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20 March 2022

Abstract

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0.1 Table of Contents

1 Introduction

You can and should cross-reference sections and sub-sections. For instance, Section 0.1.2. R Markdown automatically makes the sections lower case and adds a dash to spaces to generate labels, for instance, Section **??**.

*Code and data are available at: LINK.

2 Data

We started our analysis by using R (R Core Team 2020), dplyr(Wickham et al. 2021), tidyverse(Wickham et al. 2019), here(Müller 2020). Graphs are generated using and ggplot2(Wickham 2016) and kableExtra(Zhu 2021).

2.1 Data Source

We retrieved our data from CHASS (Canada 2014). The GSS program, established in 1985, conducts surveys annually across the 10 provinces. The GSS is recognized for its regular collection of cross-sectional data that allows for trend analysis, and its capacity to test and develop new concepts that address current and emerging issues. The two primary objectives of the General Social Survey are: a) to gather data on social trends in order to monitor changes in the living conditions and well-being of Canadians over time; and b) to provide immediate information on specific social policy issues of current or emerging interest. To meet these objectives, the data collected by the GSS are made up of two components: classification and core content. Classification content (such as age, sex, education, income) helps to delineate population groups for use in the analysis of core data. Core content is designed to measure changes in society related to living conditions and well-being and to supply data to inform specific policy issues.

Data for 2014 General Social Survey (GSS) on Canadians' Safety and Security (Victimization) was collected from January to December, 2014. The target population for the Cycle 28 GSS included all persons 15 years of age and older in Canada, excluding: 1. Residents of the Yukon, Northwest Territories, and Nunavut; 2. Full-time residents of institutions.

