



Solve each problem using a tape diagram.

Answers

- 1) A store sold 50 C batteries in a day. They sold 3 as many AAA batteries as C batteries and 3 times as many AA as AAA batteries. How many batteries did they sell total?

- 2) An ice cream shop sold 37 waffle cones. They sold 8 times as many sugar cones as waffle cones and 3 times as many wafer cones as sugar cones. How many cones did they sell total?

- 3) A school principal was looking over grades. In math 22 students scored a C. 3 times as many students scored a B. And 6 times as many students scored an A as scored a B. How many students scored an A, B or C?

- 4) On week 1 a football player jogged for 29 minutes. On week 2 he jogged for 2 times as long. On week 3 he jogged for 5 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?

- 5) An ice cream shop sold 41 waffle cones. They sold 2 times as many sugar cones as waffle cones and 2 times as many wafer cones as sugar cones. How many cones did they sell total?

1. _____

2. _____

3. _____

4. _____

5. _____

Solve each problem using a tape diagram.

Answers

- 1) A store sold 50 C batteries in a day. They sold 3 as many AAA batteries as C batteries and 3 times as many AA as AAA batteries. How many batteries did they sell total?

C	50								
AAA									
AA									

1. **650**

2. **1221**

3. **484**

4. **377**5. **287**

- 2) An ice cream shop sold 37 waffle cones. They sold 8 times as many sugar cones as waffle cones and 3 times as many wafer cones as sugar cones. How many cones did they sell total?

Waffle	37
Sugar	
Wafer	

- 3) A school principal was looking over grades. In math 22 students scored a C. 3 times as many students scored a B. And 6 times as many students scored an A as scored a B. How many students scored an A, B or C?

[illegible]

- 4) On week 1 a football player jogged for 29 minutes. On week 2 he jogged for 2 times as long. On week 3 he jogged for 5 times as long as he jogged on week 2. How many minutes did he jog across all 3 weeks?

[illegible]

- 5) An ice cream shop sold 41 waffle cones. They sold 2 times as many sugar cones as waffle cones and 2 times as many wafer cones as sugar cones. How many cones did they sell total?

Waffle	41			
Sugar				
Wafer				



Solve each problem using a tape diagram.

Answers

- 1) On week 1 a football player jogged for 46 minutes. On week 2 he jogged for 7 times as long. On week 3 he jogged for 9 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?
- 2) In one day a restaurant used 11 knives. They also used 2 as many forks as they used knives. And 2 times as many spoons as forks. How many utensils do they use in a day?
- 3) Chef Cody buys 35 carrots. He buys 2 times as many potatoes as carrots and 3 times as many tomatoes as potatoes. How many vegetables did he buy all together?
- 4) An ice cream shop sold 18 waffle cones. They sold 4 times as many sugar cones as waffle cones and 2 times as many wafer cones as sugar cones. How many cones did they sell total?
- 5) A school principal was looking over grades. In math 12 students scored a C. 3 times as many students scored a B. And 3 times as many students scored an A as scored a B. How many students scored an A, B or C?

1. _____

2. _____

3. _____

4. _____

5. _____



Solve each problem using a tape diagram.

Answers

- 1) On week 1 a football player jogged for 18 minutes. On week 2 he jogged for 3 times as long. On week 3 he jogged for 2 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?
- 2) An ice cream shop sold 30 waffle cones. They sold 3 times as many sugar cones as waffle cones and 3 times as many wafer cones as sugar cones. How many cones did they sell total?
- 3) In one day a restaurant used 22 knives. They also used 3 as many forks as they used knives. And 2 times as many spoons as forks. How many utensils do they use in a day?
- 4) An ice cream shop sold 27 waffle cones. They sold 4 times as many sugar cones as waffle cones and 8 times as many wafer cones as sugar cones. How many cones did they sell total?
- 5) Chef Cody buys 29 carrots. He buys 4 times as many potatoes as carrots and 7 times as many tomatoes as potatoes. How many vegetables did he buy all together?

