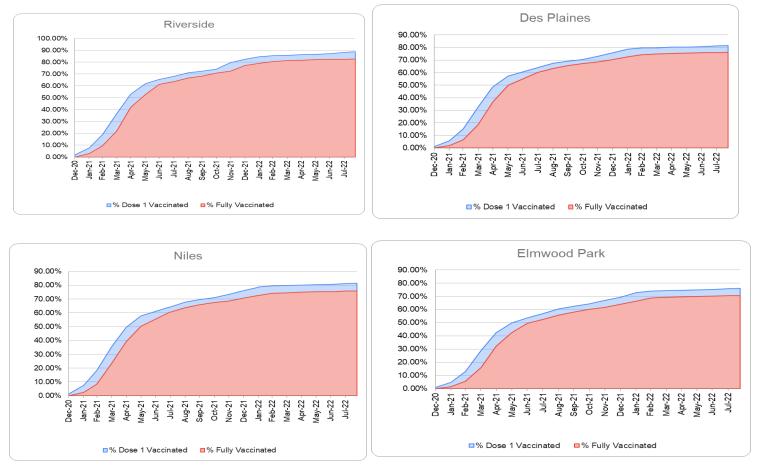
The following table shows current vaccination rates for each age group with a comparison to the rate that was first pulled at the beginning of October 2022. The changes indicated below are not directly related to the actions/interventions of the YMCA team. They may be related to a variety of factors including data cleanup/validation from IDPH and increased vaccination response to other factors/motivations.

While these changes can not be correlated to YMCA efforts, it may show signs of where efforts may be working or alternative strategies could be put in place.

	0-4	5-11	12-17	18-49	50-64	65+
Fully	<b>0.0%</b>	<b>24.8%</b>	49.7%	51.3%	72.5%	93.6%
Vaccinated		t 0.29%	• -0.24%	# -0.14%	• -0.15%	• -0.59%
Partially	5.1%	<b>29.7%</b>	55.2%	56.9%	76.6%	<b>99.5%</b>
Vaccinated	# 0.97%	10.25%	# -0.07%	• -0.06%	# 0.07%	# 0.02%
Boosted	<b>0.0%</b>	2.9% 1 0.45%	<b>14.4%</b> t 0.48%	20.9% 1 0.44%	<b>48.8%</b> t 0.98%	80.2% # 2.10%

**Note** - Limited data is available on the 0-4 population in the South Region 10 communities. While listed as 0.0% vaccinated, this is likely an underestimate and should be considered as such.

### **Region 10 - West**



Changes in vaccination rates across demographic populations for the target communities from October 2022 to January 2022 were also analyzed. Increases and decreases in vaccination rates as provided in the table below are not directly related to any intervention efforts. In fact, some changes may be tied to data clean-up (particularly, decreasing rates). It is important to note the limitations of the analysis when reviewing the findings.

In the Y's target communities within Region 10 West, the largest increases in vaccination rates came from the Asian population, particularly increasing in boosted rates. In fact, all racial/ethnic groups with sufficient data to be included in analysis were found to have some of the highest increases in boosted rates. The same trend continued across age groups, with the 65 and older group having the highest rates of increased vaccination in the boosted category. The lowest increases were found in the 18-49 year old, the "Other" (includes multiracial and races not shown below), and the Hispanic/Latino populations. The 0-4 population also showed limited increases, but data for this population is limited and should be noted. It is possible

that interventions which encourage those getting their boosters to bring their friends and family may be effective.

Changes in Vaccination Rates since October 2022 The following table shows current vaccination rates for each age group with a comparison to the rate that was first pulled at the beginning of October 2022. The changes indicated below are not directly related to the actions/interventions of the YMCA team. They may be related to a variety of factors including data cleanup/validation from IDPH and increased vaccination response to other factors/motivations. While these changes can not be correlated to YMCA efforts, it may show signs of where efforts may be working or alternative strategies could be put in place.						
	Asian	Black or AA	Hispanic or Latino	White	Other	
Fully	81.3%	72.1%	72.2%	57.9%	69.8%	
Vaccinated	# -1.75%	# -0.55%	+ -2.18%	• -0.29%	-1.73%	
Partially	87.6%	78.3%	78.9%	61.2%	80.8%	
Vaccinated	1 0.46%	1 0.61%	# -0.07%	1 0.42%	# -1.38%	
Boosted	<b>59.3%</b>	<b>39.6%</b>	<b>39.2%</b>	<b>39.8%</b>	<b>25.2%</b>	
	1.48%	1.19%	<b>1</b> 0.51%	1.13%	1 0.11%	

Changes	in	Vaccination	Rates	since	October	2022
---------	----	-------------	-------	-------	---------	------

The following table shows current vaccination rates for each age group with a comparison to the rate that was first pulled at the beginning of October 2022. The changes indicated below are not directly related to the actions/interventions of the YMCA team. They may be related to a variety of factors including data cleanup/validation from IDPH and increased vaccination response to other factors/motivations.

While these changes can not be correlated to YMCA efforts, it may show signs of where efforts may be working or alternative strategies could be put in place.

	0-4	5-11	12-17	18-49	50-64	65+
Fully	<b>1.8%</b>	<b>41.3%</b>	64.6%	63.8%	<b>73.3%</b>	85.1%
Vaccinated	# 1.44%	<b>*</b> 0.11%	* 0.08%	* 0.04%		• -0.06%
Partially	<b>10.7%</b>	<b>45.1%</b>	69.1%	<b>68.9%</b>	<b>77.1%</b>	89.5%
Vaccinated	1.24%	1 0.13%	1 0.09%	* 0.18%	# 0.23%	# 0.48%
Boosted	0.0%	8.3%	<b>25.1%</b>	33.8%	50.8%	<b>72.2%</b>
	0.00%	± 0.72%	# 0.70%	# 0.68%	1.03%	# 2.25%

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### **Transmission and Testing Data**

Transmission data from the Cook County Department of Public Health for each of the neighborhoods are listed in Table 1a and 1b below. It is important to note that total numbers of confirmed cases include only cases where community members submit the result of a positive test to IDPH or receive a test at an official testing site. Therefore, it is likely that these numbers present an undercount of the true number of confirmed cases within each neighborhood.

Target areas in the South all report a similar rate of confirmed cases per 100,000 people, even with varying numbers of confirmed cases (Table 1a). Richton Park has the highest weekly case rate per 100,000 people at 102, almost double that of Matteson and Park Forest. There are no reported cases in Steger, though this is likely an underestimate of the true case number. All neighborhoods report decreases in 14-day case rates.

	SOUTH					
	Matteson	Steger	Park Forest	<b>Richton Park</b>		
Confirmed Cases	5,152	997	4,924	3,357		
Confirmed Cases per 100,000 People	27,012	24,211	26,642	26,278		
Cases Reported Last Week*	11	0	8	13		
Weekly Case Rate per 100,000*	58	0	43	102		
Percent Change in Confirmed Cases in Past 14 Days**	-45%	0%	-45%	-7%		

### Table 1a: Region 10 South COVID-19 Case and Transmission Rates

*Data Source: Cook County Department of Public Health* (<u>https://ccdphcd.shinyapps.io/covid19</u>). \*Data presented for the week of January 8th - January 14, 2023.

