

“All” Quadratic Trinomials

This is a list of all unique quadratic trinomials of the form x^2+ax+b that are factorable over the integer complex numbers whose magnitude is less than or equal to ten. There are 441 unique trinomials on this list.

$$\begin{aligned}x^2+20x+200 &= (x-10-10i)(x-10+10i) \\x^2+20x+181 &= (x-10-9i)(x-10+9i) \\x^2+20x+164 &= (x-10-8i)(x-10+8i) \\x^2+20x+149 &= (x-10-7i)(x-10+7i) \\x^2+20x+136 &= (x-10-6i)(x-10+6i) \\x^2+20x+125 &= (x-10-5i)(x-10+5i) \\x^2+20x+116 &= (x-10-4i)(x-10+4i) \\x^2+20x+109 &= (x-10-3i)(x-10+3i) \\x^2+20x+104 &= (x-10-2i)(x-10+2i) \\x^2+20x+101 &= (x-10-i)(x-10+i) \\x^2+20x+100 &= (x-10)(x-10) \\x^2+20x+101 &= (x-10+i)(x-10-i) \\x^2+20x+104 &= (x-10+2i)(x-10-2i) \\x^2+20x+109 &= (x-10+3i)(x-10-3i) \\x^2+20x+116 &= (x-10+4i)(x-10-4i) \\x^2+20x+125 &= (x-10+5i)(x-10-5i) \\x^2+20x+136 &= (x-10+6i)(x-10-6i) \\x^2+20x+149 &= (x-10+7i)(x-10-7i) \\x^2+20x+164 &= (x-10+8i)(x-10-8i) \\x^2+20x+181 &= (x-10+9i)(x-10-9i) \\x^2+20x+200 &= (x-10+10i)(x-10-10i) \\x^2+18x+181 &= (x-9-10i)(x-9+10i) \\x^2+18x+162 &= (x-9-9i)(x-9+9i) \\x^2+18x+145 &= (x-9-8i)(x-9+8i) \\x^2+18x+130 &= (x-9-7i)(x-9+7i) \\x^2+18x+117 &= (x-9-6i)(x-9+6i) \\x^2+18x+106 &= (x-9-5i)(x-9+5i) \\x^2+18x+97 &= (x-9-4i)(x-9+4i) \\x^2+18x+90 &= (x-9-3i)(x-9+3i) \\x^2+18x+85 &= (x-9-2i)(x-9+2i) \\x^2+18x+82 &= (x-9-i)(x-9+i) \\x^2+18x+81 &= (x-9)(x-9) \\x^2+18x+82 &= (x-9+i)(x-9-i) \\x^2+18x+85 &= (x-9+2i)(x-9-2i) \\x^2+18x+90 &= (x-9+3i)(x-9-3i) \\x^2+18x+97 &= (x-9+4i)(x-9-4i) \\x^2+18x+106 &= (x-9+5i)(x-9-5i) \\x^2+18x+117 &= (x-9+6i)(x-9-6i) \\x^2+18x+130 &= (x-9+7i)(x-9-7i) \\x^2+18x+145 &= (x-9+8i)(x-9-8i) \\x^2+18x+162 &= (x-9+9i)(x-9-9i) \\x^2+18x+181 &= (x-9+10i)(x-9-10i) \\x^2+16x+164 &= (x-8-10i)(x-8+10i) \\x^2+16x+145 &= (x-8-9i)(x-8+9i) \\x^2+16x+128 &= (x-8-8i)(x-8+8i) \\x^2+16x+113 &= (x-8-7i)(x-8+7i) \\x^2+16x+100 &= (x-8-6i)(x-8+6i) \\x^2+16x+89 &= (x-8-5i)(x-8+5i) \\x^2+16x+80 &= (x-8-4i)(x-8+4i) \\x^2+16x+73 &= (x-8-3i)(x-8+3i)\end{aligned}$$

