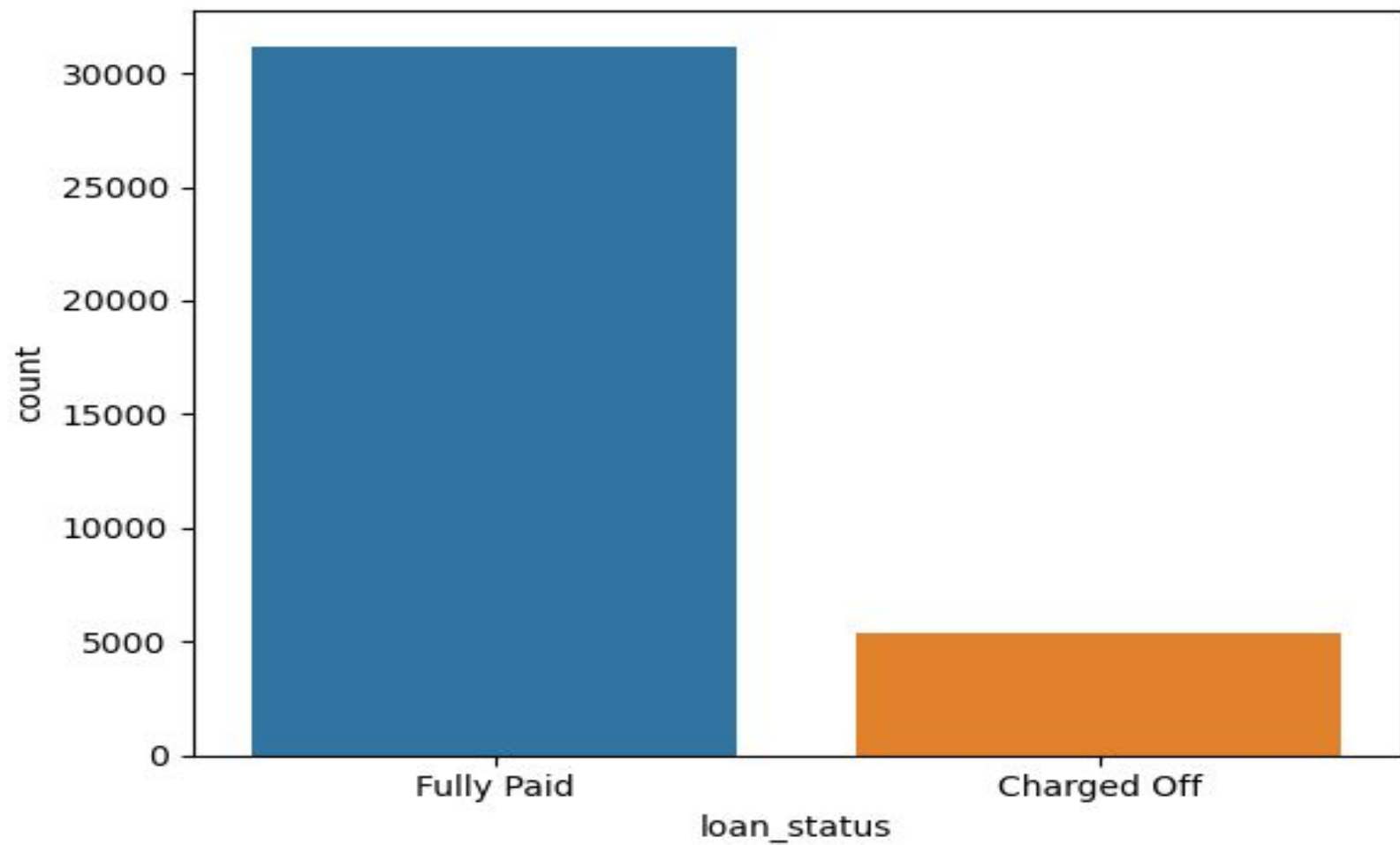
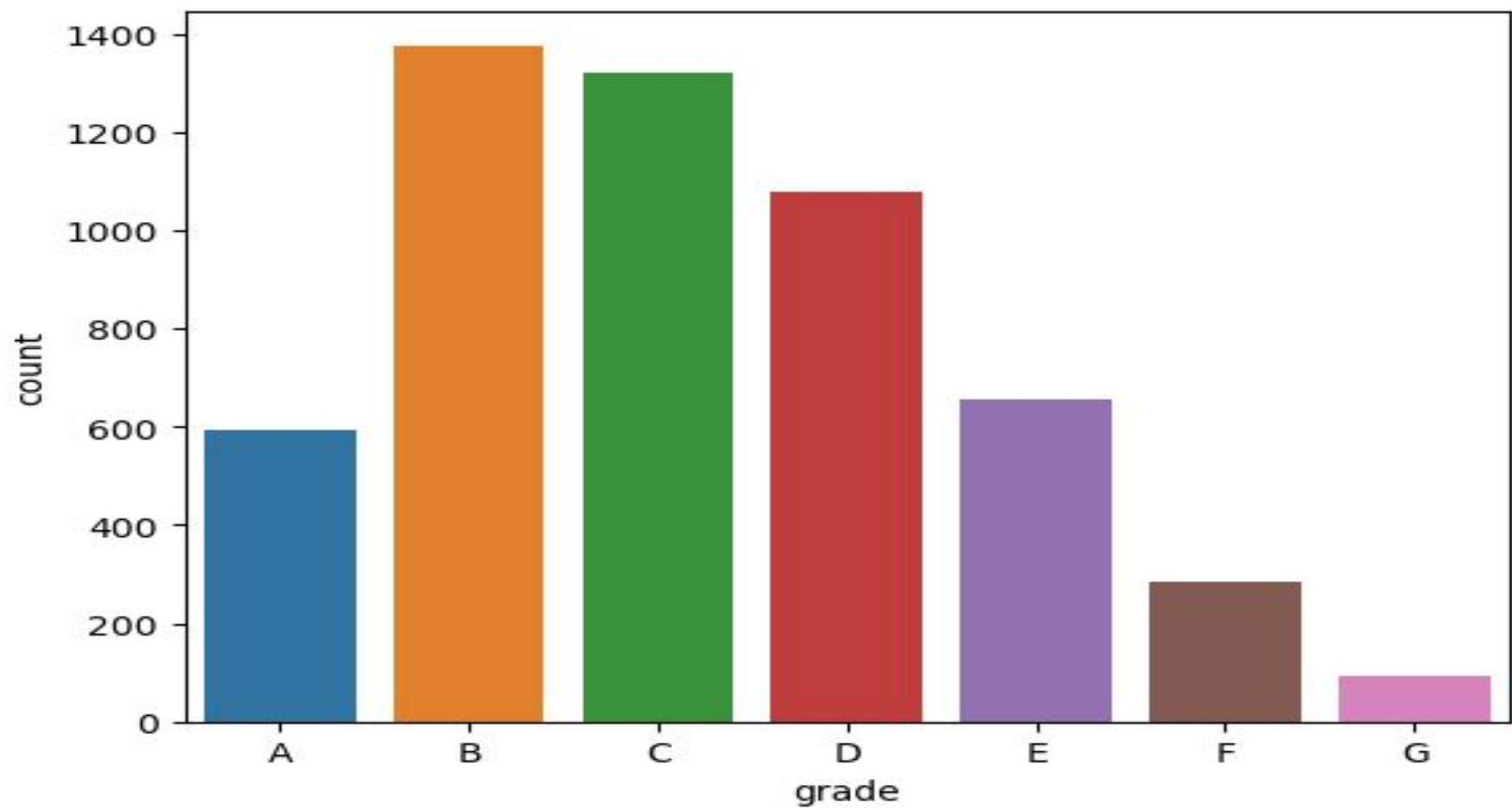
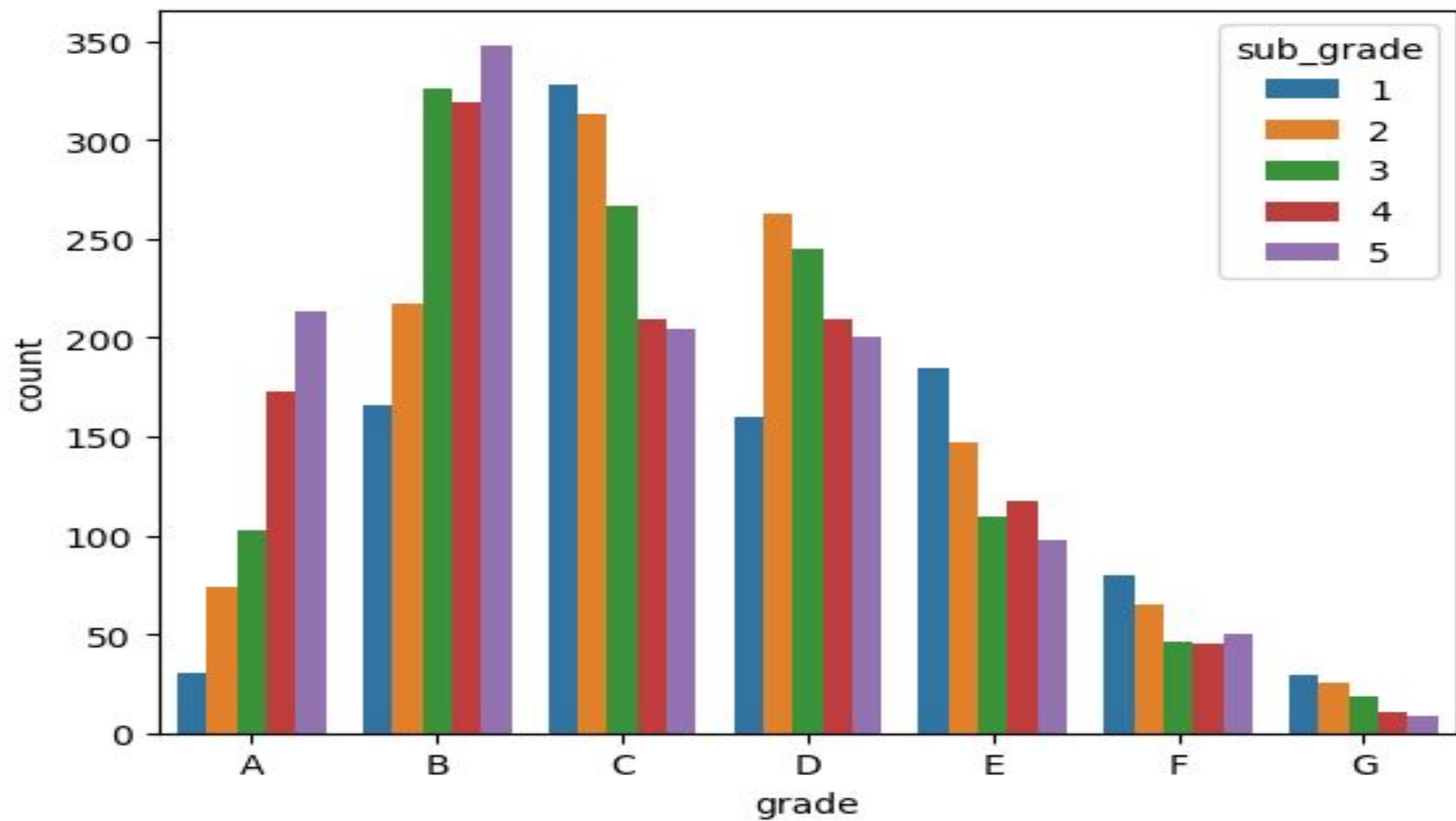


