Worksheet 2

Name Class Date

**1** This question is about the ammonium chloride reaction previously seen. The reaction is thermal decomposition.



**a** Explain how you can tell the reaction is reversible. ***(Hint: In the equation, what tells you that the reaction can proceed in both directions?)***

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**b** The reaction needs to be heated. Looking at the forward reaction, what would you observe during the reaction? ***(Hint: Look at the state symbols or think back to when you saw the experiment in lesson 87.)***

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**c** When the reaction reaches equilibrium, which substance(s) would be present? ***(Hint: Remember, the reaction does not go to completion.)***

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**d** At equilibrium under certain conditions, the proportion of reactants to products is 70% to 30%. Describe where the position of equilibrium is found. Circle the correct answer.

**to the left equal both sides to the right**

**e** Altering the conditions causes the proportions of reactants to products to change to 60% to 40%. Describe what has now happened to the position of equilibrium. ***(Hint: The position has shifted slightly, but has the overall position of equilibrium changed?)***

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