MTH6157 Survival Models

Week 3 Tutorial Question on Kaplan Meier using R

1. A researcher is investigating the quality of care for a certain illness in two different hospitals. They collect data from two hospitals on the number of days ten patients from each hospital have to stay before they go home. The results are shown in the table below with * indicating patients who discharge themselves before they recover from the illness.

Hospital A	4	5*	4	4	3	6	5	2	5*	4
Hospital B	2	5	3	2	3	4	7	3	3	7

- (a) Use R and the **survival** package to find a Kaplan Meier Estimate of the survival function for each of the hospitals.
- (b) Plot the two survival functions making sure that you add suitable axis labels, title, legend and different colours for the two survival functions.
- (c) What does this analysis say about which hospital offers the best care for this illness?