

IV. Cube Roots (p.507):

1. If “ x ” is any number, then the notation $\sqrt[3]{x}$ represents the “cube root”
2. If $x = n^3$, then $n = \sqrt[3]{x}$
3. $(\sqrt[3]{x})^3 = \underline{\hspace{2cm}}$
4. $\sqrt[3]{x^3} = \underline{\hspace{2cm}}$
5. Examples (p.512): Exercises #48-56(even)

V. n^{th} Roots (pp.508-510): not covered

HW: pp.511-513 / Exercises #1-45(odd), 47, 51, 91, 93
Read pp.515-521 (section 7.2)

I. Square Root & Cube Root, Part 2:

1. $\sqrt{x} = x^{1/2}$ since $(x^{1/2})^2 = x^{1/2 \cdot 2} = x^1 = x$ (definition of square root)

2. $\sqrt[3]{x} = x^{1/3}$ since $(x^{1/3})^3 = x^{1/3 \cdot 3} = x^1 = x$ (definition of cube root)

3. Examples (pp.521-522): Exercises #2,4,22,24,40,42,48

II. $x^{m/2} = \sqrt{x^m}$ or $(\sqrt{x})^m$

III. $x^{m/3} = \sqrt[3]{x^m}$ or $(\sqrt[3]{x})^m$

IV. Examples (pp.521-522): Exercises #12,14,16,50,
56,82

HW: pp.521-522 / Exercises #1,3,7,11,13,21,23,27,
37,39,41,45,47,49,65,85

Read pp.525-530 (section 7.3)