(Missing Base or Exponent) Integers: S1

Find the value of *x*.

1)
$$4^x = 1,024$$

2)
$$x^2 = 81$$

3)
$$-216 = (-6)^{x}$$

$$x = \underline{\hspace{1cm}}$$

$$x = \underline{\hspace{1cm}}$$

$$x = \underline{\hspace{1cm}}$$

4)
$$x^4 = 256$$

5)
$$49 = 7^{x}$$

6)
$$x^5 = 3,125$$

$$x = \underline{\hspace{1cm}}$$

$$x = \underline{\hspace{1cm}}$$

$$x = \underline{\hspace{1cm}}$$

7)
$$128 = 2^{-x}$$

8)
$$8^x = 4,096$$

9)
$$(-3)^{-x} = -27$$

$$x = \underline{\hspace{1cm}}$$

$$x = \underline{\hspace{1cm}}$$

$$x = \underline{\hspace{1cm}}$$

10) 64 =
$$x^6$$

11)
$$6^{-x} = 7,776$$

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 12) $(-x)^4 = 2,401$

$$x = \underline{\hspace{1cm}}$$

$$X = \underline{\hspace{1cm}}$$

$$x = \underline{\hspace{1cm}}$$

13) For what positive value of
$$x$$
, $625 = x^4$? 14) What is the value of x , if $(-8)^x = -512$?

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$$x$$
, if $(-8)^x = -512$?

$$x =$$

$$x = \underline{\hspace{1cm}}$$

15) If $5^x = 125$, then which of these can be the value of x?

- i) 5
- ii) 3
- iii) 4
- iv) -4