

Calculus 111, Chapter 8 Summary ~ things you should know

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Chapter 8 - Important concepts:

random variables

probability distribution table

histogram

expected value (mean)

variance and standard deviation

binomial probability distribution

hypergeometric probability distribution

normal probability distribution

Be able to:

construct the probability distribution table for a given random variable

construct the histogram for a given random variable

calculate the expected value for a given discrete random variable

calculate the variance and standard deviation for a given discrete random variable

calculate probabilities for a binomial experiment, using both formula and tables

calculate expected value, variance and standard deviation for a binomial experiment

calculate probabilities for a hypergeometric experiment, using the formula

calculate expected value for a hypergeometric experiment

calculate probabilities for a normal distribution, using the normal probability tables

calculate probabilities for an application which involves a normal probability distribution

Review exercises from the text:

Chapter 8 Review Exercises, 1 – 18, 21 – 25 (answers to odd-numbered problems are in the student solutions manual)

Appendix E pages 13-14, Self-Check Problems, 1 – 2

Appendix E pages 13-14, Exercises, 1 – 7