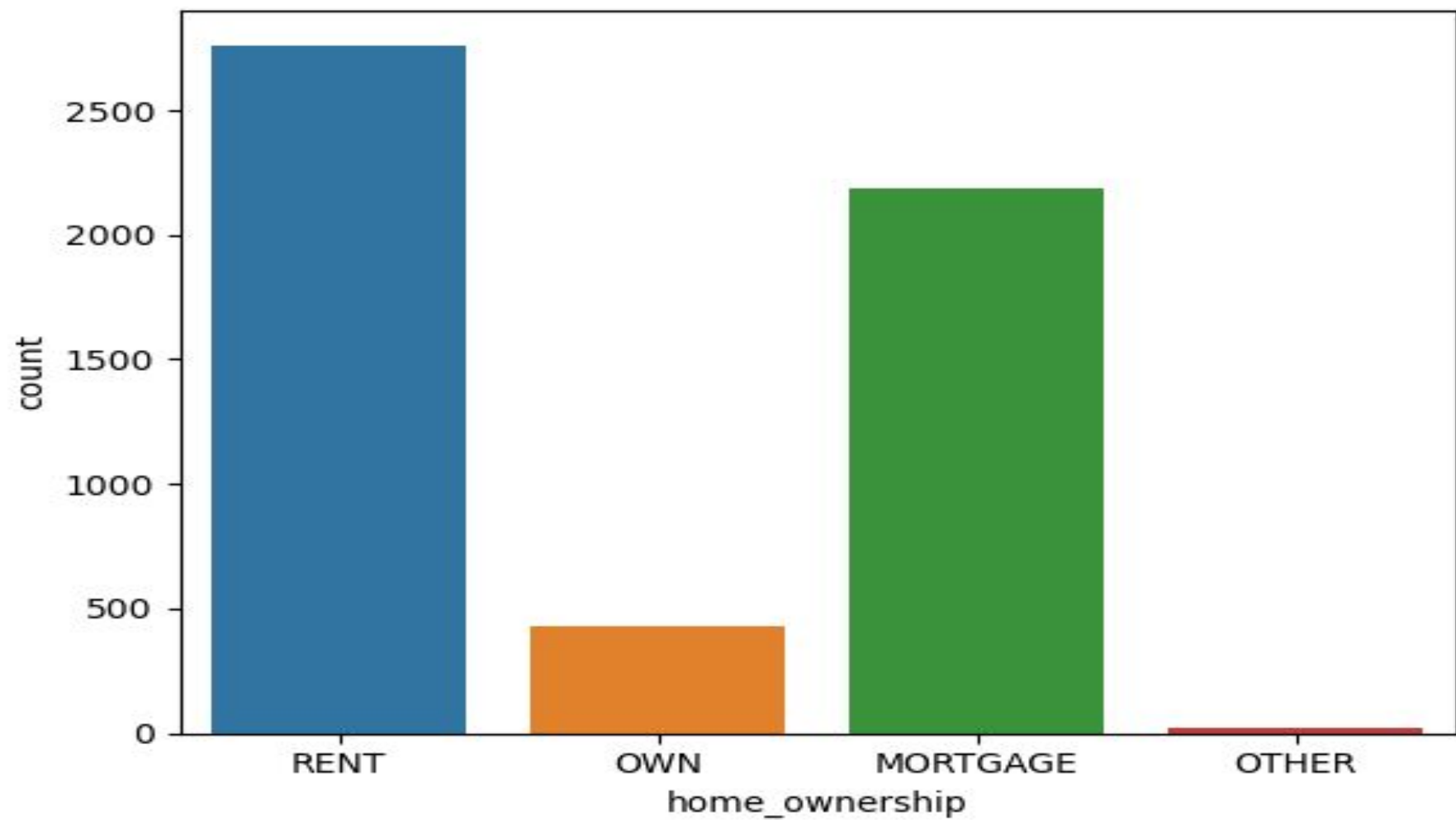
Lending club case study

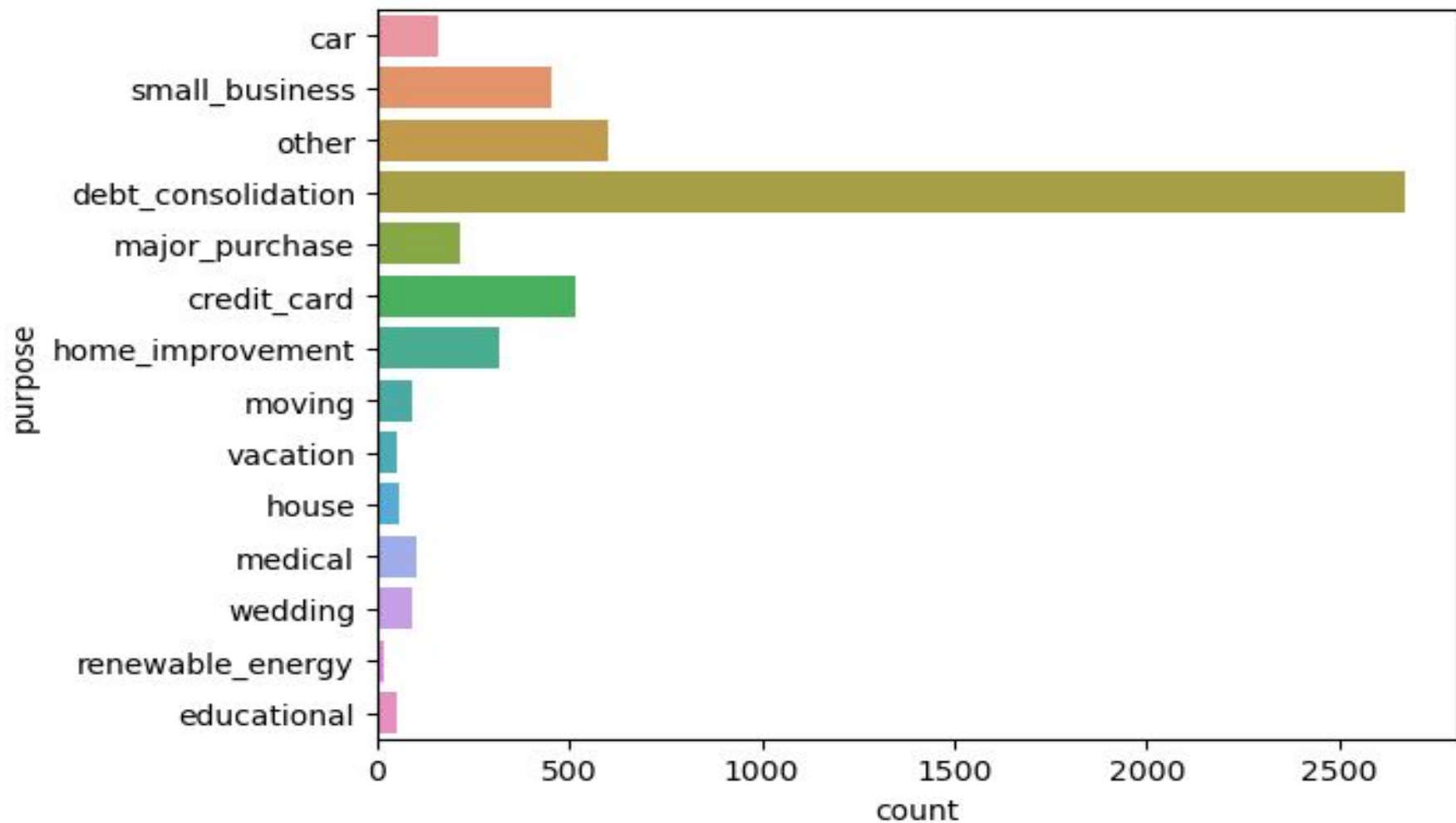
Univariate analysis

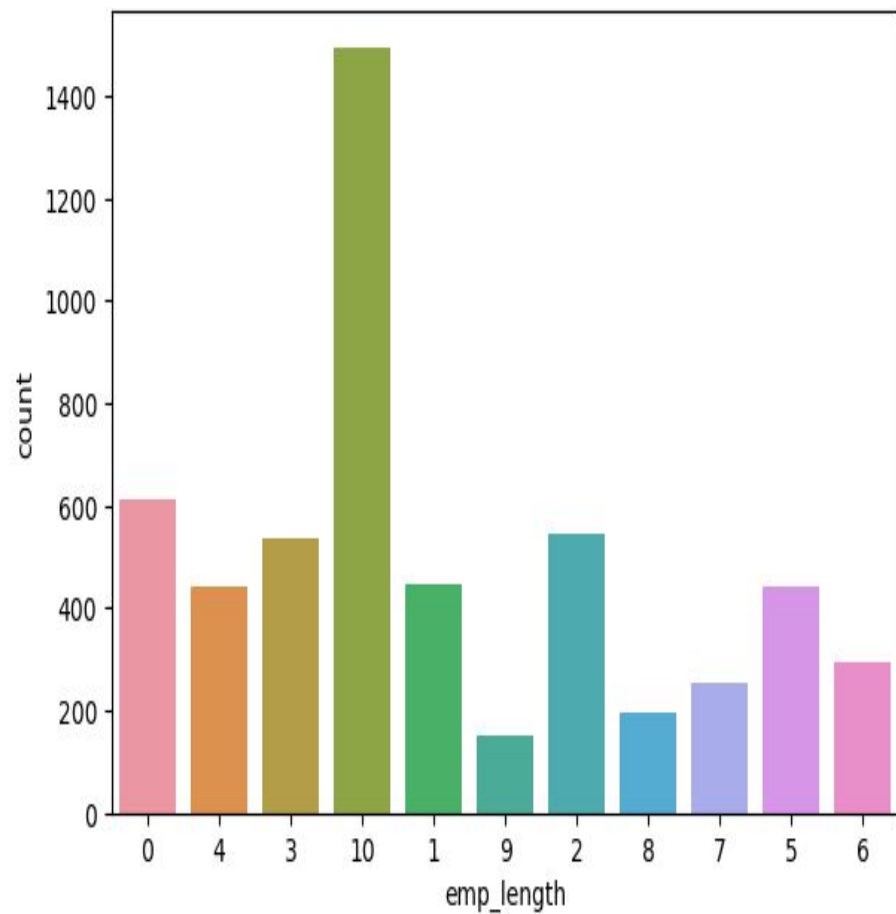
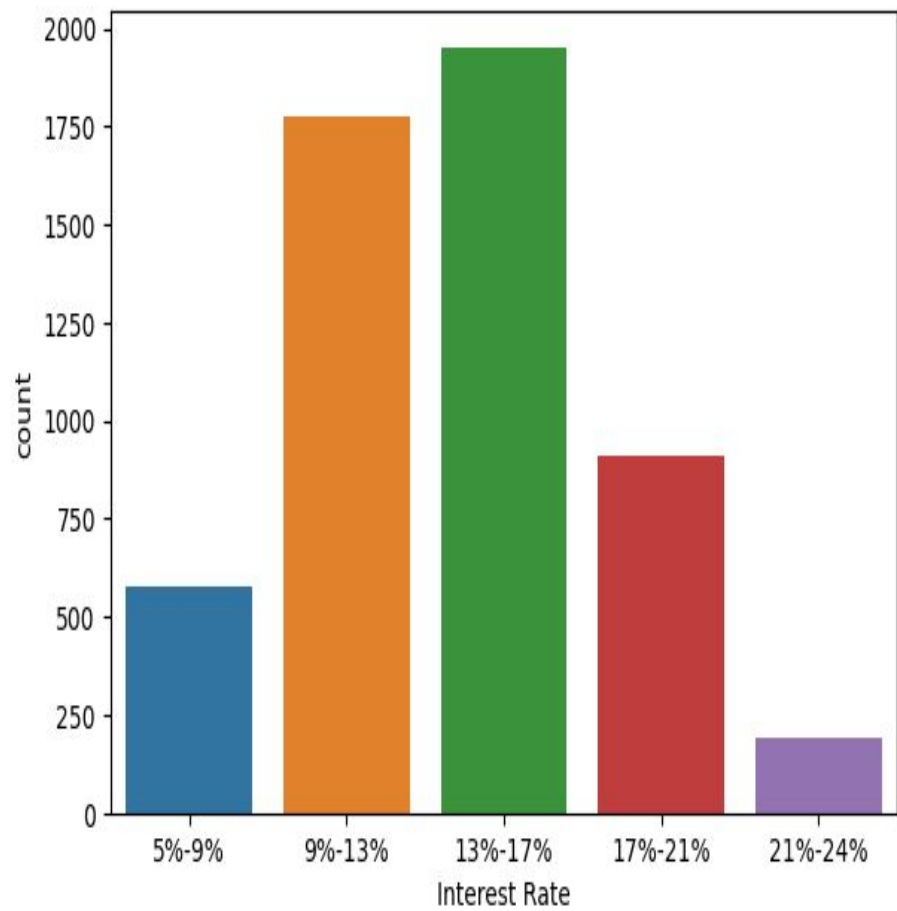