\*\*Percent change is calculated by comparing counts from the past 14 days to the 14 days preceding that. Percent change is not calculated if there were 1-4 cases in the past 14 days or in the 14 days preceding that. A 14 day period is used, rather than a 7 day period, to reduce the impact of minor fluctuations in the data. The most recent data that goes into calculating percent change may not yet be displayed in the Trends in COVID-19 Rates graph.

Similarly to the South, the West neighborhoods each report a similar rate of confirmed cases per 100,000 people, though with a slightly larger range of variation. Niles reports a confirmed case rate of 34,585 compared to Riverside

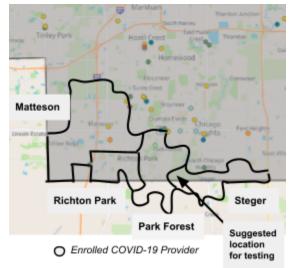
reporting 25,704 (Table 1b). All West communities except Riverside report higher total case rates per 100,000 people than the South communities, even though vaccination rates are higher in the West region. There is also variation between the weekly case rate per 100,000 with Niles reporting a rate of 191, almost four times the rate in Riverside, and double the rates in Elmwood Park and Des Plaines. Each West neighborhood except Niles reports a decreasing 14-day case rate.

		WEST					
	Elmwood Park	Des Plaines	Niles	Riverside			
Confirmed Cases	7,528	18,798	10,691	2,390			
Confirmed Cases per 100,000 People	30,700	30,981	34,585	25,704			
Cases Reported Last Week*	24	48	59	5			
Weekly Case Rate per 100,000*	98	79	191	54			
Percent Change in Confirmed Cases in Past 14 Days**	-3%	-30%	+ 11%	-6%			

*Data Source: Cook County Department of Public Health (<u>https://ccdphcd.shinyapps.io/covid19</u>). \*Data presented for the week of January 8th - January 14, 2023.* 

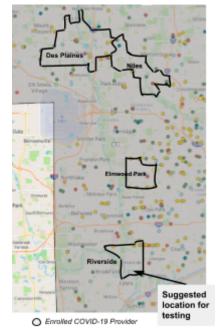
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COVID-19 providers from the IDPH Equitable Vaccine Administration Dashboard are shown below in Maps 1a and 1b. There are few enrolled providers within the South communities of interest. Increasing the number of enrolled providers may improve COVID-19 vaccination accessibility. In the West communities, there are a higher number of providers in the Des Plaines and Niles communities, whereas Elmwood Park and Riverside have fewer within their zip code boundaries. However, there appear to be concentrations of providers just outside the zip code boundaries, except for the southwest portion of Riverside. Suggested locations for where to increase testing resources are indicated in the maps below.

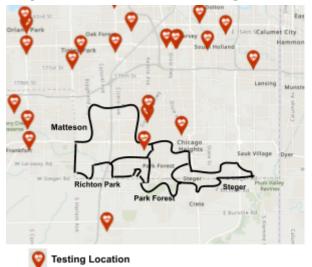


### Map 1a: Enrolled COVID Providers Region 10 South

Map 1b: Enrolled COVID Providers Region 10 West



Locations of testing locations can be seen in map 2a and 2b below. There is only one listed testing location in the South communities as documented by the Lake County Health Department. Additionally, there are very few locations in the West communities, especially within Elmwood Park and Riverside. Improving access to testing locations may support reduced transmission in the target communities.



# Map 2a: COVID-19 Testing Locations Region 10 South





# Race/Ethnicity & Language - Region 10 (South)

100%

0.00%

English Only

# Steger

#### Race and Ethnicity, 2016-2020

	Steger		
	Count	Percent	
White (Non-Hispanic)	5,979	64.4	
Hispanic or Latino (of Any Race)	1,740	18.7	
Black (Non-Hispanic)	1,317	14.2	
Asian (Non-Hispanic)	51	0.5	
Other/Multiple Races (Non-Hispanic)	202	2.2	
Source: 2016-2020 American Community Survey fi	ive-vear estimate	×5	

# **Richton Park**

# Race and Ethnicity, 2016-2020

	Richton Park	
	Count	Percent
White (Non-Hispanic)	1,170	8.7
Hispanic or Latino (of Any Race)	344	2.6
Black (Non-Hispanic)	11,440	85.5
Asian (Non-Hispanic)	41	0.3
Other/Multiple Races (Non-Hispanic)	386	2.9
Source: 2016-2020 American Community Suprey fiv	o-waar actimates	



English Only

Source: 2016-2020 American Community Survey five-year estimates

# Matteson

#### Race and Ethnicity, 2016-2020 Matteson Count Percent White (Non-Hispanic) 2,383 12.3 Hispanic or Latino (of Any Race) 1.4 262 Black (Non-Hispanic) 82.3 15,941 Asian (Non-Hispanic) 253 1.3 Other/Multiple Races (Non-Hispanic) 535 2.8

Source: 2016-2020 American Community Survey five-year estimates.

# **Park Forest**

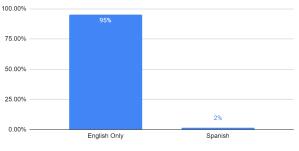
#### Race and Ethnicity, 2016-2020

Park Forest	
Count	Percent
4,743	22.9
982	4.7
14,146	68.3
90	0.4
754	3.6
	Count 4,743 982 14,146 90

Source: 2016-2020 American Community Survey five-year estimates.

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**Top Languages Spoken** 



**Top Languages Spoken** 100.00% 75.00% 50.00% 25.00% 3.80% 0.00% English Only Spanish



Spanish

2%

Slavic

1.50%

Spanish

**Top Languages Spoken** 

# Race/Ethnicity & Language - Region 10 (West)

# Niles

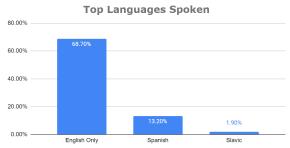
Race and Ethnicity, 2016-2020			50% —					
		Niles	-	45%				
	Count	Percent	40% —					
White (Non-Hispanic)	19,159	65.6	30% —	_				
Hispanic or Latino (of Any Race)	3,090	10.6	20%					
Black (Non-Hispanic)	778	2.7	_ 20% _					
Asian (Non-Hispanic)	5,466	18.7	10% —	-	9%	15%	15%	
Other/Multiple Races (Non-Hispanic)	705	2.4			9.6			5%
Source: 2016-2020 American Community Survey fi	ve-year estimates		_ 0/0	English Only	Spanish	Slavic Languages	Indo-European Languages	Tagalog

# Riverside

### Race and Ethnicity, 2016-2020

	Riverside		
	Count	Percent	
White (Non-Hispanic)	6,474	74.0	
Hispanic or Latino (of Any Race)	1,897	21.7	
Black (Non-Hispanic)	35	0.4	-
Asian (Non-Hispanic)	215	2.5	-
Other/Multiple Races (Non-Hispanic)	127	1.5	•





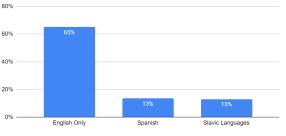
**Top Languages Spoken** 

# **Des Plaines**

### Race and Ethnicity, 2016-2020

	Des Plaines	
	Count	Percent
White (Non-Hispanic)	37,059	63.5
Hispanic or Latino (of Any Race)	10,490	18.0
Black (Non-Hispanic)	1,679	2.9
Asian (Non-Hispanic)	7,498	12.9
Other/Multiple Races (Non-Hispanic)	1,590	2.7
Source: 2016-2020 American Community Survey fiv	e-vear estimates.	

