

Assignment for EP16: Missing Values in Clinical Research

Multiple Imputation

14 – 18 May, 2018

Data

The **MIdat21** data comprise data of 1016 liver transplant patients that are followed up after receiving the transplant, from a multi-center study.

The dataset contains the following variables:

variable	explanation
<code>ID</code>	patient identifier
<code>outcome</code>	survival outcome
<code>time</code>	event time
<code>bg_don</code>	blood group of the organ donor
<code>year</code>	year the transplant was performed
<code>sex</code>	sex of the recipient (patient)
<code>bg_rec</code>	blood group of the recipient (patient)
<code>graft</code>	type of graft (HF: heart beating donor, full liver; HP: heart beating donor, partial liver; DF: domino transplant, full liver; LL: living donor, split liver; NF: non-heart beating donor, full liver; HR: heart beating donor, reduced liver; NP: non-heart beating donor; partial liver)
<code>center</code>	study center identifier
<code>isc_time</code>	ischemic time (time the organ was outside the body)
<code>age_don</code>	age of the donor
<code>bg_match</code>	are the blood groups of donor and recipient equal? (<code>factor(bg_don == bg_rec)</code>)
<code>age_rec</code>	age of the recipient (patient)
<code>birth</code>	year of birth of the recipient (patient)

Analysis model of interest

The analysis model of interest is a Cox proportional hazard regression model with event time `time` and event indicator `outcome` and covariates `year`, `bg_match`, `isc_time`, `age_don`, `age_rec` and `sex`.