

**Unit: 4<sup>th</sup> – Measurement & Data Analysis**  
**4.9.A – 4.9B – Represent Data and Solve Problems**

**Problem Set: 1**

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1 57	2 B	3 D	4 D	5 B	6 29
7 D	8 B	9 D	10 A	11 A	12 B
13 D	14 A	15 58	16 C	17 79	18 C
19 D	20 B	21 D	22 A	23 Barry won by 2 votes	24 C
25 C	26 A	27 C	28 C	29 B	30 72

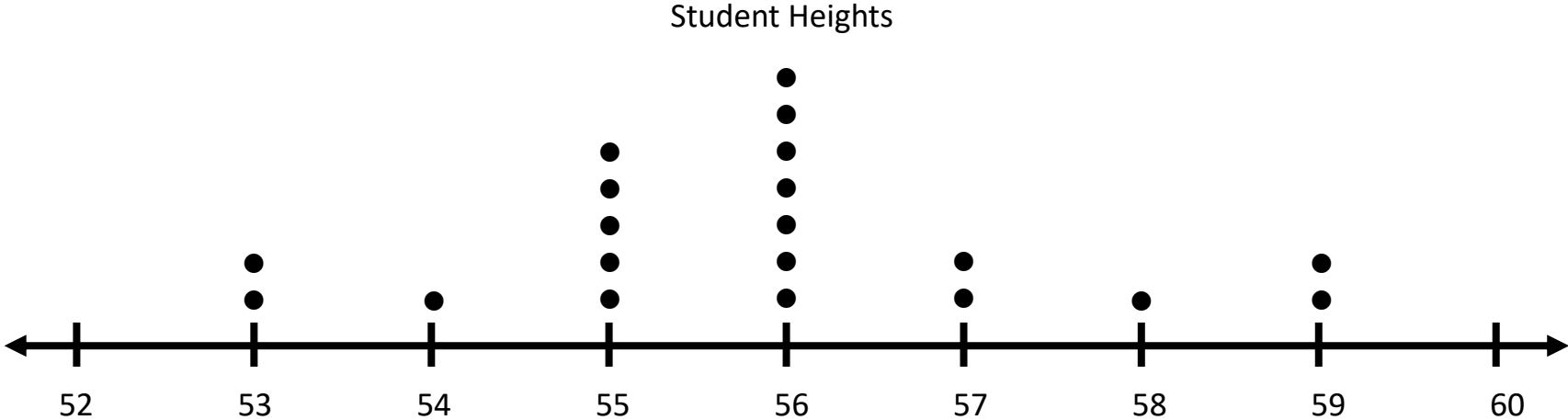


1. The table shows the heights in inches of the students in Mr. Garrison's class.

Student Heights

Height (inches)	Number of Students
53	
54	
55	
56	
57	
58	
59	

Mr. Garrison made this dot plot to show the heights of his students. The dot plot is incomplete.



Which height in inches is missing a data point on the dot plot?

2. The list gives information about the favorite color of each of 22 students.

- 6 students chose red.
- 2 students chose yellow.
- 5 more students chose blue than yellow.
- 3 fewer students chose purple than red.
- The rest of the students chose green.

Which frequency table represents the number of students who chose each color?

A.

Favorite Color	
Color	Number of Students
Red	
Yellow	
Blue	
Purple	
Green	

C.

Favorite Color	
Color	Number of Students
Red	
Yellow	
Blue	
Purple	
Green	

B.

Favorite Color	
Color	Number of Students
Red	
Yellow	
Blue	
Purple	
Green	

D.

Favorite Color	
Color	Number of Students
Red	
Yellow	
Blue	
Purple	
Green	

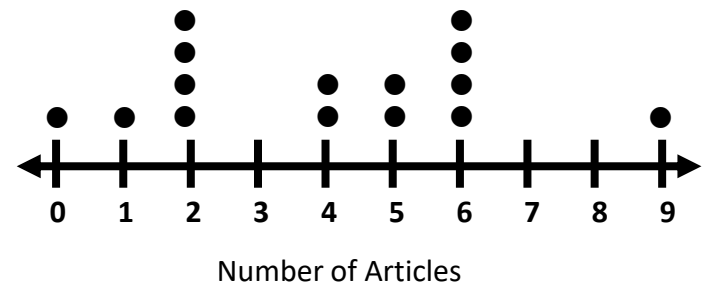
3. The list shows the number of articles written by different reporters at a newspaper last month.

6, 2, 5, 2, 6, 0, 4, 6, 1, 8, 5, 2, 6, 4, 2

Which dot plot displays the same data?

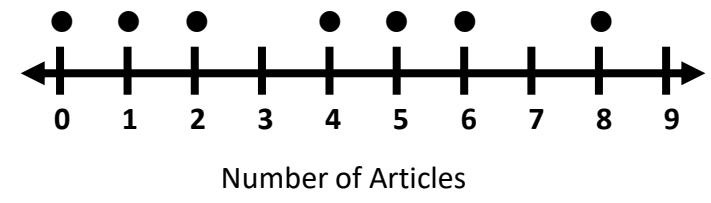
Articles Written by Reporters

A.



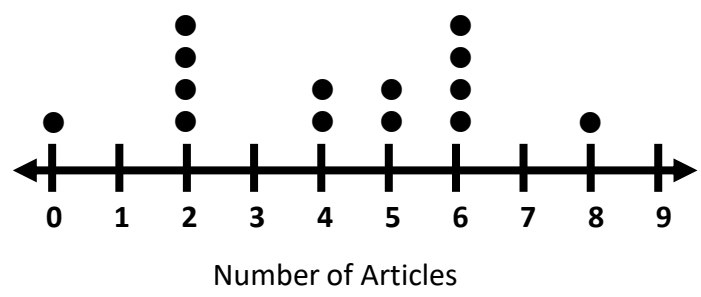
Articles Written by Reporters

C.



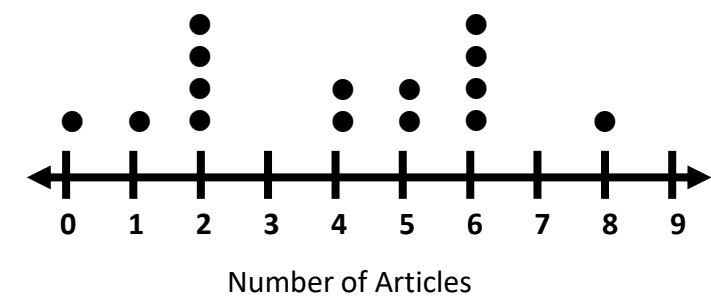
Articles Written by Reporters

B.



Articles Written by Reporters

D.



