

# Assignment 1

sema tay

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```
# Installing necessary package(s)
install.packages("ggplot2")

## Installing package into '/cloud/lib/x86_64-pc-linux-gnu-library/4.5'
## (as 'lib' is unspecified)

library(ggplot2)
```

## Dataset

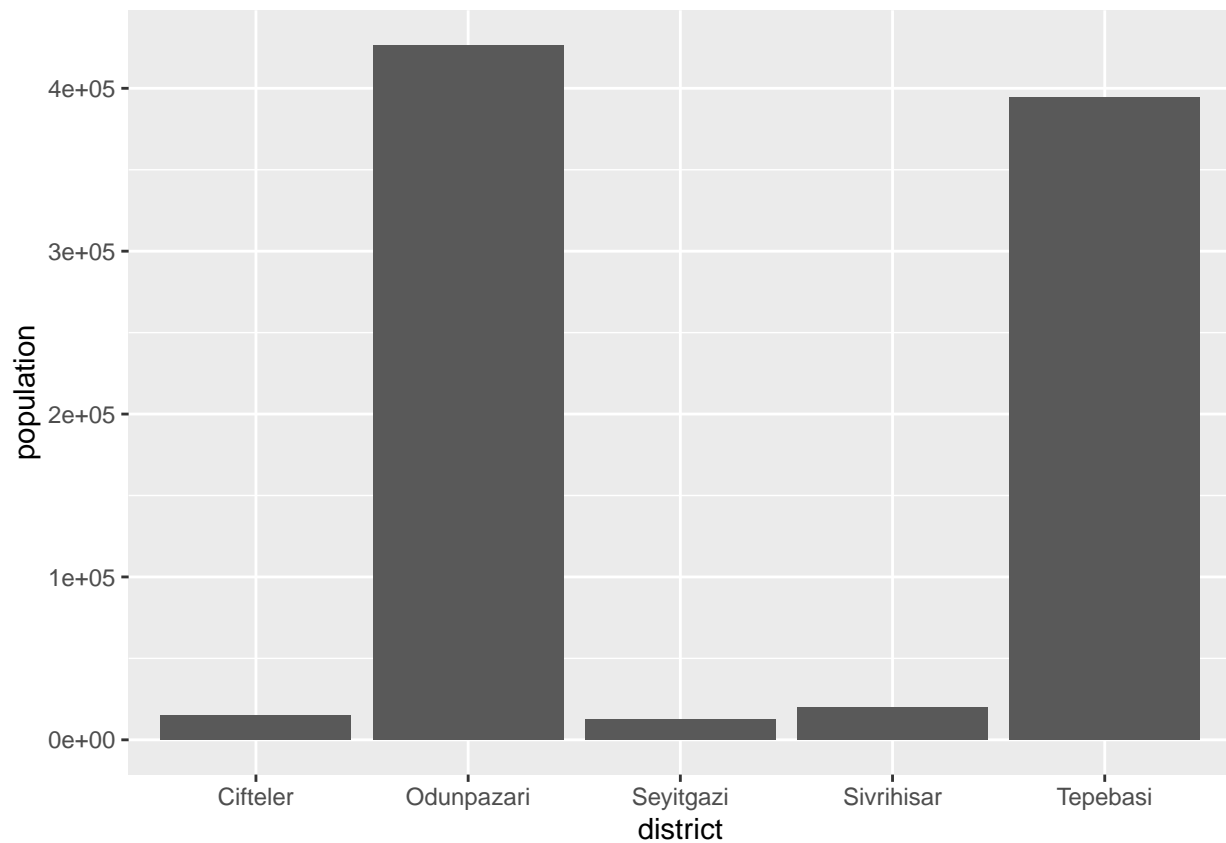
The dataset `eskisehir` contains the total population for the top-5 crowded districts of Eskisehir in 2024.