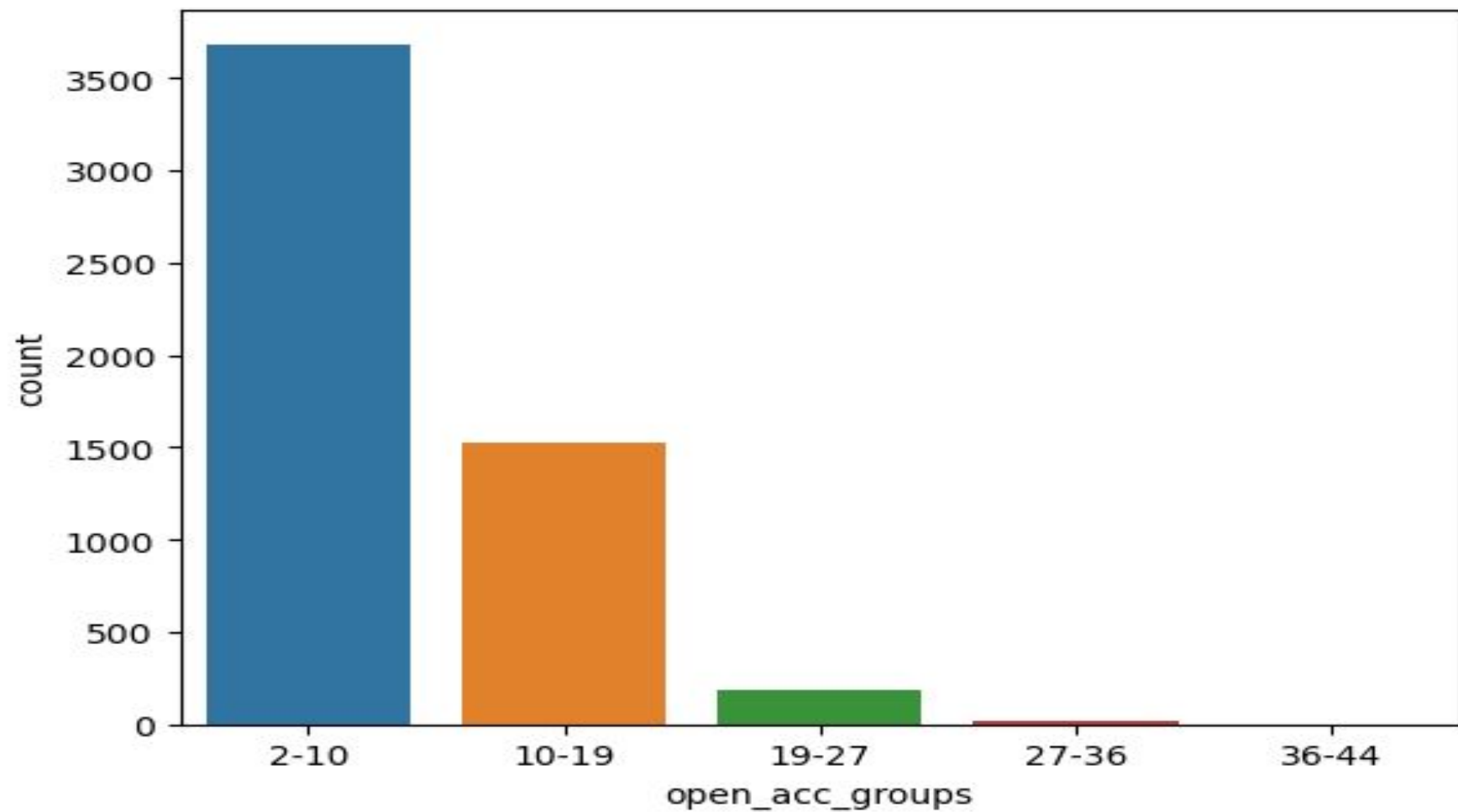


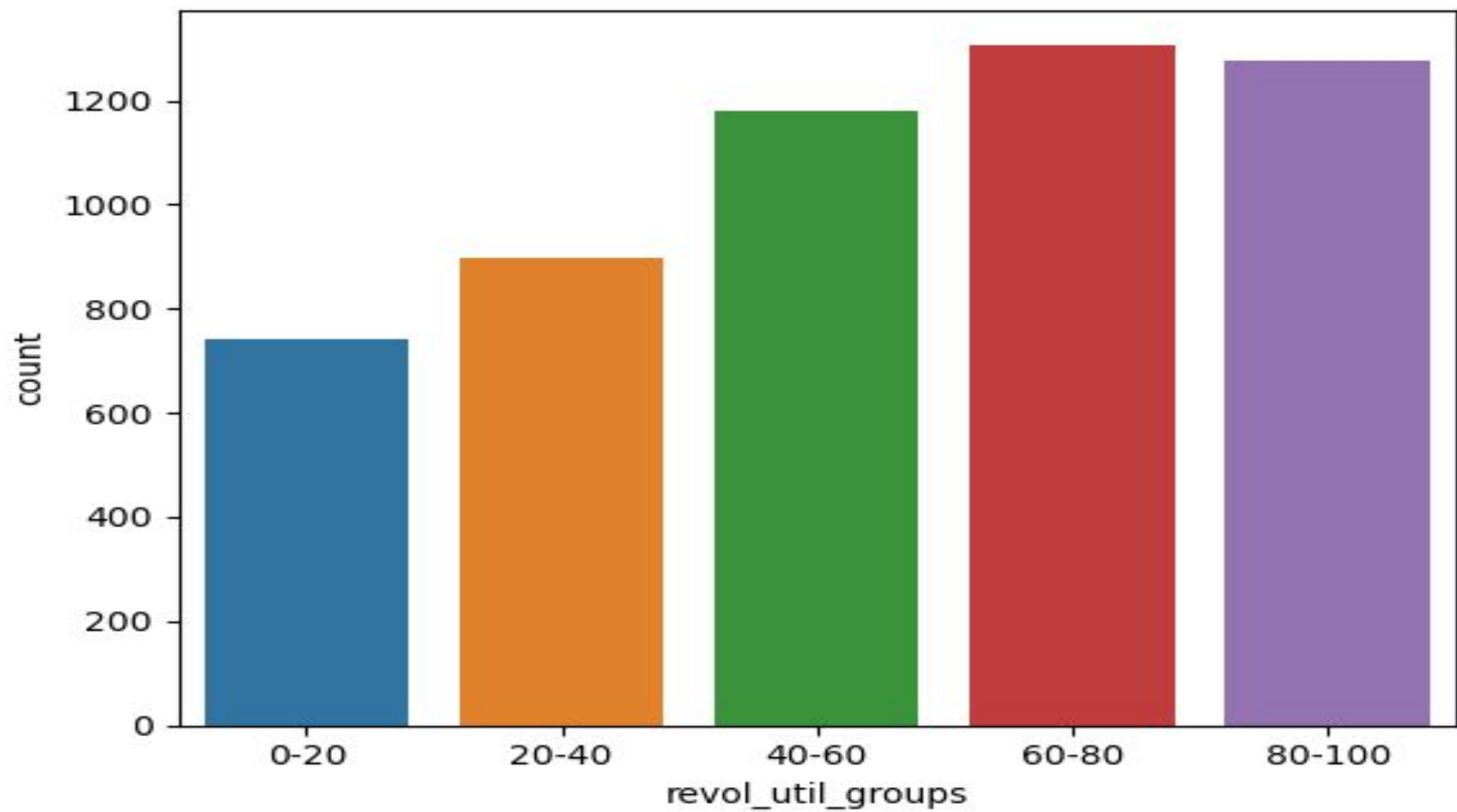


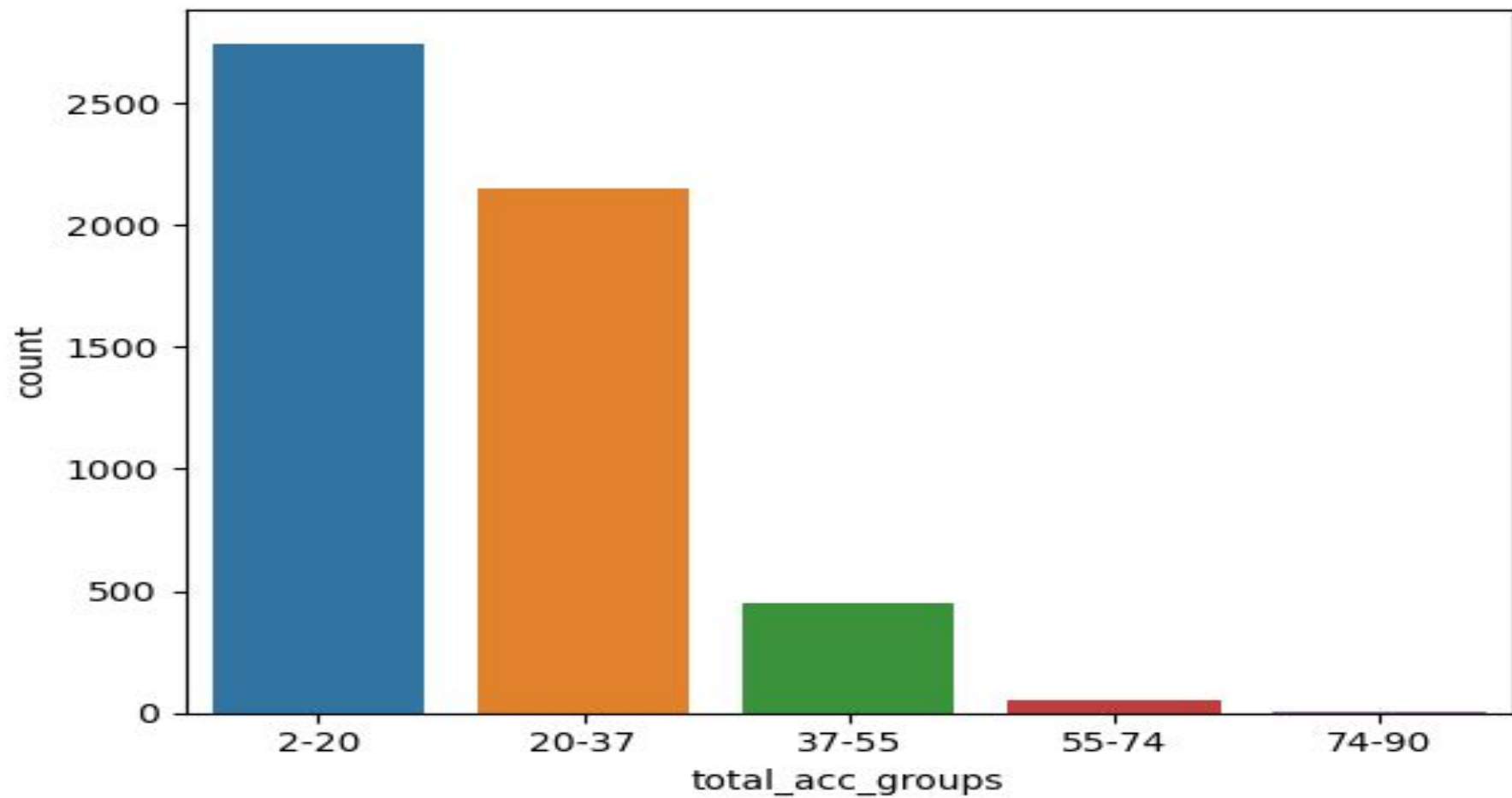


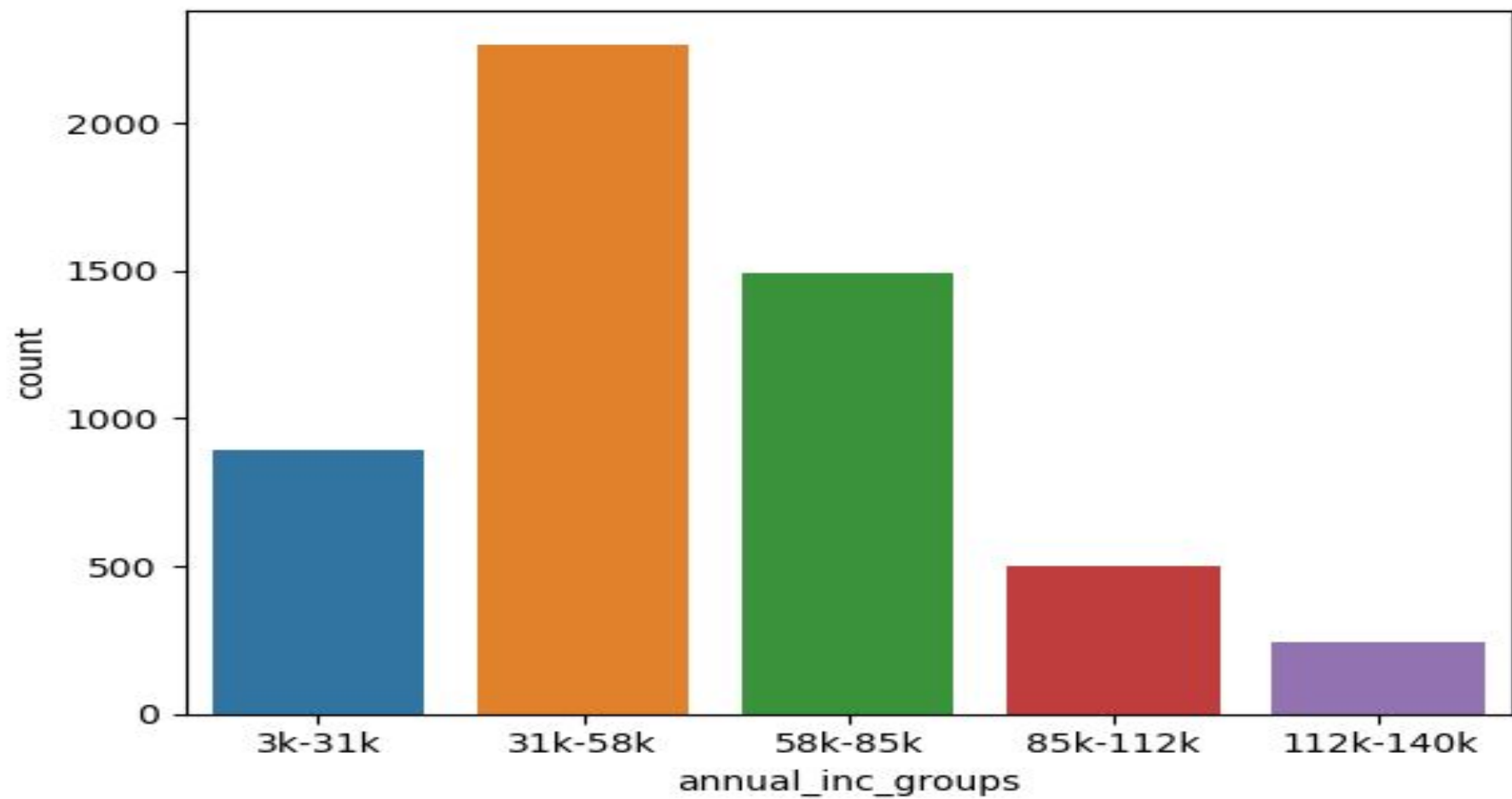


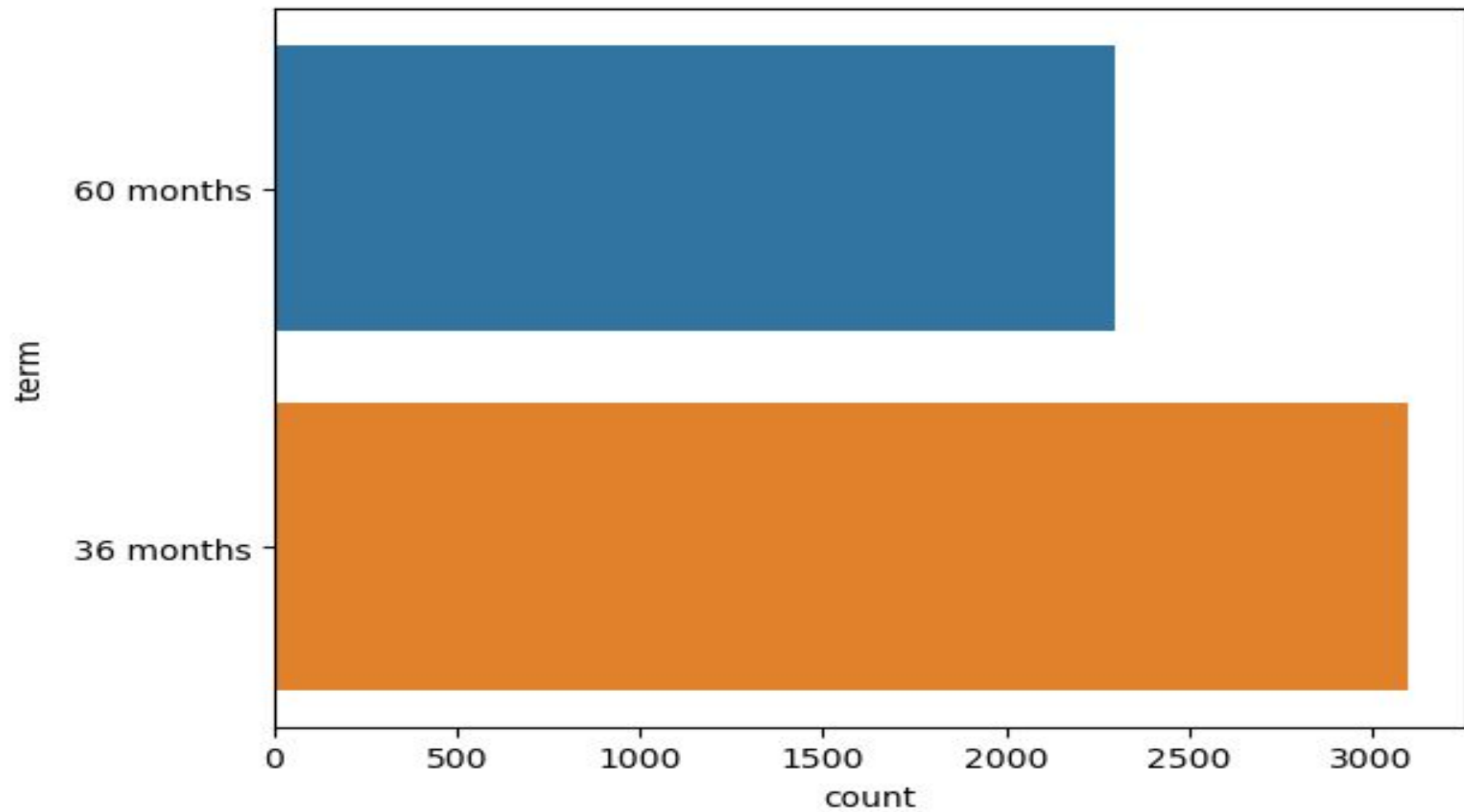


