Acid–Base & pKa Practice Worksheet

Ten carefully checked problems • Organic Chemistry • Student copy

Name: _____ Date: _____

Show your reasoning. Use complete chemical notation and units when applicable.

1. Which acid is stronger: pKa 3 or pKa 9?

2. Which acid is weaker: pKa 12 or pKa 5?

3. Write the conjugate base of CH_3COOH.

4. Write the conjugate acid of NH_3.

5. For pKa product acid 15 and reactant acid 5, estimate K.

6. For pKa product acid 4 and reactant acid 10, estimate K.

7. Why does OH^- deprotonate acetic acid easily?

8. What is the approximate pKa of a terminal alkyne?

9. What is the conjugate acid of NH_2^-?

10. Why compare pKa in similar solvents?