1. _____

2. _____

3. _____

4. _____

5. _____



Solve each problem using a tape diagram.

- 1) On week 1 a football player jogged for 18 minutes. On week 2 he jogged for 3 times as long. On week 3 he jogged for 2 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?

Week 1	<input type="text" value="18"/>
Week 2	<input type="text"/> <input type="text"/> <input type="text"/>
Week 3	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>

- 2) An ice cream shop sold 30 waffle cones. They sold 3 times as many sugar cones as waffle cones and 3 times as many wafer cones as sugar cones. How many cones did they sell total?

Waffle	<input type="text" value="30"/>
Sugar	<input type="text"/> <input type="text"/> <input type="text"/>
Wafer	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>

- 3) In one day a restaurant used 22 knives. They also used 3 as many forks as they used knives. And 2 times as many spoons as forks. How many utensils do they use in a day?

knives	<input type="text" value="22"/>
forks	<input type="text"/> <input type="text"/> <input type="text"/>
spoons	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>

- 4) An ice cream shop sold 27 waffle cones. They sold 4 times as many sugar cones as waffle cones and 8 times as many wafer cones as sugar cones. How many cones did they sell total?

Waffle	<input type="text" value="27"/>
Sugar	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>
Wafer	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>

- 5) Chef Cody buys 29 carrots. He buys 4 times as many potatoes as carrots and 7 times as many tomatoes as potatoes. How many vegetables did he buy all together?

Carrots	<input type="text" value="29"/>
Potatoes	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>
Tomatoes	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>

Answers

1. **180**
2. **390**
3. **220**
4. **999**
5. **957**



Solve each problem using a tape diagram.

Answers

- 1) An ice cream shop sold 29 waffle cones. They sold 2 times as many sugar cones as waffle cones and 3 times as many wafer cones as sugar cones. How many cones did they sell total?

- 2) In one day a restaurant used 50 knives. They also used 3 as many forks as they used knives. And 2 times as many spoons as forks. How many utensils do they use in a day?

- 3) An ice cream shop sold 28 waffle cones. They sold 3 times as many sugar cones as waffle cones and 9 times as many wafer cones as sugar cones. How many cones did they sell total?

- 4) On week 1 a football player jogged for 13 minutes. On week 2 he jogged for 4 times as long. On week 3 he jogged for 3 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?

- 5) A school principal was looking over grades. In math 40 students scored a C. 4 times as many students scored a B. And 7 times as many students scored an A as scored a B. How many students scored an A, B or C?

1. _____
2. _____
3. _____
4. _____
5. _____



Solve each problem using a tape diagram.

- 1) An ice cream shop sold 29 waffle cones. They sold 2 times as many sugar cones as waffle cones and 3 times as many wafer cones as sugar cones. How many cones did they sell total?

Waffle	<input type="text" value="29"/>	
Sugar	<input type="text"/>	<input type="text"/>
Wafer	<input type="text"/>	<input type="text"/>

- 2) In one day a restaurant used 50 knives. They also used 3 as many forks as they used knives. And 2 times as many spoons as forks. How many utensils do they use in a day?

knives	<input type="text" value="50"/>	
forks	<input type="text"/>	<input type="text"/>
spoons	<input type="text"/>	<input type="text"/>

- 3) An ice cream shop sold 28 waffle cones. They sold 3 times as many sugar cones as waffle cones and 9 times as many wafer cones as sugar cones. How many cones did they sell total?

Waffle	<input type="text" value="28"/>	
Sugar	<input type="text"/>	<input type="text"/>
Wafer	<input type="text"/>	<input type="text"/>

- 4) On week 1 a football player jogged for 13 minutes. On week 2 he jogged for 4 times as long. On week 3 he jogged for 3 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?

Week 1	<input type="text" value="13"/>	
Week 2	<input type="text"/>	<input type="text"/>
Week 3	<input type="text"/>	<input type="text"/>

- 5) A school principal was looking over grades. In math 40 students scored a C. 4 times as many students scored a B. And 7 times as many students scored an A as scored a B. How many students scored an A, B or C?