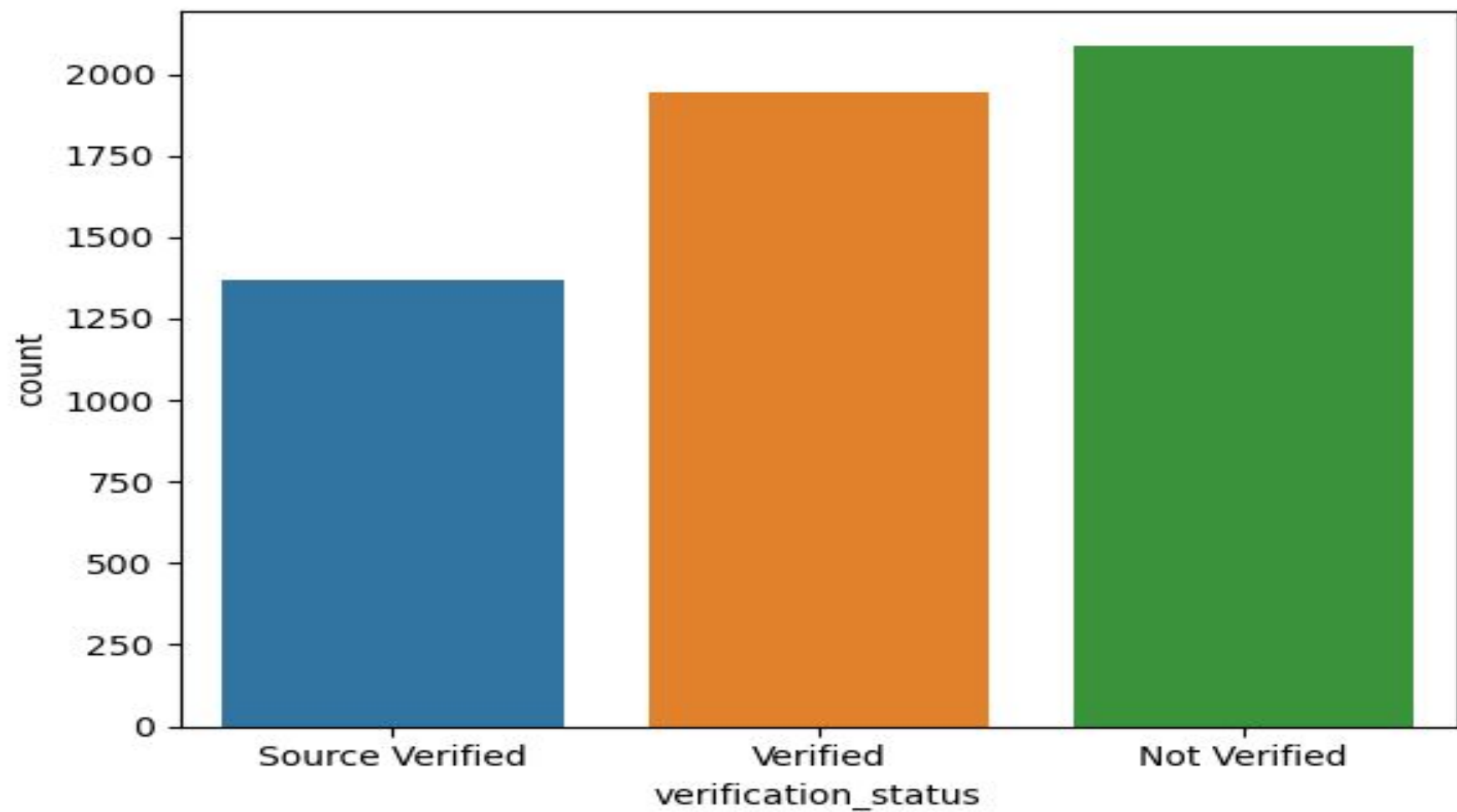


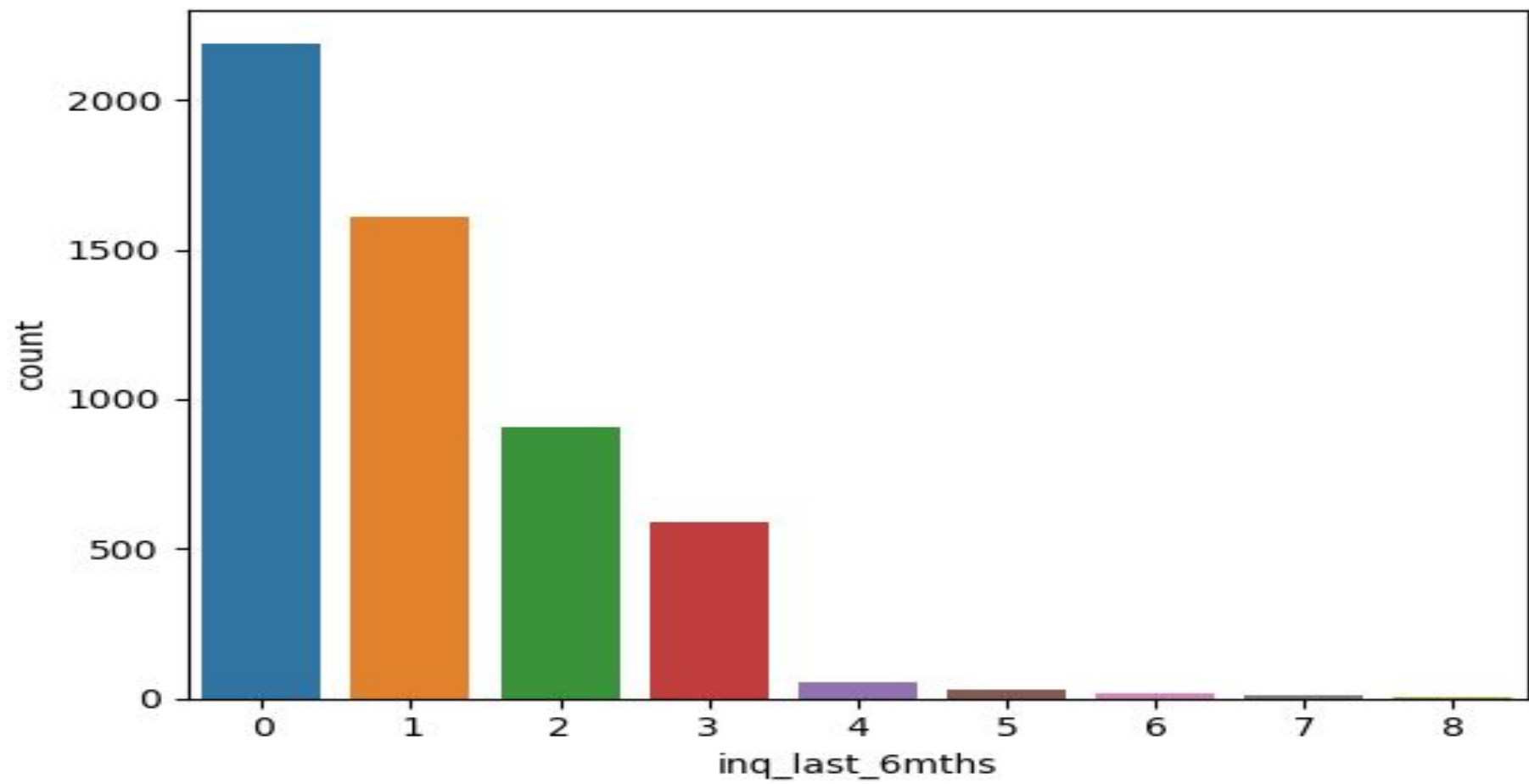


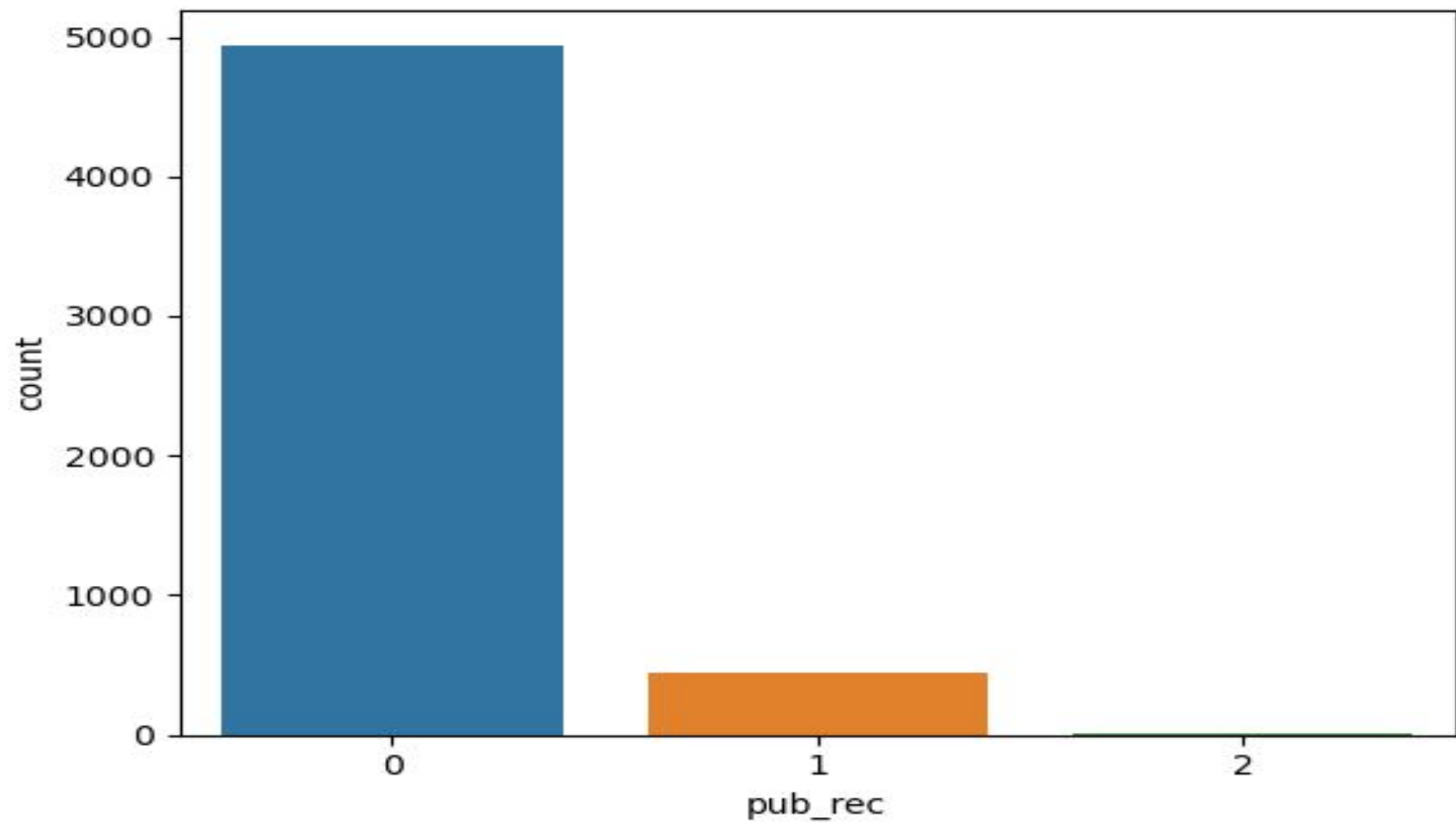


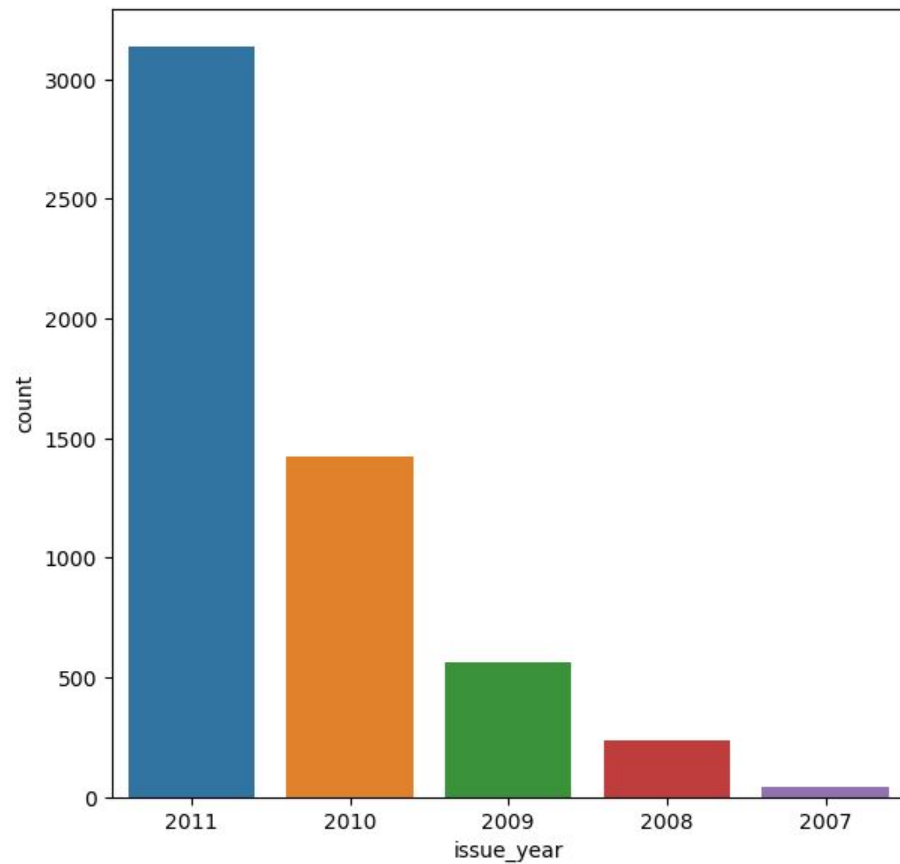
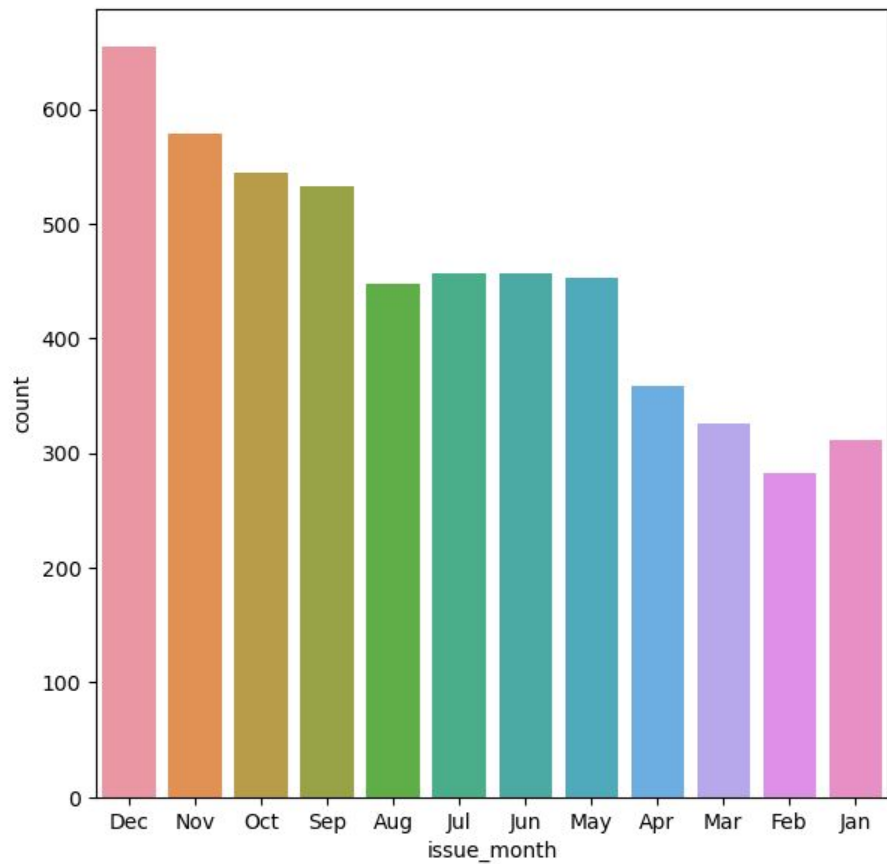