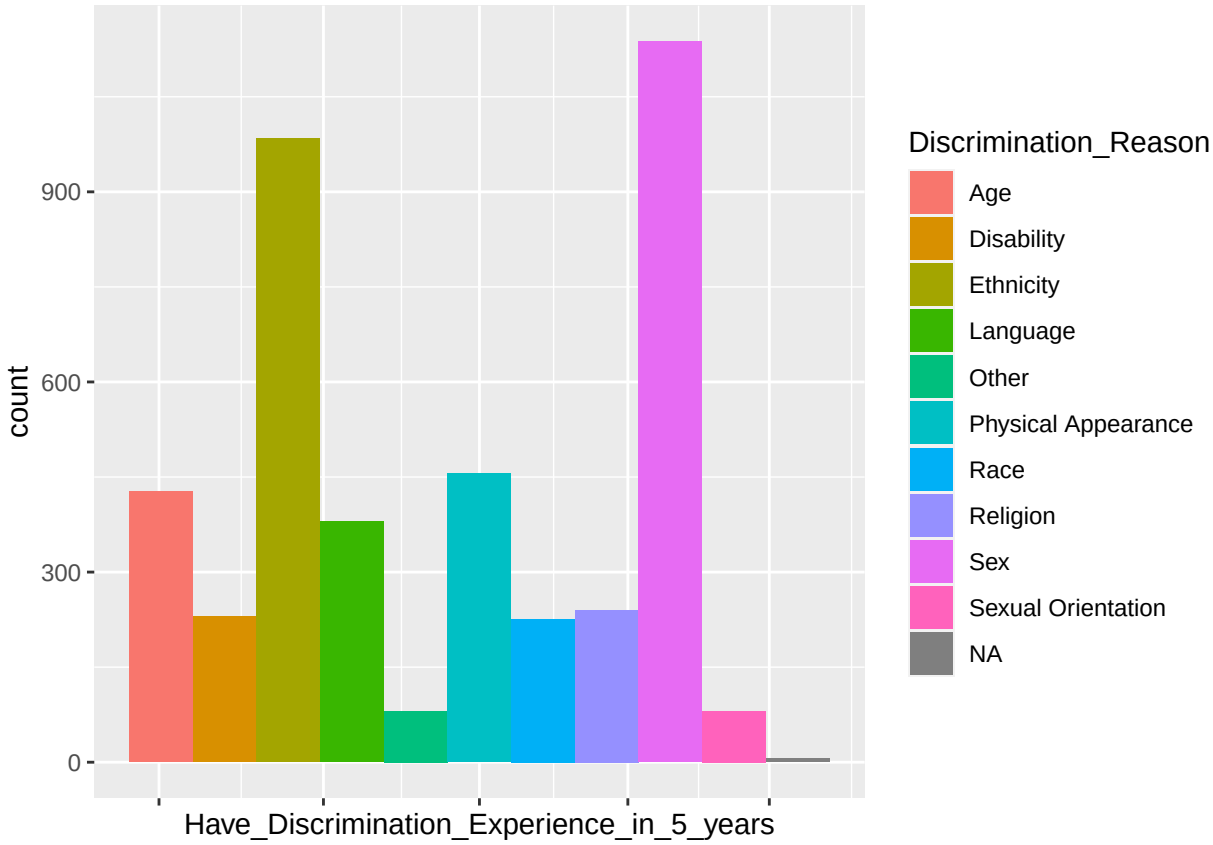
2.2 Methodology and Data Collection

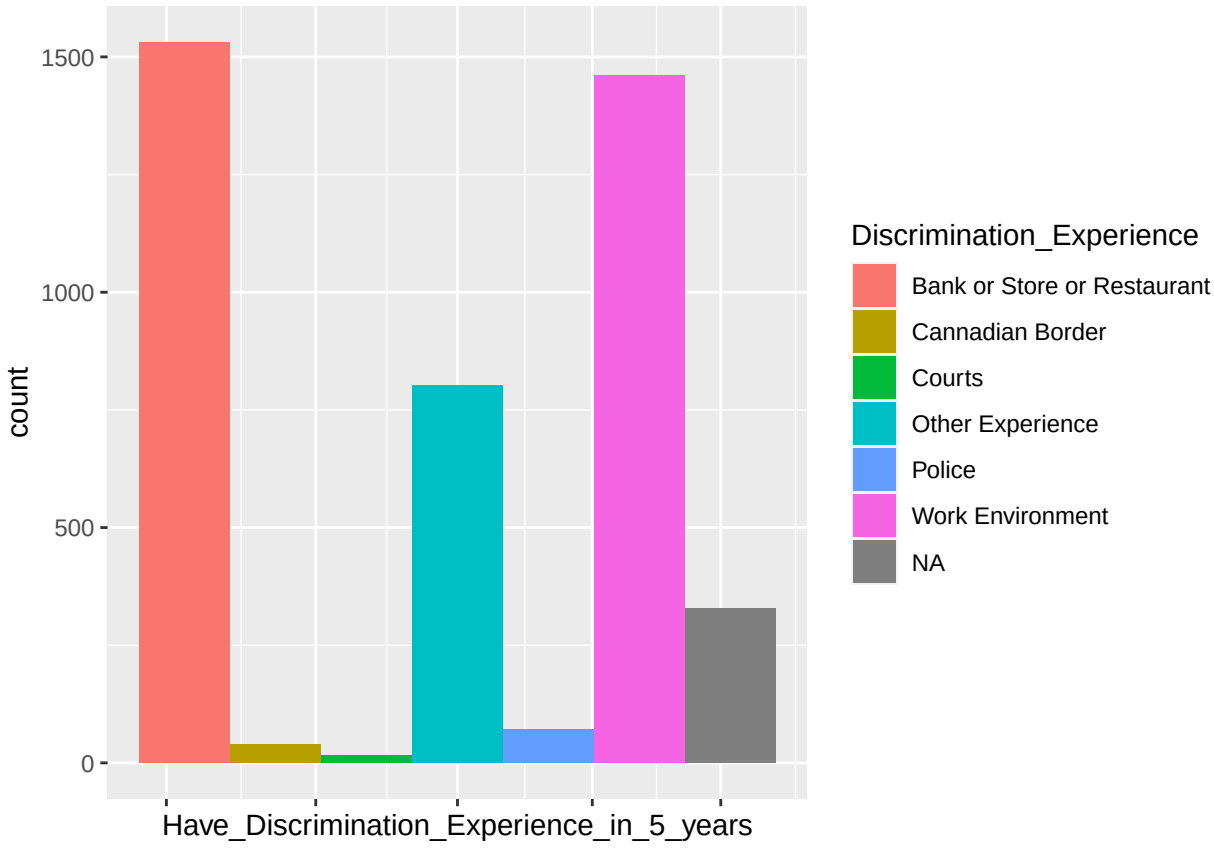
The survey frame was created using two different components: • Lists of telephone numbers in use (both land line and cellular) available to Statistics Canada from various sources (Telephone companies, Census of population, etc.); • The Address Register (AR): List of all dwellings within the ten provinces. In each frame, each record was assigned to a stratum within its province. A simple random sample without replacement of records was next selected in each stratum. Only specific geographies were targeted for the over sample of immigrants and youth. Coverage of the 2014 GSS on Canadians' Safety and Security (Victimization) targeted population by the survey frame is estimated to be more than 86% complete. All respondents in the ten provinces were interviewed by telephone. Households without telephones were therefore excluded. During collection, for the households not meeting the eligibility criteria, the interviews were terminated after an initial set of questions that established whether or not they met the criteria. For the over sample cases, an extra question was asked to determine if each person in the household was born in Canada or not. The target sample size (i.e. the number of respondents) for Cycle 28 on Canadians' Safety and Security (Victimization) was 39,674, while the actual number of respondents was 33,127. Some GSS respondents were removed from the PUMF for confidentiality reasons. GSS Cycle 28 PUMF contains questionnaire responses and associated information from 33,089 respondents. For each province, minimum sample sizes were determined that would ensure certain estimates would have acceptable sampling variability at the stratum level. Once these stratum sample size targets had been met, the remaining sample was allocated to the strata in a way that balanced the need for precision of both national-level and stratum-level estimates.

