Science 10 Physical vs Chemical (Properties and Changes) Name \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

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| **Classify the following properties as physical (P) or chemical (C).** | **Classify the following changes as physical (P) or chemical (C).** |
| 1. Milk turns sour when acid is added to it. |  | 14. Rusting nail. |  |
| 2. Hydrogen gas is colourless. |  | 15. Toasting bread. |  |
| 3. Candy is made by pressing powder into  pellets. |  | 16. Evaporating water. |  |
| 4. A diamond is hard. |  | 17. Cutting up carrots. |  |
| 5. Wood turning to ash when burned. |  | 18. Silver tarnishing (turning black).  |  |
| 6. The melting point of ice is 0 ◦C. |  | 19. A gas becomes a liquid. |  |
| 7. Sodium is a soft, grey metal. |  | 20. Baking a cake. |  |
| 8. Iodine is soluble in alcohol. |  | 21. Boiling an egg. |  |
| 9. Phosphorus ignites when exposed to air. |  | 22. Lighting a cigarette. |  |
| 10. Rolaids relieve heartburn. |  | 23. Bleaching a stain. |  |
| 11. Oxygen is needed for combustion. |  | 24. Crushing a stone into sand. |  |
| 12. Iodine kills bacteria. |  | 25. Melting ice. |  |
| 13. Water has a density of 1.0 g/mL. |  | 26. Foam is made when a can of pop is  opened. |  |
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| **Classify the following changes as physical (P) or chemical (C).** |
| 27. Water freezes into an icicle in winter and melts in the spring. |  | 31. A match ignites. The match head turns  black and brittle. |  |
| 28. Salt is added to water. It can no longer be seen but the water tastes salty. |  | 32. A welder starts with three pieces of steel rod. He heats them up so they melt together. Once cooled there is one larger rod. |  |
| 29. A glass bottle drops and smashed into  100 pieces. |  | 33. Meat left too long in the fridge changes  from red to grey and starts to smell bad. |  |
| 30. Apple cider, when left too long, produces bubbles and tastes and smells different. |  | 34. Salty water is left to evaporate on a hot day. As the water disappears the salt is left behind. |  |