$$\begin{aligned}x^2+16x+68 &= (x-8-2i)(x-8+2i) \\x^2+16x+65 &= (x-8-i)(x-8+i) \\x^2+16x+64 &= (x-8)(x-8) \\x^2+16x+65 &= (x-8+i)(x-8-i) \\x^2+16x+68 &= (x-8+2i)(x-8-2i) \\x^2+16x+73 &= (x-8+3i)(x-8-3i) \\x^2+16x+80 &= (x-8+4i)(x-8-4i) \\x^2+16x+89 &= (x-8+5i)(x-8-5i) \\x^2+16x+100 &= (x-8+6i)(x-8-6i) \\x^2+16x+113 &= (x-8+7i)(x-8-7i) \\x^2+16x+128 &= (x-8+8i)(x-8-8i) \\x^2+16x+145 &= (x-8+9i)(x-8-9i) \\x^2+16x+164 &= (x-8+10i)(x-8-10i) \\x^2+14x+149 &= (x-7-10i)(x-7+10i) \\x^2+14x+130 &= (x-7-9i)(x-7+9i) \\x^2+14x+113 &= (x-7-8i)(x-7+8i) \\x^2+14x+98 &= (x-7-7i)(x-7+7i) \\x^2+14x+85 &= (x-7-6i)(x-7+6i) \\x^2+14x+74 &= (x-7-5i)(x-7+5i) \\x^2+14x+65 &= (x-7-4i)(x-7+4i) \\x^2+14x+58 &= (x-7-3i)(x-7+3i) \\x^2+14x+53 &= (x-7-2i)(x-7+2i) \\x^2+14x+50 &= (x-7-i)(x-7+i) \\x^2+14x+49 &= (x-7)(x-7) \\x^2+14x+50 &= (x-7+i)(x-7-i) \\x^2+14x+53 &= (x-7+2i)(x-7-2i) \\x^2+14x+58 &= (x-7+3i)(x-7-3i) \\x^2+14x+65 &= (x-7+4i)(x-7-4i) \\x^2+14x+74 &= (x-7+5i)(x-7-5i) \\x^2+14x+85 &= (x-7+6i)(x-7-6i) \\x^2+14x+98 &= (x-7+7i)(x-7-7i) \\x^2+14x+113 &= (x-7+8i)(x-7-8i) \\x^2+14x+130 &= (x-7+9i)(x-7-9i) \\x^2+14x+149 &= (x-7+10i)(x-7-10i) \\x^2+12x+136 &= (x-6-10i)(x-6+10i) \\x^2+12x+117 &= (x-6-9i)(x-6+9i) \\x^2+12x+100 &= (x-6-8i)(x-6+8i) \\x^2+12x+85 &= (x-6-7i)(x-6+7i) \\x^2+12x+72 &= (x-6-6i)(x-6+6i) \\x^2+12x+61 &= (x-6-5i)(x-6+5i) \\x^2+12x+52 &= (x-6-4i)(x-6+4i) \\x^2+12x+45 &= (x-6-3i)(x-6+3i) \\x^2+12x+40 &= (x-6-2i)(x-6+2i) \\x^2+12x+37 &= (x-6-i)(x-6+i) \\x^2+12x+36 &= (x-6)(x-6) \\x^2+12x+37 &= (x-6+i)(x-6-i) \\x^2+12x+40 &= (x-6+2i)(x-6-2i) \\x^2+12x+45 &= (x-6+3i)(x-6-3i) \\x^2+12x+52 &= (x-6+4i)(x-6-4i) \\x^2+12x+61 &= (x-6+5i)(x-6-5i)\end{aligned}$$

$$\begin{aligned}
x^2 + 12x + 72 &= (x - 6 + 6i)(x - 6 - 6i) \\
x^2 + 12x + 85 &= (x - 6 + 7i)(x - 6 - 7i) \\
x^2 + 12x + 100 &= (x - 6 + 8i)(x - 6 - 8i) \\
x^2 + 12x + 117 &= (x - 6 + 9i)(x - 6 - 9i) \\
x^2 + 12x + 136 &= (x - 6 + 10i)(x - 6 - 10i) \\
x^2 + 10x + 125 &= (x - 5 - 10i)(x - 5 + 10i) \\
x^2 + 10x + 106 &= (x - 5 - 9i)(x - 5 + 9i) \\
x^2 + 10x + 89 &= (x - 5 - 8i)(x - 5 + 8i) \\
x^2 + 10x + 74 &= (x - 5 - 7i)(x - 5 + 7i) \\
