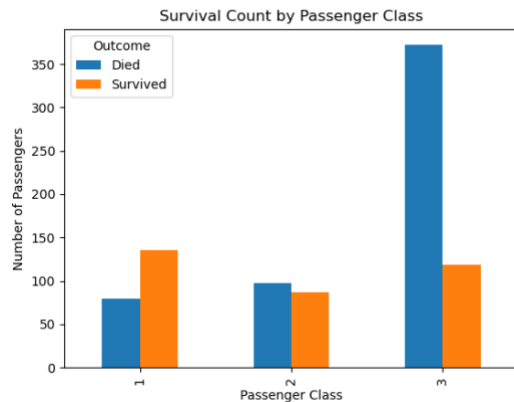


Assignment 3 Part 2 Report

Subin Shrestha

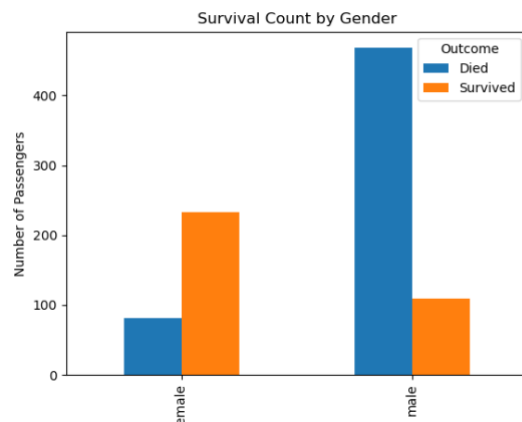
Hypothesis 1: Determine if the survival rate is associated to the class of passenger



	Pclass	SurvivalPercentage
0	1	62.962963
1	2	47.282609
2	3	24.236253

From the plots and summary, we can see that the survival rate is higher for passengers in first class compared to second and third class. There is some correlation between the passenger class and the survival rate as 62.96% first-class passengers survived, 46.28% of second-class passengers and only 24.23% of third-class passengers survived. So, if you are a first-class passenger, you have a higher percentage of survival.

Hypothesis 2: Determine if the survival rate is associated to the gender

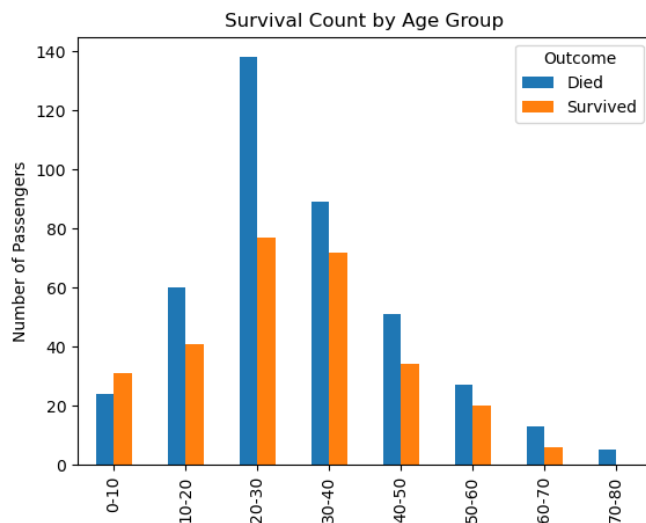


	Sex	Survival Percentage
0	female	74.203822
1	male	18.890815

From the plots and summary, we can see that the survival rate has very good correlation with the gender of the passenger as 74.2% of female survived whereas only 18.29% of male survived.

However, it should be taken into consideration that the number of male passengers is higher than female passengers.

Hypothesis 3: Determine the survival rate is associated to the age



	AgeGroup	SurvivalPercentage
0	0-10	56.363636
1	10-20	40.594059
2	20-30	35.813953
3	30-40	44.720497
4	40-50	40.000000
5	50-60	42.553191
6	60-70	31.578947
7	70-80	0.000000

On dividing the age into different age groups to get we can see that none of the people between age group 70-80 survived. There does not seem to be any significant correlation between age and survival percentage. Almost all the age groups had similar survival rate. Only the age group 0-10 years had better survival rate than others. When dividing the passengers into different age group we can see that it has multi modal distribution.