2.3 Data Overview

Among all the available data in the Canadian General Social Survey(Victimization), we decide to choose the following subset: *CIP: Confidence In Police*, *DEM: Demographic Derived Variables*, *PCC: Perceptions: Criminal Courts*, *PLP: Perceptions: Local Police*, *TIP: Trust In People*. We will first find the number of each gender in the survey, if the number of respondents from each gender groups are uneven, then the result might be biased toward a gender group. After analyzing the survey data set, the following gender distribution is found, as shown in Figure 1. From the figure, we can see that the gender distribution are about the same, so we can proceed to further investigation.

#Results ## Classification of Discrimination





2.4 Impact of Gender on People's Confidence in Law Enforcement

After noting that the majority of discriminating cases are gender discrimination. We are wondering if this will also be reflected in people's confidence in Law Enforcement. To be a specific, if a certain gender group are more vulnerable to discrimination, will that group also be treated unfairly during law enforcement? To investigate this, we extracted some other survey results from Canadian General Social Survey.

2.5 Confidence In Police

Now we will investigate people's confidence in police in different gender groups. People's response are categorized into 8 groups: *1 A great deal of confidence*, *2 Some confidence*, *3 Not very much confidence*, *4 No confidence at all*, *6 Valid skip*, *7 Don't know*, *8 Refusal*, *9 Not stated*. The following bar graph shows the distribution of the responses, categorized by gender groups, as shown in Figure 2. From the graph, we can see that the majority of respondents are confident in local police. To be specific, 92.8% of female show some or great confidence in local police, whereas 90% of male show some or great confidence in local police.

Next, we will take a closer look at the responses of two other questions, they are *Perception (local police) - Being approachable and easy to talk to* and *Perception (local police) - Treating people fairly*. Those questions, especially the second one, will allow us to have more certainty in determining whether people in different gender groups are treated unfairly in Law Enforcement. Both of the questions have 7 valid choices, they are *1 Good job*, *2 Average job*, *3 Poor job*, *6 Valid skip*, *7 Don't know*, *8 Refusal*, *9 Not stated*. For simplicity, we will only consider the first 3. The distribution of the responses is shown in Figure 3 and Figure 4. From the figures, around 81% of male respondents think that police are approachable and around 80% of female respondents hold the same opinion. On top of that, around 77% of female respondents think that police treat people fairly and around 79% of male respondents hold the same opinion. In Conclusion, based on the results of the survey, majority of the respondents from all participating gender groups have confidence in police and agree that police is approachable and treat people fairly.

