



Prof. Chih-Rung Chen/ Institute of Statistics

Regression Analysis, Statistical Quality Control

My primary research interests include the following two major parts:

- (a) **Regression Analysis:** Developing useful statistical analysis techniques for (1) analyzing questionnaire survey data by utilizing a latent class regression model with Prof. Guan-Hua Huang; (2) predicting the highway future traffic flow by utilizing a spatial-temporal process regression model with several colleagues; and (3) analyzing non-normal regression data by utilizing a general transformed truncated normal heteroscedastic mode regression model.
- (b) **Statistical Quality Control:** Developing useful monitoring schemes for controlling the quality of manufacturing processes by utilizing a multivariate exponentially weighted moving average technique with Prof. Jyh-Jen Horng Shiau.