# START OF QUIZ Student ID: 78097441, Tampubolon, Juan

Topic: Lecture 1 Source: Lecture 1

Why does the substitution test work for identifying constituents? Do you think there are any constraints on what can be substituted? Explain briefly. (1)

Topic: Lecture 4 Source: Lecture 4

We didn't talk about it in class, but how do you think a parenthetic clause (where an explanatory or tangential clause is inserted into another) might be accounted for in a CFG or feature grammar? You can assume that it works similarly for all different types of phrases. (1)

Topic: Lecture 3 Source: Lecture 3

Explain why the following rule is not valid in a CFG: dog VB -> dog barks (1)

Topic: Lecture 4 Source: Lecture 4

Briefly describe how underspecification works in a feature grammar. (1)

Topic: Lecture 2 Source: Lecture 2

Why do we not use accuracy to evaluate chunkers? Can you think of any other tasks where this might be as big (or bigger) of a problem? (1)

Topic: Lecture 2 Source: Lecture 2

Imagine you're working on analysing customer feedback, and your boss wants you to identify the most common complaints. How might you use your parsing knowledge to automate and distill the most common complaints? You can assume that complaints have already been labeled with the product they are complaining about. You can also assume that just sorting the frequency of tokens is going to be insufficient. (2)

Topic: Lecture 1 Source: Lecture 1

Imagine someone develops a new parser that has 100% accuracy. The developer claims it has 100% on every test set they've tried. Why might you be sceptical of such claims? How would you go about trying to disprove them? (2)

Topic: Lecture 3 Source: Lecture 3

Post-positive adjectives are adjectives that occur after the noun phrase they are modifying (such as "attorney/surgeon general", "somewhere nice", "nothing important"). Given that they tend to occur in set phrases, do you think it would be better to write a general class of PostAdj, and create PostAdj phrases in a CFG, or just list them as valid NPs (ie, NP = surgeon general)? Discuss the pros and cons of either decision. (2)

Topic: Long

Source: Lecture 4

Imagine you're building a tool to help second language learners of language X. You have a grammar of their first language (L1), and a grammar of the language they are trying to learn (X). How might you build a tool that learns how to translate a production from L1 into X? Describe any additional data or tools you might need, and the process you would use to learn a "production-translation grammar". Also explain how you could use this to create illustrative examples of how the syntax of language X works.

# END OF QUIZ