

T73S04 Session 38B Homework – Probabilistics

Last Update: 11/6/2015

Mentor Guide Questions

1.49 Discuss what alleviations in the derivation of the creep ductility of materials may be available to reduce levels of conservatism (e.g. for 316 or 304 steels)

1.50 Discuss stress-rupture formulations which take account of multiaxial states of stressing

1.52 Identify the items which should be included in the report of a creep-fatigue initiation assessment to R5, including sensitivity studies

1.53 Discuss the validation data available to support the claims of conservatism of the R5 creep-fatigue crack initiation assessment methodology

1.54 Discuss any special requirements for probabilistic analysis and assessment

Numerical Questions

If there are N distributed variables and each side of the resulting N -dimensional hypercube is divided into B bins, how many different Latin hypercubes are there?