# **Top Languages Spoken**

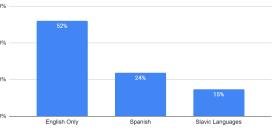


# **Elmwood Park**

#### Race and Ethnicity, 2016-2020

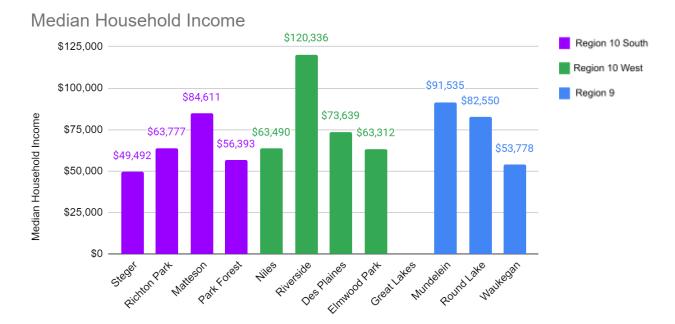
	Elmwood Park	
	Count	Percent
White (Non-Hispanic)	14,045	57.9
Hispanic or Latino (of Any Race)	8,291	34.2
Black (Non-Hispanic)	533	2.2
Asian (Non-Hispanic)	1,082	4.5
Other/Multiple Races (Non-Hispanic)	323	1.3
Source: 2016-2020 American Community Survey five	e-year estimates.	

**Top Languages Spoken** 

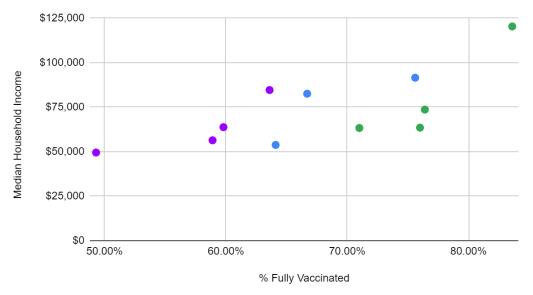


# **Socioeconomic Measures**

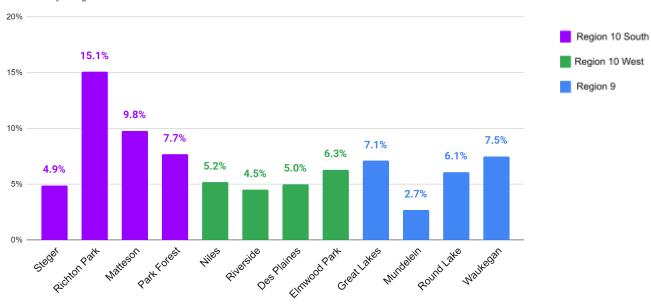
Socioeconomic data for all the Y's target communities are presented below. Generally, vaccination rates are higher for target communities with higher median household income and are lower for communities with lower median household income.



Median Household Income vs. Vaccination Rate

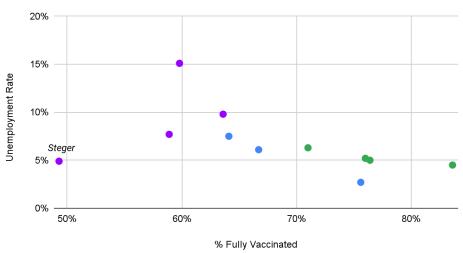


Vaccination rates were found to be generally lower for target communities with higher unemployment rates and higher for communities with lower unemployment rates. Notably, Steger is an outlier in this case, with a low unemployment rate and low vaccination rate. This may be a result of individuals who receive cash benefits (31% of residents in Steger) and are not actively searching for employment. These residents are not included when calculating the unemployment rate.



**Unemployment Rate** 

Data source: U.S. Census Bureau, American Community Survey 5-year estimates, 2017-2021



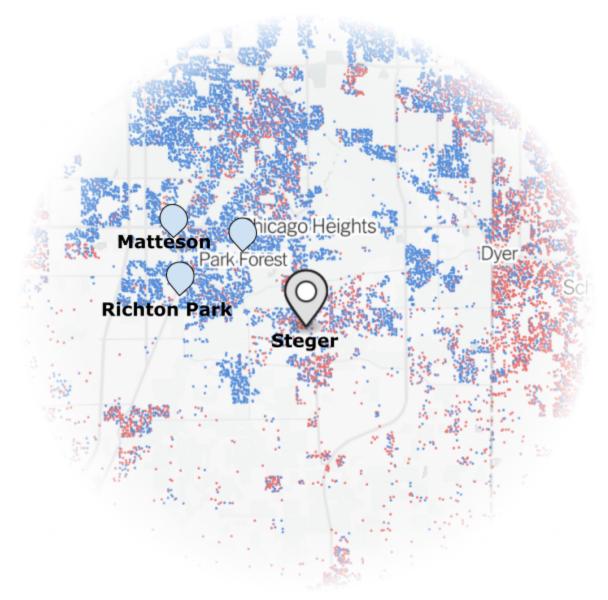
Unemployment Rate vs. Vaccination Rate

*Data source: U.S. Census Bureau, American Community Survey 5-year estimates, 2017-2021 and Illinois Department of Public Health Equitable Vaccine Administration Dashboard* 

# **Political Affiliation**

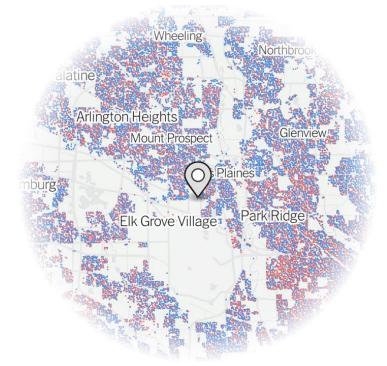
# Political Affiliation of Closest 1000 residents to Region 10 South Target Communities:

- Matteson 4% Republican, 96% Democrat
- Richton Park 5% Republican, 95% Democrat
- Park Forest 6% Republican, 94% Democrat
- Steger 43% Republican, 56% Democrat, 1% independent



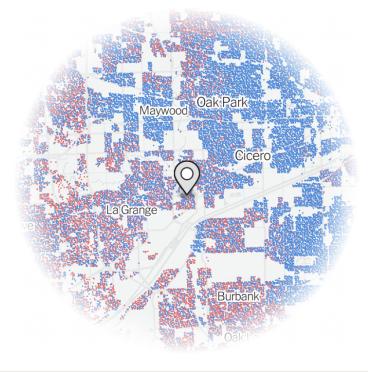
*Source:* "Do you live in a political bubble?" The New York Times, May 3, 2021, https://www.nytimes.com/interactive/2021/04/30/opinion/politics/bubble-politics.html

