

**Wiener Biometrische Sektion
der Internationalen Biometrischen Gesellschaft
Region Österreich – Schweiz**

<http://www.meduniwien.ac.at/wbs/>

Einladung zum

Biometrischen Kolloquium

am Donnerstag den 16.11.06 um 13:30 Uhr

in der Bibliothek (gegenüber Lift, Ebene 3) der Besonderen
Einrichtung für Medizinische Statistik und Informatik (MSI) der
Medizinischen Universität Wien, Spitalgasse 23, 1090 Wien

Es spricht Fr. Mag. Maja Pohar, Department of Medical Informatics,
University of Ljubljana, zum Thema:

Regression in Relative Survival using R

Wir ersuchen um zahlreichen Besuch für diesen sehr interessanten
und aktuellen Vortrag.

Werner Brannath
Präsident

Thomas Lang
Sekretär

Regression in Relative Survival using R

Maja Pohar
Department of Medical Informatics
University of Ljubljana, Slovenia

Abstract

Relative survival methods use the population mortality tables to give information about cause specific survival when the patients' causes of death are unknown. Various regression models exist with their results and interpretation being quite different or even seemingly contradictory. When choosing the appropriate model, one must therefore be aware of the assumptions made. In this talk, we present

- the transformation approach, that allows for fitting a model without making assumptions about the relationship between the observed and population hazard;
- the methods for checking the proportional excess hazards assumption in the additive model;
- an EM algorithm based fitting approach that allows for a semi-parametric additive model.

The several aspects of relative survival will be illustrated using our R package `relsurv`, that covers all the commonly used relative survival methods, from using the population tables and plotting the relative survival curves to fitting and evaluating the various models with common goodness of fit methods.