

# Overview

- ▶ Binary logistic regression, also called a logit model, is used to model **dichotomous outcome** variables. In the logit model the log odds of the outcome is modeled as a linear combination of the predictor variables.
- ▶ Multinomial logistic regression is used to model nominal outcome variables (categorical variables). Again the log odds of the outcomes are modeled as a linear combination of the predictor variables.

- ▶ Ordinal logistic regression is used to model nominal outcome variables, where a hierarchy within categories exists.
- ▶ Poisson regression is used to model count variables.
- ▶ Negative binomial regression is for modeling count variables, usually for over-dispersed count outcome variables.