**Question 8.1**

*Describe a situation or problem from your job, everyday life, current events, etc., for which a linear regression model would be appropriate. List some (up to 5) predictors that you might use.*

I supervised a project for a company that builds machinery with custom features. Based on a generic base model, potential customers specify additional features they need, and the company quotes a price. The goal of the project was to create a linear regression model to estimate the cost to build each unit, based on the number of units, time until delivery, and binary variables for each of the potential features. (It could also include interaction terms between them.) The model would be trained on data from previous completed projects.