



# RESIDENTS IN KING COUNTY **SURVEY** REPORT

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# EXECUTIVE SUMMARY

King County Housing Authority is a public organization in King County, Washington that provides services for its local community to assist housing and support sustainable growth. KCHA plans to launch a workforce development program for their residents in order to improve their well-being. In King County, both the population and the employee number are gradually growing, and KCHA aims to help their residents find their desired and sustainable jobs. To learn about the situation of the residents, KCHA and Applied Inference conducted a survey and have received answers from 130 people. After discussing the survey results with visualization of the answers on a dashboard, the following report recommends how to design the program based on the findings.

First, nearly half of the participants stated that childcare is the top priority and prevents them from taking vocational trainings. Therefore, KCHA might need to provide childcare services along with the training itself. Secondly, residents pay a lot of attention to their current health condition, and some of them hesitate to attend the training because of the health concerns. Thus, there should be multiple types of

programs that fit different health levels. Thirdly, over half of the interviewees have more than five years of work experience, while less than half have completed college degrees. The resulting visualizations demonstrate that KCHA needs to consider providing more specific job training or support for higher education, instead of entry-level job training. Finally, since more than one-third of the residents are originally from foreign countries in Europe and Africa, and are concerned about language skills, the program should include English courses as supplementary education.

This report recommends KCHA to take some of the strategies introduced here, in order to provide a comprehensive and sustainable workforce development program that makes a positive impact on the residents.

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**RESIDENTS'  
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**WHY NOT  
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# INTRODUCTION



## About King County Housing Authority

King County Housing Authority (KCHA) is a state organization in King County, Washington founded in 1939, that aims to support the revitalization of local communities. Especially, KCHA provides services for its local community to assist housing and support sustainable growth. More than 55,00 people has received rental housing and assistance service from KCHA. Its main targets are low-income households, the elderly, and people with disabilities in 33 cities in King County. In addition, KCHA provides their community centers and educational programs with a goal to help children receive educational opportunities.

## Background

As part of their projects, KCHA plans to launch a workforce development program for their residents in order to improve their work situation. KCHA and Applied Inference have worked together for this project, conducting seven focus groups with residents in King County. As part of the studies, participants were verbally interviewed and also asked to complete a paper survey so that KCHA could learn their background, family, and living situation. Around 130 residents filled out the survey. This report discusses the survey results, and is intended to help KCHA understand the residents' situation more clearly in order to design the job training program that best meets their true needs.

KCHA: <https://www.kcha.org>

Applied Inference: <https://appliedinference.com>



# INFORMATION NEEDS

This report helps KCHA make a well-informed decision to design a workforce development program. The main focus is “residents”, but not “job market trends”. Especially, a dashboard shown below visualizes three main points; 1. Needs of residents, 2. Potential obstacles, and 3. Residents’ background. The visualization is intended to help readers understand the information clearly. Based on the results, this report recommends some actionable strategies. However, in order to provide sustainable training, KCHA also should understand the job market situation of King County. Since this report does not dig deep into the situation, it is recommended to investigate it through other methods.



## Needs of Residents

It is crucial for KCHA to know what the residents truly need. Even if the program creates a significant positive effect on job searching, nobody would take it, when residents do not feel they definitely need it.



## Potential Obstacles

Even when the residents know this program would improve their well-being, some obstacles potentially hinder them from participating in the training. Therefore, KCHA might need to take measures about these potential problems.



## Residents' Background

KCHA needs to understand the residents’ background, such as education and work experience in order to provide programs that fit into their level. This section also covers the residents’ home countries to see the demographics.