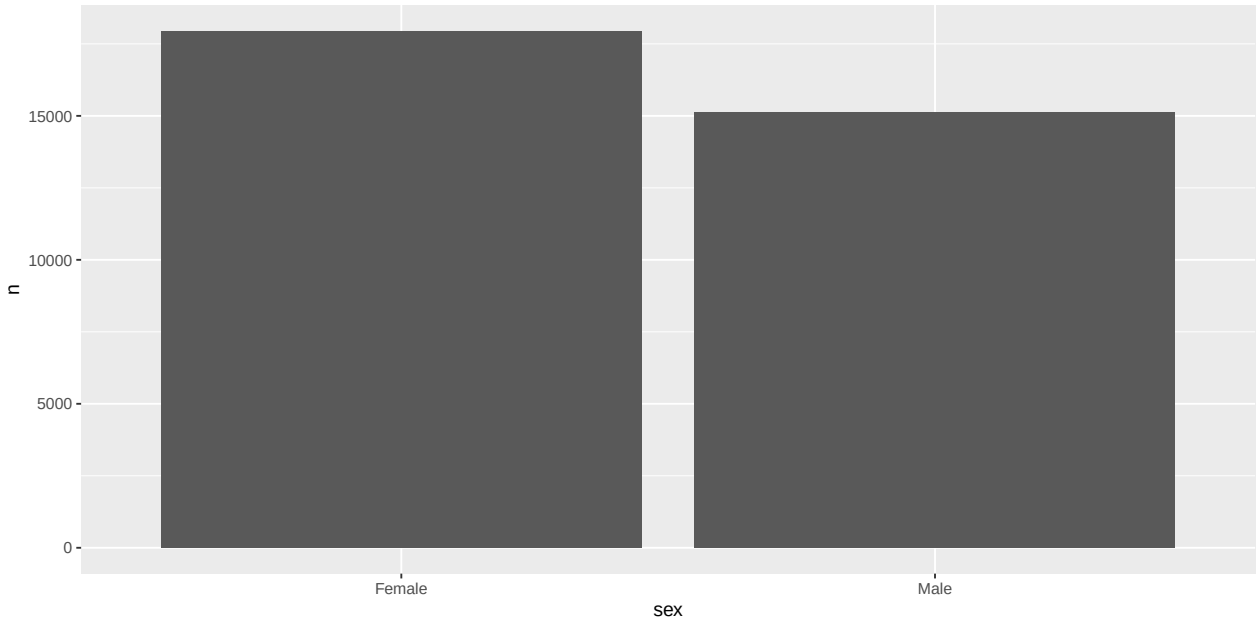


Figure 1: Gender Distribution

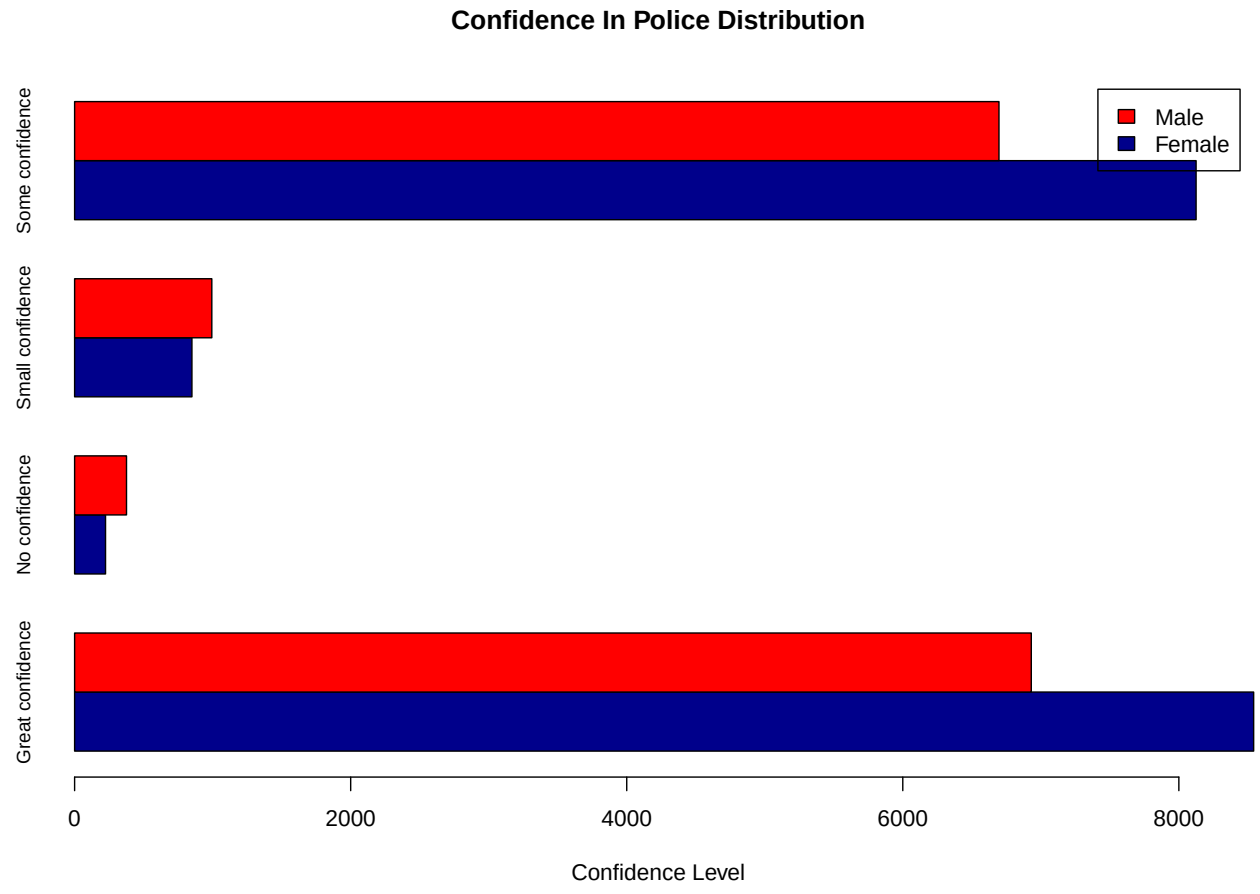


Figure 2: Confidence in Police Distribution

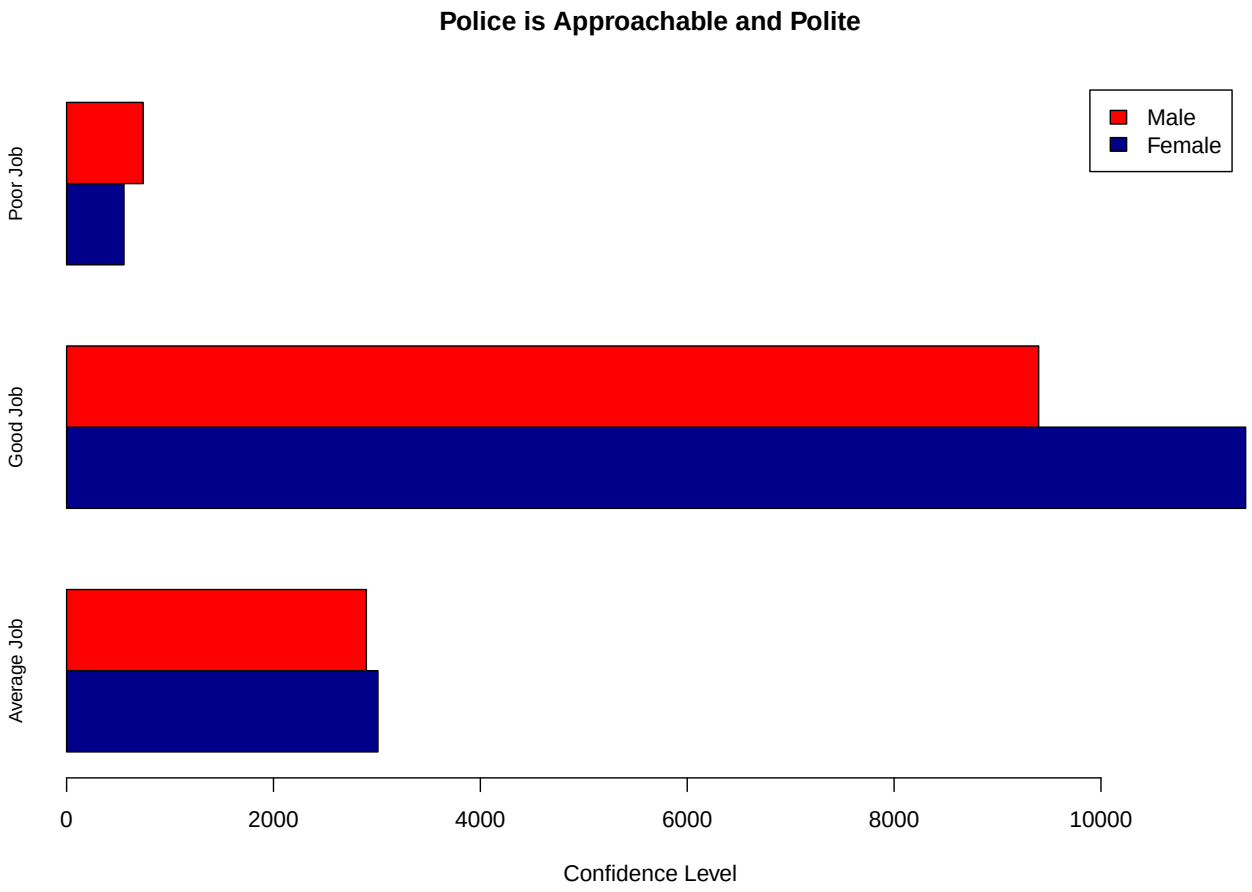


