

$$x^2$$

$$x-1 \overline{) x^3 + 2x^2 + 3x - 6}$$

Step 2: Multiply  $x^2$  by  $x-1$  (divisor) and write the answer below  $x^3 + 2x^2$

$$x^2$$

$$x-1 \overline{) x^3 + 2x^2 + 3x - 6}$$

$$\underline{-x^3 + x^2}$$

Step 3: Subtract  $x^3 - x^2$  from the dividend

$$x^2$$

$$x-1 \overline{) x^3 + 2x^2 + 3x - 6}$$

$$\underline{-x^3 + x^2}$$

$$3x^2$$

Step 4: Bring down the term  $3x$  to the level of the answer in Step 3.

$$x^2$$

$$x-1 \overline{) x^3 + 2x^2 + 3x - 6}$$

$$\underline{-x^3 + x^2}$$

$$3x^2 + 3x$$

Step 5: (It's a repeat of step 1)

Divide  $3x^2$  by  $x$ . Write answer above  $2x^2$

$$x^2 + 3x$$

$$x-1 \overline{) x^3 + 2x^2 + 3x - 6}$$

$$\underline{-x^3 + x^2}$$

$$3x^2 + 3x$$

Step 6: (Repeat of step 2). Multiply  $3x$  by  $x-1$  (divisor) and write the answer below  $3x^2 + 3x$ .

$$x^2 + 3x$$

$$x-1 \overline{) x^3 + 2x^2 + 3x - 6}$$

$$\underline{-x^3 + x^2}$$

$$3x^2 + 3x$$

$$\underline{-3x^2 + 3x}$$