

Simplifying Radicals Review

I can simplify square roots.

Simplifying Square Roots:

All square root expressions are in simplest form when **no** perfect square factor other than 1 is in the radicand (the number underneath the radical). Simplify each of the following.

Hint: Find the largest perfect square factor of the radicand.

Perfect squares are: 4, 9, 16, 25, 36, 49, 64, 81, 100, 121, 144, etc.
--

Examples:

A) $\sqrt{12} = \sqrt{4} \cdot \sqrt{3} = 2\sqrt{3}$

B) $\sqrt{98} = \sqrt{49}\sqrt{2} = 7\sqrt{2}$

C) $\sqrt{75} = \sqrt{25}\sqrt{3} = 5\sqrt{3}$

Simplifying Radicals Practice

Simplify each of the following.

A) $\sqrt{200}$

B) $\sqrt{500}$

C) $\sqrt{50}$

D) $\sqrt{60}$

E) $\sqrt{72}$

F) $\sqrt{243}$

G) $\sqrt{128}$

H) $\sqrt{112}$

Answer Key:	A) $10\sqrt{2}$	B) $10\sqrt{5}$	C) $5\sqrt{2}$	D) $2\sqrt{15}$
	E) $6\sqrt{2}$	F) $9\sqrt{3}$	G) $8\sqrt{2}$	H) $4\sqrt{7}$