4. The frequency table shows the number of times some people visited a movie theater last year.

Movie Theater Visitors

Number of Visits	Number of People
1 – 5	
6 – 10	
11 – 15	
16 – 20	

Which set of data could the frequency table represent?

- A. 1, 2, 2, 3, 6, 7, 7, 9, 12, 12, 12, 14, 17, 18, 20
- B. 0, 2, 4, 5, 6, 6, 7, 8, 9, 11, 11, 13, 14, 15, 20, 20, 20
- C. 1, 5, 6, 10, 11, 15, 16, 20, 4, 5, 5, 3
- D. 2, 2, 4, 5, 6, 6, 7, 8, 9, 11, 11, 13, 14, 15, 20, 20, 20

5. The stem and leaf plot shows the scores given to the dogs at a dog show. Possible scores were between 0.1 and 5.0.

**Dog show Scores**

Stem	Leaf
0	8
1	2 5
2	2 4 8
3	0 3 3 6 8
4	0 5 5

1|5 means a score of 1.5.

What is the difference between the highest and lowest score shown in the stem and leaf plot?

- A. 4.3
- B. 3.7
- C. 0.25
- D. 0.47

6. The frequency table shows the favorite school lunches of some of the students. The table is missing the information for the number of students who like hamburgers best.

Favorite School Lunches

Lunch Choice	Tally	Frequency
Pizza		32
Hamburger		
Chicken		13

The number of students who chose a hamburger is half the number of students who chose pizza. How many students chose a hamburger or chicken as their favorite school lunch?



**Unit: 4<sup>th</sup> – Measurement & Data Analysis**  
**4.9.A – 4.9B – Represent Data and Solve Problems**

**Problem Set: 2**

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1 57	2 B	3 D	4 D	5 B	6 29
7 D	8 B	9 D	10 A	11 A	12 B
13 D	14 A	15 58	16 C	17 79	18 C
19 D	20 B	21 D	22 A	23 Barry won by 2 votes	24 C
25 C	26 A	27 C	28 C	29 B	30 72

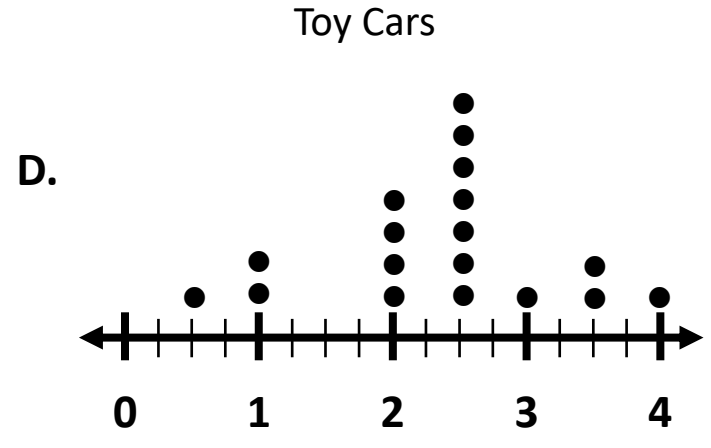
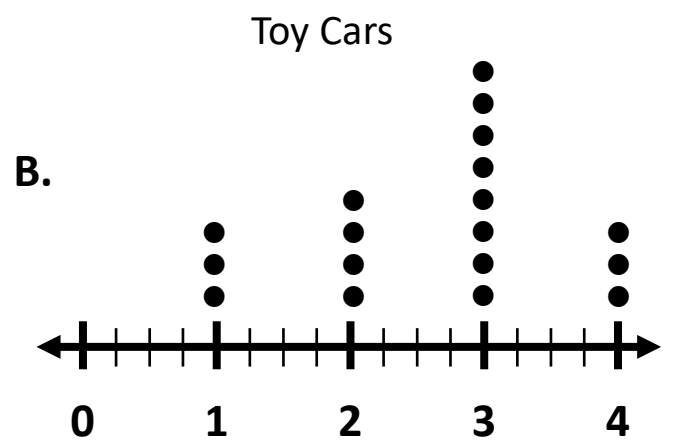
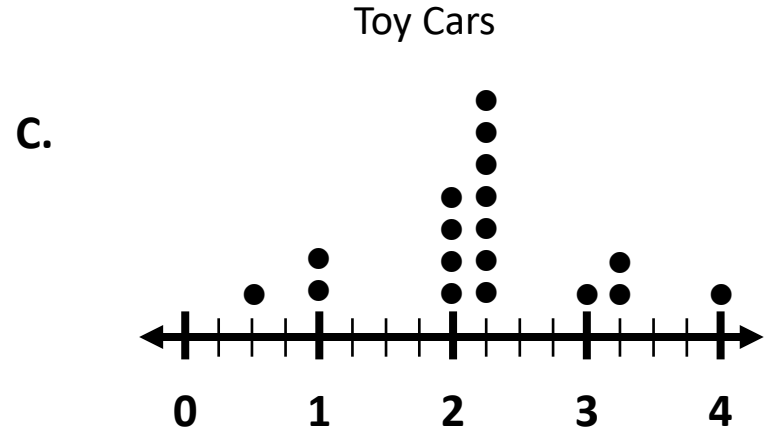
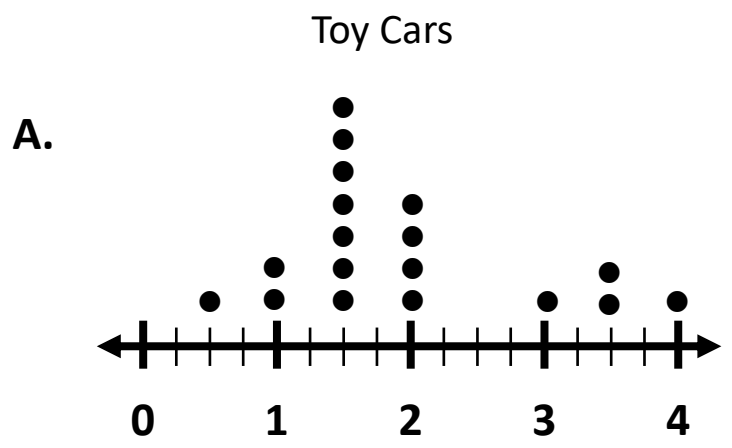


7. Students pushed toy cars to see how far they would roll. The table shows the number of cars that rolled different distances.

Toy Cars

Distance (feet)	$\frac{1}{2}$	1	$1\frac{1}{2}$	2	$2\frac{1}{2}$	3	$3\frac{1}{2}$	4
Number of cars	1	2	0	4	7	1	2	1

Which dot plot represents the data in the table?