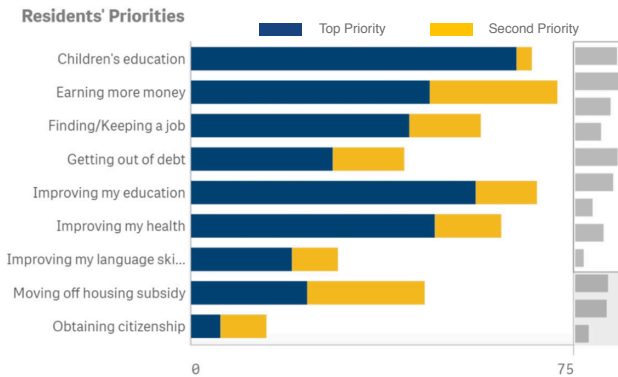
# DASHBOARD DESIGN

This dashboard consists of four parts with seven graphs. A graph of “Residents’ Priority” demonstrates Needs of Residents. “Why do you not participate in any vocational training now?” shows Potential Obstacles. Three graphs on the bottom left all together explain Residents’ Background. Finally, “Population & Number of Employments in King County” shows the job market trends.

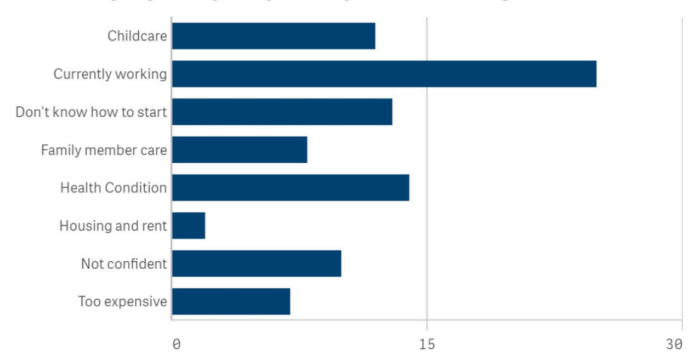
## 1. Needs of Residents

## 2. Potential Obstacles

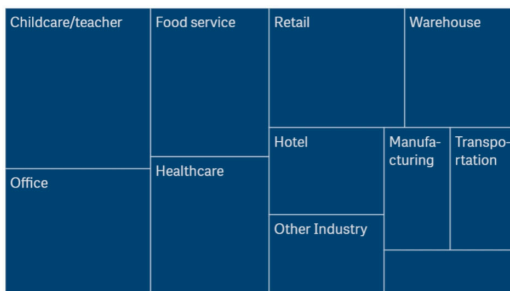
Residents' Priorities



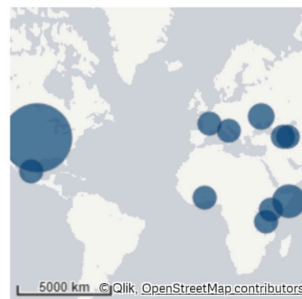
Why do you not participate in any vocational training now?



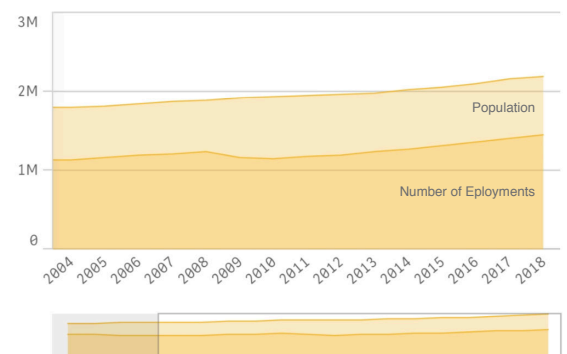
Industry of their work experience



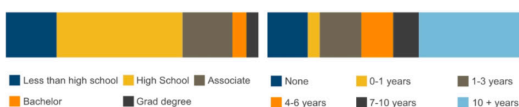
Where are residents from?



Population & Number of Employments in King County



Education Completed



Years of Work Experience



## Survey Results

## 3. Residents' Background

## 4. Job Market



# DASHBOARD DETAILS

This dashboard has four main sections: Needs of Residents, Potential Obstacles, Residents' Background, and Job Market. And readers will see these most likely in this order so that they can efficiently understand the data. Therefore, the layout meets the three major information needs, and also provides the job market trends.

