

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

Date: \_\_\_\_\_

## Sensors and Scatterplots Activity – Class Data Sheet

### Directions

Record the data from your student data sheet in the table below. In the student column, circle “M” if you are a male and circle “F” if you are a female. This data will be used to create the scatterplots.

Student		BMI	Systolic Pressure Average	Diastolic Pressure Average	Pulse Rate Average	Height
1	M F					
2	M F					
3	M F					
4	M F					
5	M F					
6	M F					
7	M F					
8	M F					
9	M F					
10	M F					
11	M F					
12	M F					
13	M F					
14	M F					
15	M F					
16	M F					
17	M F					
18	M F					
19	M F					
20	M F					
21	M F					
22	M F					
23	M F					
24	M F					
25	M F					
26	M F					
27	M F					
28	M F					
29	M F					
30	M F					
31	M F					
32	M F					
33	M F					
34	M F					
35	M F					

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

**Statistics for Class BMI Data (Choose 4 students at random)**

$$\text{Class Mean BMI} = \frac{\text{Sum of student's BMIs}}{\text{Number of students}} = \underline{\hspace{2cm}}$$

Student #	BMI	(BMI – Class Mean BMI)	(BMI – Class Mean BMI) <sup>2</sup>

$$\text{Variance} = \text{Sum of (BMI – Class Mean BMI)}^2 = \underline{\hspace{2cm}}$$

$$\text{Standard Deviation} = \sqrt{\text{Variance}} = \underline{\hspace{2cm}}$$

**Statistics for Class Pulse Rate Data (Choose the same 4 students as above)**

$$\text{Class Mean Pulse Rate} = \frac{\text{Sum of student's Pulse Rates}}{\text{Number of students}} = \underline{\hspace{2cm}}$$

Student #	Pulse Rate (PR)	(PR – Class Mean PR)	(PR – Class Mean PR) <sup>2</sup>

$$\text{Variance} = \text{Sum of (PR – Class Mean PR)}^2 = \underline{\hspace{2cm}}$$

$$\text{Standard Deviation} = \sqrt{\text{Variance}} = \underline{\hspace{2cm}}$$

**Statistics for Class Height Data (Choose the same 4 students as above)**

$$\text{Class Mean Height} = \frac{\text{Sum of student's Heights}}{\text{Number of students}} = \underline{\hspace{2cm}}$$

Student #	Height	(Height – Class Mean Height)	(Height – Class Mean Height) <sup>2</sup>

$$\text{Variance} = \text{Sum of (Height – Class Mean Height)}^2 = \underline{\hspace{2cm}}$$

$$\text{Standard Deviation} = \sqrt{\text{Variance}} = \underline{\hspace{2cm}}$$