8. The table shows the total numbers of runs different baseball teams scored in one season. Which stem and leaf plot matches the information in the table?

**Baseball Runs Scored**

Team	Total Number of Runs Scored
R	61
S	92
T	100
U	65
V	72
W	64
X	84

**A.**

**Baseball Runs Scored**

Stem	Leaf
6	1
9	2
10	0
6	5
7	2
6	4
8	4

6 | 1 means 61 runs

**B.**

**Baseball Runs Scored**

Stem	Leaf
6	1 4 5
7	2
8	4
9	2
10	0

6 | 1 means 61 runs

**C.**

**Baseball Runs Scored**

Stem	Leaf
6	1 4 5
7	2
8	4
9	2
10	

6 | 1 means 61 runs

**D.**

**Baseball Runs Scored**

Stem	Leaf
6	1
6	5
6	4
7	2
8	4
9	2
10	0

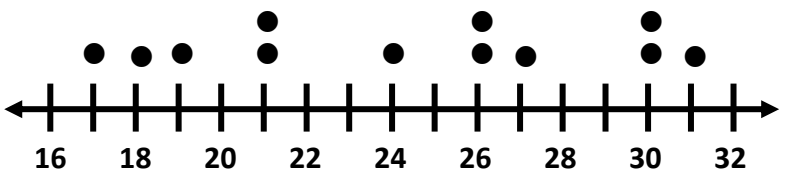
6 | 1 means 61 runs

9. The list shows the lengths of twelve strings in inches.

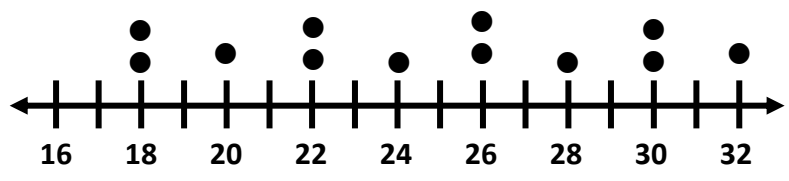
26, 30, 19, 21, 24, 26, 18, 31, 27, 21, 17, 29

Which plot represents the data in the list?

A.



C.



B.

String Lengths	
Stem	Leaf
1	7 8 9
2	1 1 4 6 6 7 9
3	1

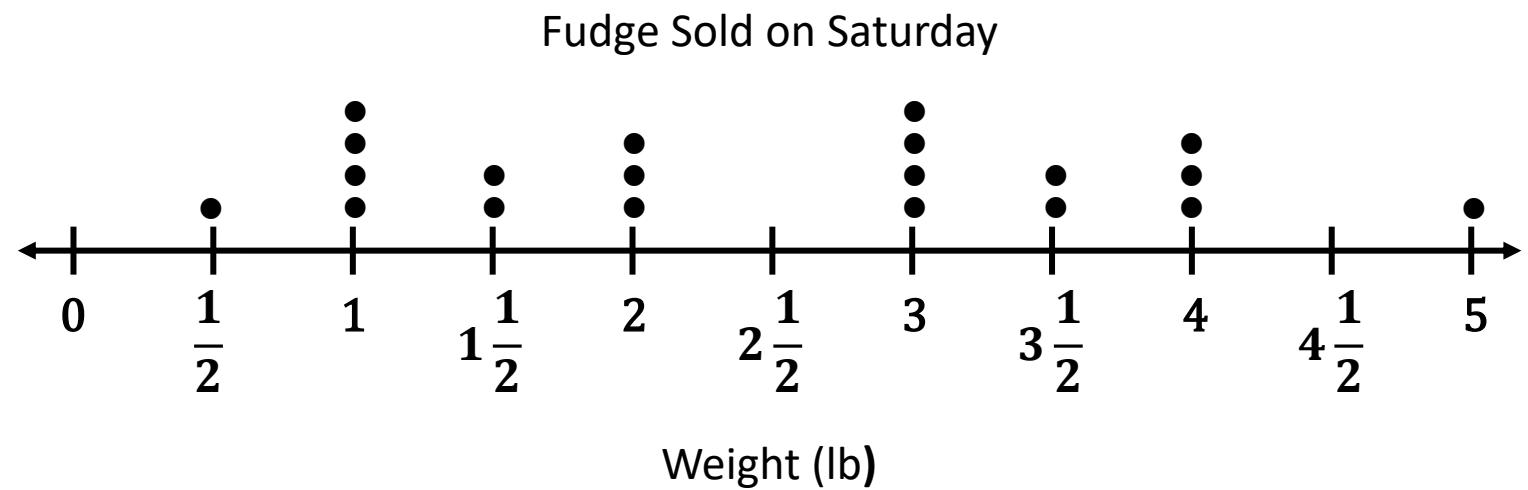
1|8 means 18 inches

D.

String Lengths	
Stem	Leaf
1	7 8 9
2	1 1 4 6 6 7 9
3	0 1

1|8 means 18 inches

10. A candy store sells fudge by the pound. The dot plot shows the number of customers who bought different numbers of pounds of fudge on Saturday.



Which frequency table represents the same data as the dot plot?

**A.**

Weight (lb)	1/2	1	1 1/2	2	2 1/2	3	3 1/2	4	4 1/2	5
Tally										

**B.**

Weight (lb)	1	4	2	3	0	4	2	3	0	1
Tally										

**C.**

Weight (lb)	1/2	1	1 1/2	2	2 1/2	3	3 1/2	4	4 1/2	5
Tally										

**D.**

Weight (lb)	1/2	1	1 1/2	2	2 1/2	3	3 1/2	4	4 1/2	5
Tally										

11. Karnika recorded the number of minutes she practiced volleyball each week for several weeks. She used a stem and leaf plot to organize the data.

**Volleyball Practice Time**

Stem	Leaf
14	0 2 2
15	5 5
16	0

14|2 means 142 minutes.

Based on the data, what is the amount of time in minutes Karnika practiced volleyball?

- A. 894 min
- B. 597 min
- C. 594 min
- D. 1,224 min

12. The stem and leaf plot shows the number of miles members of the walking club walked last week.

Miles Walked	
Stem	Leaf
1	7
2	0, 2, 2, 3, 6, 7
3	2, 3, 5, 5, 7, 7, 7, 9, 9
4	0, 1, 1, 2

1|7 means 17 miles.

What is the difference between the most miles walked and the least miles walked as shown in the stem and leaf plot?