## 1. Needs of Residents

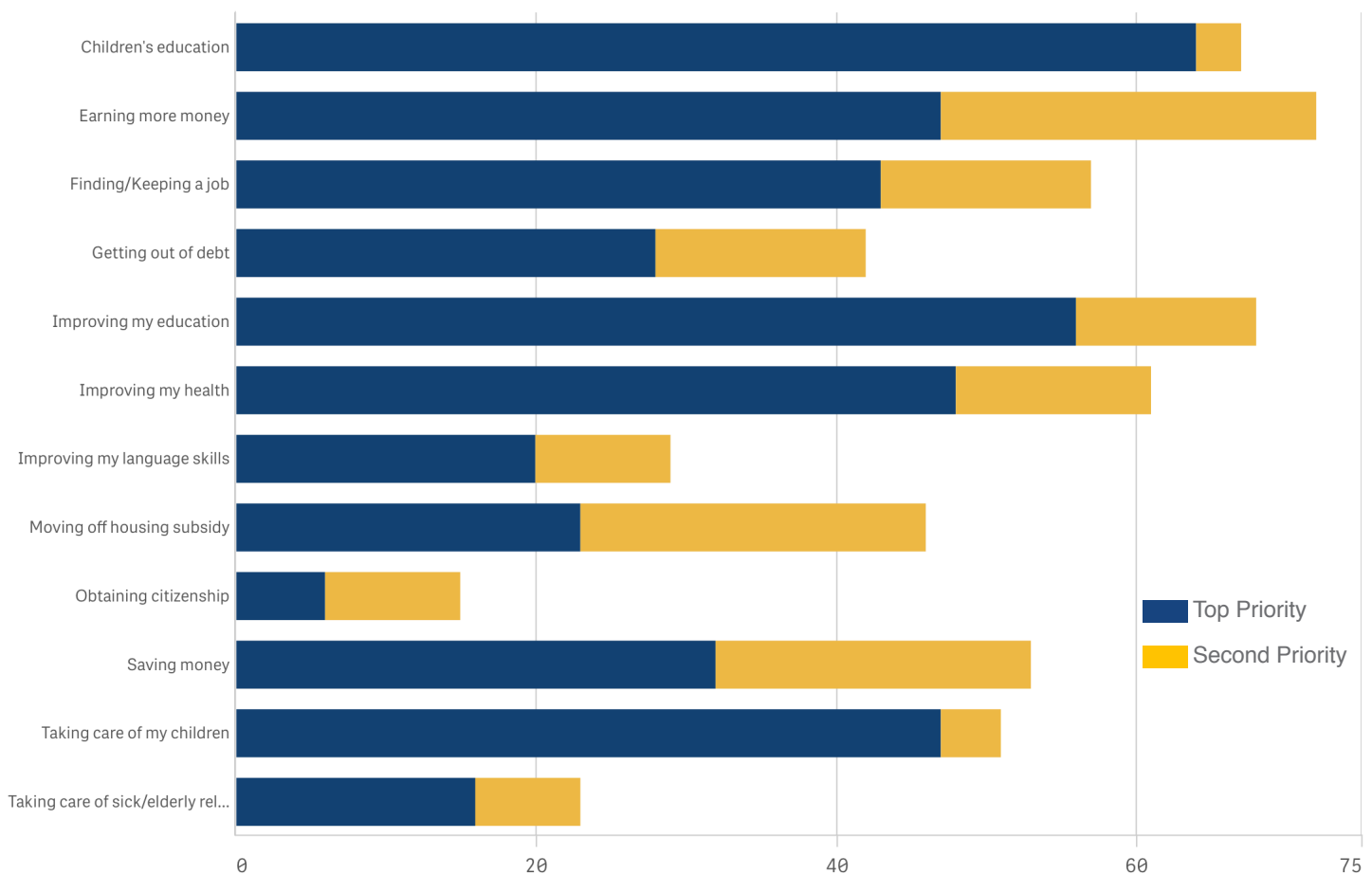


Figure I. Residents' Priority

This stacked bar chart indicates the residents' priority in their life, corresponding to **“the needs of residents”**. Each bar of the chart tells the number of answers for “Top Priority” and “Second Priority” on each category, such

as “Children’s education” and “Earning more money”. With the stacked bar chart design, readers can immediately see how many people in total prioritize the category.



## 2. Potential Obstacles

This bar chart tells reasons why the residents do not currently participate in any job training program, corresponding to “**Potential Obstacles**”. Each bar indicates how many people chose the reason, and therefore readers can see which concerns KCHA should invest more resource to solve. To design effective job training, KCHA needs to consider how to remove these concerns.

