**Grading Rubric form: addition of Br2 across trans-cinnamic acid theory**

Your name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_**\_/3**  **Intro/Purpose**

**\_\_\_\_ 47 Theory**

Based on drawings and text…

**\_\_/20 Bottom side anti; preferred side attack**

\_\_\_Correct choice of initial Br attachment (COOH side)

\_\_clear explanation for why Br adds on COOH side (phen is electron rich with pi e- and stabilizes the carbocation)

\_\_\_ clear picture and text on distributions in initial bridgehead

**\_\_\_**\_clear description of `flexing’ of groups down and away from intial Br

**\_\_**\_back side attack geometry shown clearly (flexing of phen and H up and away)

\_\_\_ correct re-orientation of intial staggered form created above to Fischer form

\_ correct assignment of R,S; Erythro., Threo

**\_\_/4 Why other anti attack cases less likely (role of inductive effect)**

**\_ /10 Bottom side syn**

**\_\_\_** Drawing of syn attack’s initial bonding and flow of electrons clear

\_\_\_ flexing of original groups down and away from Br attacks evident

**\_\_\_**\_Final Fischer structure correct

x\_\_ correct assignment if R,S; Erythro, threo

**\_\_\_\_/ 8 Table of possible outcomes vs attacks**

 **\_\_\_**\_correct R,S

 \_\_\_ correct Erythro, Threo

 \_\_\_ table is well-laid out

**\_\_\_/5 Workmanship**

\_\_\_\_\_clear language

\_**\_\_**\_ clear diagrams

\_\_\_ easy to read and understand. English, free of errors