

12.8.15

Multiply and simplify the following expression. Use your box!

$$(-7\sqrt{2} + 4\sqrt{7})(6\sqrt{2} + 3\sqrt{7})$$

$$-7\sqrt{2} \quad 4\sqrt{7}$$

$6\sqrt{2}$	$42\sqrt{4}$	$24\sqrt{4}$
$3\sqrt{7}$	$21\sqrt{4}$	$12\sqrt{49}$

$$-42\sqrt{14} + 24\sqrt{14} - 21\sqrt{14} + 12\sqrt{14}$$

$$-42 \cdot 2 \qquad 3\sqrt{14} \qquad 12 \cdot 7$$

$$-84 \qquad \qquad \qquad 84$$

$$\frac{-84 + 3\sqrt{14} + 84}{3\sqrt{14}}$$