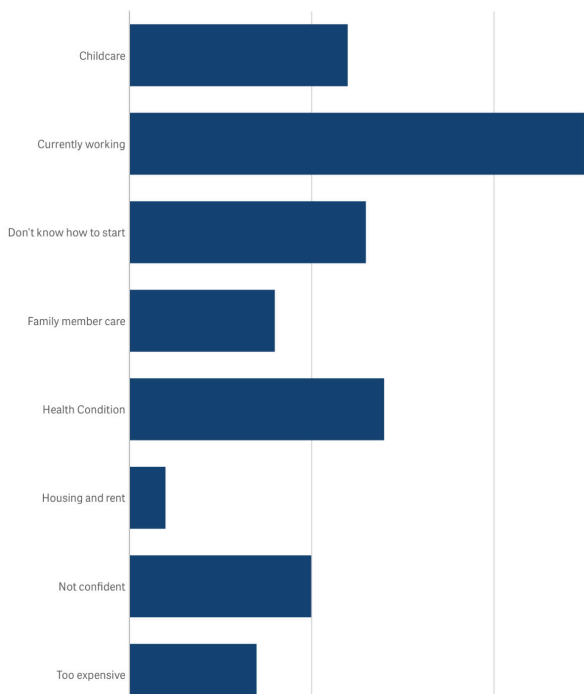


Figure II. Why not participate in training?

## 3. Residents' Background

This tree map tells which industries the residents have experience in, corresponding to “**Residents' Background**”. For example, readers can easily see “Childcare/Teacher” is relatively popular. The size of each area indicates the number of answers on the industry. This map helps KCHA design contents of the program that fit into their industry knowledge.

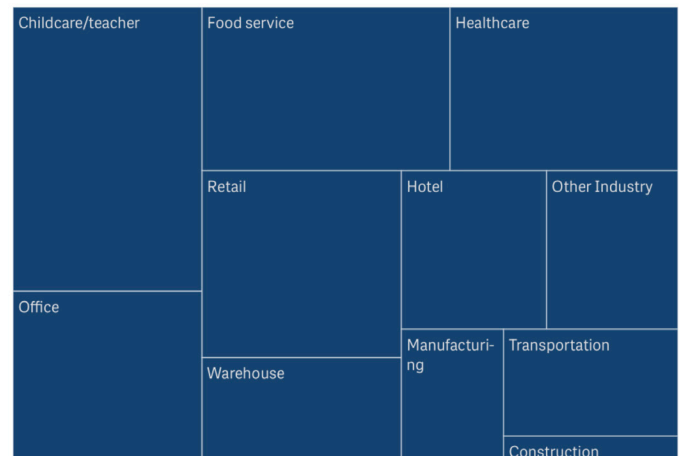


Figure III. Industry of work experience

### Excluded Data...



- Gender and age information: because KCHA already has a clear image of target genders and ages.
- Residents' current information resources: because this dashboard is not intended to help promote this program.
- Why they do not currently have a job: because this question is overlapped with “why not to participate in training?”.

### 3. Residents' Background (2)



■ Less than high school ■ High School ■ Associate  
■ Bachelor ■ Grad degree

Figure IV. Education Completed

This single stacked bar chart informs the residents' educational level, corresponding to "Residents' Background". Each area indicates how many interviewees have completed each of the education level. From this chart, KCHA can design a training program that best fits their education level.



■ None ■ 0-1 years ■ 1-3 years  
■ 4-6 years ■ 7-10 years ■ 10+ years

Figure V. Years of Work Experience

This single stacked bar chart tells years of the residents' work experience, corresponding to "Residents' Background". By combining this chart with the tree map of industries, KCHA can determine what contents should be included to promote the residents' career.

