19.

$$\underbrace{x^3 + x^2 - 17x + 15}_{r1} = \underbrace{0}_{r2}$$

$$x = -5, 1, 3$$

20.

$$\underbrace{x^3 - 3x^2 - 17x + 51}_{r1} = \underbrace{0}_{r2}$$

$$x = -4.12, 3, 4.12$$

$$\frac{\sqrt{23}}{3} \text{ yrs}$$

$$5.10 \text{ yrs}$$