Automatically Generating Questions about Novel Metaphors in Literature Supplement: Question Templates

Natalie Parde

Computer Science
University of Illinois at Chicago
parde@uic.edu

Rodney D. Nielsen

Computer Science and Engineering University of North Texas rodney.nielsen@unt.edu

Twelve sub-groups of templates were constructed: dobj_iobj (used for instances related by a *dobj* or *iobj* syntactic dependency), nsubj, nsubjpass, appos, advmod, csubj, csubjpass, amod, advcl_dep (*advcl* or *dep*), compound, xcomp_nmod_acl (*xcomp*, *nmod*, or *acl*), and N/A (for instances that do not fit into one of the previous eleven groups). For each sub-group, we created eleven templates based on the following sample questions (Beck and McKeown, 2006):

- What is the author trying to say here?
- What do you think the author wants us to know?
- What is the author talking about?
- What's the important message in this section?
- So what does the author mean right here?
- That's what the author said, but what did the author mean?
- Does that make sense with what the author told us before?
- How does that fit in with what the author told us?
- Does the author tell us why?
- Why do you think the author tells us that
- What is the author telling us with this conversation?

The templates are listed below, organized by syntactic dependency sub-group:

• Relation: dobj_iobj

- What is the author trying to say with the expression <GOV (V)> <?THE> <DEP (N_P)>?
- What do you think the author wants us to know by figuratively saying <GOV
 (V)> <? THE> <DEP (N_P)>?
- What is the author talking about when <HE/SHE> writes <GOV (V)> <? THE> <DEP (N_P)>?
- What's the important message in the expression <GOV (V)> <? THE> <DEP (N.P)>?
- So what does the author mean when <HE/SHE> writes <GOV (V)> <? THE> <DEP (N_P)>?
- The author said <GOV (V)> <? THE> <DEP>, but what did <HE/SHE> mean?
- Does the expression <GOV (V)> <? THE> <DEP (N_P)> make sense?
- How does the expression <GOV (V)>
 <? THE> <DEP (N_P)> fit in with what the author told us?
- Does the author tell us why <HE/SHE> wrote that <GOV (V)> <? THE> <DEP (N_P)>?
- Why do you think the author tells us <GOV (V)> <? THE> <DEP (N_P)>?
- What is the author telling us with the expression <GOV (V)> <? THE> <DEP (N_P)>?
- Relation: nsubj
 - What is the author trying to say with the expression <DEP (N_P)> <GOV (V)>?

- What do you think the author wants us to know by figuratively saying <DEP (N-P)> <GOV (V)>?
- What is the author talking about when <HE/SHE> writes <DEP (N_P)> <GOV (V)>?
- What's the important message in the expression <DEP (N_P)> <GOV (V)>?
- So what does the author mean when <HE/SHE> writes <DEP (N_P)> <GOV (V)>?
- The author said <DEP (N_P)> <GOV (V)>, but what did <HE/SHE> mean?
- Does the expression <DEP (N_P)> <GOV (V)> make sense?
- How does the expression <DEP (N_P)> <GOV (V)> fit in with what the author told us?
- Does the author tell us why <HE/SHE> wrote that <DEP (N_P)> <GOV (V)>?
- Why do you think the author tells us <DEP (N_P)> <GOV (V)>?
- What is the author telling us with the expression <DEP (N_P)> <GOV (V)>?

• Relation: appos

- What is the author trying to say by modifying <DEP> with <GOV>?
- What do you think the author wants us to know by figuratively modifying <DEP> with <GOV>?
- What is the author talking about when <HE/SHE> figuratively modifies <DEP> with <GOV>?
- What's the important message in the expression modifying <DEP> with <GOV>?
- So what does the author mean when <HE/SHE> modifies <DEP> with <GOV>?
- The author modified <DEP> with <GOV>, but what did <HE/SHE> mean?
- Does the expression modifying <DEP> with <GOV> make sense?
- How does the expression modifying <DEP> with <GOV> fit in with what the author told us?
- Does the author tell us why <HE/SHE> modified <DEP> with <GOV>?

