

ANSC/TPSS Assignment 6  
Split Split Plot

1. Analyze the following experiment using SAS. Make sure correct F tests are used.
2. Show how the experiment would be analyzed by hand or in Excel by:
  - a. showing the sources of variation and df for the ANOVA
  - b. showing the subtables to be used to calculate the SS for each source
  - c. showing the numbers which would go into each SS calculation (partial lists are fine)

Sugar beet virus control experiment

Main Plant	Sub Spray	Sub-Sub Harvest	Sugar Beet Root Yields (tons/acre)				
			Block				
				1	2	3	4
	1	1	1	25.7	25.4	23.8	22.0
	1	1	2	31.8	29.5	28.7	26.4
	1	1	3	34.6	37.2	29.1	23.7
	1	2	1	27.7	30.3	30.2	33.2
	1	2	2	38.0	40.6	34.6	31.0
	1	2	3	42.1	43.6	44.6	42.7
	2	1	1	28.9	24.7	27.8	23.4
	2	1	2	37.5	31.5	31.0	27.8
	2	1	3	38.4	32.5	31.2	29.8
	2	2	1	38.0	31.0	29.5	30.7
	2	2	2	36.9	31.9	31.5	35.9
	2	2	3	44.2	41.6	38.9	37.6
	3	1	1	23.4	24.2	21.2	20.9
	3	1	2	25.3	27.7	23.7	24.3
	3	1	3	29.8	29.9	24.3	23.8
	3	2	1	20.8	23.0	25.2	23.1
	3	2	2	29.0	32.0	26.5	31.2
	3	2	3	36.6	37.8	34.8	40.2