C	<input type="text" value="40"/>	
B	<input type="text"/>	<input type="text"/>
A	<input type="text"/>	<input type="text"/>

Answers

1. **261**
2. **500**
3. **868**
4. **221**
5. **1320**



Solve each problem using a tape diagram.

Answers

- 1) On week 1 a football player jogged for 37 minutes. On week 2 he jogged for 7 times as long. On week 3 he jogged for 4 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?
- 2) A school principal was looking over grades. In math 30 students scored a C. 2 times as many students scored a B. And 2 times as many students scored an A as scored a B. How many students scored an A, B or C?
- 3) An ice cream shop sold 19 waffle cones. They sold 5 times as many sugar cones as waffle cones and 6 times as many wafer cones as sugar cones. How many cones did they sell total?
- 4) Chef Paul buys 20 carrots. He buys 5 times as many potatoes as carrots and 7 times as many tomatoes as potatoes. How many vegetables did he buy all together?
- 5) A store sold 14 C batteries in a day. They sold 2 as many AAA batteries as C batteries and 2 times as many AA as AAA batteries. How many batteries did they sell total?

1. _____

2. _____

3. _____

4. _____

5. _____

Solve each problem using a tape diagram.

Answers

- 1) On week 1 a football player jogged for 37 minutes. On week 2 he jogged for 7 times as long. On week 3 he jogged for 4 times as long as he jogged on week 2. How many minutes did he jog across all 3 weeks?

Week 1 37

Week 2

--	--	--	--	--	--	--

Week 3

- 2) A school principal was looking over grades. In math 30 students scored a C. 2 times as many students scored a B. And 2 times as many students scored an A as scored a B. How many students scored an A, B or C?

C	30
---	----

B		
---	--	--

A				
---	--	--	--	--

- 3) An ice cream shop sold 19 waffle cones. They sold 5 times as many sugar cones as waffle cones and 6 times as many wafer cones as sugar cones. How many cones did they sell total?

Waffle 19

Sugar				
-------	--	--	--	--

[illegible]

- 4) Chef Paul buys 20 carrots. He buys 5 times as many potatoes as carrots and 7 times as many tomatoes as potatoes. How many vegetables did he buy all together?

Carrots 20

Potatoes					
----------	--	--	--	--	--

[illegible]

- 5) A store sold 14 C batteries in a day. They sold 2 as many AAA batteries as C batteries and 2 times as many AA as AAA batteries. How many batteries did they sell total?

C	14
---	----

AAA		
-----	--	--

AA				
----	--	--	--	--

1. 1332

2. 210

3. **684**

4. **820**

5. 98



Solve each problem using a tape diagram.

Answers

- 1) A school principal was looking over grades. In math 29 students scored a C. 2 times as many students scored a B. And 3 times as many students scored an A as scored a B. How many students scored an A, B or C?
- 2) On week 1 a football player jogged for 22 minutes. On week 2 he jogged for 3 times as long. On week 3 he jogged for 2 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?
- 3) In one day a restaurant used 43 knives. They also used 2 as many forks as they used knives. And 3 times as many spoons as forks. How many utensils do they use in a day?
- 4) On week 1 a football player jogged for 33 minutes. On week 2 he jogged for 6 times as long. On week 3 he jogged for 8 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?
- 5) A school principal was looking over grades. In math 41 students scored a C. 4 times as many students scored a B. And 9 times as many students scored an A as scored a B. How many students scored an A, B or C?

1. _____

2. _____

3. _____

4. _____

5. _____



Solve each problem using a tape diagram.

- 1) A school principal was looking over grades. In math 29 students scored a C. 2 times as many students scored a B. And 3 times as many students scored an A as scored a B. How many students scored an A, B or C?

C	<input type="text" value="29"/>					
B	<input type="text"/>	<input type="text"/>				
A	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>

- 2) On week 1 a football player jogged for 22 minutes. On week 2 he jogged for 3 times as long. On week 3 he jogged for 2 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?

