Radicals Simplifying

Simplify The Following Sum/Subtraction of Radicals

Name_____ **Date**_____

1. $-\sqrt{81}+\sqrt{80}-\sqrt{70}-\sqrt{130}-\sqrt{70}+\sqrt{45}+\sqrt{196}$

2. $-\sqrt{5}+\sqrt{24}-\sqrt{7}+\sqrt{112}-\sqrt{196}$

3. $\sqrt{15}+\sqrt{112}+\sqrt{135}+\sqrt{15}-\sqrt{15}+\sqrt{60}-\sqrt{112}-\sqrt{1}$

4. $-\sqrt{50}-\sqrt{8}+\sqrt{30}+\sqrt{8}$

5. $-\sqrt{4}+\sqrt{176}-\sqrt{20}+\sqrt{112}-\sqrt{64}+\sqrt{64}-\sqrt{81}$

6. $-\sqrt{65}+\sqrt{45}+\sqrt{28}+\sqrt{180}-\sqrt{1}$

Answers

Simplify The Following Sum/Subtraction of Radicals

1. $-\sqrt{81}+\sqrt{80}-\sqrt{70}-\sqrt{130}-\sqrt{70}+\sqrt{45}+\sqrt{196}$

   $5+7\sqrt{5}-2\sqrt{70}-\sqrt{130}$

2. $-\sqrt{5}+\sqrt{24}-\sqrt{7}+\sqrt{112}-\sqrt{196}$

   $-\sqrt{5}+2\sqrt{6}+3\sqrt{7}-14$

3. $\sqrt{15}+\sqrt{112}+\sqrt{135}+\sqrt{15}-\sqrt{15}+\sqrt{60}-\sqrt{112}-\sqrt{1}$

   $6\sqrt{15}-1$

4. $-\sqrt{50}-\sqrt{8}+\sqrt{30}+\sqrt{8}$

   $-5\sqrt{2}+\sqrt{30}$

5. $-\sqrt{4}+\sqrt{176}-\sqrt{20}+\sqrt{112}-\sqrt{64}+\sqrt{64}-\sqrt{81}$

   $-11+4\sqrt{11}-2\sqrt{5}+4\sqrt{7}$

6. $-\sqrt{65}+\sqrt{45}+\sqrt{28}+\sqrt{180}-\sqrt{1}$

   $-\sqrt{65}+9\sqrt{5}+2\sqrt{7}-1$