- A. 27
- B. 25
- C. 15
- D. 17



**Unit: 4<sup>th</sup> – Measurement & Data Analysis**  
**4.9.A – 4.9B – Represent Data and Solve Problems**  
**Problem Set: 3**

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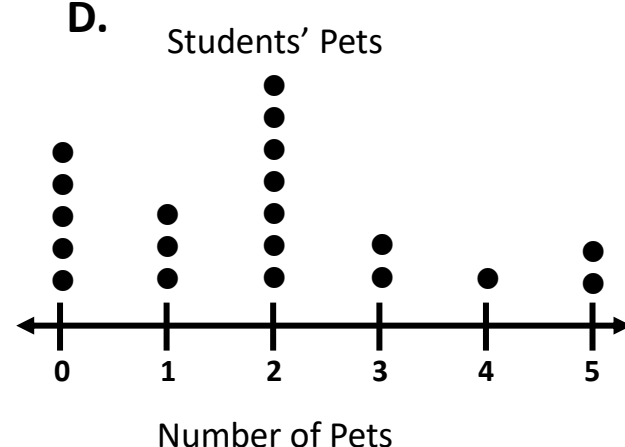
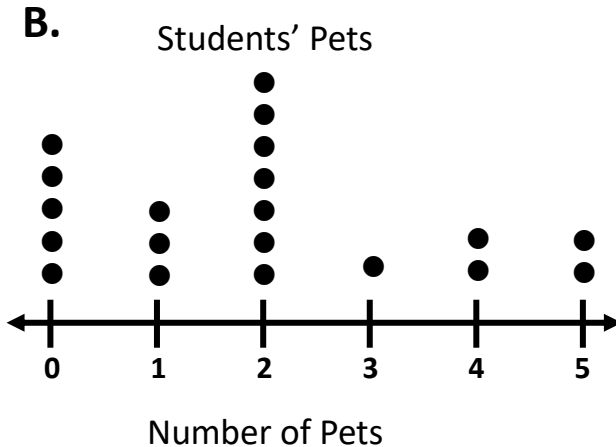
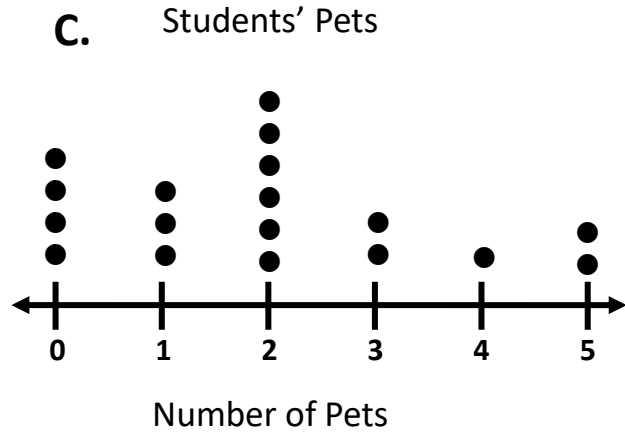
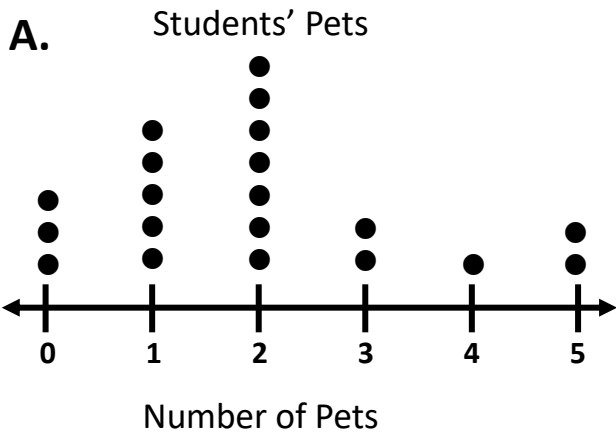
1 57	2 B	3 D	4 D	5 B	6 29
7 D	8 B	9 D	10 A	11 A	12 B
13 D	14 A	15 58	16 C	17 79	18 C
19 D	20 B	21 D	22 A	23 Barry won by 2 votes	24 C
25 C	26 A	27 C	28 C	29 B	30 72



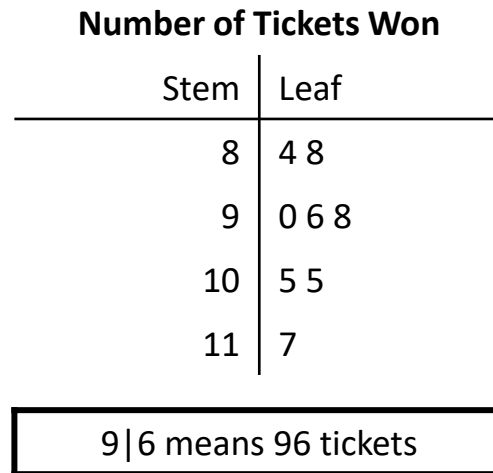
13. The table shows the number of pets that each student in Mrs. Morris's class owns. Which dot plot represents the data in the table?

**Student's Pets**

Number of pets	Frequency
0	⦿
1	
2	⦿
3	
4	
5	



14. The stem and leaf plot shows the numbers of tickets Stephen won when he played games at a carnival.



What is the total number of tickets that Stephen won at the carnival?

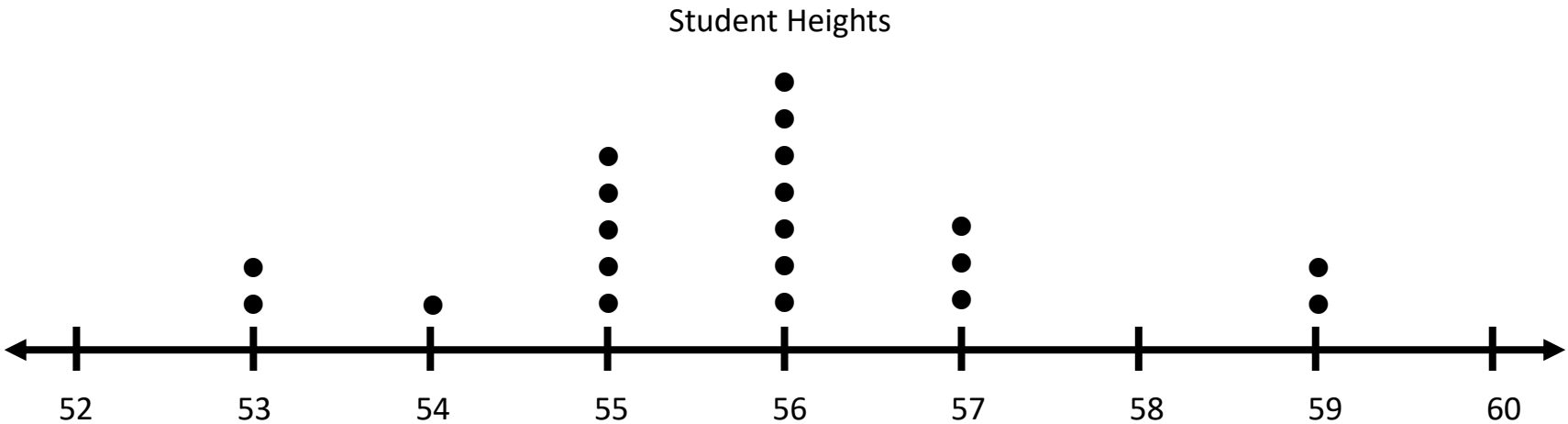
- A. 783
- B. 178
- C. 81
- D. 678

15. The table shows the heights in inches of the students in Mr. Gurley's class.

Student Heights

Height (inches)	Number of Students
53	
54	
55	
56	
57	
58	
59	

Mr. Gurley made this dot plot to show the heights of his students. The dot plot is incomplete.