```
eskisehir <- data.frame(
  district = c("Odunpazari", "Tepebasi", "Sivrihisar", "Cifteler", "Seyitgazi"),
  population = c(426581, 394734, 20258, 14814, 12878))
```

## Drawing a barplot

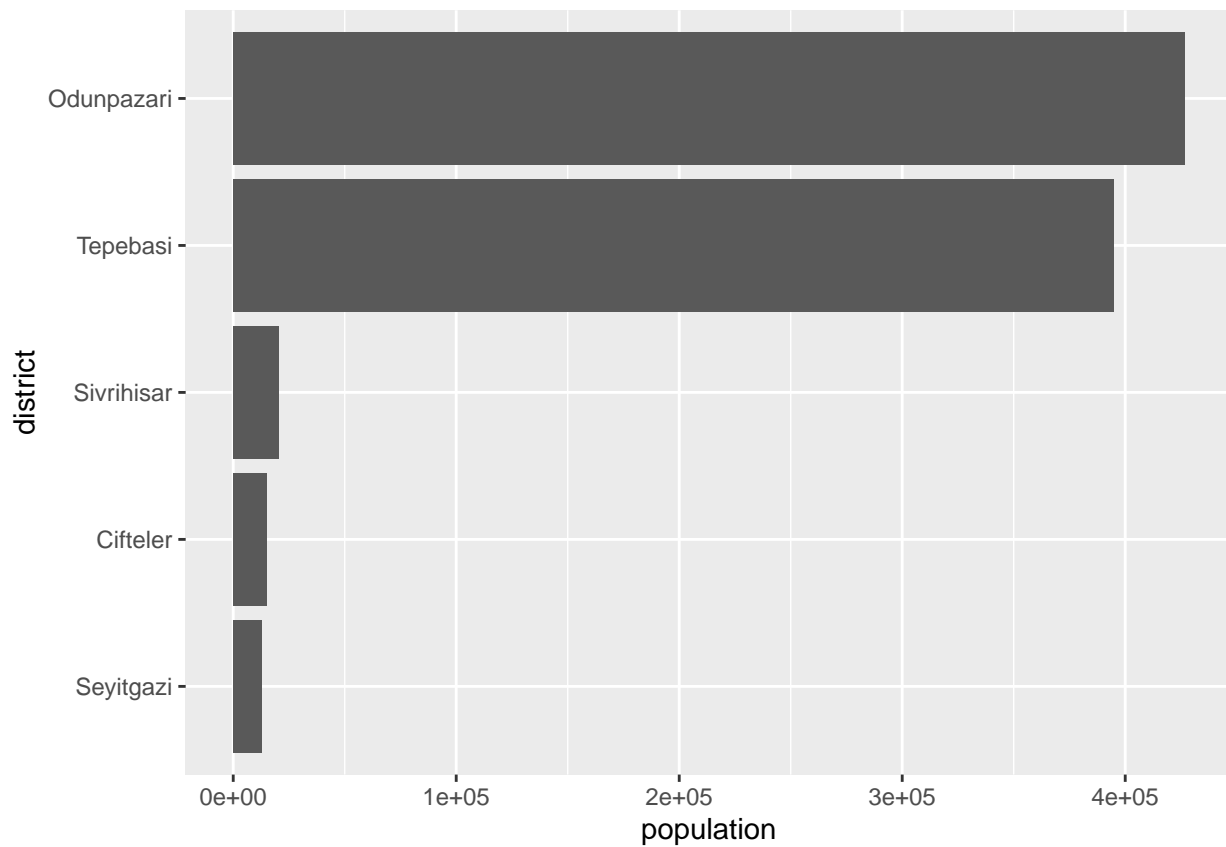
1. Please draw a barplot to visualize the population of districts (20 pts).

