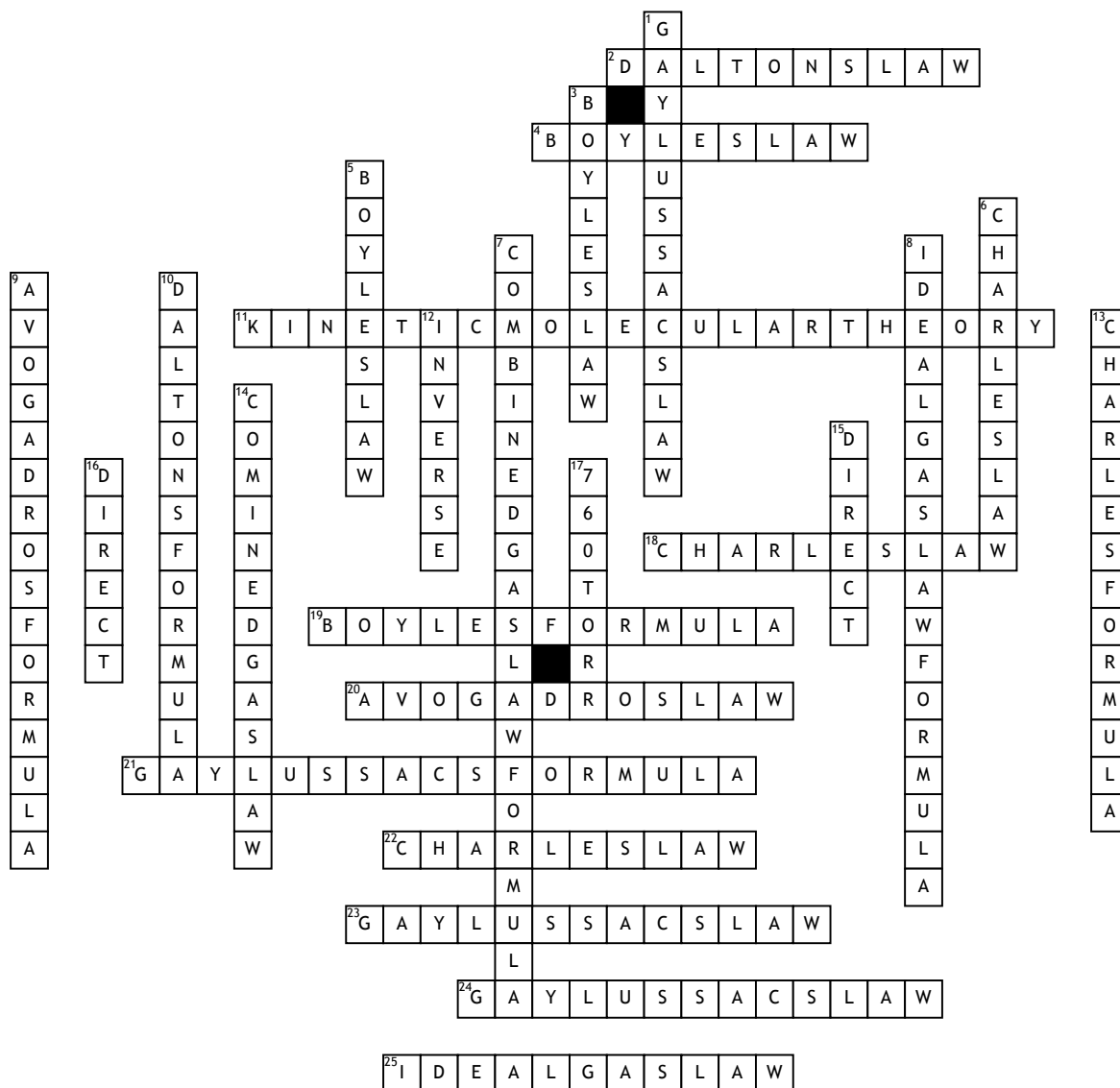


Name: \_\_\_\_\_

# Gas Laws



## Across

2. total pressure of a mixture of nonreacting gases is the sum of their individual partial pressures
4. indirect relationship between pressure and volume
11. as particles are heated, they move faster and exert more pressure on the walls of their container
18. Direct relationship between volume and temperature
19.  $P_1 \times V_1 = P_2 \times V_2$
20. direct relationship between the number of moles and volume
21.  $P_1/T_1 = P_2/T_2$
22. What law happens when you put a balloon into liquid nitrogen?

23. What law is it when you open a sealed container of hot food?

24. What law is it when you heat a can and then put it into water?

25. the ideal law that factors at STP and includes number of moles

## Down

1. Direct relationship between pressure and temperature
3. What law is a spray can?
5. What law happens when you twist a straw and then flick it?
6. What law happens when you leave a basketball out side in cold weather for a long time?
7.  $P_1V_1/T_1 = P_2V_2/T_2$

8.  $PV = nRT$

9.  $V_1/n_1 = V_2/n_2$

10.  $P_{total} = P_a + P_b + P_c \dots$

12. Is Boyle's Law a inverse or direct proportion?

13.  $V_1/T_1 = V_2/T_2$

14. A law that combines Boyles, Charles, and Lussacs laws

15. Is Charles's law inverse or direct proportion?

16. Is Ideal Gas Law a inverse or direct proportion?

17. What does 1 atm equal?