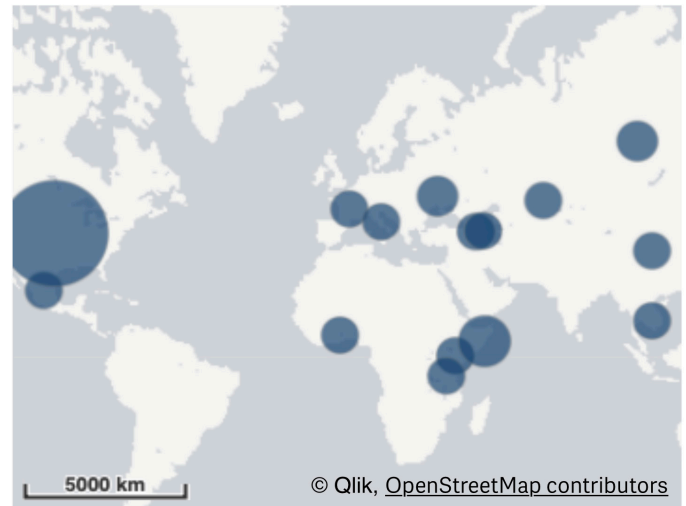


Figure VI. Home Countries

This map indicates which countries the residents are originally from. The size of each circle tells how many people are from the country. The purpose of this map is to inform readers of the general sense of where the residents came from in order to learn their cultural background.

By combining these four charts (figure III~VI), readers can know the comprehensive background of residents, including where they came from, and what they have done both in the academic and professional experience. This information would help KCHA design most suitable programs that majority of them can benefit from.

## 4. Job Market

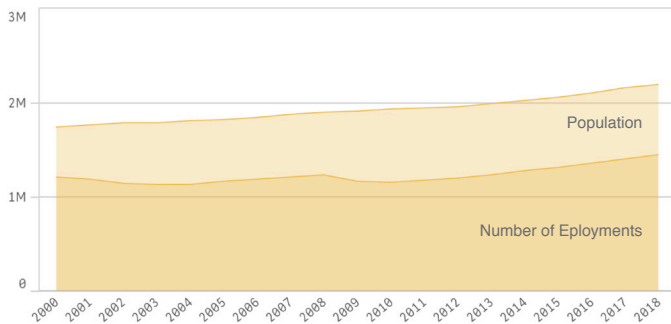


Figure VII. Population & Employments

Although this report does not elaborate, KCHA also needs to understand the job market trends in King County. This line chart indicates the population growth and changes of number of employments. By having these two factors in the same chart, readers can compare their trends easily.



### Qlik Sense Cloud

I used Qlik Sense Cloud to design all the charts. The dashboard is interactive on Qlik, and so if you would like to see more details, please feel free to contact me.

## Survey Dataset



KCHA and Applied Inference conducted a survey with 130 people in seven focus groups along with in-person interviews. All the graphs in the dashboard were created based on this survey data. Since the survey questions are very comprehensive and completing them takes more than 20 minutes, the dashboard could not include all the data. However, this report has tried to extract important key points and convey main messages in a concise manner. In addition, this report focuses only on the survey results, but qualitative data from the interviews would also be able to provide rich insights, and therefore, readers might want to check the interview results to have comprehensive understanding. Then, when KCHA actually designs the details of workforce development program, they might need to dig deeper into more specific topics through more interviews, observations, and surveys.

# RECOMMENDATIONS

Based on the resulting visualization, this section introduces several findings and makes five actionable recommendations.



## Concerns about Childcare

Nearly half of the participants stated that childcare is the top priority and prevents them from taking vocational trainings. Therefore, KCHA should consider providing childcare services along with the training itself.



## Specific Job Training & Support for Higher Education

Over half of the interviewees have more than five years of work experience, while less than half have completed college degrees. The residents' background demonstrates that KCHA needs to consider providing more specific job training or support for higher education, instead of entry-level job training.



## More Investigation on Job Market

In addition to what satisfies the residents, KCHA needs to know what skills and knowledge are in demand in the job market in order to provide meaningful programs.



## Concerns about Health Condition

Residents pay a lot of attention to their current health condition, and some of them hesitate to attend the training because of the health concerns. (Figure I & II) Thus, there should be multiple types of programs that fit different health levels.



## English Language Education

Since more than one-third of the residents are originally from foreign countries in Europe and Africa, and are concerned about language skills, the program should include English courses as supplementary education.