x^2 + 10x + 61 &= (x - 5 - 6i)(x - 5 + 6i) \\
x^2 + 10x + 50 &= (x - 5 - 5i)(x - 5 + 5i) \\
x^2 + 10x + 41 &= (x - 5 - 4i)(x - 5 + 4i) \\
x^2 + 10x + 34 &= (x - 5 - 3i)(x - 5 + 3i) \\
x^2 + 10x + 29 &= (x - 5 - 2i)(x - 5 + 2i) \\
x^2 + 10x + 26 &= (x - 5 - 1i)(x - 5 + 1i) \\
x^2 + 10x + 25 &= (x - 5 + 0i)(x - 5 - 0i) \\
x^2 + 10x + 26 &= (x - 5 + 1i)(x - 5 - 1i) \\
x^2 + 10x + 29 &= (x - 5 + 2i)(x - 5 - 2i) \\
x^2 + 10x + 34 &= (x - 5 + 3i)(x - 5 - 3i) \\
x^2 + 10x + 41 &= (x - 5 + 4i)(x - 5 - 4i) \\
x^2 + 10x + 50 &= (x - 5 + 5i)(x - 5 - 5i) \\
x^2 + 10x + 61 &= (x - 5 + 6i)(x - 5 - 6i) \\
x^2 + 10x + 74 &= (x - 5 + 7i)(x - 5 - 7i) \\
x^2 + 10x + 89 &= (x - 5 + 8i)(x - 5 - 8i) \\
x^2 + 10x + 106 &= (x - 5 + 9i)(x - 5 - 9i) \\
x^2 + 10x + 125 &= (x - 5 + 10i)(x - 5 - 10i) \\
x^2 + 8x + 116 &= (x - 4 - 10i)(x - 4 + 10i) \\
x^2 + 8x + 97 &= (x - 4 - 9i)(x - 4 + 9i) \\
x^2 + 8x + 80 &= (x - 4 - 8i)(x - 4 + 8i) \\
x^2 + 8x + 65 &= (x - 4 - 7i)(x - 4 + 7i) \\
x^2 + 8x + 52 &= (x - 4 - 6i)(x - 4 + 6i) \\
x^2 + 8x + 41 &= (x - 4 - 5i)(x - 4 + 5i) \\
x^2 + 8x + 32 &= (x - 4 - 4i)(x - 4 + 4i) \\
x^2 + 8x + 25 &= (x - 4 - 3i)(x - 4 + 3i) \\
x^2 + 8x + 20 &= (x - 4 - 2i)(x - 4 + 2i) \\
x^2 + 8x + 17 &= (x - 4 - 1i)(x - 4 + 1i) \\
x^2 + 8x + 16 &= (x - 4 + 0i)(x - 4 - 0i) \\
x^2 + 8x + 17 &= (x - 4 + 1i)(x - 4 - 1i) \\
x^2 + 8x + 20 &= (x - 4 + 2i)(x - 4 - 2i) \\
x^2 + 8x + 25 &= (x - 4 + 3i)(x - 4 - 3i) \\
x^2 + 8x + 32 &= (x - 4 + 4i)(x - 4 - 4i) \\
x^2 + 8x + 41 &= (x - 4 + 5i)(x - 4 - 5i) \\
x^2 + 8x + 52 &= (x - 4 + 6i)(x - 4 - 6i) \\
x^2 + 8x + 65 &= (x - 4 + 7i)(x - 4 - 7i) \\
x^2 + 8x + 80 &= (x - 4 + 8i)(x - 4 - 8i) \\
x^2 + 8x + 97 &= (x - 4 + 9i)(x - 4 - 9i) \\
x^2 + 8x + 116 &= (x - 4 + 10i)(x - 4 - 10i) \\
x^2 + 6x + 109 &= (x - 3 - 10i)(x - 3 + 10i) \\
x^2 + 6x + 90 &= (x - 3 - 9i)(x - 3 + 9i) \\
x^2 + 6x + 73 &= (x - 3 - 8i)(x - 3 + 8i) \\
x^2 + 6x + 58 &= (x - 3 - 7i)(x - 3 + 7i) \\
x^2 + 6x + 45 &= (x - 3 - 6i)(x - 3 + 6i) \\
x^2 + 6x + 34 &= (x - 3 - 5i)(x - 3 + 5i) \\