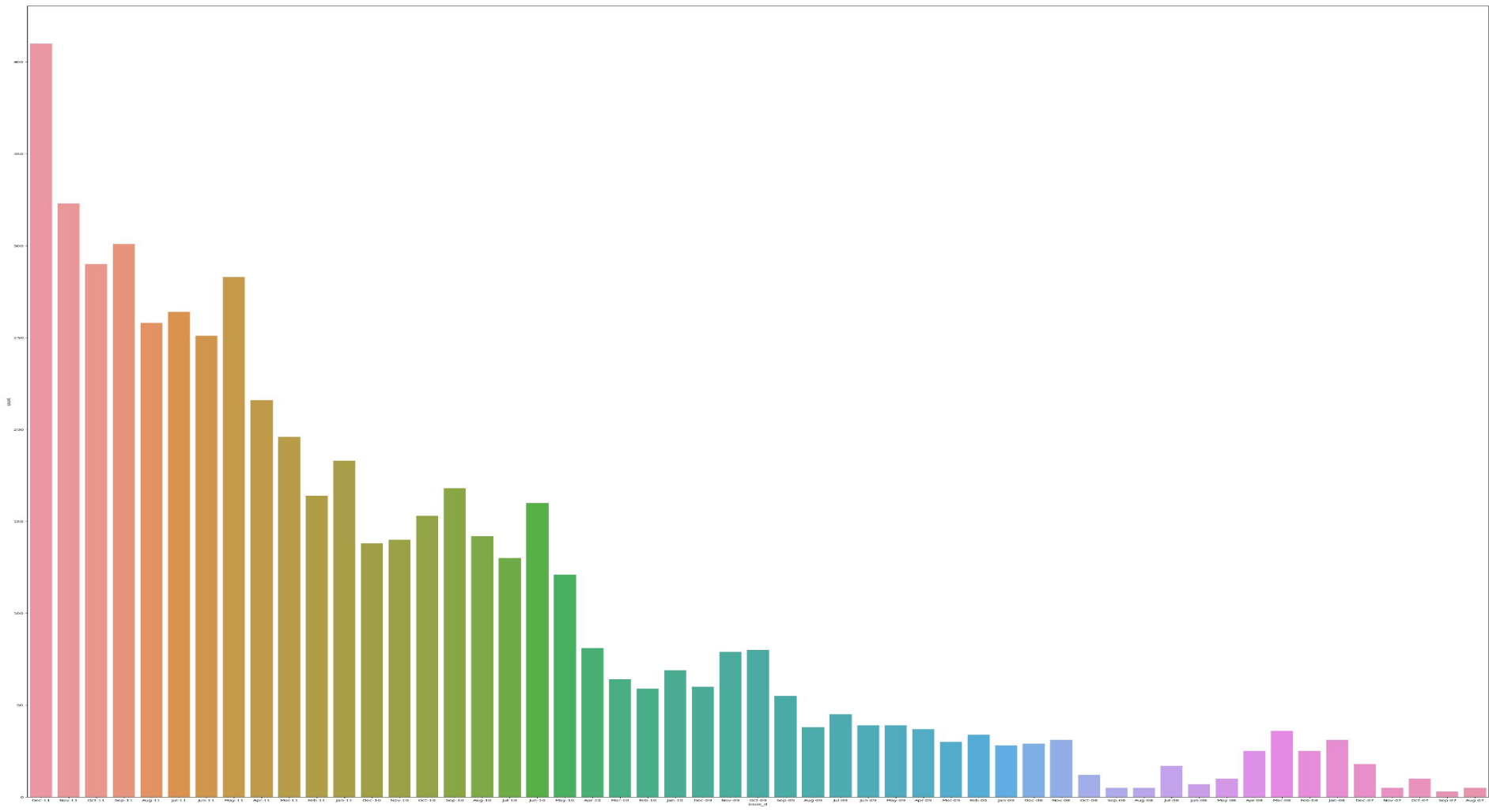


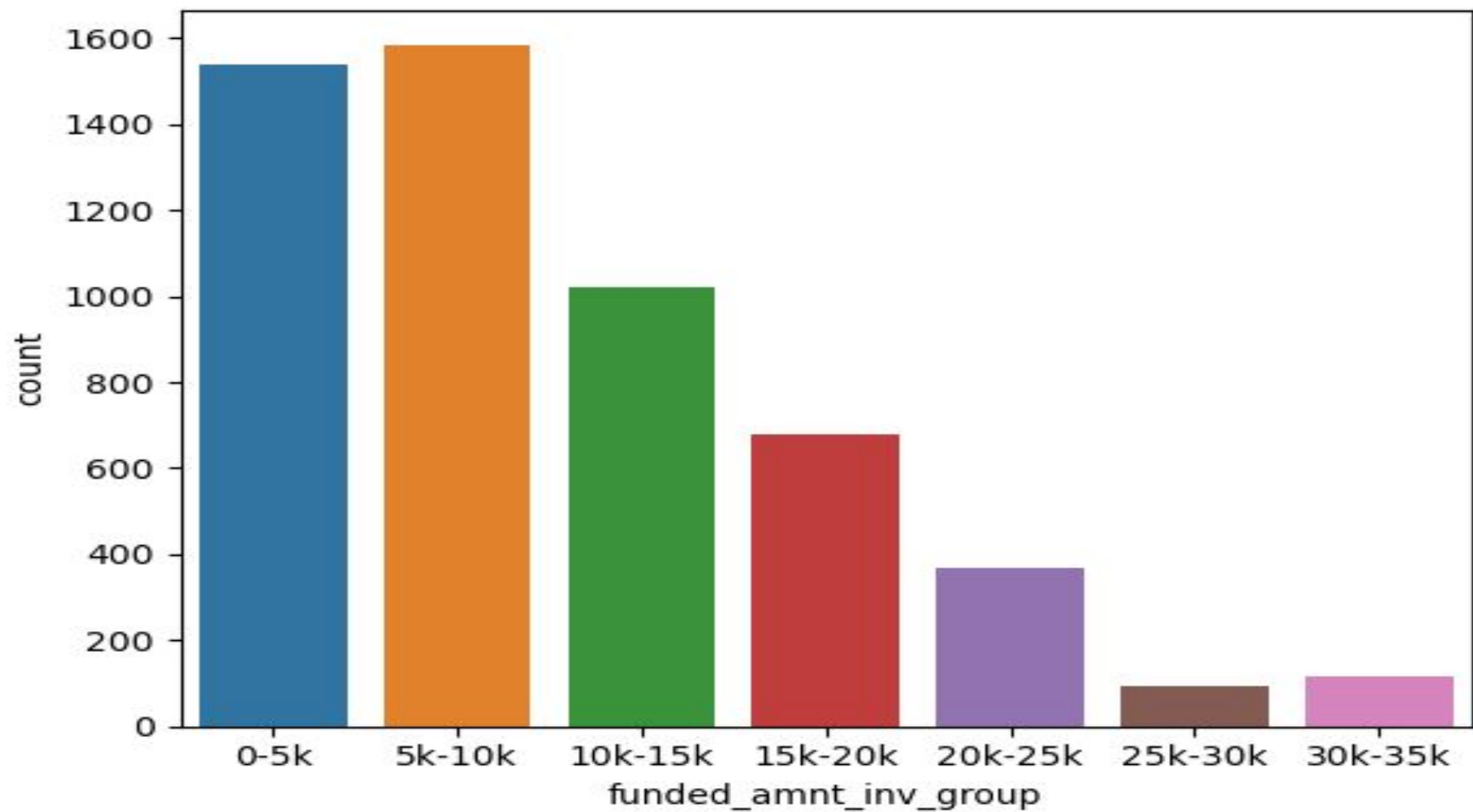


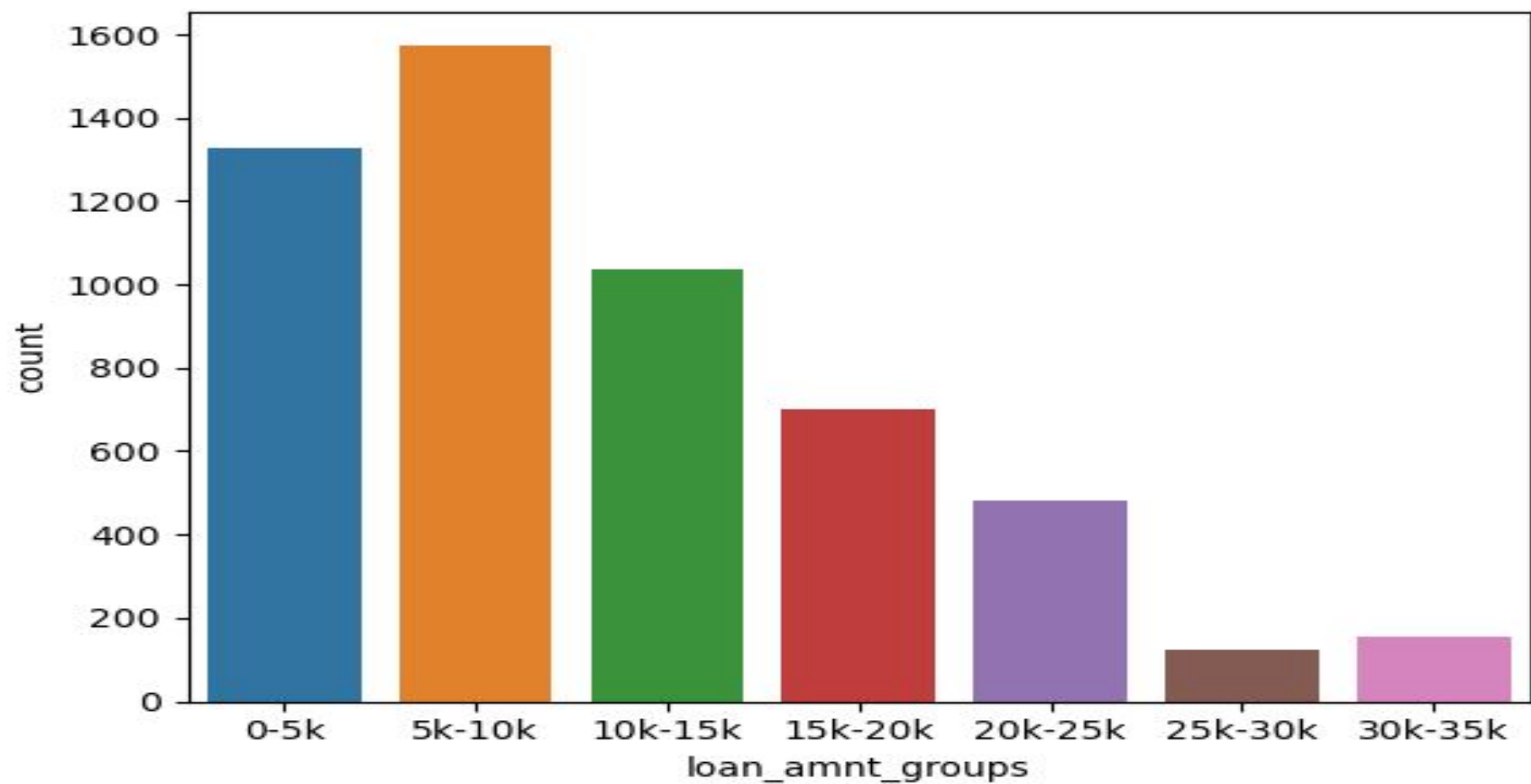


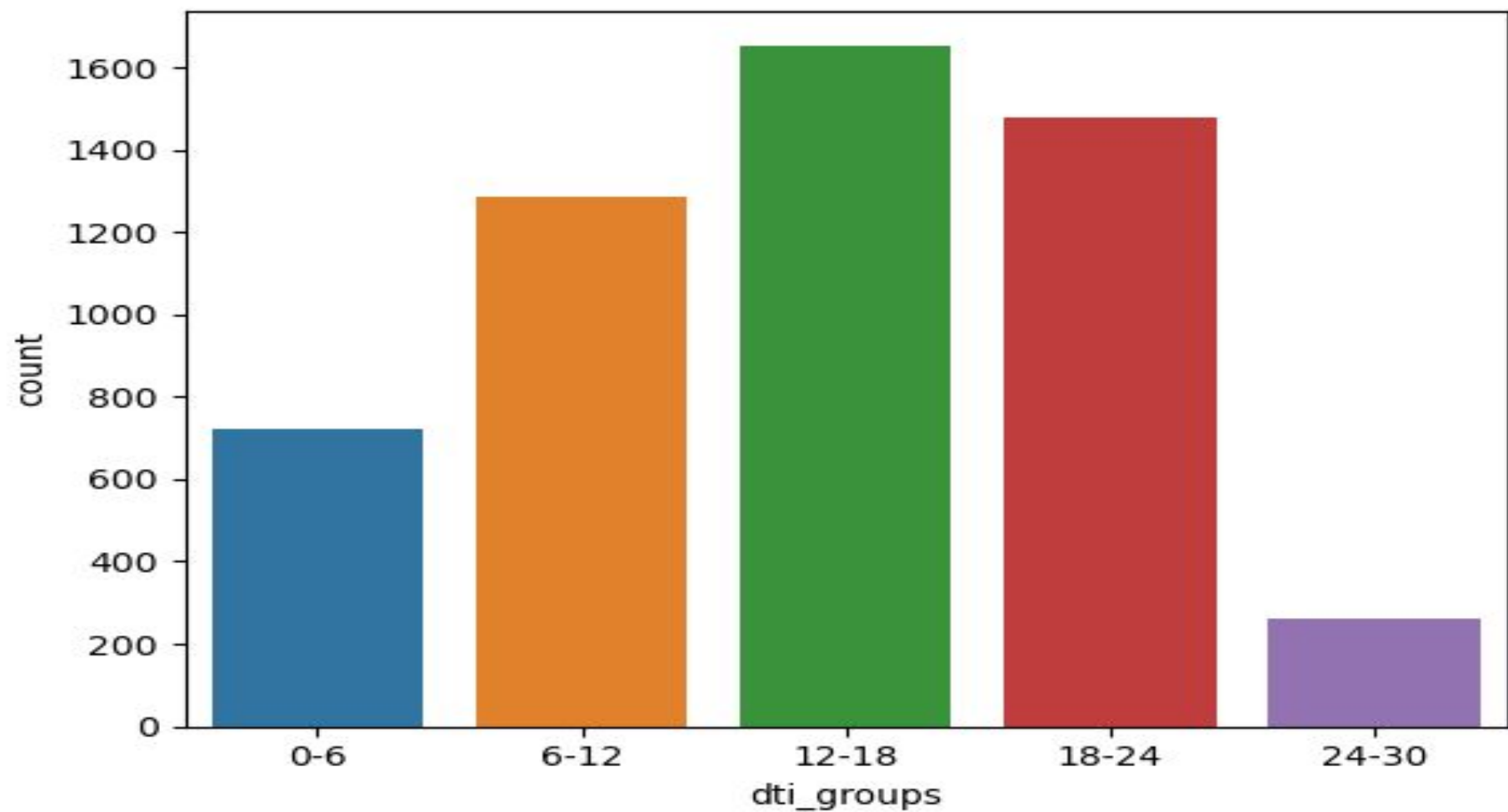


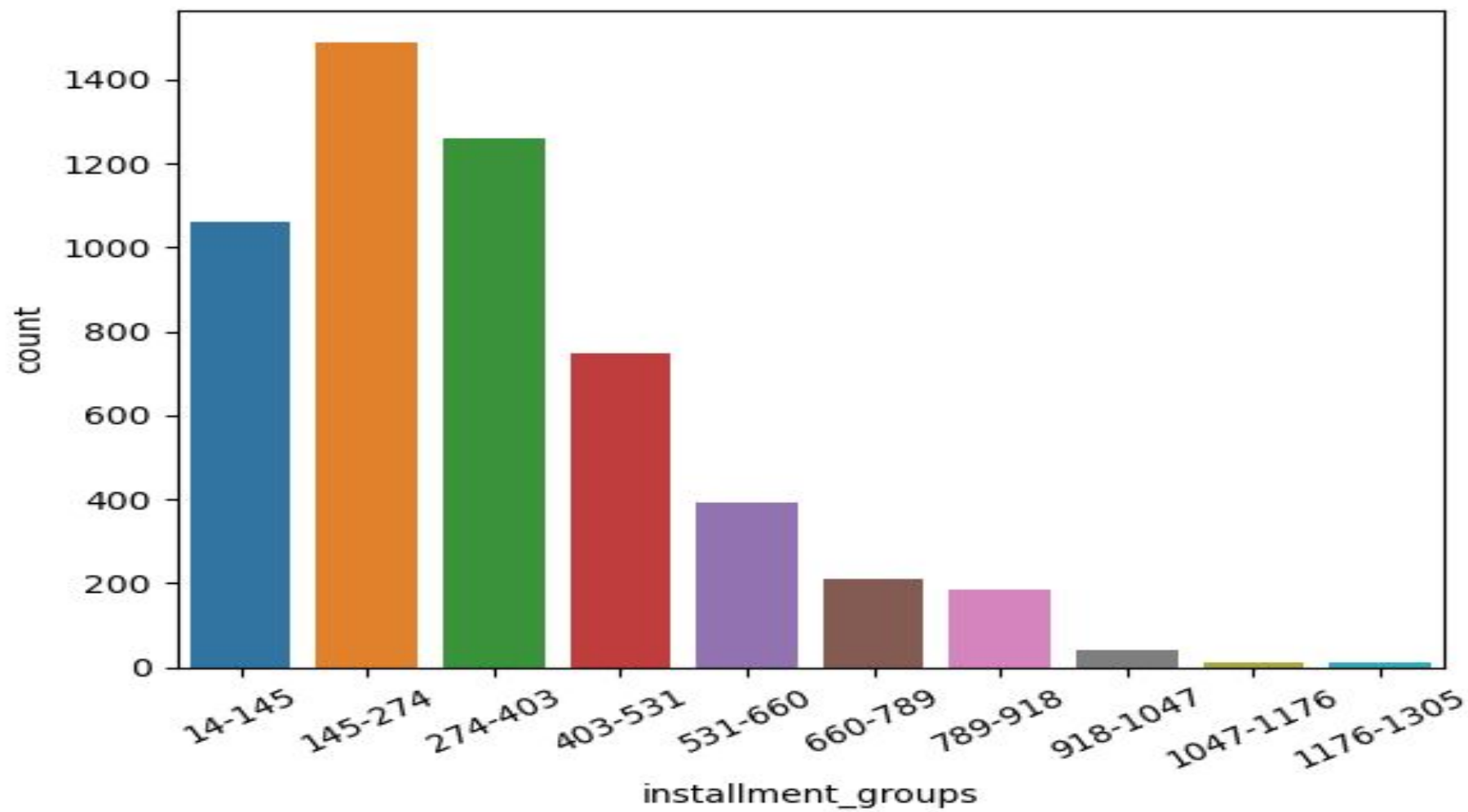