# Political Affiliation of Closest 1000 residents to Region 10 West Target Communities

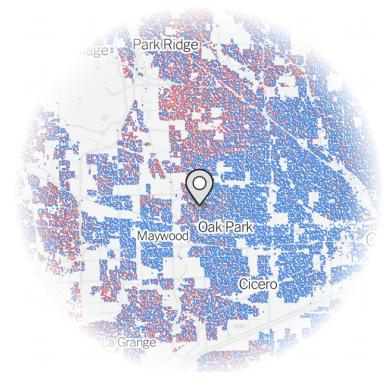


**Des Plaines:** 23% Republican, 74% Democrat, 3% independent

Riverside: 23% Republican, 65% Democrat, 12% independent

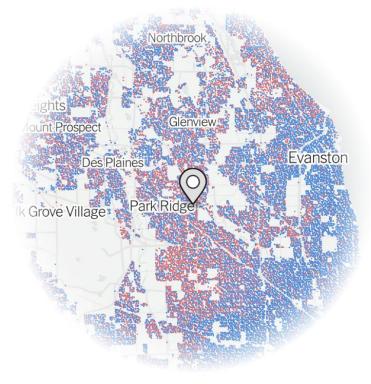


Source: "Do you live in a political bubble?" The New York Times, May 3, 2021, https://www.nytimes.com/interactive/2021/04/30 /opinion/politics/bubble-politics.html



Elmwood Park: 28% Republican, 71% Democrat, 1% independent

Niles: 47% Republican, 51% Democrat, 2% independent



Source: "Do you live in a political bubble?" The New York Times, May 3, 2021, https://www.nytimes.com/interactive/2021/04/30 /opinion/politics/bubble-politics.html

# **APPENDIX B: GAP ANALYSIS**

# **Background & Methodology**

As an initial phase of the assessment of the 12 communities, a gap analysis was conducted. The goal of the gap analysis was to identify populations within the target communities that had below average rates of vaccination when compared to the overall region. The results of this analysis could then serve as a launching point for strategy activation and intervention planning.

Using IDPH Equitable Vaccine Administrative (EVA) Dashboard, vaccination data was pulled for the select communities by using a zip code-level crosswalk with census tracts. The focus of the gaps analysis is for fully vaccinated individuals, or those who have received both doses of a two-dose series (Pfizer or Moderna), or one dose of a single-dose vaccine (Johnson & Johnson). Vaccination data broken down by race/ethnicity, age, and gender was used in this analysis. In order to determine whether a population was above, at, or below average with the rest of the region, control values for the vaccination rates were also pulled. These controls represent the overall region without the selected Y communities.

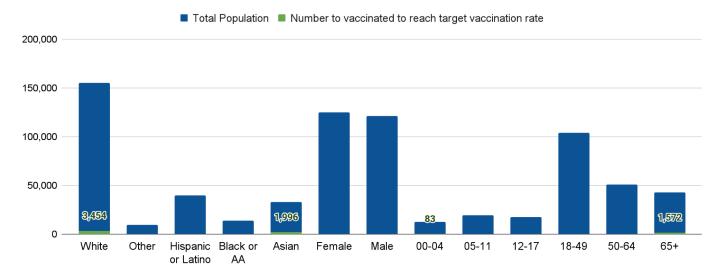
The "gap" or the number of people needed to be vaccinated in order to reach the regional averages was calculated for each population within the select communities. The gap was calculated by first taking the difference between the vaccination rates of the select communities and the overall region. The resulting rate was multiplied by the total population of the select community to determine how many people would need to be vaccinated to reach the average rate of the entire region.

## Results

In Region 10 West, most demographic groups had equal to or higher rates of vaccination when compared to the overall region (Figure 1a). The populations with the largest discrepancy in fully vaccinated rates were for White individuals (3,454) and those 65 years or older (1,572). This is of particular concern as older adults face greater risk of COVID-19 complications, with 81% of COVID-19 deaths in the US being individuals who are 65 and older.<sup>1</sup>

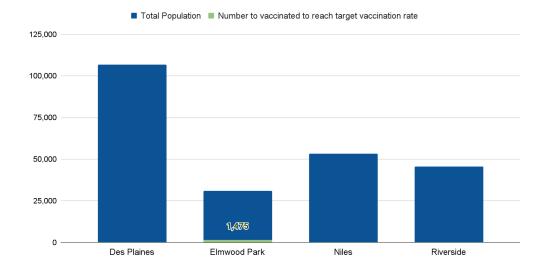
<sup>&</sup>lt;sup>1</sup> The Kaiser Family Foundation COVID-19 Vaccine Monitor Poll was a nationally representative sampling poll conducted by KFF in July 2022. More information can be found by viewing the methodology here: <u>www.kff.org/report-section/kff-covid-19-vaccine-monitor-july-2022-methodology/</u>

Across the Region 10 West communities, all but one have higher than region average rates of full vaccination (Figure 1b). Elmwood Park has a gap of 1,475 people needing to be vaccinated to meet the regional average vaccination rate.



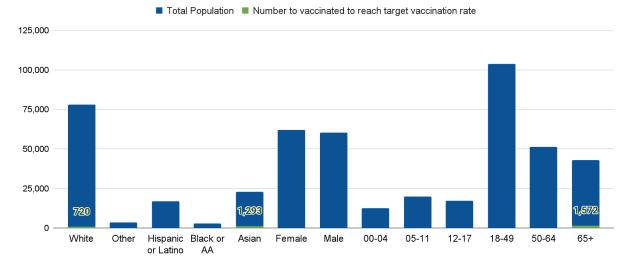
### Figure 1a: Region 10 West Gap Analysis by Demographics

# Figure 1b: Region 10 West Gap Analysis by Community



At the community-level, there is variation in the populations with the largest gaps. In Des Plaines, most populations have vaccination rates equal to or above the regional average. However, the white, Asian, and 65+ populations all experience lower than average vaccination rates. Specifically, the largest vaccination gap is for

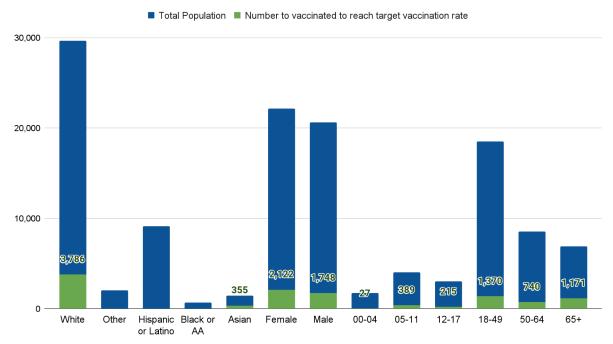
the 65+ and Asian populations at 1,572 and 1,293 individuals, respectively (Figure 2a).



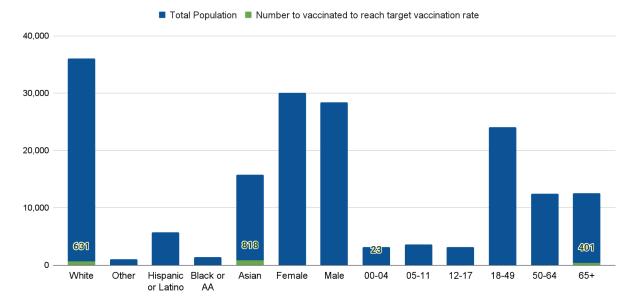
### Figure 2a: Community-level Gap Analysis - Des Plaines

Elmwood Park showed the greatest number of populations with vaccination disparities across Region 10 West target communities. The largest vaccination gap is for the white and the 18-49 year old populations, with 3,786 and 1,370 people needing to be vaccinated to reach the regional average, respectively (Figure 2b).