Which height in inches is missing a data point on the dot plot?

16. The list gives information about the favorite subject of 25 students.

- 6 students chose reading
- 9 students chose math
- 4 more students chose reading than science.
- 6 fewer students chose art than math.
- The rest of the students chose P.E.

Which frequency table represents the number of students who chose each subject?

A.

Favorite Subject	
Subject	Number of Students
Reading	### ##
Math	###
Science	
Art	
P.E.	###

C.

Favorite Subject	
Subject	Number of Students
Reading	###
Math	###
Science	
Art	
P.E.	###

B.

Favorite Subject	
Subject	Number of Students
Reading	###
Math	###
Science	
Art	
P.E.	###

D.

Favorite Subject	
Subject	Number of Students
Reading	###
Math	### ##
Science	
Art	
P.E.	###

17. The frequency table shows the favorite pets of some of the students. The table is missing the information for the number of students who chose cats as their favorite.

Favorite Pets

Pet	Tally	Frequency
Dogs		43
Cats		
Lizards		9

The number of students who chose cats is four times the number of students who chose lizards. How many students chose a dog or cat as their favorite pet?

18. Jordy bought a sack of potatoes and weighed each potato. The potatoes weighed between 5 and 10 ounces each. The Stem and Leaf plot shows the weights of the potatoes.

**Potato Weights**

Stem	Leaf
5	2, 2, 4, 7, 8
6	2, 3, 7, 8
7	0, 3, 5, 8, 8
8	1, 2, 3, 7
9	0, 2

5|6 means 5.6 ounces.

What is the difference between the weight of the heaviest and lightest potato?

- A. 3.4 ozs
- B. 0.4 ozs
- C. 4.0 ozs
- D. 40 ozs



**Unit: 4<sup>th</sup> – Measurement & Data Analysis**  
**4.9.A – 4.9B – Represent Data and Solve Problems**

**Problem Set: 4**

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<b>1</b>  57	<b>2</b>  B	<b>3</b>  D	<b>4</b>  D	<b>5</b>  B	<b>6</b>  29
<b>7</b>  D	<b>8</b>  B	<b>9</b>  D	<b>10</b>  A	<b>11</b>  A	<b>12</b>  B
<b>13</b>  D	<b>14</b>  A	<b>15</b>  58	<b>16</b>  C	<b>17</b>  79	<b>18</b>  C
<b>19</b>  D	<b>20</b>  B	<b>21</b>  D	<b>22</b>  A	<b>23</b>  Barry won by 2 votes	<b>24</b>  C
<b>25</b>  C	<b>26</b>  A	<b>27</b>  C	<b>28</b>  C	<b>29</b>  B	<b>30</b>  72



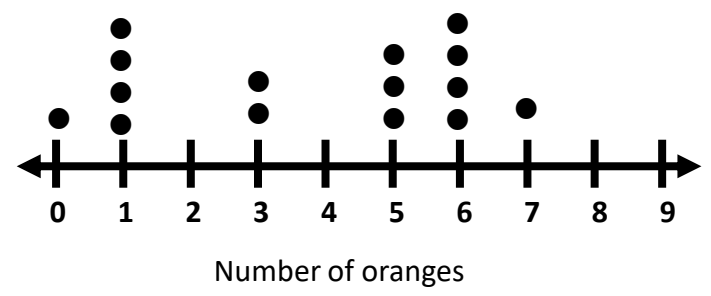
19. The Baylor Football team loves oranges. The following shows the number of oranges eaten yesterday by different members of the Baylor football team.

5, 1, 4, 1, 5, 4, 3, 5, 0, 7, 4, 1, 5, 3, 1

Which dot plot displays the same data?

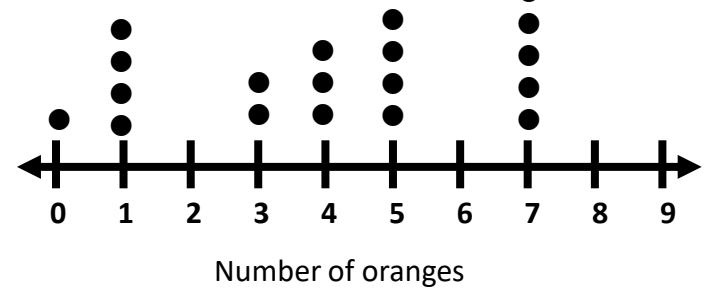
Oranges eaten by players

A.



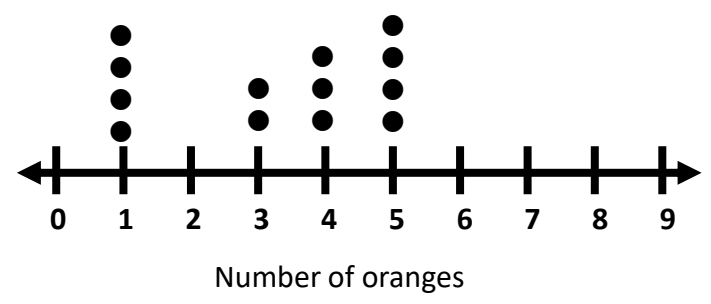
Oranges eaten by players

C.



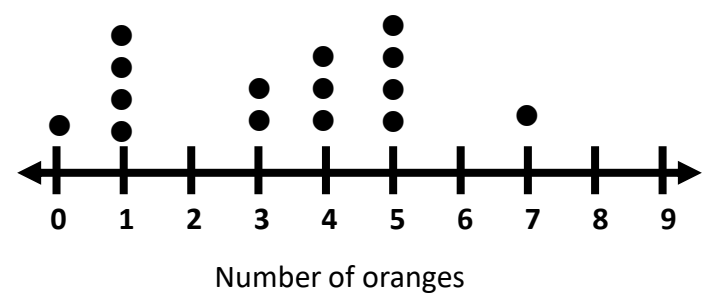
Oranges eaten by players

B.