x^2 + 6x + 25 &= (x - 3 - 4i)(x - 3 + 4i) \\
x^2 + 6x + 18 &= (x - 3 - 3i)(x - 3 + 3i)
\end{aligned}$$

$$\begin{aligned}
x^2 + 6x + 13 &= (x - 3 - 2i)(x - 3 + 2i) \\
x^2 + 6x + 10 &= (x - 3 - 1i)(x - 3 + 1i) \\
x^2 + 6x + 9 &= (x - 3 + 0i)(x - 3 - 0i) \\
x^2 + 6x + 10 &= (x - 3 + 1i)(x - 3 - 1i) \\
x^2 + 6x + 13 &= (x - 3 + 2i)(x - 3 - 2i) \\
x^2 + 6x + 18 &= (x - 3 + 3i)(x - 3 - 3i) \\
x^2 + 6x + 25 &= (x - 3 + 4i)(x - 3 - 4i) \\
x^2 + 6x + 34 &= (x - 3 + 5i)(x - 3 - 5i) \\
x^2 + 6x + 45 &= (x - 3 + 6i)(x - 3 - 6i) \\
x^2 + 6x + 58 &= (x - 3 + 7i)(x - 3 - 7i) \\
x^2 + 6x + 73 &= (x - 3 + 8i)(x - 3 - 8i) \\
x^2 + 6x + 90 &= (x - 3 + 9i)(x - 3 - 9i) \\
x^2 + 6x + 109 &= (x - 3 + 10i)(x - 3 - 10i) \\
x^2 + 4x + 104 &= (x - 2 - 10i)(x - 2 + 10i) \\
x^2 + 4x + 85 &= (x - 2 - 9i)(x - 2 + 9i) \\
x^2 + 4x + 68 &= (x - 2 - 8i)(x - 2 + 8i) \\
x^2 + 4x + 53 &= (x - 2 - 7i)(x - 2 + 7i) \\
x^2 + 4x + 40 &= (x - 2 - 6i)(x - 2 + 6i) \\
x^2 + 4x + 29 &= (x - 2 - 5i)(x - 2 + 5i) \\
x^2 + 4x + 20 &= (x - 2 - 4i)(x - 2 + 4i) \\
x^2 + 4x + 13 &= (x - 2 - 3i)(x - 2 + 3i) \\
x^2 + 4x + 8 &= (x - 2 - 2i)(x - 2 + 2i) \\
x^2 + 4x + 5 &= (x - 2 - 1i)(x - 2 + 1i) \\
x^2 + 4x + 4 &= (x - 2 + 0i)(x - 2 - 0i) \\
x^2 + 4x + 5 &= (x - 2 + 1i)(x - 2 - 1i) \\
x^2 + 4x + 8 &= (x - 2 + 2i)(x - 2 - 2i) \\
x^2 + 4x + 13 &= (x - 2 + 3i)(x - 2 - 3i) \\
x^2 + 4x + 20 &= (x - 2 + 4i)(x - 2 - 4i) \\
x^2 + 4x + 29 &= (x - 2 + 5i)(x - 2 - 5i) \\
x^2 + 4x + 40 &= (x - 2 + 6i)(x - 2 - 6i) \\
x^2 + 4x + 53 &= (x - 2 + 7i)(x - 2 - 7i) \\
x^2 + 4x + 68 &= (x - 2 + 8i)(x - 2 - 8i) \\
x^2 + 4x + 85 &= (x - 2 + 9i)(x - 2 - 9i) \\
x^2 + 4x + 104 &= (x - 2 + 10i)(x - 2 - 10i) \\
x^2 + 2x + 101 &= (x - 1 - 10i)(x - 1 + 10i) \\
x^2 + 2x + 82 &= (x - 1 - 9i)(x - 1 + 9i) \\
x^2 + 2x + 65 &= (x - 1 - 8i)(x - 1 + 8i) \\
x^2 + 2x + 50 &= (x - 1 - 7i)(x - 1 + 7i) \\
x^2 + 2x + 37 &= (x - 1 - 6i)(x - 1 + 6i) \\
x^2 + 2x + 26 &= (x - 1 - 5i)(x - 1 + 5i) \\
x^2 + 2x + 17 &= (x - 1 - 4i)(x - 1 + 4i) \\
x^2 + 2x + 10 &= (x - 1 - 3i)(x - 1 + 3i) \\
x^2 + 2x + 5 &= (x - 1 - 2i)(x - 1 + 2i) \\