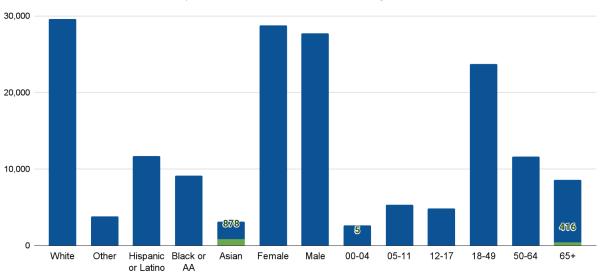


In Niles, many populations were at or above the regional average vaccination rate. However, similarly to the overall Region 10 West findings, the white, Asian, 0-4, and 65+ populations were found to have a vaccination gap (Figure 2c). The largest gaps for Niles were found in the Asian and 65+ populations, with 818 and 401 individuals, respectively.



### Figure 2c: Community-level Gap Analysis - Niles

There were only three populations with vaccination gaps in Riverside: Asian, 0-4, and 65+ (Figure 2d). The largest disparity was for the Asian and 65+ population at 876 and 416, respectively. Given the level of disparity for the Asian and 65+ population across Region 10 West, this may be a focus for strategic interventions to increase uptake in these populations.

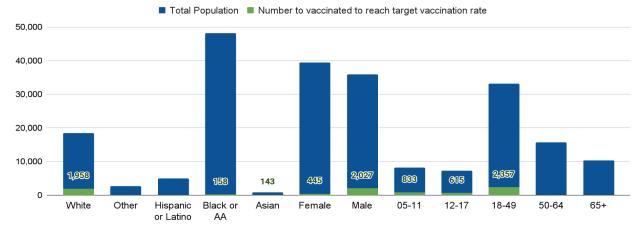


## Figure 2d: Community-level Gap Analysis - Riverside

Total Population Number to vaccinated to reach target vaccination rate

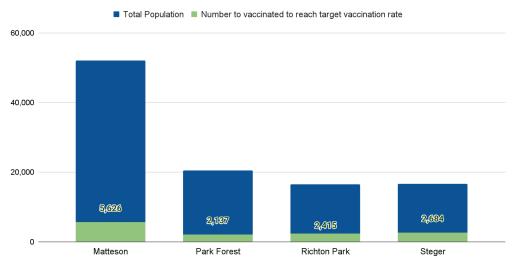
In Region 10 South, the largest disparities in fully vaccinated rates between the Y's selected communities and the overall region were found in the Male and 18-49 populations (Figure 3a). The number of people needed to be vaccinated in those categories to meet the regional level are 2,027 and 2,357 respectively. Also showing one of the largest gaps for the Region 10 South communities was the white population with a gap of 1,958. While people aged 18-49 and men have lower than average vaccination rates across the country, the disparity for the white population in the Y's communities poses a unique challenge as white adults have been shown to have above average rates of vaccination at the national level.<sup>2</sup>

<sup>&</sup>lt;sup>2</sup> The Kaiser Family Foundation COVID-19 Vaccine Monitor Poll was a nationally representative sampling poll conducted by KFF in July 2022. More information can be found by viewing the methodology here: <a href="https://www.kff.org/report-section/kff-covid-19-vaccine-monitor-july-2022-methodology/">www.kff.org/report-section/kff-covid-19-vaccine-monitor-july-2022-methodology/</a>



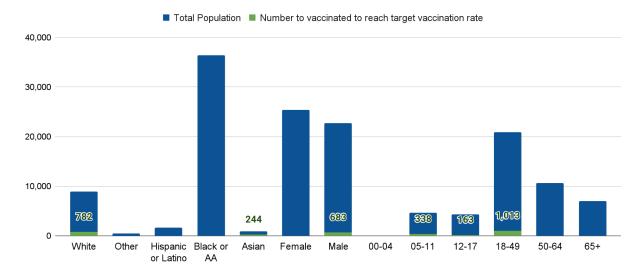
# Figure 3a: Region 10 South Gap Analysis by Demographics

Across the Region 10 South communities, the fully vaccinated rate was compared to the regional average. Matteson had the highest discrepancy and number of people needed to vaccinate to reach the regional rate at 5,626 (Figure 3b). Park Forest, Steger, and Richton Park all have smaller discrepancies around 2,500.



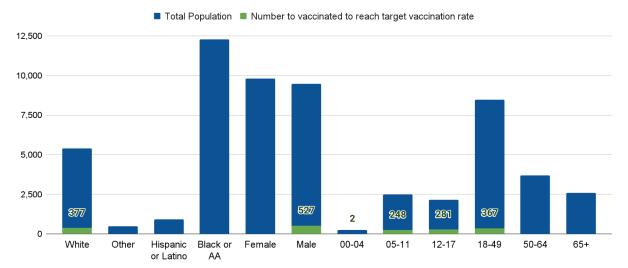
# Figure 3b: Region 10 South Gap Analysis by Community

Community-level demographic gaps analysis also found several populations within each community where disparities exist. In Matteson, there were some populations that experienced vaccination rates at or higher than the regional average. The largest vaccination gap was found in 18-49 year olds and White populations, at 1,013 and 782 people, respectively (Figure 4a). Men showed the third highest gap at 683.



### Figure 4a: Community-level Gap Analysis - Matteson

Most populations in Park Forest have vaccination rates equal to or above the regional average. The largest vaccination gap was found in men and white populations at 527 and 377 people, respectively (Figure 4b). The third largest gap was in 18-49 year olds at 367.



### Figure 4b: Community-level Gap Analysis - Park Forest

In Richton Park, the populations with the largest vaccination gaps were the Black/African American and male populations at 822 and 687, respectively (Figure 4c). This is especially notable as no other community had such a large disparity for the Black population, even though the communities are majority Black. The third

largest gap in Richton Park was in 18-49 year olds at 680 people needed to be vaccinated to meet the regional average.

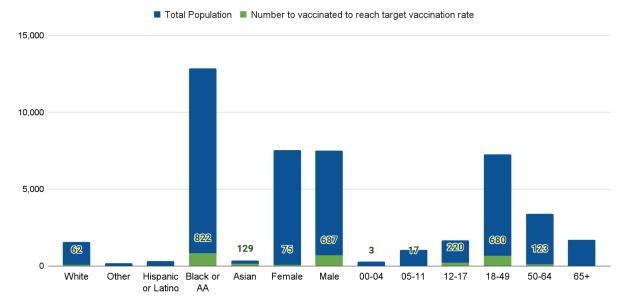
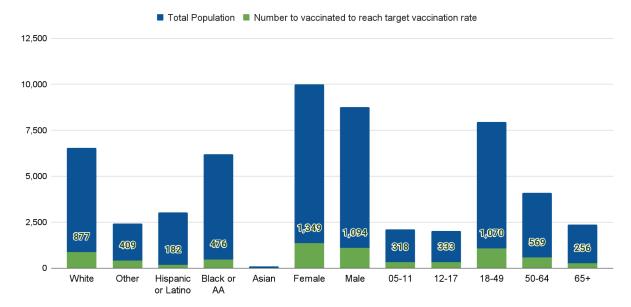


Figure 4c: Community-level Gap Analysis - Richton Park

In Steger, the populations with the largest vaccination gaps were the white and 18-49 year old populations (Figure 4d). This follows the overall trend seen in the Region 10 South.



### Figure 4d: Community-level Gap Analysis - Steger

# Discussion

# Region 10 West

The findings of the gaps analysis for Region 10 West indicate that the largest disparity in vaccination coverage in the Y's target communities are for the white and 65 and older populations. While there are other population disparities across the communities, strategizing around how to increase vaccination uptake for white and 65+ community members may be an opportunity to maximize impact in closing of vaccination gaps.

