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**Unit 6- Geometry REVIEW**

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| --- | --- |
| **Question 1**  **Consider this figure.**     Image result for right triangle **Enter the area of the right triangle, in square**  **centimeters.**    **square centimeters** | **Question 2**  **Ramon was plotting the coordinates of a polygon.  He has  plotted the coordinates of the polygon shown below.  What  is the area of Ramon's polygon?**   **1.  Point**A**(2, 5)  2.  Point B (8, 5)  3.  Point C (8, 9)  4.  Point D (5, 7)  5.  Point E (2, 9)**   [https://imagebank.illuminateed.com/imagebank/379989](https://testing.illuminateed.com/#ib_img_0)    **square units** |
| **Question 3**  Image result for irregular polygon   In the figure shown above, all the corners form right angles.  What is the area of the figure?   |  | | --- | | 1. 8 m2 | | 1. 19 m2 | | 1. 16 m2 | | 1. 18 m2 | | **Question 4**  **Use this figure to answer the questions that follow.**   [https://imagebank.illuminateed.com/imagebank/448741](https://testing.illuminateed.com/#ib_img_0)   **Part A:  What is the area of triangle FIJ?**  **Part B:  What is the area of parallelogram FGHJ?** |
| **Question 5**  A cube has edges of 3 ½ inches. How many cubes with side lengths of ½ inches would be needed to fill the prism?   |  |  |  | | --- | --- | --- | | A | 343 cubes |  | | B | 34.3 cubes |  | | C | 7 cubes |  | | D | 85.75 cubes |  | | **Question 6**  **A quadrilateral has the following vertices on a coordinate  plane:**   **Point J: (3, –6)**  **Point K: (–1, –6)**  **Point L: (–1, 2)**  **Point M: (3, 2)**   **Enter the length of side KL.**    **units**  [https://imagebank.illuminateed.com/imagebank/448744](https://testing.illuminateed.com/#ib_img_0) |
| **Question 7**  Carterville was built along a grid using a coordinate plane. City Hall, the Fire Department, and the Police Department are the vertices of a triangle. City Hall is located at (1, 4), the Fire Department is located at (-3, 4) and the Police Department is located at (1, -2). Each square on the coordinate plane is equal to 1 square mile. Which department is closer to City Hall and by how much?   |  |  |  | | --- | --- | --- | | A | The Fire Department is closer to City Hall  by 4 miles. |  | | B | The Police Department is closer to City Hall   by 6 miles. |  | | C | The Police Department is closer to City Hall  by 2 miles. |  | | D | The Fire Department is closer to City Hall  by 2 miles. |  | | **Question 8**  Which of the following sets of coordinates represents  the image shown below?  [https://imagebank.illuminateed.com/imagebank/368335](https://testing.illuminateed.com/#ib_img_0)   |  |  |  | | --- | --- | --- | | A | (–5 , 6), (–5 , –4), (2 , 6), (2 , –4) |  | | B | (6 , –5), (–4 , 5), (6 , 2), (–4 , 2) |  | | C | (5 , –6), (5 , 4), (–2 , –6), (–2 , 4) |  | | D | (–6 , 5), (4 , 5), (–6 , –2), (4 , –2) |  | |
| **Question 9**  Image result for rectangular prism   **Calculate the volume of the rectangular prism in the  diagram above.**   |  |  |  | | --- | --- | --- | |  | A | 330 cm3 | |  | B | 302 cm3 | |  | C | 22 cm3 | |  | D | 130 cm3 | | **Question 10**  **Consider this figure.**   [https://imagebank.illuminateed.com/imagebank/833557](https://testing.illuminateed.com/#ib_img_0)   **Enter the volume of this right rectangular prism in cubic inches.** |
| **Question 11**  Philip claims this net will fold to form a triangular pyramid.**[https://imagebank.illuminateed.com/imagebank/375456](https://testing.illuminateed.com/#ib_img_0)  Is Philip correct?**   |  |  |  | | --- | --- | --- | | A | Yes. |  | | B | No, because a triangular pyramid does not  have four faces. |  | | C | No, because all the faces of a triangular  pyramid are triangles. |  | | D | No, because even though the net uses the  correct type and number of shape, they are  positioned incorrectly. |  | | **Question 12**  **What is the surface area of the net shown below?**   Image result for surface area of net |
| **Question 13**  **What is the surface area of the box shown by the pattern below?**   Image result for surface area of a box net | |