Figure 3: Police is approachable

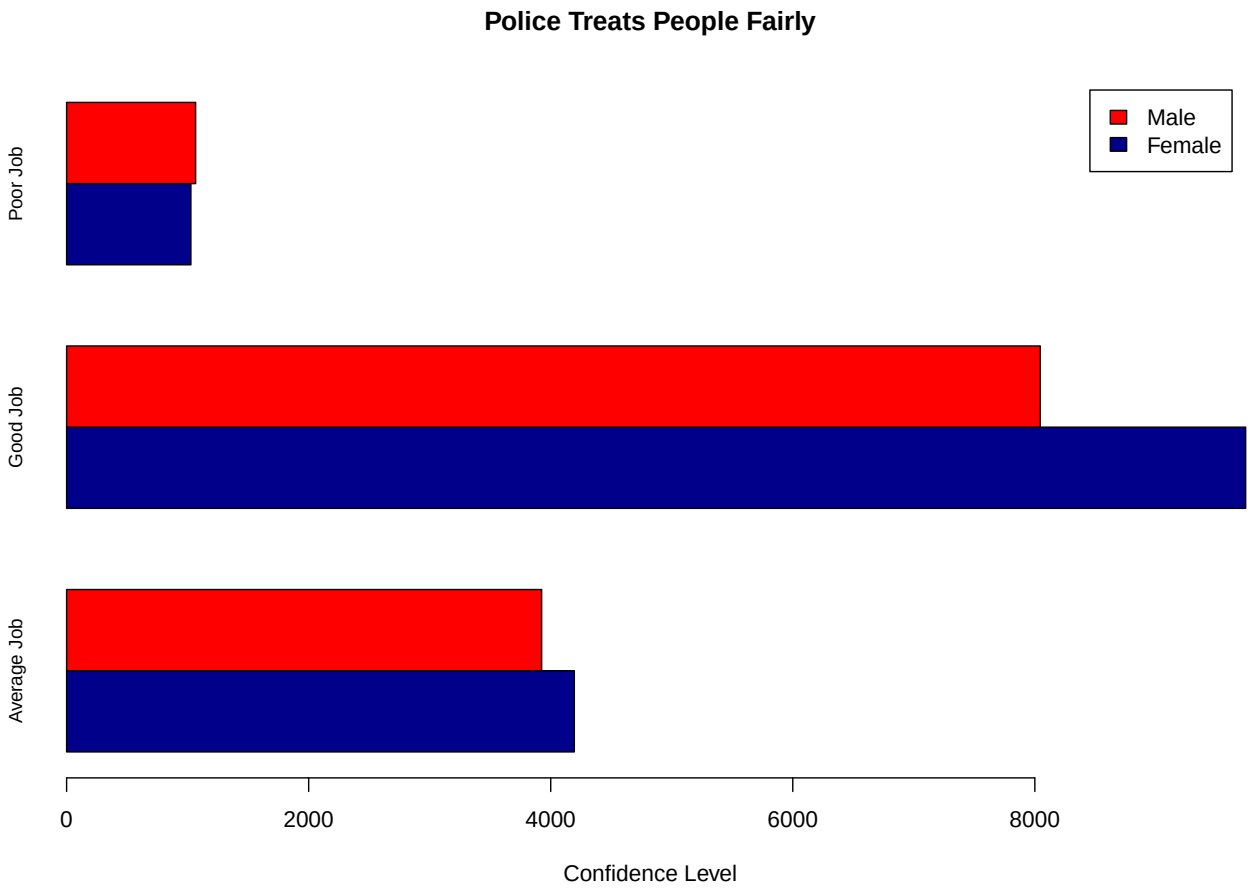


Figure 4: Police Treats People Fairly

2.6 Confidence In Criminal Courts

After investigating different gender group's confidence in police, we will now take a look at people's confidence in criminal courts. Similarly, we will only look at the following three responses: *1 A great deal of confidence*, *2 Some confidence*, *3 Not very much confidence*, Figure 5 shows the result.