At the community-level, Elmwood Park may be an area to focus considering it was the only community with an overall fully vaccinated rate that was below the regional average. This does not indicate that the other communities should not engage in interventions, however. Each of the communities had specific populations that showed vaccination gaps.

Within the communities, there were some outliers that indicate a community-specific approach may be needed. In Elmwood Park, the 18-49 year old population also showed a high vaccination gap. In Des Plaines, Riverside, and Niles, the Asian populations indicated a high disparity in vaccination rate when compared to the regional average. It may be beneficial to initiate strategies in this community that target these additional populations as well.

Area	Target population	Geographic focus
Region 10 West	Whites and those 65+	Elmwood Park
Elmwood Park	18-49 year olds	
Des Plaines	Asians	
Riverside	Asians	
Niles	Asians	

# Region 10 South

The findings of the gaps analysis for Region 10 South indicate that the largest disparity in vaccination coverage in the Y's target communities are for the white, Male, and 18-49 year old populations. While there are other population disparities across the communities, strategizing around how to increase vaccination uptake for white, Male, and 18-49 year-old community members may be an opportunity to maximize impact in closing of vaccination gaps.

At the community-level, Matteson may be an area to focus efforts on as it showed the largest vaccination disparities. This does not indicate that the other communities should not engage in interventions, however. Each of the communities had specific populations that showed vaccination gaps.

Within the communities, there were some outliers that indicate a community-specific approach may be needed. In Richton Park, the Black/African American population had notably high gaps. It may be beneficial to initiate strategies in this community that target this additional population as well.

Area	Target population	Geographic focus
Region 10 South	Whites, Males and 18-49 year olds	Matteson
Richton Park	Blacks/African Americans	

# **APPENDIX C: SURVEY ANALYSIS**

Below is an analysis of survey results. This survey was distributed to Region 10 community members at community spaces and through email and social media networks. The survey asked community members about their thoughts, attitudes, and experiences with COVID-19 testing and vaccination.

# Sample Size and Representation

There were a total of 52 responses collected. The majority of respondents were between 18-44 years of age (65%) with 22% in the 18-24 age group. Females represented 67% of the sample. The race breakdown of the sample showed a heavy representation from Black/African American and Hispanic/Latino groups with 40% of respondents being Black or African American and 31% being Hispanic or Latino. Compared with the demographics of South and West target communities, Black and Hispanic individuals were overrepresented in our sample, with 28.7% and 15% of the population being Black and Hispanic respectively. Approximately half of all respondents completed some college and received a formal degree from a college or university. Just under 36% of respondents who had completed at least some college were non-Hispanic Black. About 28% were non-Hispanic white, and 31% were Hispanic or Latino.

The income distribution of survey respondents varied with income distribution in our target communities generally. In the South communities, individuals with household incomes of \$50,000 or less are overrepresented in our survey sample, accounting for over 80% of respondents, while only about 40% of the actual population falls within this income group. In the West communities, the income distribution of survey respondents was more aligned with population levels. However, the \$50,000 to \$74,999 was overrepresented, accounting for double its proportion in the survey as compared to the community-level data. Additionally, the less than \$25,000 income level was underrepresented for West region respondents as compared to the general population.

Ninety six percent of survey respondents responded to the survey in English while 4% responded in Spanish. Individuals who speak English appear to be over-represented in our sample given that approximately 79.5% of community members in our target zip codes speak English while 11.6% of community members in target zip codes speak Spanish<sup>3</sup>.

<sup>&</sup>lt;sup>3</sup> Calculated using CMAP data combined with census tract population data

Forty-six percent of survey respondents identified as democrats, 2% identified as republicans and 31% were independent or had no preference. Forty-eight percent of survey respondents identified as liberal, 11.5% identified as conservative, 15.4% did not identify as either, and 25% preferred not to share.

### Survey Response Counts

So	uth	
Area	Response Count	Area
Richton Park	6	Des Plaines
Matteson	13	Riverside
Park Forest	3	Elmwood park
Steger	5	Niles
Total	27	Total

West		
Area	Response Count	
Des Plaines	9	
Riverside	7	
Elmwood park	6	
Niles	3	
Total	25	

# **Vaccination Status by Political Affiliation**

Political affiliation was varied across vaccination status. In the South communities, there were roughly equal numbers of conservative and liberal respondents who were fully vaccinated and boosted and just fully vaccinated (Figure 1a). The one partially vaccinated respondent reported somewhat liberal. The majority of unvaccinated respondents were liberal leaning (55%, n=5). Across each of the vaccination statuses, there were several respondents (9 total) who preferred not to share their political leanings.

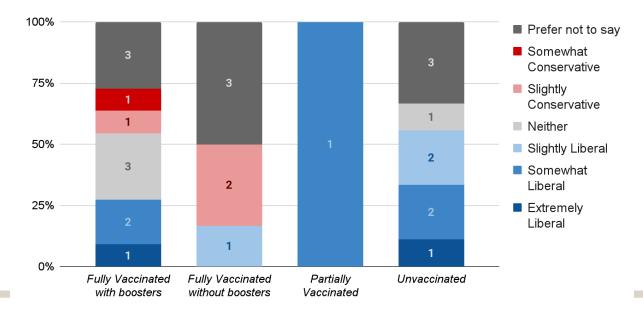


Figure 1a: Region 10 South Vax Status by Political Affiliation

In the West communities, most respondents who were fully vaccinated and boosted (86%, n=12) reported liberal leanings (Figure 1b). Of fully vaccinated but not boosted respondents, two indicated conservative affiliation and 3 reported liberal views. The unvaccinated respondent preferred not to say their political affiliation. Across vaccination statuses, 16% reported that they prefer not to say, and another 16% reported that they were neither liberal or conservative.

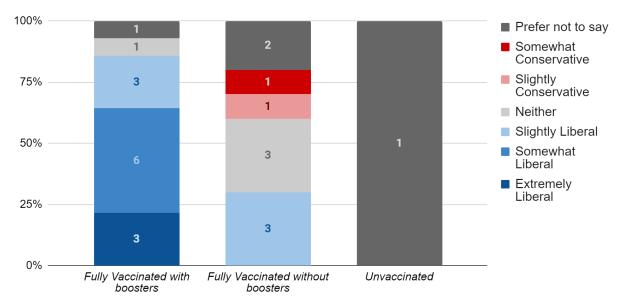


Figure 1b: Region 10 West Vax Status by Political Affiliation

# **Vaccination Status by Socioeconomic Status**

Income level across vaccination status varied. In the South communities, 82% of fully vaccinated and boosted respondents reported a household income of less than 50,000 (Figure 2a). Moreover, all but one unvaccinated respondent reported an income of less than 50,000 (n=8, 89%). While the small sample of unvaccinated community members is a limitation to this analysis, the finding is aligned with a national pattern that unvaccinated individuals are more likely to report lower household income.<sup>4</sup>

<sup>&</sup>lt;sup>4</sup> The Kaiser Family Foundation COVID-19 Vaccine Monitor Poll was a nationally representative sampling poll conducted by KFF in July 2022. More information can be found by viewing the methodology here: <a href="https://www.kff.org/report-section/kff-covid-19-vaccine-monitor-july-2022-methodology/">www.kff.org/report-section/kff-covid-19-vaccine-monitor-july-2022-methodology/</a>

