Introduction to Semantics: Homework 2
Answer key

Sentence entailments

(1)   a.   Today is sunny.
        b.   Today is warm.

(1a) does not entail (1b) here. There's no infelicity in uttering *Today is sunny, but it isn't warm.*, for example.

(2)   a.   Jane ate oatmeal for breakfast this morning.
        b.   Jane ate breakfast this morning.

(2a) entails (2b) here. It seems infelicitous to say *Jane ate oatmeal for breakfast this morning, but she didn't eat breakfast this morning.*, for example.

(3)   a.   Jane ate oatmeal for breakfast this morning.
        b.   Jane ate something hot this morning.

(3a) does not entail (3b). For example *Jane ate only oatmeal for breakfast this morning, and it was cold.* entails (3a), but it entails the negation of (3b). Additionaly assuming (3a) entails (3b) would result in a contradition.

(4)   a.   Juan is not aware that Mindy is pregnant.
        b.   Mindy is pregnant.

(4a) entails (4b). In particular, it presupposes its truth. It's infelicitous to utter *Juan is not aware that Mindy is pregnant, which she is not.*, for example. But testing a negated version of the sentence yields the same infelicity, e.g., *Juan is aware that Mindy is pregnant, which she is not.*. This result suggests that the truth of (4b) is presupposed by (4a).

(5)   a.   Every second year student who knows Latin will get credit for it.
        b.   If John is a second year student and knows Latin, he will get credit for it.

(5a) entails (5b). Using the same tests as above, consider following (5a) with the sentence *John is a second year student and knows Latin, and he will not get credit for it.*. This continuation is not felicitous, which suggests that if (5a) is true, then the continuation is false. If it is false, then either John is not a second year, he doesn't know Latin, or he is and he does, but he in fact will get credit for it. In such a situation, (5b) is true.

(6)   a.   If Alice wins a fellowship, she can finish her thesis.
        b.   If Alice doesn't win a fellowship, she can't finish her thesis.

(6a) does not entail (6b). There appears to be an inference from (6a) to (6b), but consider following (6a) up with *Hell, if she doesn't win a fellowship, she can finish it too!*. Such a continuation is felicitous, and moreover, it contradicts (6b).

(7)   a.   Maria and Marco are married.
        b.   Maria and Marco are married to each other.

There is a reading of (7a) on which it doesn't entail (7b). Consider following up (7a) with *Not to each other, though.*, which is felicitous, but contradicts (7b). However, there is another ("collective") interpretation of (7a), on which it does entail (7b). Consider someone uttering (7a) after being asked *Do Maria and Marco live together?*. Such an answer is only relevant if it has a collective interpretation. Hence following this answer with *Not to each other, though.* yields infelicity again, suggesting that (7b) is an entailment.

(8)   a.   Only Amy knows the answer.
        b.   Amy knows the answer.

(8a) entails (8b), and in particular presupposes its truth. As well as following (8a) with *But she doesn't know the answer.*, it is also infelicitous to follow *Not only Amy knows the answer.* with such an utterance.

(9)   a.   Some student will not go to the party.
        b.   Not every student will go to the party.

(9a) entails (9b). Using the same test from above, consider continuing (9a) with a sentence expressing the negation of (9b), e.g., *It's also true that every student will go the party.*. Such a continuation is infelicitous, suggesting that it is necessarily false and that (9b) is an entailment.

(10)   a.   Not every student will go to the party.
        b.   Some student will go to the party.

(10a) does not entail (10b). Consider following up (10a) with *In fact, no student at all will go to the party.*. Such a continuation is felicitous and, moreover, contradicts an entailment of (10b), in particular that there is some or other student who will attend the party.