Detailed Homework Instructions

An example section follows the guidelines.

- Place your name in the upper right hand corner of the page.
- Place the section number in the upper right hand corner of the page under your name.
- You may optionally write the homework assignment. It helps when you're doing the homework so you don't have to keep on looking back to the homework sheet each time.
- Check each correct odd problem with a red pen. There are times you will not be able to verify whether an even problem is correct, so the only requirement is to check the odds.
- If the problem is not correct, please go back and correct it before turning it in. You are not grading what you had correct the first time around, but what you had correct by the time of the exam.
- Score the section at the top of the page as a fraction (number of odds correct over the total number of odds).
- Convert that fraction into a percent (round to the nearest whole number).
- Use the chart to award points. In this case, 100% falls in the 80-100% range, and would be awarded 2 points.
- Record only the points on the homework sheet.
- Make sure your homework is legible.
- Show work where necessary. (The instructions for 33-37 were to use the calculator, so there is no work). Problem 31, however is something that can not be done in your head, so show the work.
- Be sure to allow plenty of room between problems. Don't crowd your homework.
- You will be able to use your homework on the final exam. Make sure all problems are legible and clearly identified. There could be problems directly from the homework on the final exam.
- You really should get 100% on each section since you only have to grade the odd problems.
- If you're not going to get 100% on each section, make sure you at least get 80% so you can get the 2 points.
- Please make an effort to do the difficult problems, rather than just doing enough of the easy ones to get the 80%. The more difficult ones help you to make sure that you really understand the material, rather than just being able to punch something into the calculator.

Sample Section (section 7.6)

James Jones
Sect 7.6
25-37, 47-49

$$\frac{9}{9} = 100\% \quad +2$$

$\checkmark$25. $_4P_4 = 4 \cdot 3 \cdot 2 \cdot 1 = 24$

$\checkmark$27. $_8P_3 = 8 \cdot 7 \cdot 6 = 336$

$\checkmark$29. $_5P_4 = 5 \cdot 4 \cdot 3 \cdot 2 = 120$

$\checkmark$31. $14 \cdot {_nP_3} = {_{n+2}P_4}$

$14 \cdot n(n-1)(n-2) = (n+2)(n+1)(n)(n-1)$

$14(n-2) = (n+2)(n+1)$

$14n - 28 = n^2 + 3n + 2$

$n^2 - 11n + 30 = 0$

$(n - 6)(n-5) = 0$

$n = 6 \qquad n = 5$

$\{5, 6\}$

$\checkmark$33. $_{20}P_5 = 186,480$ Calculator

$\checkmark$35. $_{100}P_3 = 970,200$ Calculator

$\checkmark$37. $_{20}C_5 = 15,504$ Calculator

$\checkmark$47. $\dfrac{7!}{(2!)(1!)(3!)(1!)} = \dfrac{5040}{2 \cdot 1 \cdot 6 \cdot 1} = 420$

$\checkmark$49. $\dfrac{7!}{(2!)(1!)(1!)(1!)(1!)(1!)} = \dfrac{5040}{2 \cdot 1 \cdot 1 \cdot 1 \cdot 1 \cdot 1} = 2520$