Name: $\qquad$ Date: $\qquad$

| Learning Goal 3.3 | Solving equations algebraically and graphically. |
| :--- | :--- |

Example Consider the equation $f(x)=x^{4}+x^{3}-10 x^{2}-4 x+24$.

| Degree | Leading <br> Coefficient | Constant | Domain | $y$-intercept | Number of <br> $x$-intercepts |
| :--- | :--- | :--- | :--- | :--- | :--- |
|  |  |  |  |  |  |

Factor the equation.

Find the solutions or roots of the equation.

Section 3.4 Equations and Graphs of

Multiplicity (of a zero)

| Range | Maximum(s) | Minimum(s) | End Behaviour |
| :--- | :--- | :--- | :--- |
|  |  |  |  |

Graph the function (using technology).


Find the zeros of the equation.

