



Tutorial 3 & Discussion

WOA7013

1. Common nouns can be divided into count nouns and mass nouns. Explain the differences between these two nouns by using relevant examples.

2. Suppose an HMM part-of-speech tagger has been applied to a famous tongue twister as shown below. Use the tagged tongue twister to estimate the following probabilities (you may ignore the punctuations marks).

*I/PRO thought/VB a/ART thought/NOUN but/CONJ the/ART thought/NOUN
I/PRO thought/VB was/VB not/ADV the/ART thought/NOUN I/PRO
thought/VB I/PRO thought/VB.*

- i. $P(\text{the})$*
- ii. $P(\text{NOUN})$*
- iii. $P(\text{thought} \mid I)$*
- iv. $P(\text{thought} \mid \text{VB})$*
- v. $P(\text{ART} \mid \text{VB})$*