x^2 + 2x + 2 &= (x - 1 - 1i)(x - 1 + 1i) \\
x^2 + 2x + 1 &= (x - 1 + 0i)(x - 1 - 0i) \\
x^2 + 2x + 2 &= (x - 1 + 1i)(x - 1 - 1i) \\
x^2 + 2x + 5 &= (x - 1 + 2i)(x - 1 - 2i) \\
x^2 + 2x + 10 &= (x - 1 + 3i)(x - 1 - 3i) \\
x^2 + 2x + 17 &= (x - 1 + 4i)(x - 1 - 4i) \\
x^2 + 2x + 26 &= (x - 1 + 5i)(x - 1 - 5i) \\
x^2 + 2x + 37 &= (x - 1 + 6i)(x - 1 - 6i) \\
x^2 + 2x + 50 &= (x - 1 + 7i)(x - 1 - 7i) \\
x^2 + 2x + 65 &= (x - 1 + 8i)(x - 1 - 8i) \\
x^2 + 2x + 82 &= (x - 1 + 9i)(x - 1 - 9i) \\
x^2 + 2x + 101 &= (x - 1 + 10i)(x - 1 - 10i)
\end{aligned}$$

$$\begin{aligned}
x^2 + 0x + 100 &= (x + 0 - 10i)(x + 0 + 10i) \\
x^2 + 0x + 81 &= (x + 0 - 9i)(x + 0 + 9i) \\
x^2 + 0x + 64 &= (x + 0 - 8i)(x + 0 + 8i) \\
x^2 + 0x + 49 &= (x + 0 - 7i)(x + 0 + 7i) \\
x^2 + 0x + 36 &= (x + 0 - 6i)(x + 0 + 6i) \\
x^2 + 0x + 25 &= (x + 0 - 5i)(x + 0 + 5i) \\
x^2 + 0x + 16 &= (x + 0 - 4i)(x + 0 + 4i) \\
x^2 + 0x + 9 &= (x + 0 - 3i)(x + 0 + 3i) \\
x^2 + 0x + 4 &= (x + 0 - 2i)(x + 0 + 2i) \\
x^2 + 0x + 1 &= (x + 0 - 1i)(x + 0 + 1i) \\
x^2 + 0x + 0 &= (x + 0 + 0i)(x + 0 - 0i) \\
x^2 + 0x + 1 &= (x + 0 + 1i)(x + 0 - 1i) \\
x^2 + 0x + 4 &= (x + 0 + 2i)(x + 0 - 2i) \\
x^2 + 0x + 9 &= (x + 0 + 3i)(x + 0 - 3i) \\
x^2 + 0x + 16 &= (x + 0 + 4i)(x + 0 - 4i) \\
x^2 + 0x + 25 &= (x + 0 + 5i)(x + 0 - 5i) \\
x^2 + 0x + 36 &= (x + 0 + 6i)(x + 0 - 6i) \\
x^2 + 0x + 49 &= (x + 0 + 7i)(x + 0 - 7i) \\
x^2 + 0x + 64 &= (x + 0 + 8i)(x + 0 - 8i) \\
x^2 + 0x + 81 &= (x + 0 + 9i)(x + 0 - 9i) \\
x^2 + 0x + 100 &= (x + 0 + 10i)(x + 0 - 10i) \\
x^2 - 2x + 101 &= (x + 1 - 10i)(x + 1 + 10i) \\
x^2 - 2x + 82 &= (x + 1 - 9i)(x + 1 + 9i) \\
x^2 - 2x + 65 &= (x + 1 - 8i)(x + 1 + 8i) \\
x^2 - 2x + 50 &= (x + 1 - 7i)(x + 1 + 7i) \\
x^2 - 2x + 37 &= (x + 1 - 6i)(x + 1 + 6i) \\
x^2 - 2x + 26 &= (x + 1 - 5i)(x + 1 + 5i) \\
x^2 - 2x + 17 &= (x + 1 - 4i)(x + 1 + 4i) \\
x^2 - 2x + 10 &= (x + 1 - 3i)(x + 1 + 3i) \\
x^2 - 2x + 5 &= (x + 1 - 2i)(x + 1 + 2i) \\
x^2 - 2x + 2 &= (x + 1 - 1i)(x + 1 + 1i) \\
x^2 - 2x + 1 &= (x + 1 + 0i)(x + 1 - 0i) \\
x^2 - 2x + 2 &= (x + 1 + 1i)(x + 1 - 1i) \\
