HDAT 9600 - Assignment 1: Linear Models

Name: Zhenyu Zhang

	Available Marks	Achieved Marks	Comments
Task 1			
Question 1A	**0.5**	0.5	
Question 1B	**0.5**	0.5	
Question 1C	**1**	0.75	Good discussion - just to note that the 90% CI doesn't indicate stronger confidence, it is more that if we relax our threshold to being 90% confident, then the beta value is expected to fall in this narrower range.
Question 1D	**0.5**	0.5	
Question 1E	**2**	2	Good discussion
Question 1F	**2**	2	
Question 1G	**2**	2	
Question 1H	**1.5**	1.5	Very clear discussion of the changes supported by citing the key values from your results.
Task 2			
Question 2A	**2.5**	2	Fantastic and thorough EDA. You could work on a few things like sizing of plots and including titles. You summarise your findings well. To note that there were two obs per person so the sample size was 11 and 24.
Question 2B	**1**	1	Beautifully presented histograms. Your titles were cutting off a little - try using \n to include a line break. Eg. "Rotation Difference\n for Treatment Group"
Question 2C	**1.5**	1.25	You pick up the main issue of independence with the two obs from the same person likely to be correlated. I disagree slightly on your point in para two that running two models doesn't address the independence issue. Within each model it solves this issue. I agree mixed-effect models are often a great choice for correlated data and would be a more efficient choice!
Question 2D	**1**	1	
Question 2E	**1**	1	
Question 2F	**1**	1	
Question 2G	**1**	1	
Question 2H	**1**	0.5	You take an interesting approach here, but need to fit your model to a new dataset using the predict() function rather than run a new model.

Task 1	**10**	**9.75**
Task 2	**10**	**8.75**
TOTAL	**20**	**18.5 (93%)**