Oranges eaten by players

D.



20. The frequency table shows the points students earned in the summer reading program last year.

Summer Reading Program  
Points

Number of points	Number of readers
Less than 50	
51 – 75	
76 - 100	
101 or more	

Which set of data could the frequency table represent?

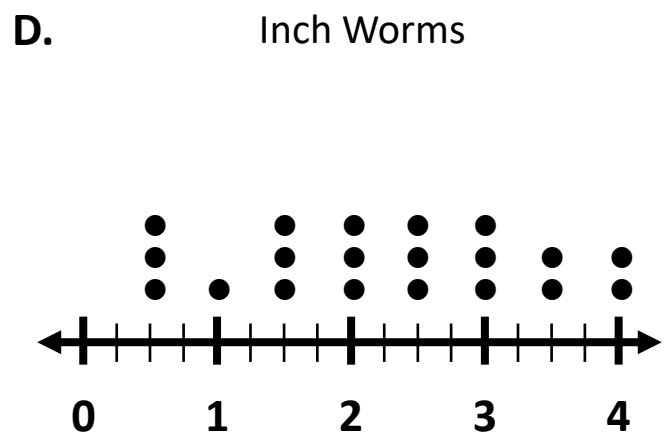
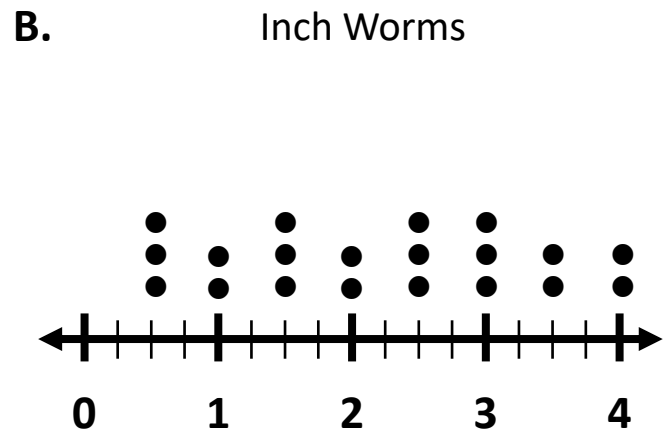
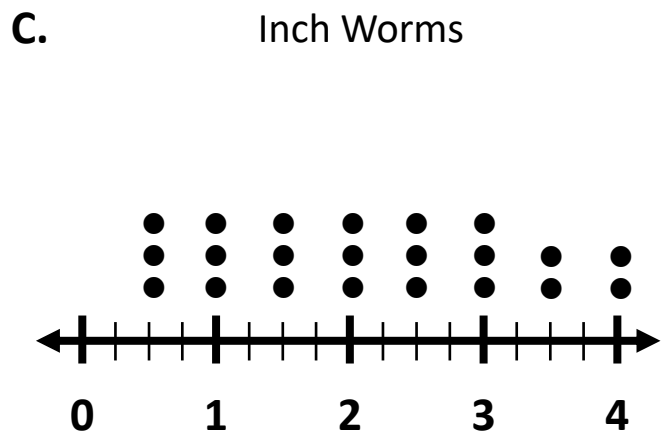
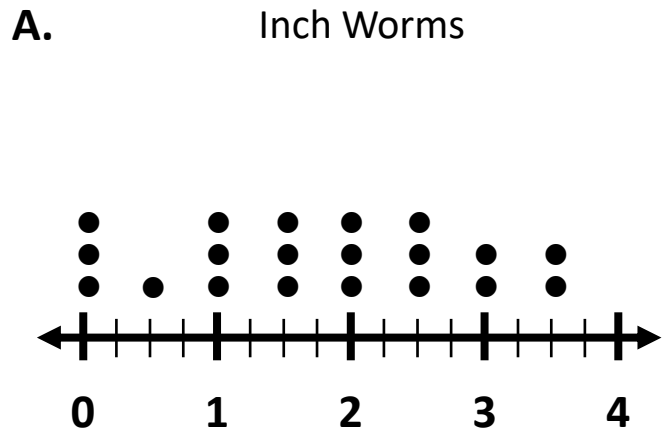
- A. 11,78,83,87,87,90,91,92,92,93,97,101,107,111,112,113,115,133,138
- B. 11,22,39,46,54,55,59,68,78,83,87,87,90,91,111,112,113,115,133,138
- C. 54,55,59,68,78,83,87,87,90,91,111,112,113,115,133,138,212,232,252
- D. 11,22,39,46,54,55,59,68,111,112,113,115,128, 132,133,138,145,153

21. Scientists studied inch worms to see how far they could inch in 5 minutes in freezing temperatures. The chart shows the results.

Inch Worms

Distance (feet)	$\frac{1}{2}$	1	$1\frac{1}{2}$	2	$2\frac{1}{2}$	3	$3\frac{1}{2}$	4
Number of inch worms	3	1	3	3	3	3	2	2

Which dot plot represents the data in the table?



22. The table shows the field goal percentage for different players on a basketball team. Which stem and leaf plot shows the same information?

**Field Goal Percentage**

Player	Field Goal %
R. Woodard	12
Z. Collins	49
R. Langford	43
K. Diop	51
D. Murray	46
J. Poeltl	61
J. Wieskamp	35

**A.**

**Field Goal Percentage**

Stem	Leaf
1	2
2	
3	5
4	6, 3, 9
5	1
6	1

5 | 1 means 51%

**B.**

**Field Goal Percentage**

Stem	Leaf
1	12
2	
3	35
4	49, 43, 46
5	51
6	61

5 | 1 means 51%

**C.**

**Field Goal Percentage**

Stem	Leaf
1	2, 5, 6
2	
3	4, 5
4	6, 3, 9
5	1, 3
6	1, 4

5 | 1 means 51%

**D.**

**Field Goal Percentage**

Stem	Leaf
1	5, 6
2	1
3	4
5	3
6	4
9	4

5 | 1 means 51%

23. Ms. Keller brought a giant teddy bear to class to be used as a class mascot. The students decided to give it a name. The table shows how many students voted for which name.

Names for the Class Bear

Name	Tally
Ted	
Bruno	
Barry	

Ms. Keller forgot to write down the number of students who voted for the name “Bruno,” but it was twice as many as those who voted for the name “Ted.” Which name won and by how many votes?

24. Veronica loves to read. She decided to keep track of how many pages a day she read for 20 days. She used a stem and leaf plot to organize the data.