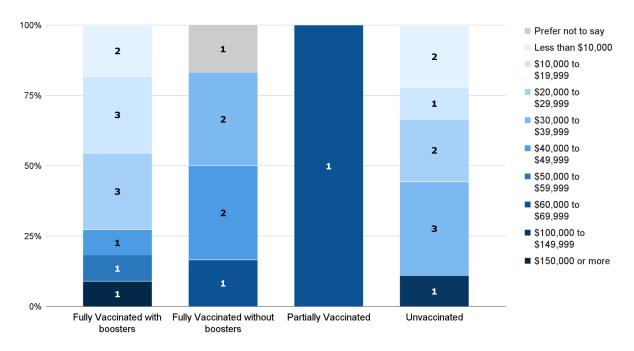


Figure 2a: Region 10 South Vaccination Status by Income

In the West communities, 71.4% of respondents who were fully vaccinated and boosted reported an annual household income of 60,000 or more (n=7, Figure 2b). Meanwhile, only 40% of respondents who were fully vaccinated but not boosted reported the same (n=4). The one unvaccinated respondent for Region 10 West preferred not to report their annual household income.

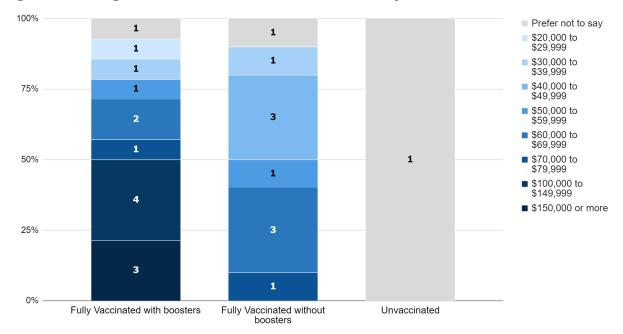


Figure 2b: Region 10 West Vaccination Status by Income

Across both the South and West communities, respondent's highest level of educational attainment varied across groups of different vaccination status (Figure 3a & Figure 3b). In the South, 36.3% of fully vaccinated (boosted and non-boosted) respondents reported having a Bachelor's degree or higher, while only 11% of unvaccinated respondents reported the same level of educational attainment.

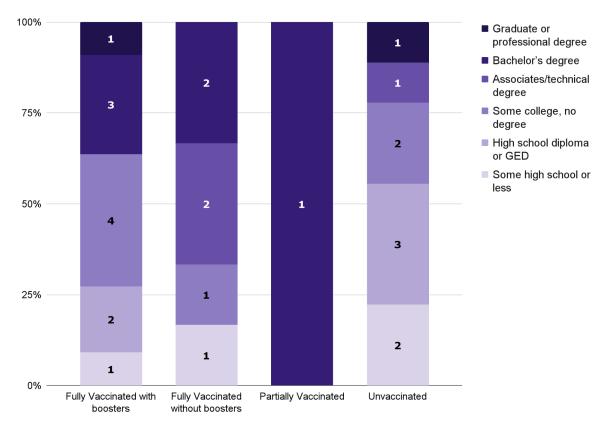


Figure 3a: Region 10 South Vaccination Status by Educational Attainment

In the West communities, all fully vaccinated and boosted respondents reported an educational attainment of at least some college, while the one unvaccinated respondent reported having a highschool diploma or GED equivalent. Similarly to income levels, the pattern found in this limited sample size has been replicated at a national scale.<sup>5</sup>

<sup>&</sup>lt;sup>5</sup> The Kaiser Family Foundation COVID-19 Vaccine Monitor Poll was a nationally representative sampling poll conducted by KFF in July 2022. More information can be found by viewing the methodology here: <a href="https://www.kff.org/report-section/kff-covid-19-vaccine-monitor-july-2022-methodology/">www.kff.org/report-section/kff-covid-19-vaccine-monitor-july-2022-methodology/</a>

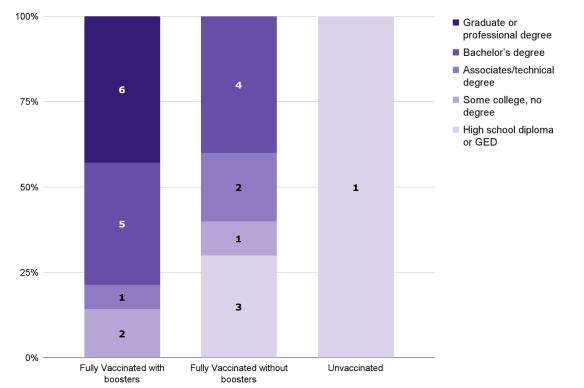


Figure 3b: Region 10 West Vaccination Status by Educational Attainment

# COVID-19 Positivity by Race/Ethnicity, Age, & Gender

Survey respondents were asked whether they have ever had COVID-19 and where they believe they got it from. Overall, 40% of survey respondents reported having had COVID-19, which is aligned with reporting from the CDC that roughly 42% of Americans have had the virus.<sup>6</sup> Forty-eight percent reported never having had COVID-19 and 12% reported that they were not sure. Individuals who were not sure whether they had had COVID-19 may have made the decision not to test or may not have had access to testing.

When asked about transmission source, approximately one-third of respondents who reported ever having COVID-19 shared that they were unsure where they got it from. This held true for both the West communities (n = 5, 35.7%) and the South communities (n = 4, 33.3%). No other source of transmission emerged with an equal or higher proportion of response. Due to the lack of reported knowledge of

<sup>&</sup>lt;sup>6</sup> Akinbami LJ, Kruszon-Moran D, Wang C, et al. SARS-CoV-2 Serology and Self-Reported Infection Among Adults – National Health and Nutrition Examination Survey, United States, August 2021–May 2022. MMWR Morb Mortal Wkly Rep 2022;71:1522–1525. DOI: http://dx.doi.org/10.15585/mmwr.mm7148a4

COVID-19 transmission source across all respondents, further breakdown by race/ethnicity, gender, and/or age did not yield additional findings.

In the South neighborhoods, most Black/African American and Hispanic respondents reported never having COVID-19, whereas most of those who identified as white or Multiple Races reported having had the virus (Figure 3a).

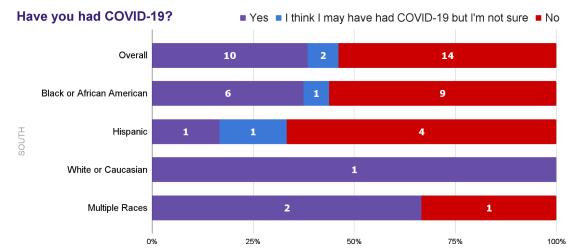
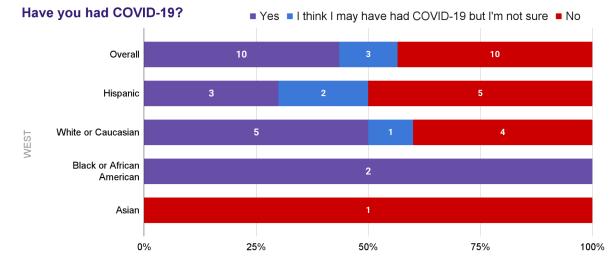


Figure 4a: Region 10 South COVID-19 Positivity by Race/Ethnicity

In the West neighborhoods, there were an equal proportion of Hispanic and white respondents who reported having (or thinking they had) COVID-19 and not having it (Figure 3b). All Black respondents (n=2) reported having COVID-19, and the one Asian respondent reported not having COVID-19.