```
ggplot(eskisehir, aes(x=district, y=population)) +
  geom_bar(stat="identity")
```



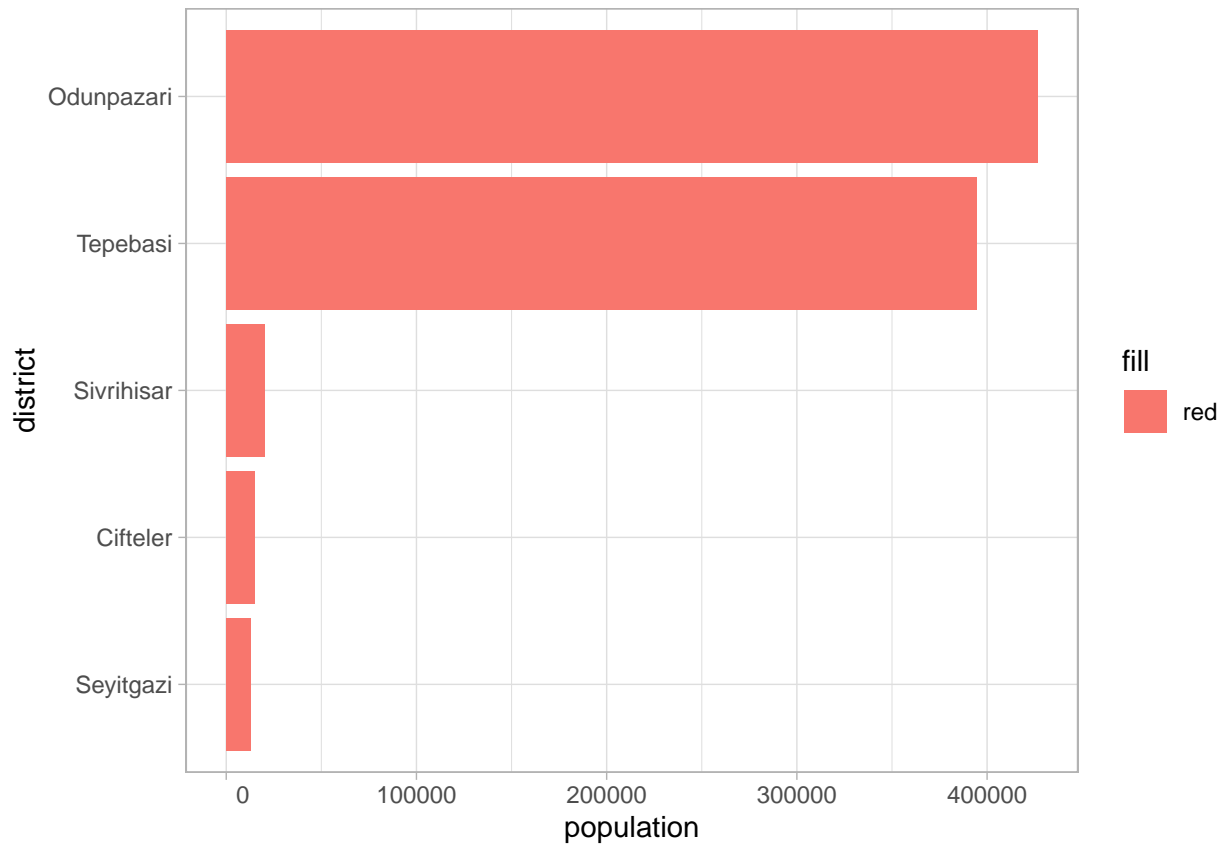
2. Please solve the problems in the plot to make it better (20 pts).

```
ggplot(eskisehir, aes(x= reorder(district, population), y=population)) +  
  geom_bar(stat="identity") +  
  coord_flip() +  
  labs(x="district",  
       y="population")
```



3. Then configure the plot to present it in a better way (40 pts). You can use the tricks that you learned in the lecture.

```
ggplot(eskisehir, aes(x= reorder(district, +population), y=population, fill="red")) +  
  geom_bar(stat="identity")+  
  coord_flip()+  
  scale_y_continuous(labels = function(x) format(x, scientific = FALSE))+  
  labs(x="district",  
       y="population")+  
  theme_light()
```



4. Interpret the plot (20 pts). It must be about the information of the district populations not the technical part of the plot. the most crowded district is odunpazarı then tepebaşı. most of people in eskişehir live odunpazarı and tepebaşı.fewer people live in other cities. ...