Week 1	<input type="text" value="22"/>					
Week 2	<input type="text"/>	<input type="text"/>	<input type="text"/>			
Week 3	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>

- 3) In one day a restaurant used 43 knives. They also used 2 as many forks as they used knives. And 3 times as many spoons as forks. How many utensils do they use in a day?

knives	<input type="text" value="43"/>					
forks	<input type="text"/>	<input type="text"/>				
spoons	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>

- 4) On week 1 a football player jogged for 33 minutes. On week 2 he jogged for 6 times as long. On week 3 he jogged for 8 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?

Week 1	<input type="text" value="33"/>					
Week 2	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
Week 3	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>

- 5) A school principal was looking over grades. In math 41 students scored a C. 4 times as many students scored a B. And 9 times as many students scored an A as scored a B. How many students scored an A, B or C?

C	<input type="text" value="41"/>					
B	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>		
A	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>

Answers

1. **261**
2. **220**
3. **387**
4. **1815**
5. **1681**



Solve each problem using a tape diagram.

Answers

- 1) A school principal was looking over grades. In math 34 students scored a C. 4 times as many students scored a B. And 2 times as many students scored an A as scored a B. How many students scored an A, B or C?
- 2) On week 1 a football player jogged for 24 minutes. On week 2 he jogged for 4 times as long. On week 3 he jogged for 8 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?
- 3) A store sold 44 C batteries in a day. They sold 8 as many AAA batteries as C batteries and 8 times as many AA as AAA batteries. How many batteries did they sell total?
- 4) In one day a restaurant used 39 knives. They also used 4 as many forks as they used knives. And 3 times as many spoons as forks. How many utensils do they use in a day?
- 5) In one day a restaurant used 16 knives. They also used 2 as many forks as they used knives. And 9 times as many spoons as forks. How many utensils do they use in a day?

1. _____

2. _____

3. _____

4. _____

5. _____

Solve each problem using a tape diagram.

- 1) A school principal was looking over grades. In math 34 students scored a C. 4 times as many students scored a B. And 2 times as many students scored an A as scored a B. How many students scored an A, B or C?

C	34						
B							
A							

- 2) On week 1 a football player jogged for 24 minutes. On week 2 he jogged for 4 times as long. On week 3 he jogged for 8 times as long as he jogged on week 2. How many minutes did he jog across all 3 weeks?

[illegible]

- 3) A store sold 44 C batteries in a day. They sold 8 as many AAA batteries as C batteries and 8 times as many AA as AAA batteries. How many batteries did they sell total?

Diagram illustrating the hierarchical structure of the 1000 Genomes Project:

- C** (44) branches into **AAA** (10).
- AAA** (10) branches into **AA** (1000).

- 4) In one day a restaurant used 39 knives. They also used 4 as many forks as they used knives. And 3 times as many spoons as forks. How many utensils do they use in a day?

[illegible]

- 5) In one day a restaurant used 16 knives. They also used 2 as many forks as they used knives. And 9 times as many spoons as forks. How many utensils do they use in a day?

knives	16
forks	
spoons	

Answers

1. **442**

2. **888**

3. **3212**

4. **663**

5. **336**



Answers

- 1) A school principal was looking over grades. In math 40 students scored a C. 9 times as many students scored a B. And 9 times as many students scored an A as scored a B. How many students scored an A, B or C?
- 2) Chef Edward buys 42 carrots. He buys 2 times as many potatoes as carrots and 4 times as many tomatoes as potatoes. How many vegetables did he buy all together?
- 3) A store sold 26 C batteries in a day. They sold 2 as many AAA batteries as C batteries and 3 times as many AA as AAA batteries. How many batteries did they sell total?
- 4) An ice cream shop sold 19 waffle cones. They sold 2 times as many sugar cones as waffle cones and 2 times as many wafer cones as sugar cones. How many cones did they sell total?
- 5) An ice cream shop sold 27 waffle cones. They sold 6 times as many sugar cones as waffle cones and 4 times as many wafer cones as sugar cones. How many cones did they sell total?

