## Lesson 11 Practice Problems

1. Which point represents the complex number $-3+2 i$ ?

A. A
B. B
C. C
D. D
2. Match each expression to an equivalent expression.
A. $2 i \cdot 8$
3. -16
B. $16 i^{3}$
4. 16
C. $(2 i)^{4}$
5. $-16 i$
D. $2 i \cdot 8 i$
6. $16 i$
7. a. Diego squared a number and got 4. Andre squared a different number and got 4. What were the numbers that Diego and Andre squared?
b. Jada squared a number and got -4 . Elena squared a different number and got -4 . What were the numbers that Jada and Elena squared?
8. Find all solutions to each equation.
a. $a^{2}=1$
b. $b^{2}=13$
c. $c^{2}=-9$
d. $d^{2}=-5$
9. Find the exact solution(s) to each of these equations, or explain why there is no solution.
a. $\sqrt[3]{a+2}=4$
b. $\sqrt[3]{b}+5=4$
c. $\sqrt[3]{c-1}-14=-4$
(From Unit 3, Lesson 8.)
10. Explain how you know that $\sqrt{-1}$ is not a negative number.
