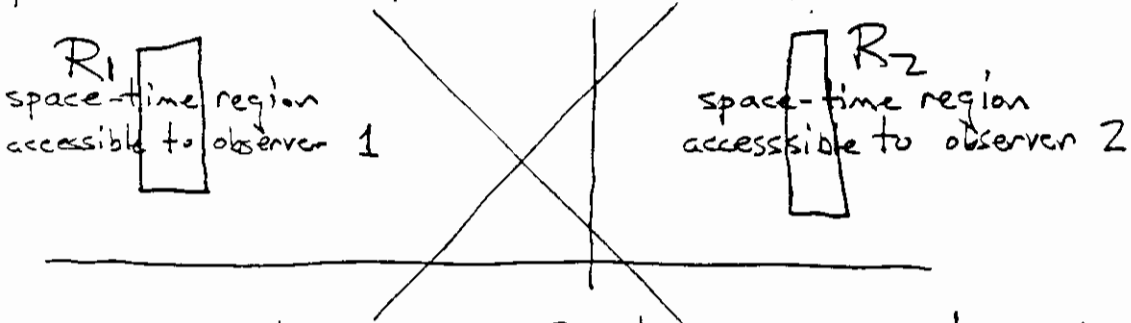
R_1
space-time region
accessible to observer 1
R_2
space-time region
accessible to observer 2