1. _____
2. _____
3. _____
4. _____
5. _____

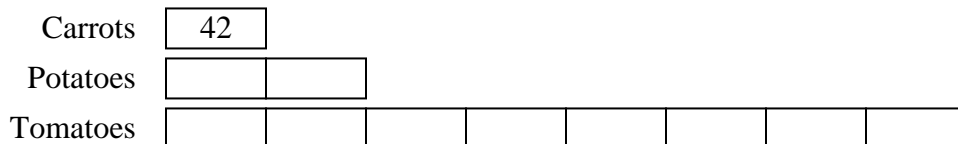


Solve each problem using a tape diagram.

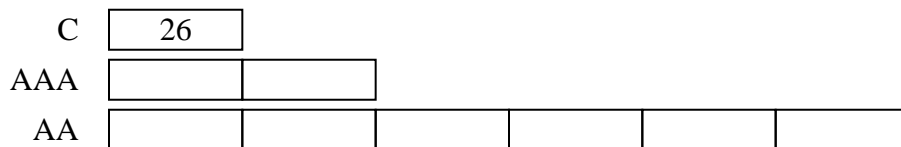
- 1) A school principal was looking over grades. In math 40 students scored a C. 9 times as many students scored a B. And 9 times as many students scored an A as scored a B. How many students scored an A, B or C?



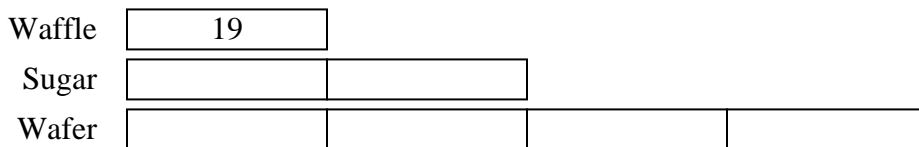
- 2) Chef Edward buys 42 carrots. He buys 2 times as many potatoes as carrots and 4 times as many tomatoes as potatoes. How many vegetables did he buy all together?



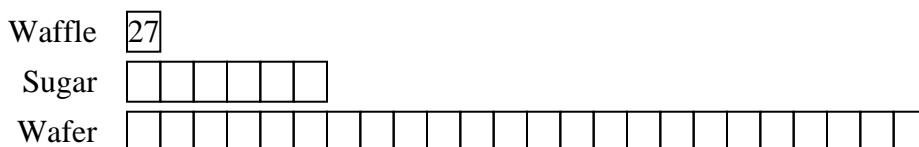
- 3) A store sold 26 C batteries in a day. They sold 2 as many AAA batteries as C batteries and 3 times as many AA as AAA batteries. How many batteries did they sell total?



- 4) An ice cream shop sold 19 waffle cones. They sold 2 times as many sugar cones as waffle cones and 2 times as many wafer cones as sugar cones. How many cones did they sell total?



- 5) An ice cream shop sold 27 waffle cones. They sold 6 times as many sugar cones as waffle cones and 4 times as many wafer cones as sugar cones. How many cones did they sell total?

**Answers**

1. **3640**
2. **462**
3. **234**
4. **133**
5. **837**

Solve each problem using a tape diagram.

Answers

- 1) A store sold 47 C batteries in a day. They sold 6 as many AAA batteries as C batteries and 5 times as many AA as AAA batteries. How many batteries did they sell total?
- 2) Chef Luke buys 28 carrots. He buys 3 times as many potatoes as carrots and 3 times as many tomatoes as potatoes. How many vegetables did he buy all together?
- 3) In one day a restaurant used 24 knives. They also used 6 as many forks as they used knives. And 2 times as many spoons as forks. How many utensils do they use in a day?
- 4) In one day a restaurant used 18 knives. They also used 4 as many forks as they used knives. And 3 times as many spoons as forks. How many utensils do they use in a day?
- 5) Chef George buys 25 carrots. He buys 7 times as many potatoes as carrots and 6 times as many tomatoes as potatoes. How many vegetables did he buy all together?