## Figure 4b: Region 10 West COVID-19 Positivity by Race/Ethnicity

Self-reported COVID-19 case rate was stratified by age group as well. In the South neighborhoods, about half of all age groups reported having (or thinking they had) COVID-19, and half reported not ever having the virus (Figure 4a).

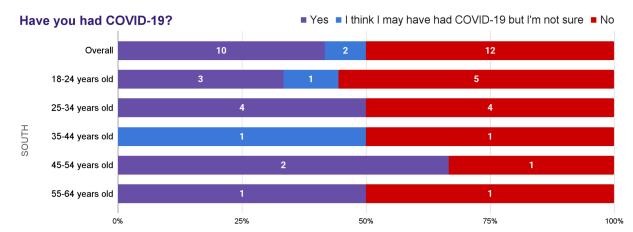
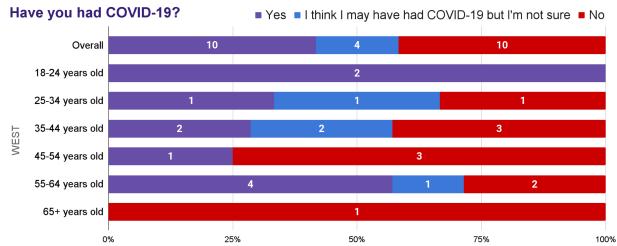


Figure 5a: Region 10 South COVID-19 Positivity by Age

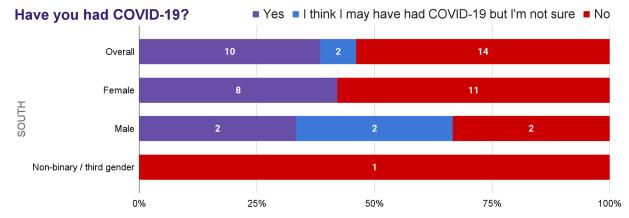
In the West neighborhoods, there was more variation between age groups and experience with COVID-19. Most 18-44 year olds and 54-64 year olds reported having (or thinking they had) COVID-19, while more 45-54 year old and 65 and older respondents reported never having COVID-19 (Figure 4b).



## Figure 5b: Region 10 West COVID-19 Positivity by Age

Reported experience having COVID-19 was slightly varied by gender identity and subregion. In the South neighborhoods, more female-identifying respondents reported never having COVID, while more male-identifying respondents reported having (or thinking they had) COVID-19 (Figure 5a). Only one non-binary/third

gender-identifying respondent completed the survey and reported not ever having COVID-19.



### Figure 6a: Region 10 South COVID-19 Positivity by Gender

In the West neighborhoods, the opposite was found. A majority of female-identifying respondents reported having (or thinking they had) COVID-19, while most male-identfying respondents reported never having COVID-19 (Figure 5b).

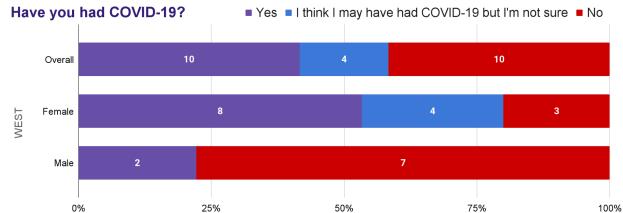
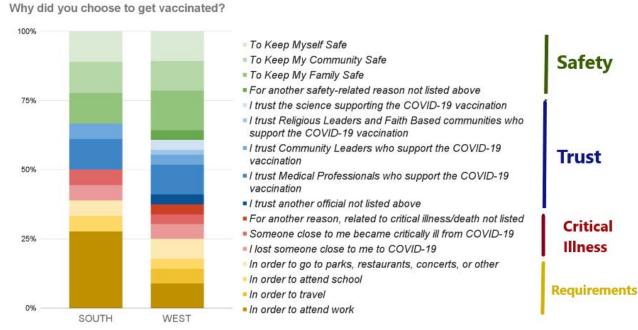


Figure 6b: Region 10 West COVID-19 Positivity by Gender

# **Reason for COVID-19 Vaccination**

Vaccinated survey respondents were asked why they chose to get vaccinated, with response types categorized into the following groupings: Safety, Trust, Critical Illness, and Requirements. Respondents were asked to select all that applied. The responses by subregion are similar, with both groups reporting a high level of responses related to safety (Figure 6). The West neighborhoods reported higher

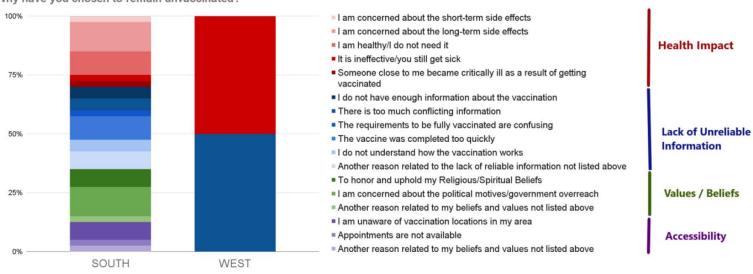
levels of trust as a factor in deciding to be vaccinated than the South neighborhoods. On the other hand, respondents from the South neighborhoods reported requirements as a reason for vaccination at a rate higher than the West.



### Figure 7: Reasons for COVID-19 vaccination

Unvaccinated respondents were also asked to share why they have chosen to remain unvaccinated. Responses were grouped into the following categories: Health Impact, Lack of Reliable Information, Values / Beliefs, and Accessibility. A major limitation of this analysis is that there was only one unvaccinated respondent in the West neighborhoods, compared to 9 in the South. For respondents in the South neighborhoods, lack of reliable information and health were the major drivers behind not being vaccinated (Figure 8). While there was some report of accessibility issues, these accounted for a smaller proportion of responses.

# Figure 8: Reasons remaining unvaccinated for COVID-19



Why have you chosen to remain unvaccinated?

# **Survey Analysis Takeaways**

Though the survey sample size was limited, several key patterns emerged that align with national trends. These trends warrant further research and attempts to understand variation in COVID-19 vaccination, testing, and prevalence across community members.

Based on the survey findings, the Y should focus on interventions that intentionally target the following populations:

- Individuals with lower incomes and/or lower levels of education. Both indicators of SES were related to vaccination status and correspond to national findings that lower educational attainment and income status are associated with vaccination hesitancy.
- **Both ends of the political spectrum.** Despite the politicization of COVID-19, vaccination status and political affiliation did not appear to be related in this survey. Interventions that target the values of both political viewpoints may increase vaccination uptake across the target communities.
- Community members who don't believe they have ever contracted COVID-19. While forty percent of respondents indicated that they have had

a COVID-19 infection (aligning with national rates), several populations within the target communities had low reporting of COVID-19 prevalence. In the South communities, the Hispanic/Latino population, and in the West region, the male and 45-54 year old population all reported lower than average prevalence of COVID-19. Interventions targeting these populations may help increase COVID-19 safety through increased testing and reduced transmission of the virus.

• Develop educational outreach that focuses on the long-term effects of COVID-19 versus the long-term impacts of the vaccine. Include stories from individuals who were otherwise healthy but developed long-COVID.