- Why do you think the author modifies <DEP> with <GOV>?
- What is the author telling us with the expression modifying <DEP> with <GOV>?

• Relation: advmod

- What is the author trying to say with the expression <DEP (V_J_R)> <GOV (R)>?
- What do you think the author wants us to know by figuratively saying <DEP (V_J_R)> <GOV (R)>?
- What is the author talking about when <HE/SHE> writes <DEP (V_J_R)> <GOV (R)>?
- What's the important message in the expression <DEP (V_J_R)> <GOV (R)>?
- So what does the author mean when <HE/SHE> writes <DEP (V_J_R)> <GOV (R)>?
- The author said <DEP (V_J_R)> <GOV (R)>, but what did <HE/SHE> mean?
- Does the expression <DEP (V_J_R)> <GOV (R)> make sense?
- How does the expression <DEP (V_J_R)> <GOV (R)> fit in with what the author told us?
- Does the author tell us why <HE/SHE>
 wrote <DEP (V_J_R)> <GOV (R)>?
- Why do you think the author tells us <DEP (V_J_R)> <GOV (R)>?
- What is the author telling us with the expression <DEP (V_J_R)> <GOV (R)>?

• Relation: csubjpass

- What is the author trying to say with the expression <CLAUSE_PASS>?
- What do you think the author wants us to know by figuratively saying <CLAUSE_PASS>?
- What is the author talking about when <HE/SHE> writes <CLAUSE_PASS>?
- What's the important message in the expression included in <CLAUSE_PASS>?

- So what does the author mean when <HE/SHE> writes <CLAUSE_PASS>?
- The author said <CLAUSE_PASS>, but what did <HE/SHE> mean?
- Does the expression in <CLAUSE_PASS> make sense?
- How does the expression in <CLAUSE_PASS> fit in with what the author told us?
- Does the author tell us why <HE/SHE> wrote <CLAUSE_PASS>?
- Why do you think the author tells us <CLAUSE_PASS>?
- What is the author telling us with the expression <CLAUSE_PASS>?

• Relation: amod

- What is the author trying to say with the expression <DEP> <GOV>?
- What do you think the author wants us to know by writing <DEP> <GOV>?
- What is the author talking about when <HE/SHE> writes <DEP> <GOV>?
- What's the important message in the expression <DEP> <GOV>?
- So what does the author mean when <HE/SHE> writes <DEP> <GOV>?
- The author said <DEP> <GOV>, but what did <HE/SHE> mean?
- Does the expression <DEP> <GOV> make sense?
- How does the expression <DEP> <GOV> fit in with what the author told us?
- Does the author tell us why <HE/SHE> wrote <DEP> <GOV>?
- Why do you think the author uses the phrase <DEP> <GOV>?
- What is the author telling us with the expression <DEP> <GOV>?

• Relation: advcl_dep

- What is the author trying to say with the expression <PHRASE>?
- What do you think the author wants us to know by figuratively saying <PHRASE>?

- What is the author talking about when <HE/SHE> writes <PHRASE>?
- What's the important message included in <PHRASE>?
- So what does the author mean when <HE/SHE> writes <PHRASE>?
- The author said <PHRASE>, but what did <HE/SHE> mean?
- Does <PHRASE> make sense?
- How does the <PHRASE> fit in with what the author told us?
- Does the author tell us why <HE/SHE> wrote <PHRASE>?
- Why do you think the author tells us <PHRASE>?
- What is the author telling us with the expression <PHRASE>?

