Explorations and Activities

▶.   Let:

- P be a true statement
- Q be a true statement

and

- U be false statement
- V be false statement

and

- W be a statement but it is not known if W is true or false.

Which of the following statements are true, which are false, and for which statements is it not possible to determine if it is true or false? Justify your conclusions (of course using complete sentences).

1. $P \wedge (W \implies Q)$
2. $W \implies (P \wedge U)$
3. $(P \vee W) \implies (U \wedge W)$

....

DELETE this whole sentence and THEN put your answer to ALL parts down here.