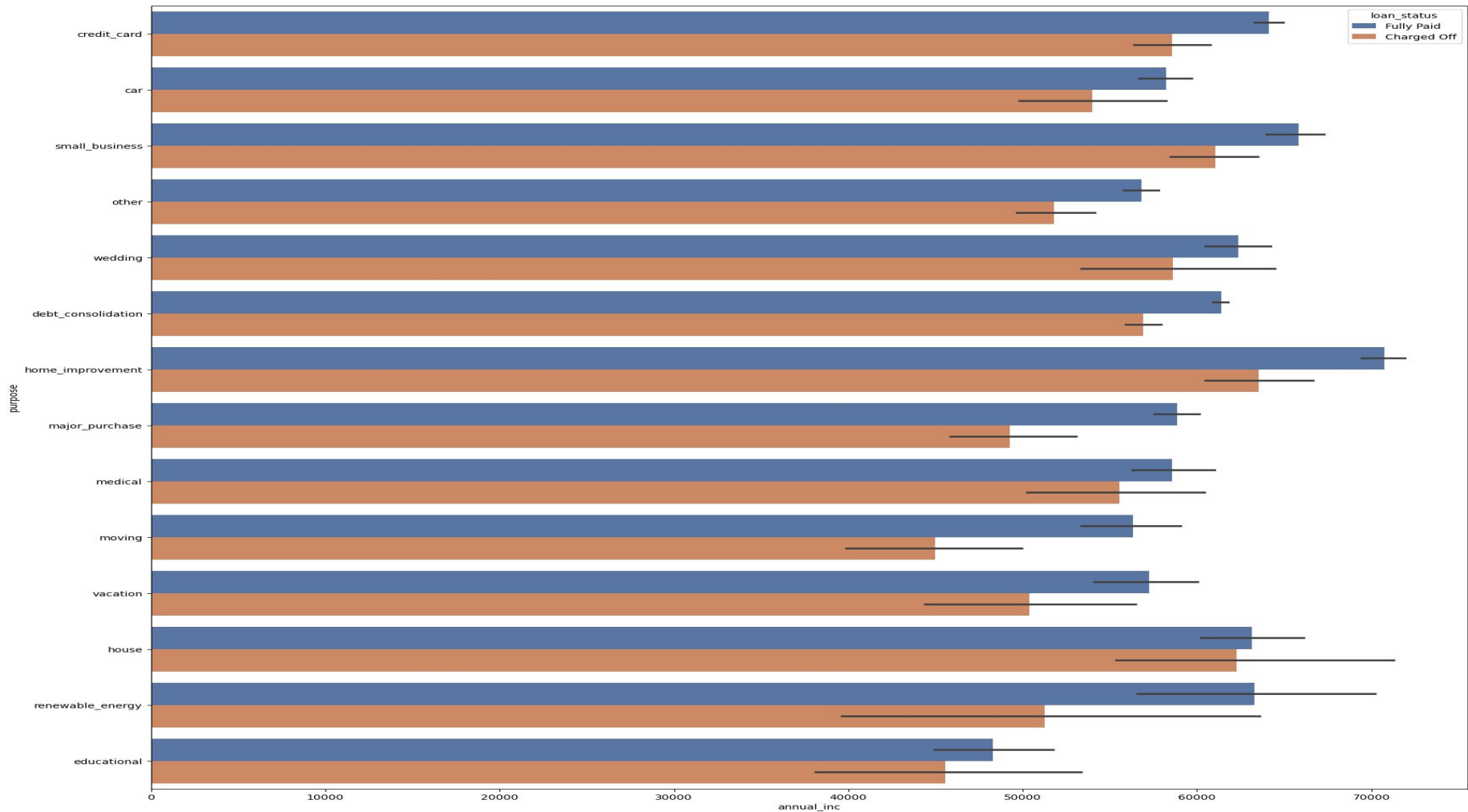


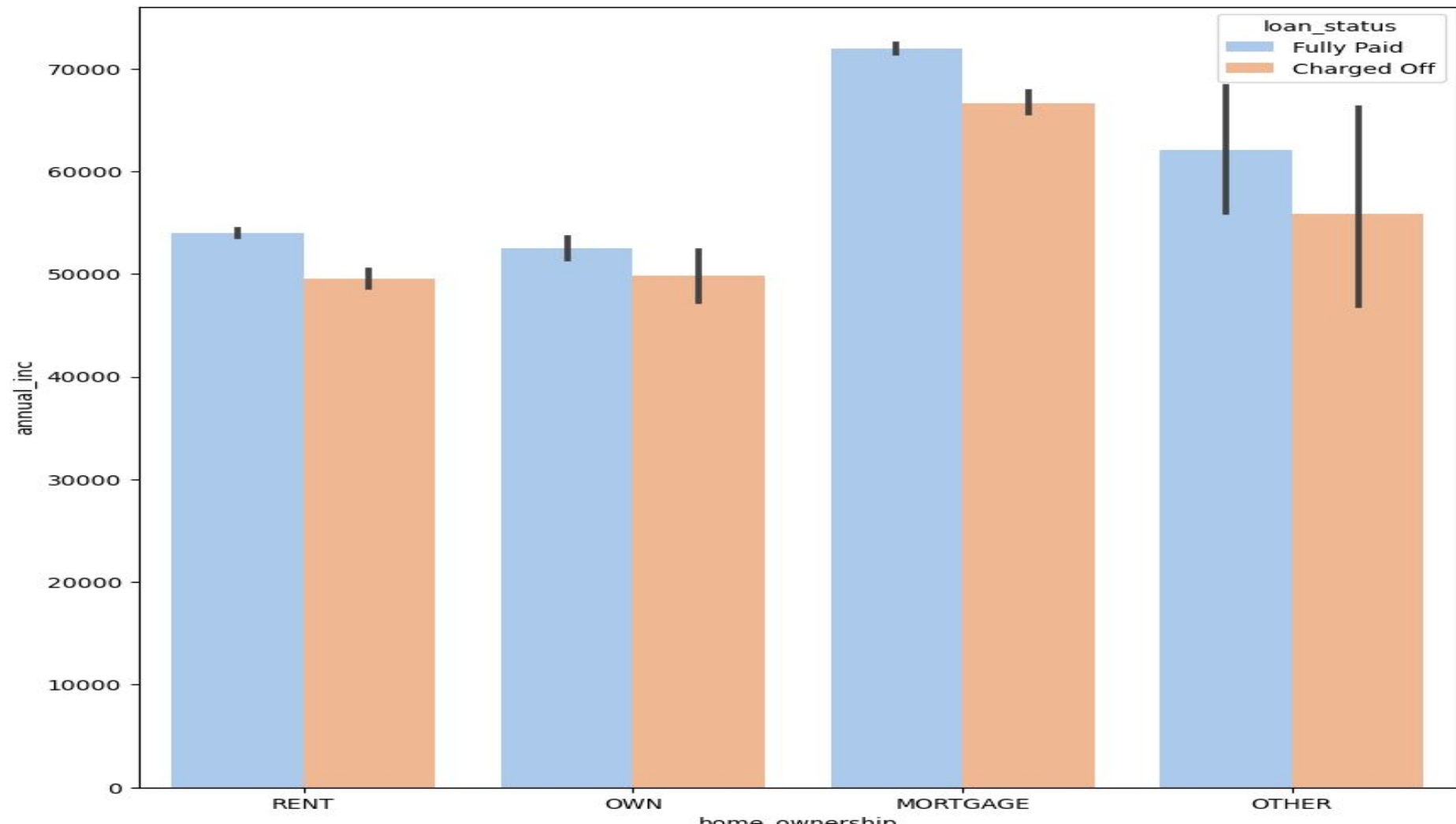


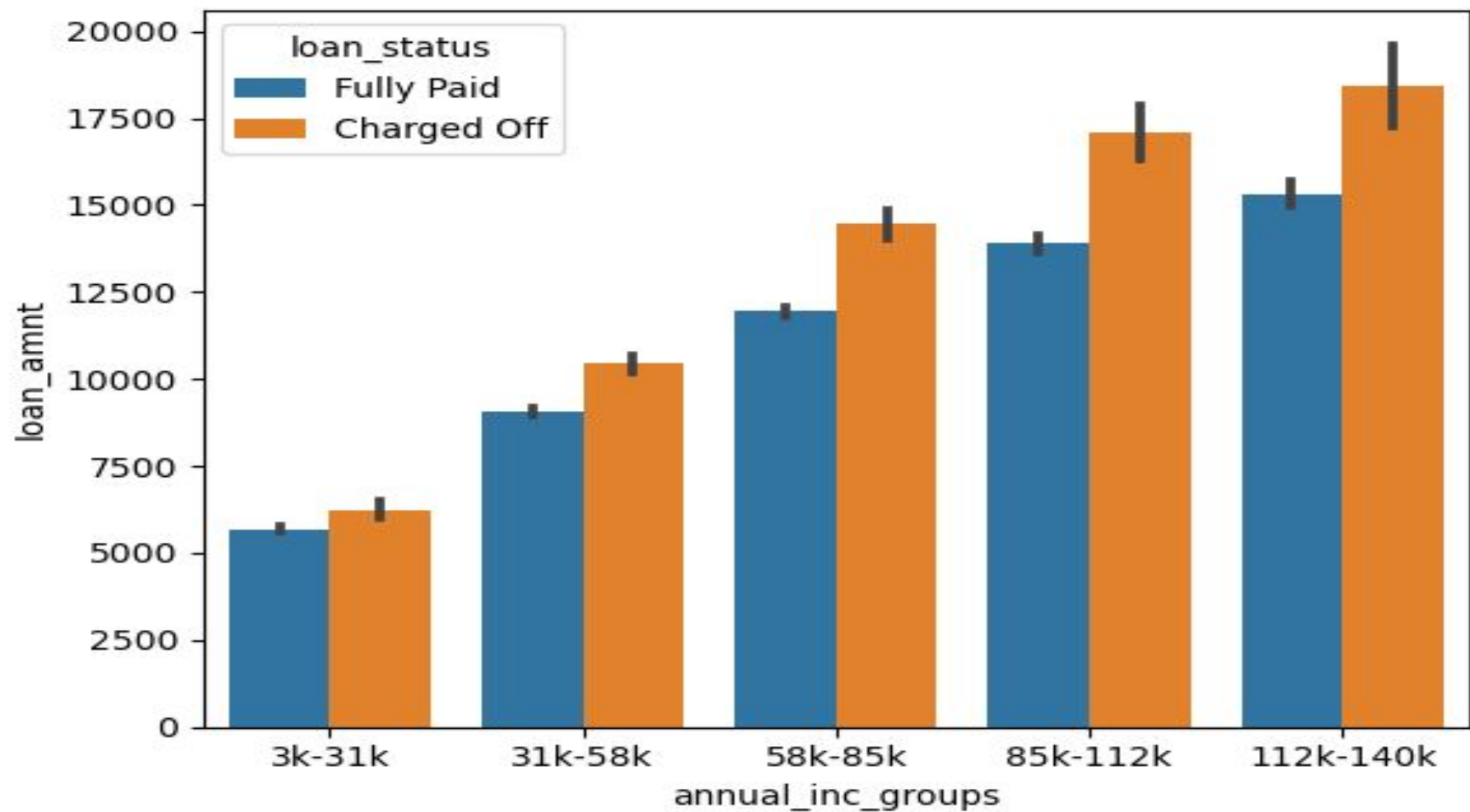


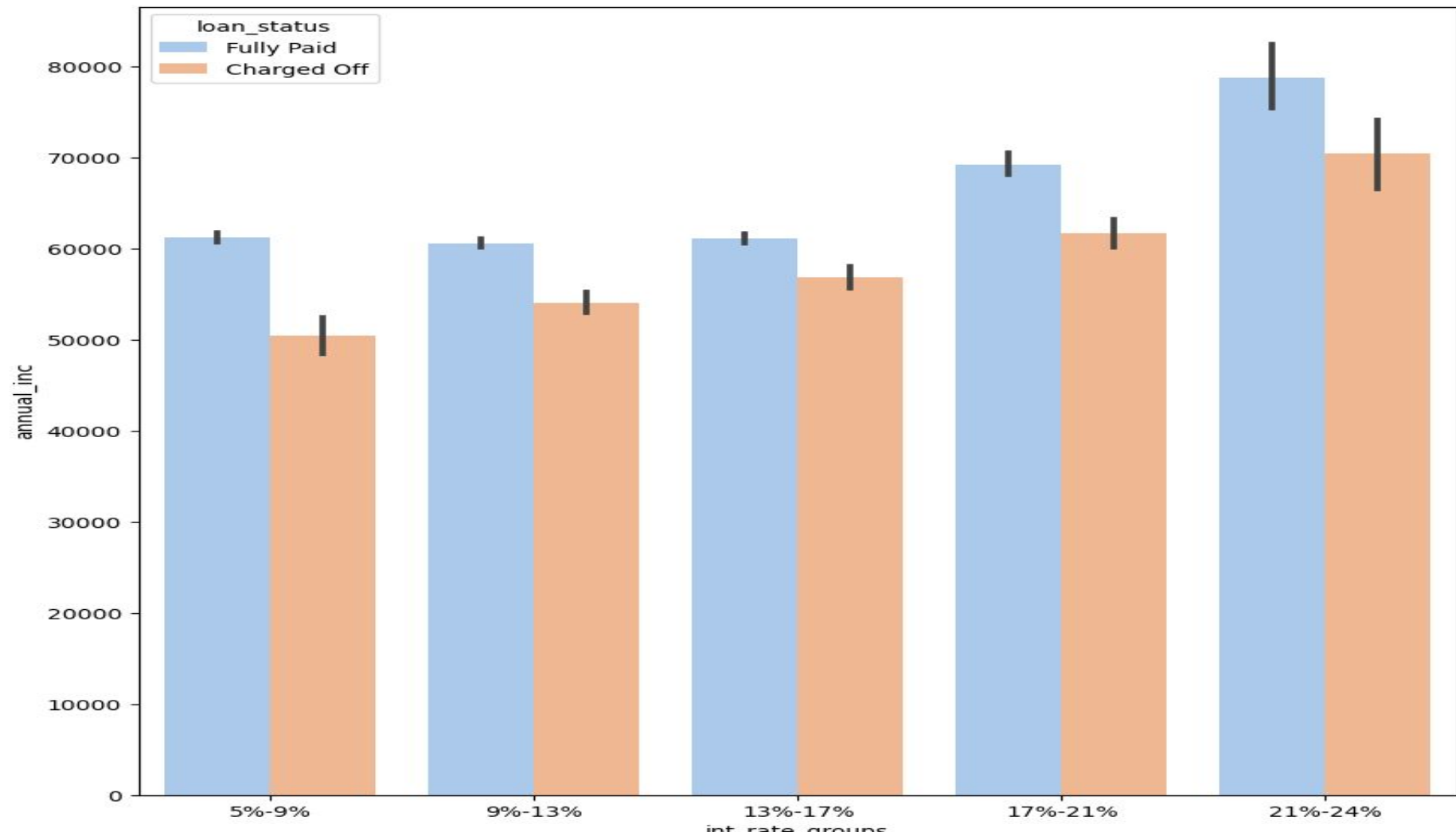


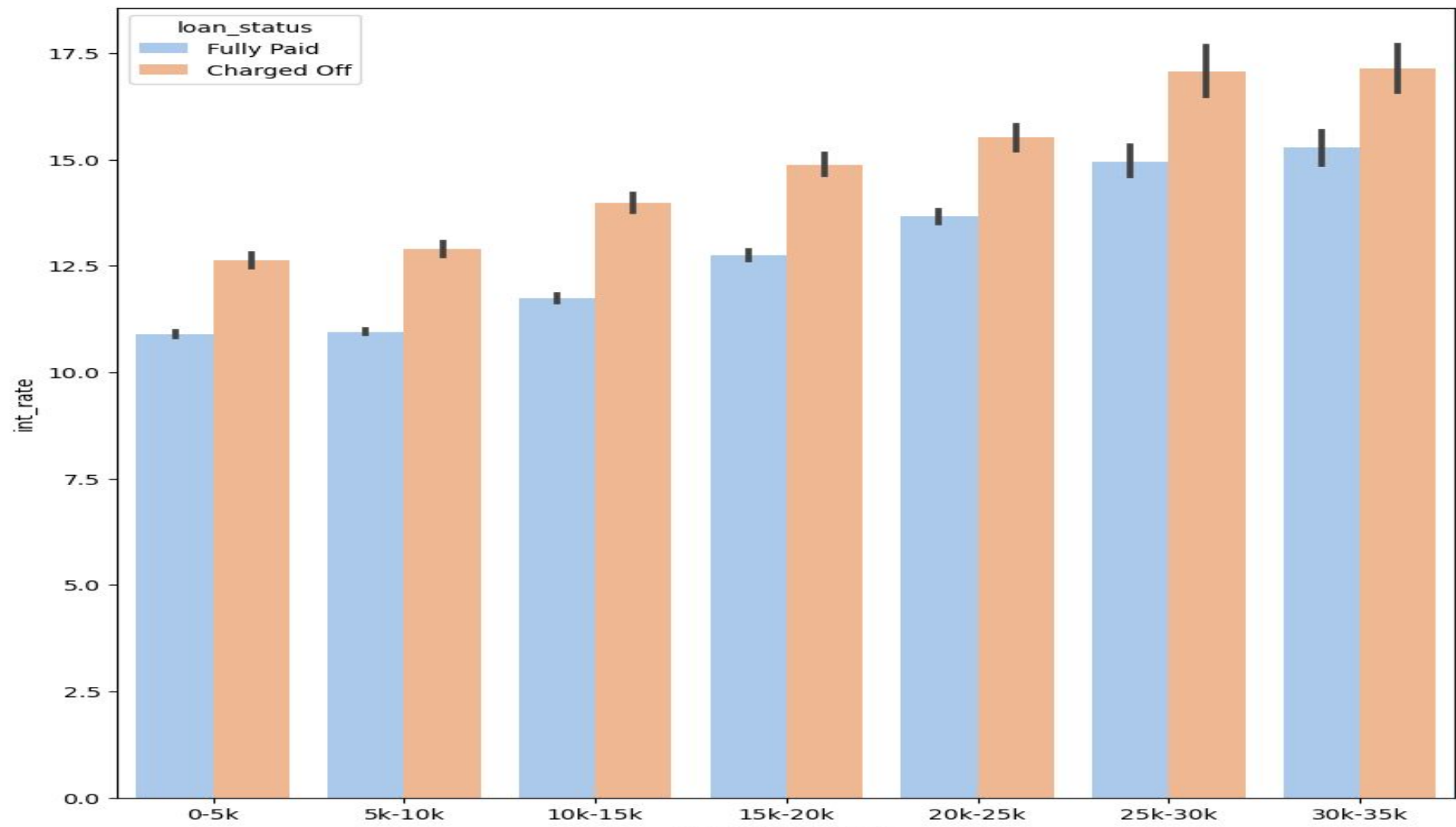