• Relation: nsubjpass

- What is the author trying to say with the expression <DEP (N_P)> <WAS/WERE> <GOV (V)>?
- What do you think the author wants us to know by figuratively saying <DEP (N_P)> <WAS/WERE> <GOV (V)>?
- What is the author talking about when <HE/SHE> writes <DEP (N_P)> <WAS/WERE> <GOV (V)>?
- What's the important message in the expression <DEP (N_P)> <WAS/WERE> <GOV (V)>?
- So what does the author mean when <HE/SHE> writes <DEP (N_P)> <WAS/WERE> <GOV (V)>?
- The author said <DEP (N_P)> <WAS/WERE> <GOV (V)>, but what did <HE/SHE> mean?
- Does the expression <DEP (N_P)> <WAS/WERE> <GOV (V)> make sense?
- How does the expression <DEP (N_P)> <WAS/WERE> <GOV (V)> fit in with what the author told us?
- Does the author tell us why <HE/SHE> wrote that <DEP (N_P)> <WAS/WERE> <GOV (V)>?
- Why do you think the author tells us <DEP (N_P)> <WAS/WERE> <GOV (V)>?

- What is the author telling us with the expression <DEP (N_P)> <WAS/WERE> <GOV (V)>?

• Relation: csubj

- What is the author trying to say with the expression <CLAUSE>?
- What do you think the author wants us to know by figuratively saying <CLAUSE>?
- What is the author talking about when <HE/SHE> writes <CLAUSE>?
- What's the important message in the expression included in <CLAUSE>?
- So what does the author mean when <HE/SHE> writes <CLAUSE>?
- The author said <CLAUSE>, but what did <HE/SHE> mean?
- Does <CLAUSE> make sense?
- How does <CLAUSE> fit in with what the author told us?
- Does the author tell us why <HE/SHE> wrote <CLAUSE>?
- Why do you think the author tells us <CLAUSE>?
- What is the author telling us with the expression <CLAUSE>?

• Relation: compound

- What is the author trying to say with the expression <W1> <W2>?
- What do you think the author wants us to know by figuratively saying <W1> <W2>?
- What is the author talking about when <HE/SHE> writes <W1> <W2>?
- What's the important message in the expression <W1> <W2>?
- So what does the author mean when <HE/SHE> writes <W1> <W2>?
- The author said <W1> <W2>, but what did <HE/SHE> mean?
- Does the expression <W1> <W2> make sense?
- How does the expression <W1> <W2> fit in with what the author told
- Does the author tell us why <HE/SHE> wrote <W1> <W2>?

- Why do you think the author tells us <W1><W2>?
- What is the author telling us with the expression <W1> <W2>?

• Relation: xcomp_nmod_acl

- What is the author trying to say with the expression <STRING>?
- What do you think the author wants us to know by figuratively saying <STRING>?
- What is the author talking about when <HE/SHE> writes <STRING>?
- What's the important message in the expression <STRING>?
- So what does the author mean when <HE/SHE> writes <STRING>?
- The author said <STRING>, but what did <HE/SHE> mean?
- Does the expression in <STRING> make sense?
- How does the expression <STRING> fit in with what the author told us?
- Does the author tell us why <HE/SHE> wrote <STRING>?
- Why do you think the author tells us <STRING>?
- What is the author telling us with the expression <STRING>?
- Relation: N/A (Backup template in case an instance does not conform to any of the above syntactic relations; should only occur in the event of an incorrect parse.)
 - What is the author trying to say with the expression in <SENTENCE>?
 - What do you think the author wants us to know by saying <SENTENCE>?
 - What is the author talking about when <HE/SHE> writes <SENTENCE>?
 - What's the important message in <SENTENCE>?
 - So what does the author mean when <HE/SHE> writes <SENTENCE>?
 - The author said <SENTENCE>, but what did <HE/SHE> mean?
 - Does <SENTENCE> make sense?
 - How does <SENTENCE> fit in with what the author told us?

- Does the author tell us why <HE/SHE> wrote <SENTENCE>?
- Why do you think the author tells us <SENTENCE>?
- What is the author telling us with the sentence <SENTENCE>?

References

Isabel L. Beck and Margaret G. McKeown. 2006. *Improving Comprehension with Questioning the Author: A Fresh and Expanded View of a Powerful Approach*. Theory and Practice. Scholastic.