1. _____

2. _____

3. _____

4. _____

5. _____

Solve each problem using a tape diagram.

- 1) A store sold 47 C batteries in a day. They sold 6 as many AAA batteries as C batteries and 5 times as many AA as AAA batteries. How many batteries did they sell total?

Diagram illustrating the bus structure for the 47-bit bus:

- C**: 4 bits
- AAA**: 5 bits
- AA**: 38 bits

- 2) Chef Luke buys 28 carrots. He buys 3 times as many potatoes as carrots and 3 times as many tomatoes as potatoes. How many vegetables did he buy all together?

Carrots	28								
Potatoes									
Tomatoes									

- 3) In one day a restaurant used 24 knives. They also used 6 as many forks as they used knives. And 2 times as many spoons as forks. How many utensils do they use in a day?

knives	<div style="border: 1px solid black; padding: 2px 10px; display: inline-block;">24</div>
forks	<div style="border: 1px solid black; width: 100%; height: 20px;"></div>
spoons	<div style="border: 1px solid black; width: 100%; height: 20px;"></div>

- 4) In one day a restaurant used 18 knives. They also used 4 as many forks as they used knives. And 3 times as many spoons as forks. How many utensils do they use in a day?

[illegible]

- 5) Chef George buys 25 carrots. He buys 7 times as many potatoes as carrots and 6 times as many tomatoes as potatoes. How many vegetables did he buy all together?

Carrots	25
Potatoes	10
Tomatoes	50

Answers

1. **1739**

2. **364**

3. **456**

4. **306**

5. **1250**



Solve each problem using a tape diagram.

Answers

- 1) On week 1 a football player jogged for 38 minutes. On week 2 he jogged for 6 times as long. On week 3 he jogged for 4 times as long as he jogged on week 2. How many minute did he jog across all 3 weeks?
- 2) A store sold 11 C batteries in a day. They sold 5 as many AAA batteries as C batteries and 9 times as many AA as AAA batteries. How many batteries did they sell total?
- 3) Chef Victor buys 24 carrots. He buys 3 times as many potatoes as carrots and 2 times as many tomatoes as potatoes. How many vegetables did he buy all together?
- 4) A school principal was looking over grades. In math 26 students scored a C. 3 times as many students scored a B. And 3 times as many students scored an A as scored a B. How many students scored an A, B or C?
- 5) In one day a restaurant used 47 knives. They also used 4 as many forks as they used knives. And 3 times as many spoons as forks. How many utensils do they use in a day?

1. _____

2. _____

3. _____

4. _____

5. _____

Solve each problem using a tape diagram.

Answers

- 1) On week 1 a football player jogged for 38 minutes. On week 2 he jogged for 6 times as long. On week 3 he jogged for 4 times as long as he jogged on week 2. How many minutes did he jog across all 3 weeks?

Week 1 38

Week 2

--	--	--	--	--	--

[illegible]

1. **1178**

2. **561**

3. **240**

4. **338**

5. **799**

- 2) A store sold 11 C batteries in a day. They sold 5 as many AAA batteries as C batteries and 9 times as many AA as AAA batteries. How many batteries did they sell total?

C \sqcap AAA

--	--	--	--	--

[illegible]

- 3) Chef Victor buys 24 carrots. He buys 3 times as many potatoes as carrots and 2 times as many tomatoes as potatoes. How many vegetables did he buy all together?

Carrots	24
---------	----

Potatoes			
----------	--	--	--

Tomatoes						
----------	--	--	--	--	--	--

- 4) A school principal was looking over grades. In math 26 students scored a C. 3 times as many students scored a B. And 3 times as many students scored an A as scored a B. How many students scored an A, B or C?

C 26

B			
---	--	--	--

A								
---	--	--	--	--	--	--	--	--

- 5) In one day a restaurant used 47 knives. They also used 4 as many forks as they used knives. And 3 times as many spoons as forks. How many utensils do they use in a day?

knives 47

forks

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[illegible]