Bi/Multi Variate analysis further

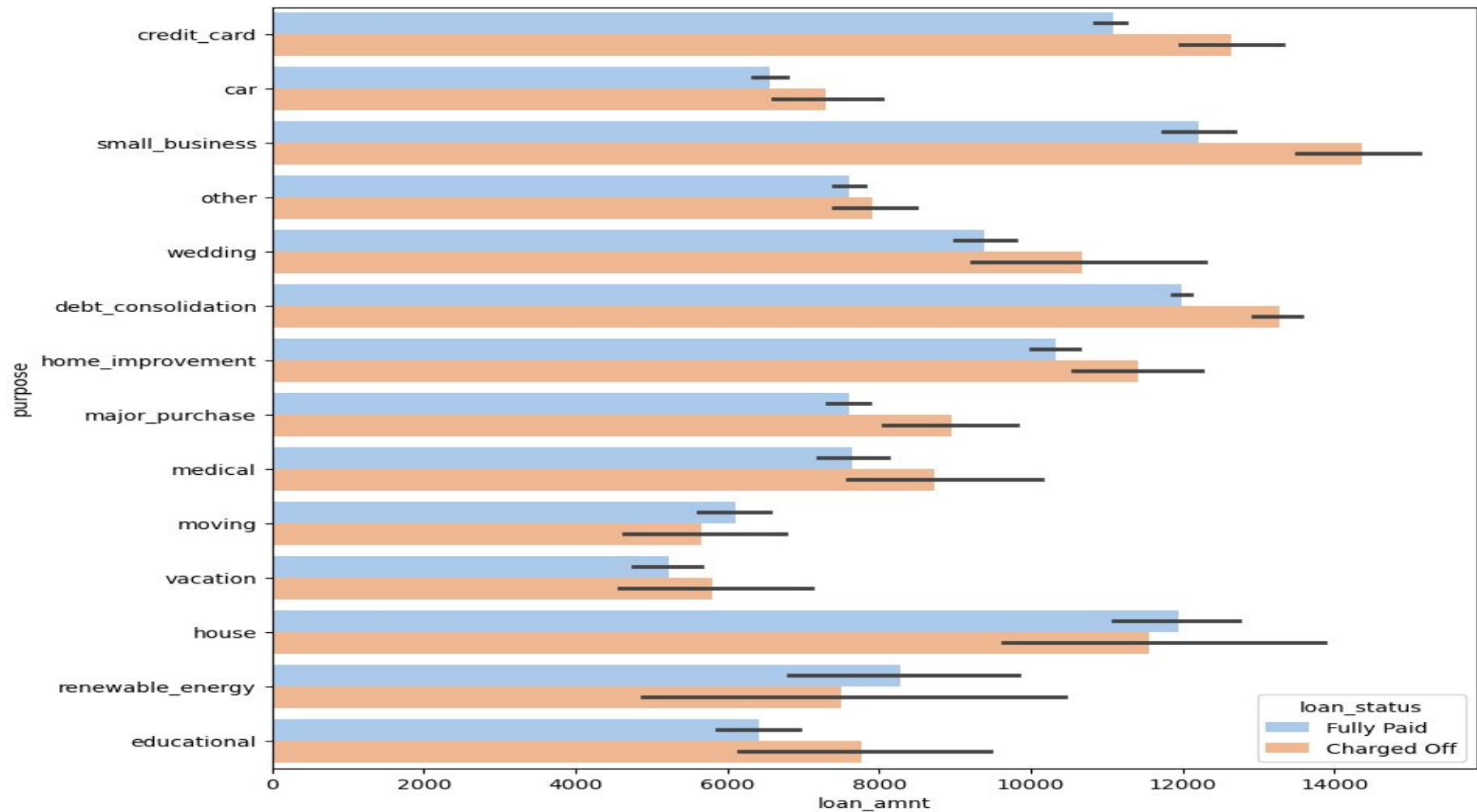


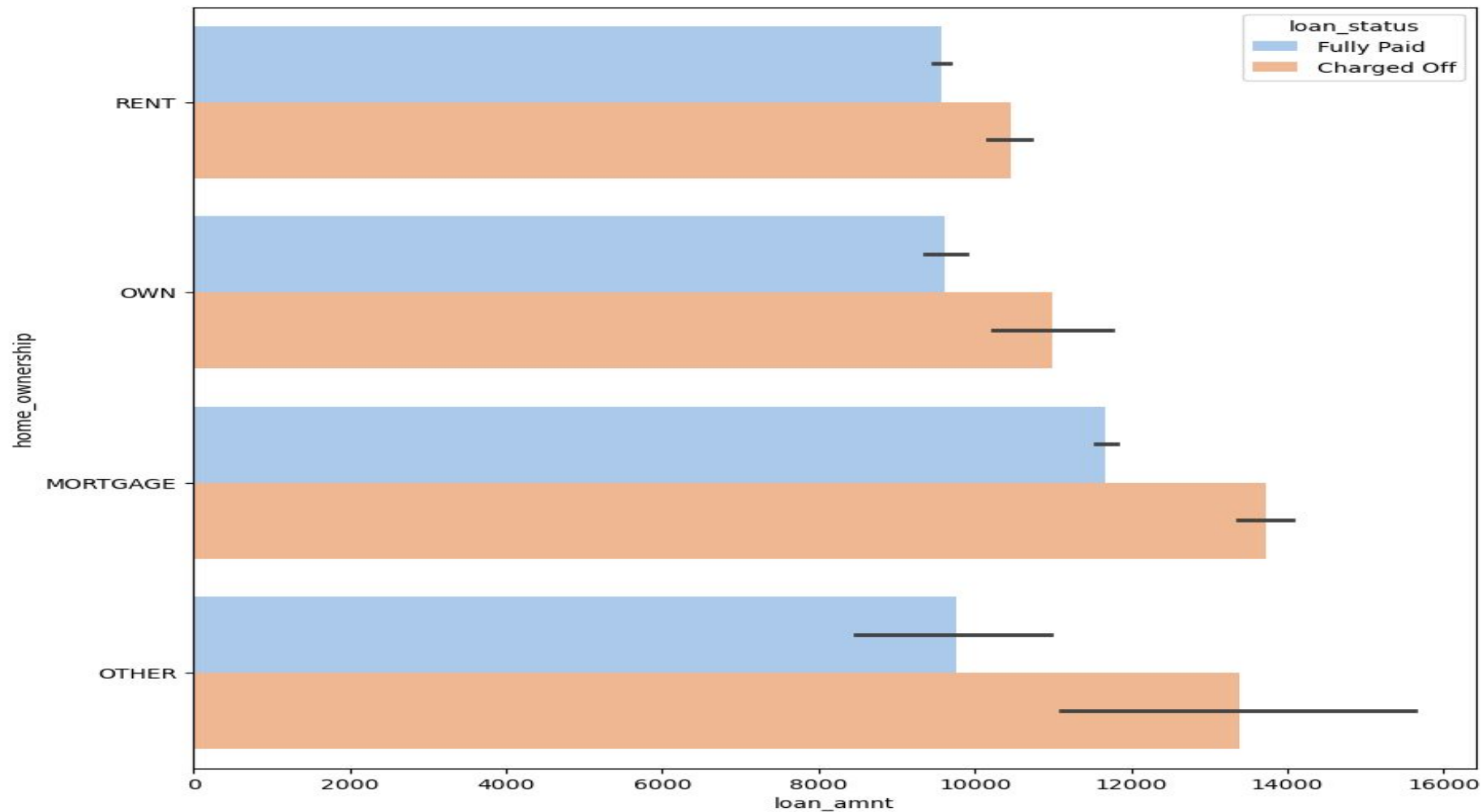


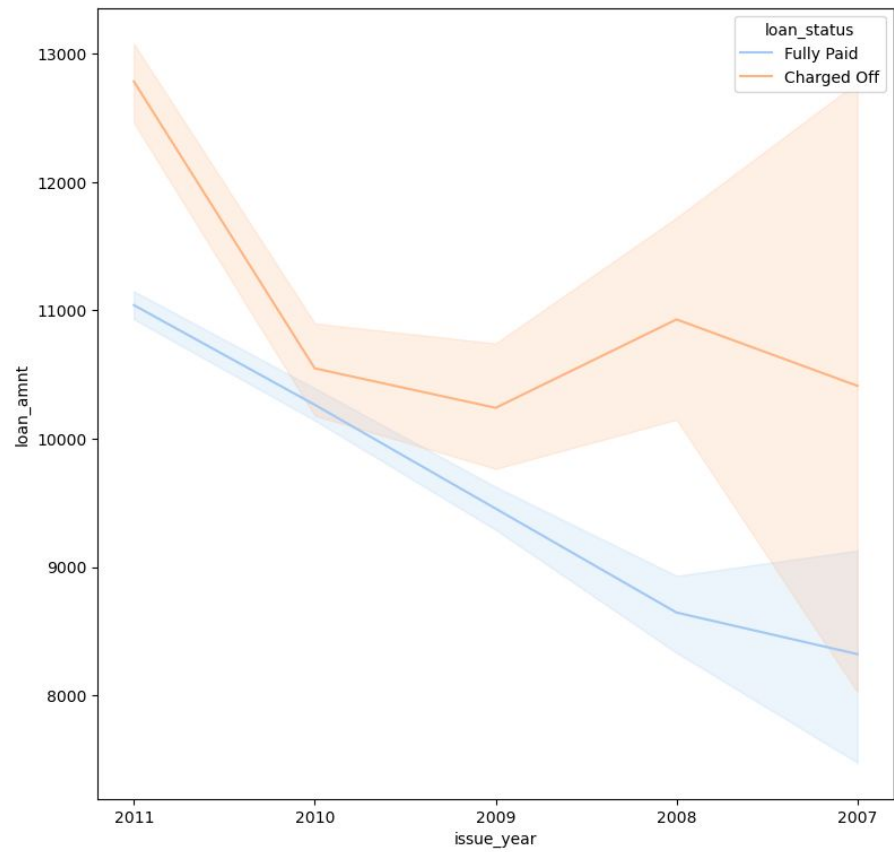
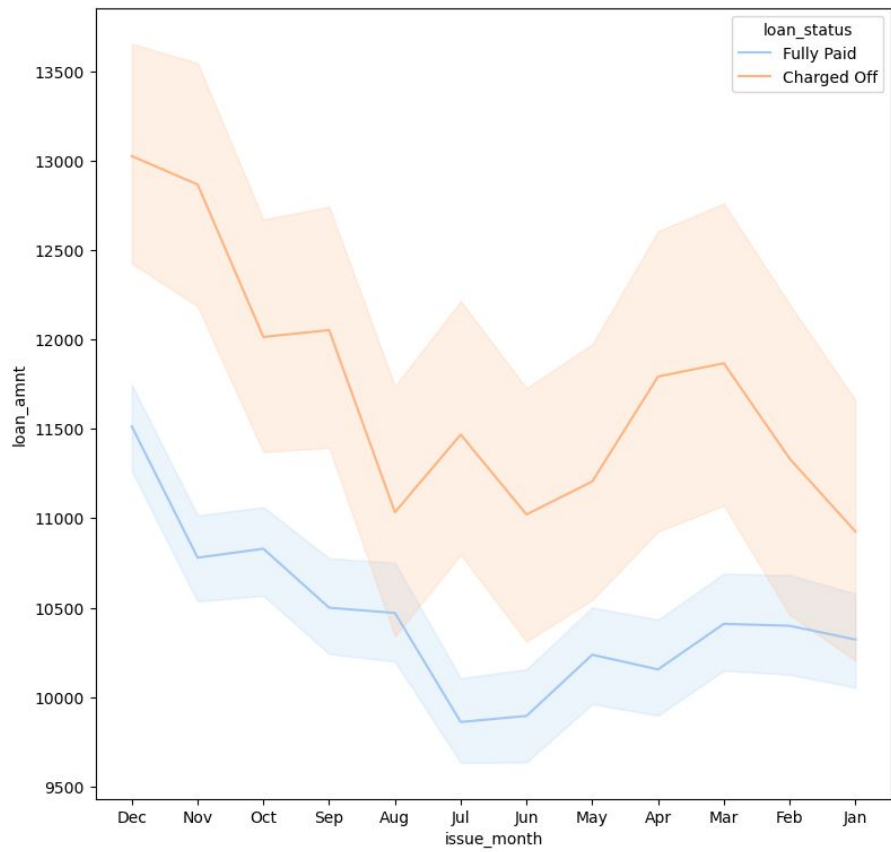