Stem	Leaf
1	0, 7, 7, 8
2	0, 6
3	
4	2, 5, 5, 7
5	4, 4, 5, 7, 8
6	0, 1, 3, 8, 9

1|2 means 12 pages

Based on the stem and leaf plot how many days did she read 40 or more pages?

- A. 0
- B. 4
- C. 14
- D. 19



**Unit: 4<sup>th</sup> – Measurement & Data Analysis**  
**4.9.A – 4.9B – Represent Data and Solve Problems**  
**Problem Set: 5**

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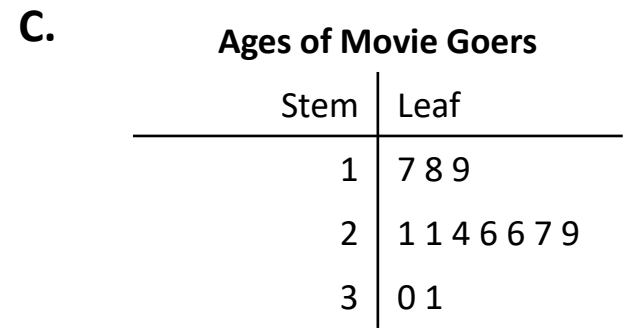
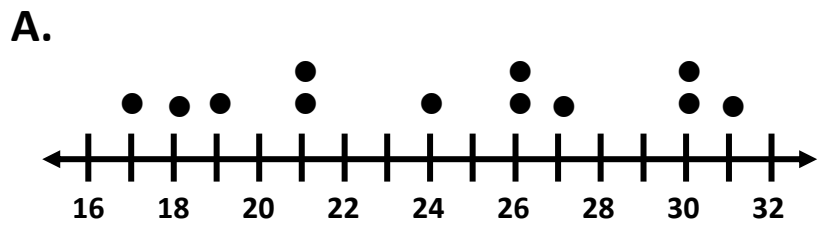
<b>1</b>  57	<b>2</b>  B	<b>3</b>  D	<b>4</b>  D	<b>5</b>  B	<b>6</b>  29
<b>7</b>  D	<b>8</b>  B	<b>9</b>  D	<b>10</b>  A	<b>11</b>  A	<b>12</b>  B
<b>13</b>  D	<b>14</b>  A	<b>15</b>  58	<b>16</b>  C	<b>17</b>  79	<b>18</b>  C
<b>19</b>  D	<b>20</b>  B	<b>21</b>  D	<b>22</b>  A	<b>23</b>  Barry won by 2 votes	<b>24</b>  C
<b>25</b>  C	<b>26</b>  A	<b>27</b>  C	<b>28</b>  C	<b>29</b>  B	<b>30</b>  72



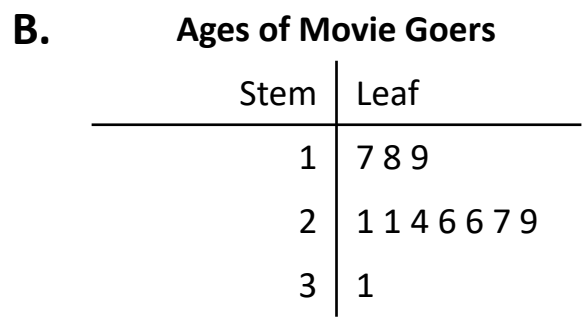
25. The list shows the ages of the first 12 people who came to see the new Batman movie on the first day it opened.

26, 30, 19, 21, 24, 26, 18, 31, 27, 21, 17, 29

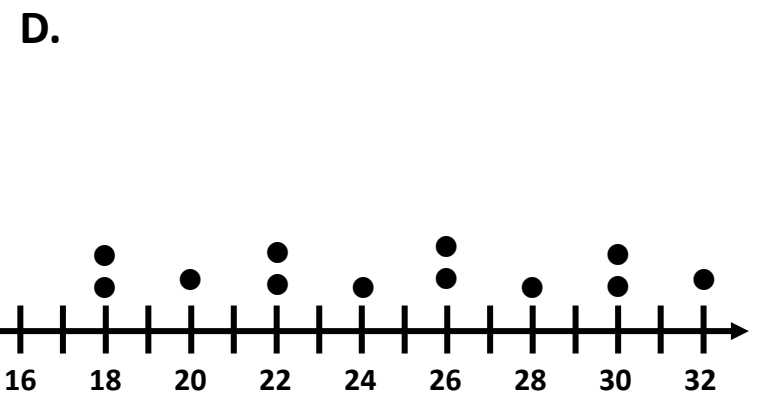
Which plot represents the data in the list?



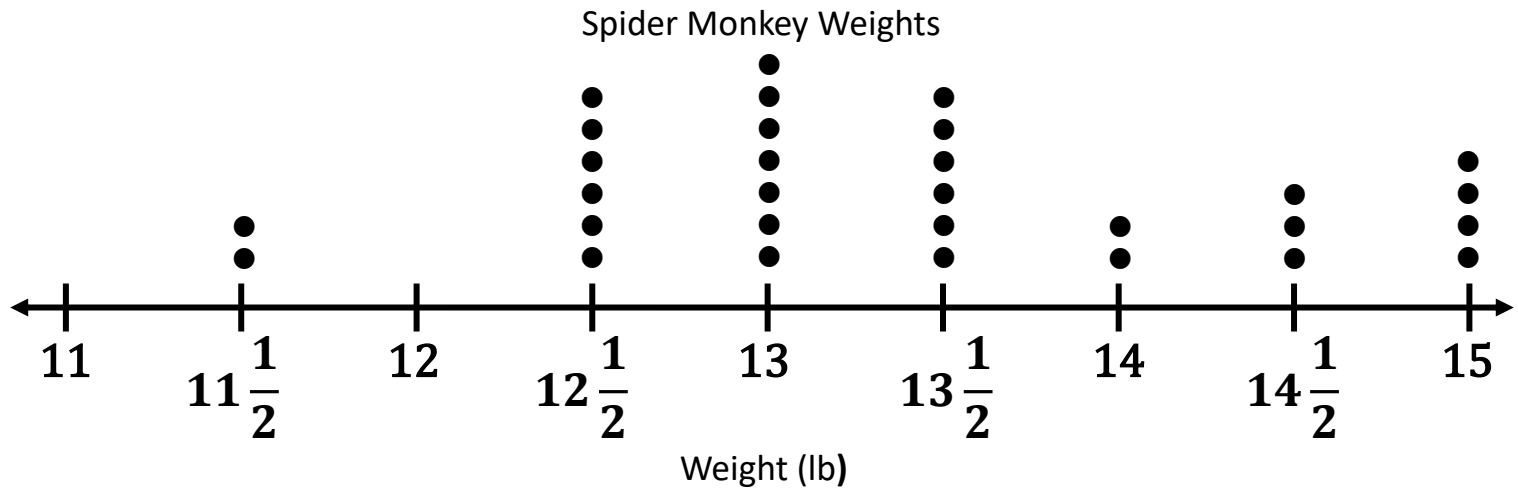
1|8 means 18 years old



1|8 means 18 years Old



26. A zoo has 30 spider Monkeys. The dot plot shows their weights.



Which frequency table represents the same data as the dot plot?