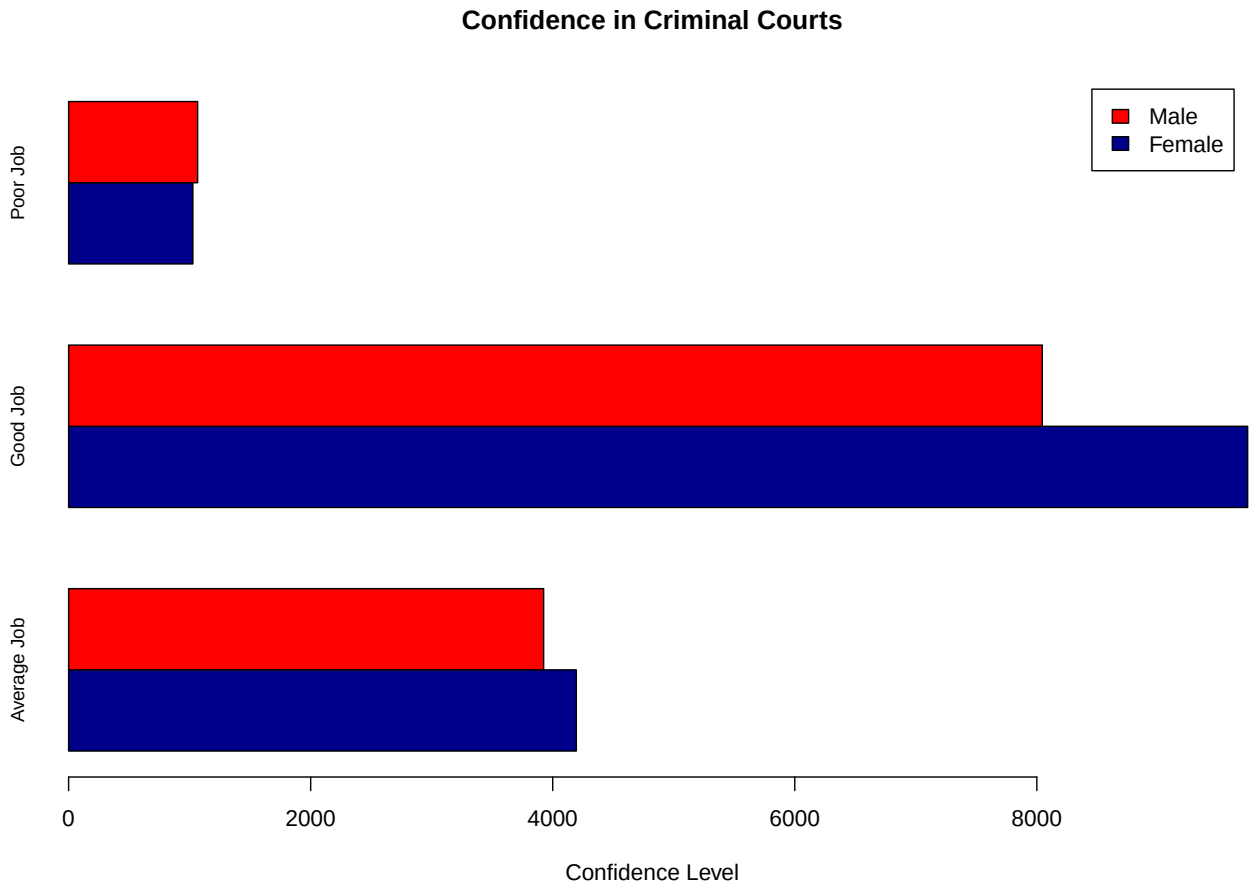


Figure 5: Confidence in Criminal Courts

3 Discussion

3.1 Gender Discrimination in Law Enforcement

Based on results of the survey, every gender group have a similar perception in police and criminal courts. However, it is still too early to conclude that there are no gender discrimination during law enforcement because of the limitations in the survey. Taking gender discrimination as an example, in the original survey, only Male and Female are available to choose from, the other options are either "Valid Skip" or "Refusal", as a result, every survey respondent chose either "Male" or "Female". This makes the results very biased. Suppose that all the *Poor Job* votes are from a minority gender group, the results become deceptive because they were not able to select their own gender.

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