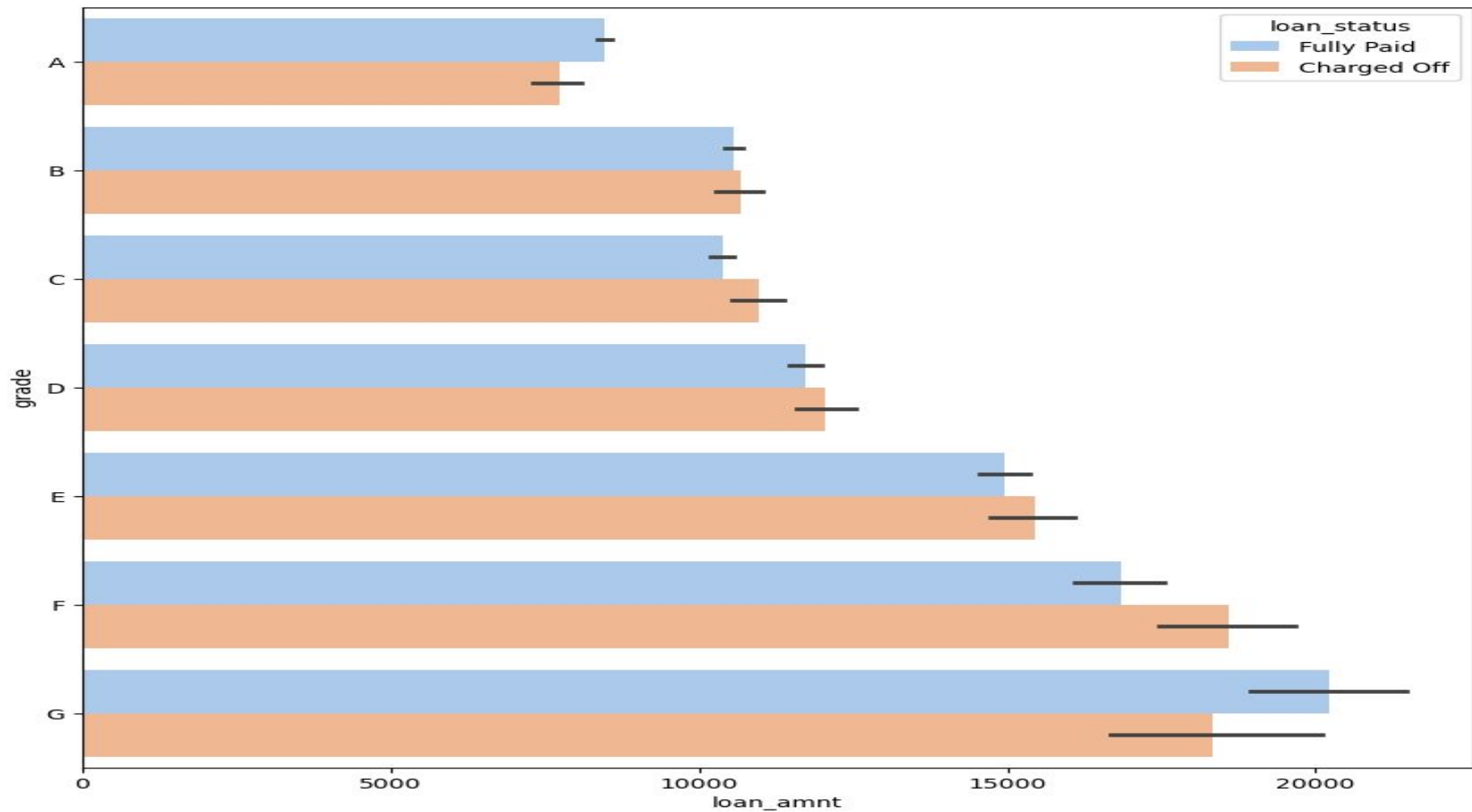


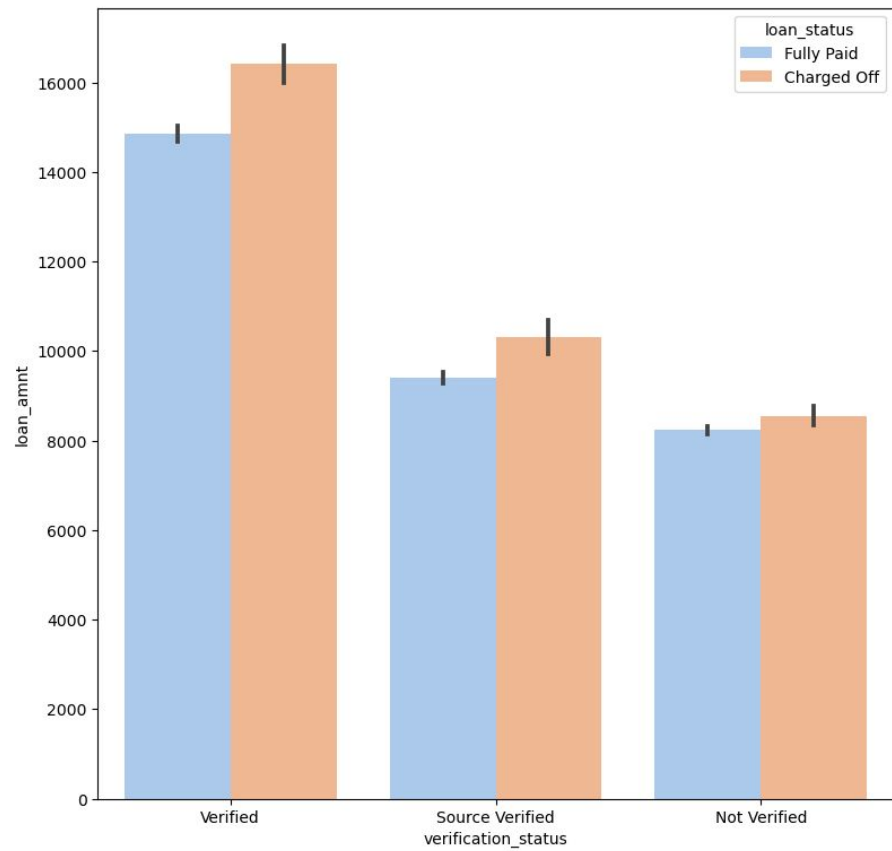
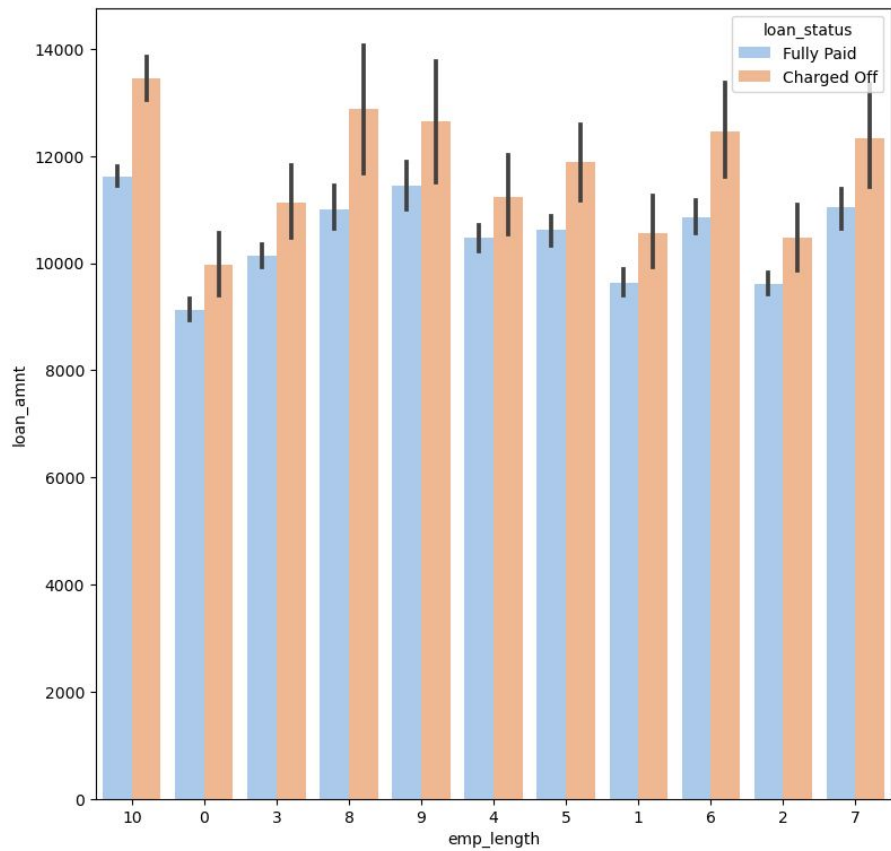


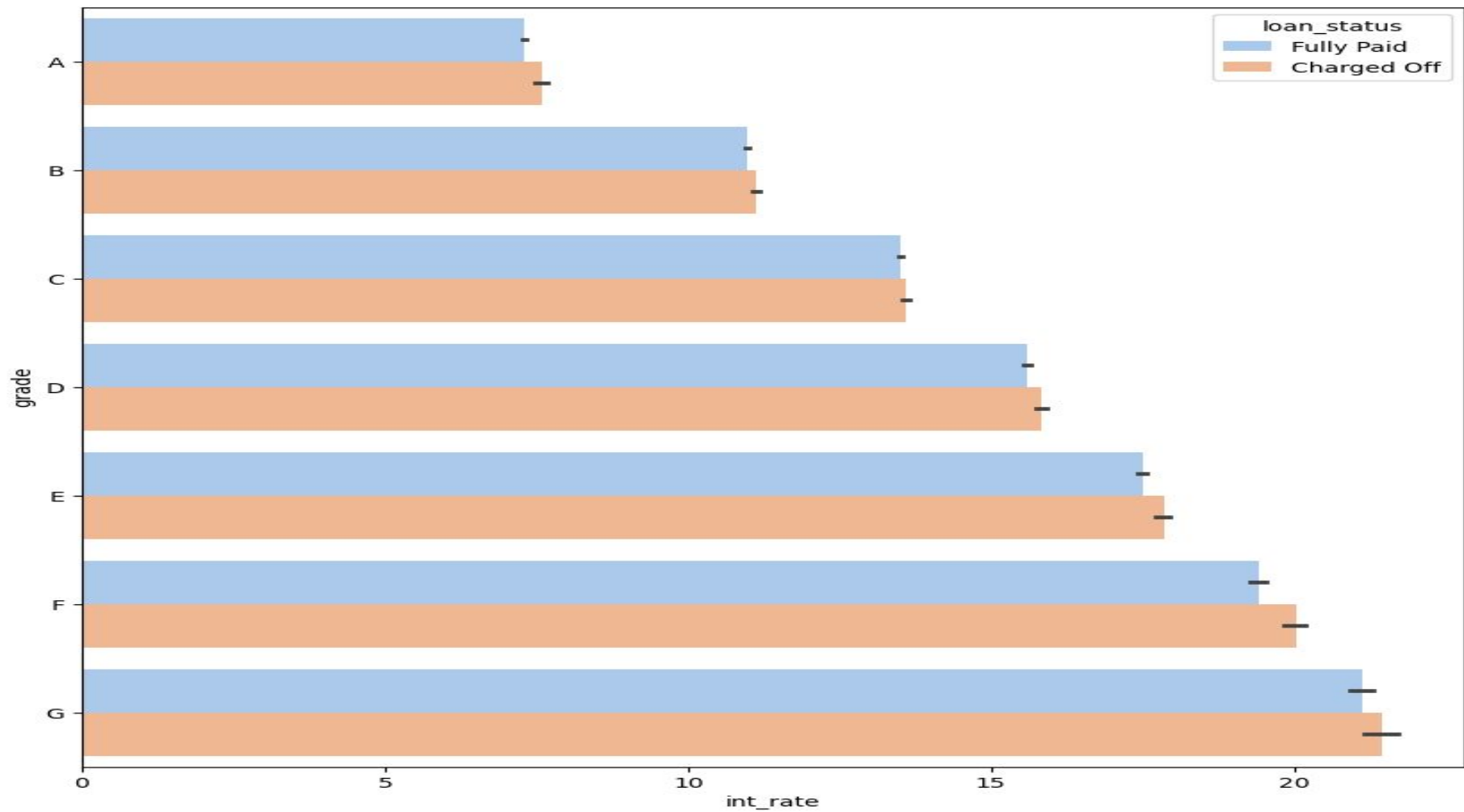


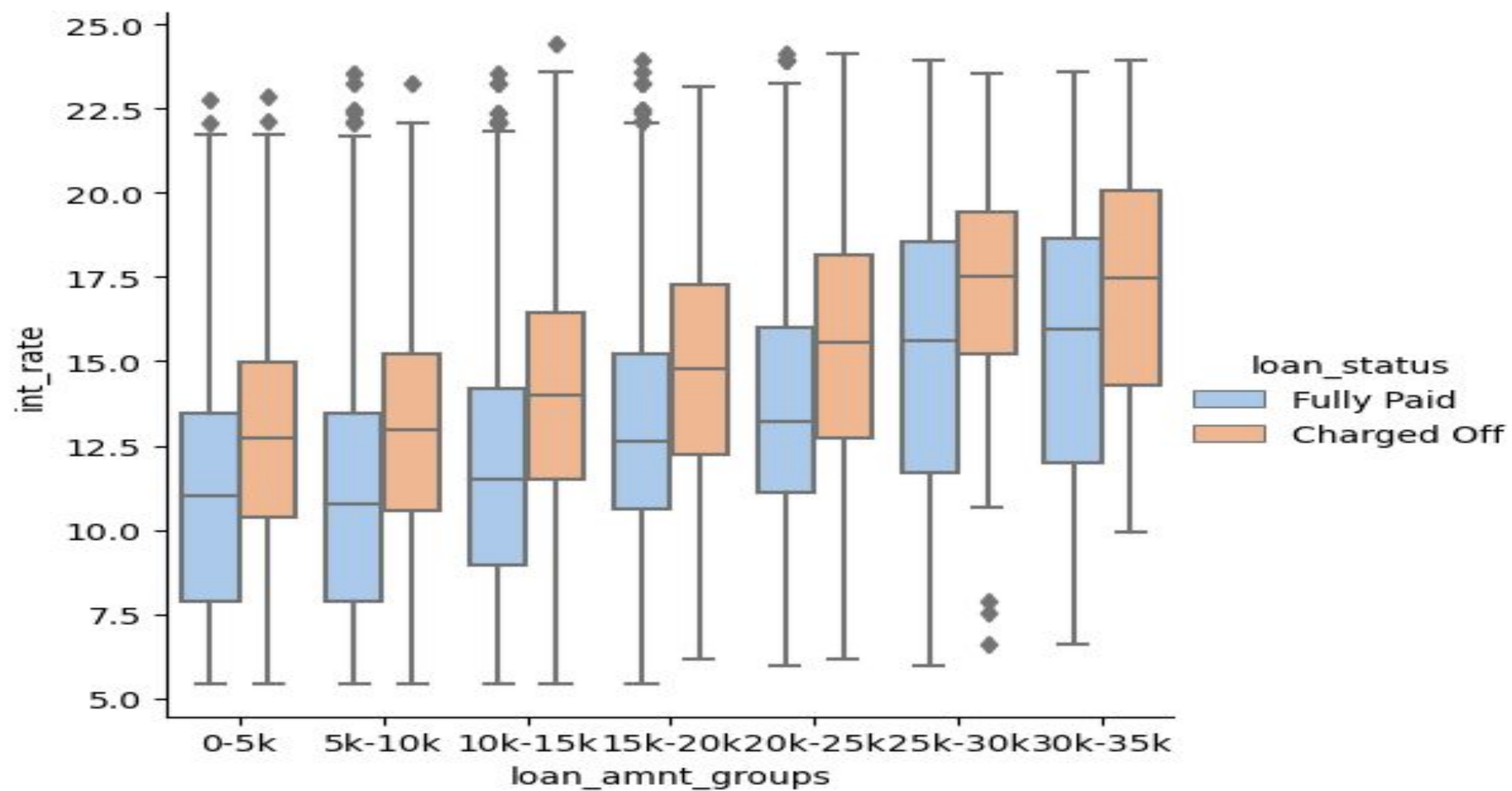


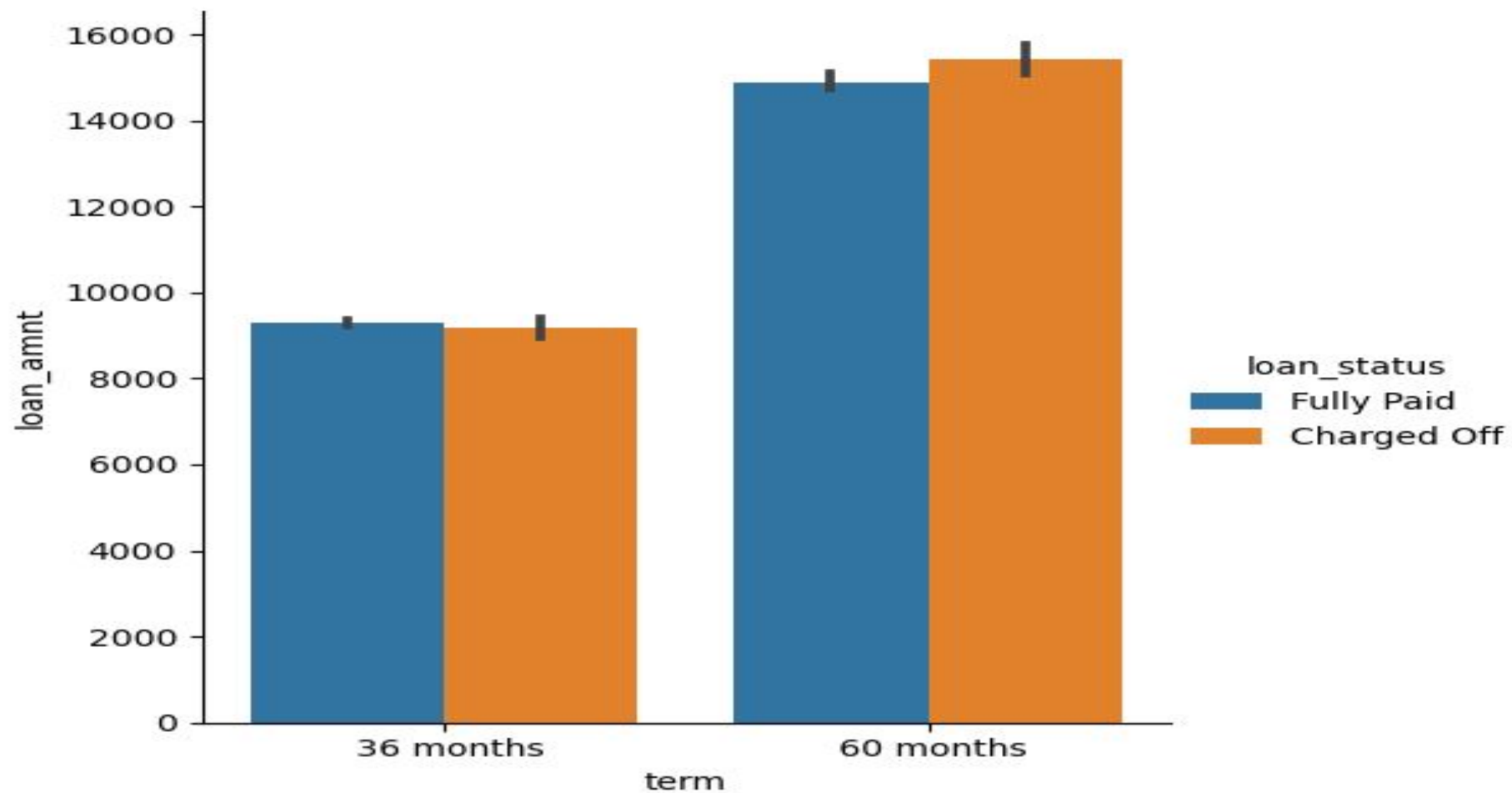












Conclusions

Univariate analysis with respect to the charged off loans.
There is a more probability of defaulting when :

- Applicants having house_ownership as 'RENT'
- Applicants who receive interest at the rate of 13-17%
- Applicants who have an income of range 31201 - 58402
- Applicants with employment length of 10
- When funded amount by investor is between 5000-10000
- Loan amount is between 5429 - 10357
- Dti is between 12-18
- When monthly installments are between 145-274
- Term of 36 months
- When the loan status is Not verified
- When the no of enquiries in last 6 months is 0
- When the number of derogatory public records is 0
- When the purpose is 'debt_consolidation'
- Grade is 'B'
- And a total grade of 'B5' level.

Bivariate/multivariate analysis with respect to the charged off loans. There is a more probability of defaulting when :

- Applicants taking loan for 'home improvement' and have income of 60k -70k
- Applicants whose home ownership is 'MORTGAGE and have income of 60-70k
- Applicants who receive interest at the rate of 21-24% and have an income of 70k-80k
- Applicants who have taken a loan in the range 30k - 35k and are charged interest rate of 15-17.5 %
- Applicants who have taken a loan for small business and the loan amount is greater than 14k
- Applicants whose home ownership is 'MORTGAGE and have loan of 14-16k
- When grade is F and loan amount is between 15k-20k
- When employment length is 10yrs and loan amount is 12k-14k
- When the loan is verified and loan amount is above 16k
- For grade G and interest rate above 20%

Useful Information

- The interest rate for charged off loans is pretty high than that of fully paid loans in all the loan_amount groups. So this can be a pretty strong driving factor for loan defaulting.
- Employees with longer working history got the loan approved for a higher amount. Looking at 36 slide , the verification status data, verified loan applications tend to have higher loan amount. Which might indicate that the firms are first verifying the loans with higher values.