**A.**

Weight (lb)	11	11 ½	12	12 ½	13	13 ½	14	14 ½	15
Tally									

**B.**

Weight (lb)	11	11 ½	12	12 ½	13	13 ½	14	14 ½	15
Tally									

**C.**

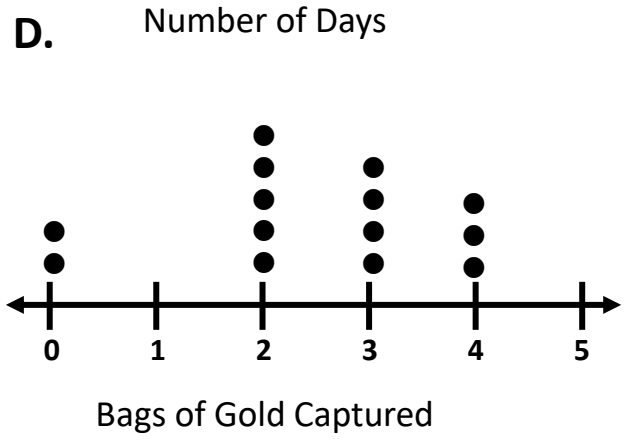
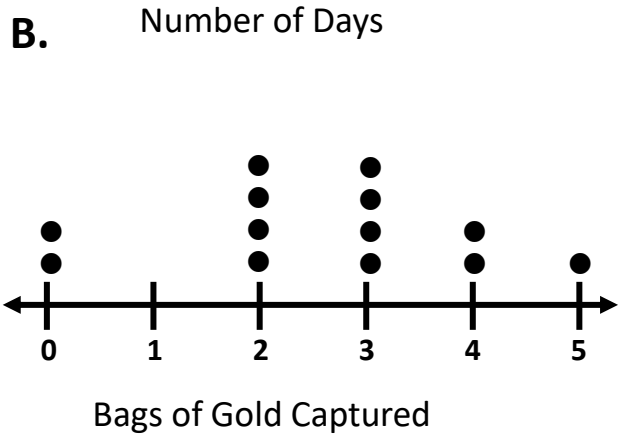
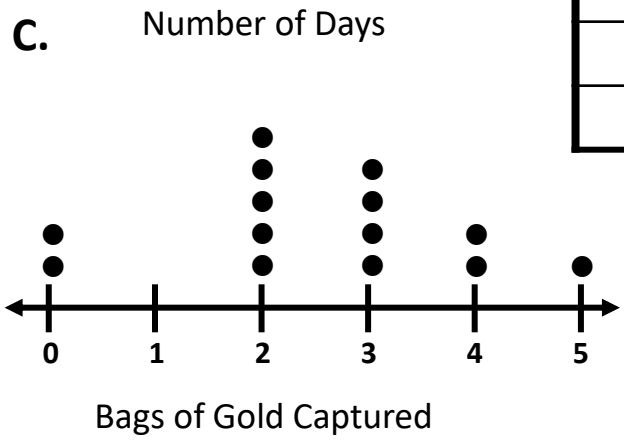
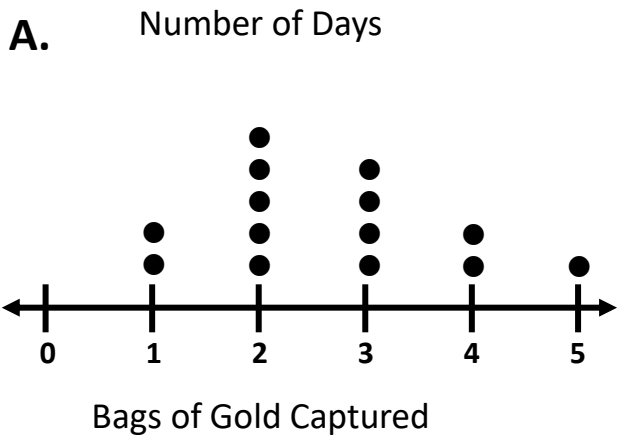
Weight (lb)	11	11 ½	12	12 ½	13	13 ½	14	14 ½	15
Tally									

**D.**

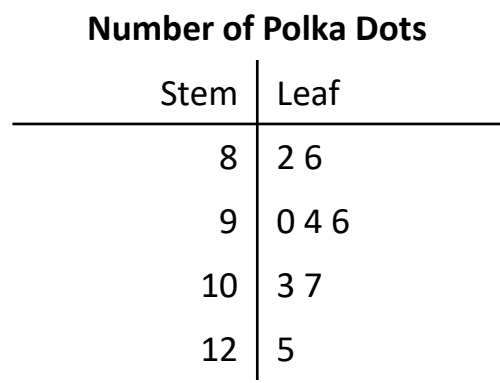
Weight (lb)	11	11 ½	12	12 ½	13	13 ½	14	14 ½	15
Tally									

27. The table shows the number of bags of gold that Peg-Leg Pete the Pirate has captured per day in the last two weeks. Which dot plot represents the data in the table?

Bags of gold captured	Number of Days
0	
1	
2	
3	
4	
5	



28. Fashionable Fiona has eight dresses with polka dots. She counted the dots on each dress and summarized the information in the stem and leaf plot below.



9 | 6 means 96 polka dots

What is the total number of polka dots on Fiona’s dresses?

- A. 72
- B. 423
- C. 783
- D. 504

29. The stem and leaf plot shows the finishing time in seconds for the racers in the most recent 50-yard Wiener Dog Race at the fair.

**Wiener Dog Times**

Stem	Leaf
6	8
7	2 5
8	0 3 3 6 8
9	2 4 8

7|5 means 7.5 seconds

What is the difference in time between the slowest wiener dog's time and the winning wiener dog's time?

- A. 2.4 seconds
- B. 3 seconds
- C. 30 seconds
- D. 0.7 seconds

30. Larry the Lizard Rancher is counting the lizards on his lizard ranch.

Lizards at the Lizard Ranch

Type of Lizard	Tally	Frequency
Green Lizard		
Spiny Lizard		21
Alligator Lizard		17

It got dark before Larry had a chance to count the green lizards, but he knows he has twice as many green lizards as alligator lizards. How many lizards does Larry have in all?