x^2 - 2x + 5 &= (x + 1 + 2i)(x + 1 - 2i) \\
x^2 - 2x + 10 &= (x + 1 + 3i)(x + 1 - 3i) \\
x^2 - 2x + 17 &= (x + 1 + 4i)(x + 1 - 4i) \\
x^2 - 2x + 26 &= (x + 1 + 5i)(x + 1 - 5i) \\
x^2 - 2x + 37 &= (x + 1 + 6i)(x + 1 - 6i) \\
x^2 - 2x + 50 &= (x + 1 + 7i)(x + 1 - 7i) \\
x^2 - 2x + 65 &= (x + 1 + 8i)(x + 1 - 8i) \\
x^2 - 2x + 82 &= (x + 1 + 9i)(x + 1 - 9i) \\
x^2 - 2x + 101 &= (x + 1 + 10i)(x + 1 - 10i) \\
x^2 - 4x + 104 &= (x + 2 - 10i)(x + 2 + 10i) \\
x^2 - 4x + 85 &= (x + 2 - 9i)(x + 2 + 9i) \\
x^2 - 4x + 68 &= (x + 2 - 8i)(x + 2 + 8i) \\
x^2 - 4x + 53 &= (x + 2 - 7i)(x + 2 + 7i) \\
x^2 - 4x + 40 &= (x + 2 - 6i)(x + 2 + 6i) \\
x^2 - 4x + 29 &= (x + 2 - 5i)(x + 2 + 5i) \\
x^2 - 4x + 20 &= (x + 2 - 4i)(x + 2 + 4i) \\
x^2 - 4x + 13 &= (x + 2 - 3i)(x + 2 + 3i) \\
x^2 - 4x + 8 &= (x + 2 - 2i)(x + 2 + 2i) \\
x^2 - 4x + 5 &= (x + 2 - 1i)(x + 2 + 1i) \\
x^2 - 4x + 4 &= (x + 2 + 0i)(x + 2 - 0i) \\
x^2 - 4x + 5 &= (x + 2 + 1i)(x + 2 - 1i) \\
x^2 - 4x + 8 &= (x + 2 + 2i)(x + 2 - 2i)
\end{aligned}$$

$$\begin{aligned}
x^2 - 4x + 13 &= (x + 2 + 3i)(x + 2 - 3i) \\
x^2 - 4x + 20 &= (x + 2 + 4i)(x + 2 - 4i) \\
x^2 - 4x + 29 &= (x + 2 + 5i)(x + 2 - 5i) \\
x^2 - 4x + 40 &= (x + 2 + 6i)(x + 2 - 6i) \\
x^2 - 4x + 53 &= (x + 2 + 7i)(x + 2 - 7i) \\
x^2 - 4x + 68 &= (x + 2 + 8i)(x + 2 - 8i) \\
x^2 - 4x + 85 &= (x + 2 + 9i)(x + 2 - 9i) \\
x^2 - 4x + 104 &= (x + 2 + 10i)(x + 2 - 10i) \\
x^2 - 6x + 109 &= (x + 3 - 10i)(x + 3 + 10i) \\
x^2 - 6x + 90 &= (x + 3 - 9i)(x + 3 + 9i) \\
x^2 - 6x + 73 &= (x + 3 - 8i)(x + 3 + 8i) \\
x^2 - 6x + 58 &= (x + 3 - 7i)(x + 3 + 7i) \\
x^2 - 6x + 45 &= (x + 3 - 6i)(x + 3 + 6i) \\
x^2 - 6x + 34 &= (x + 3 - 5i)(x + 3 + 5i) \\
x^2 - 6x + 25 &= (x + 3 - 4i)(x + 3 + 4i) \\
x^2 - 6x + 18 &= (x + 3 - 3i)(x + 3 + 3i) \\
x^2 - 6x + 13 &= (x + 3 - 2i)(x + 3 + 2i) \\
x^2 - 6x + 10 &= (x + 3 - 1i)(x + 3 + 1i) \\
x^2 - 6x + 9 &= (x + 3 + 0i)(x + 3 - 0i) \\
x^2 - 6x + 10 &= (x + 3 + 1i)(x + 3 - 1i) \\
x^2 - 6x + 13 &= (x + 3 + 2i)(x + 3 - 2i) \\
x^2 - 6x + 18 &= (x + 3 + 3i)(x + 3 - 3i) \\
x^2 - 6x + 25 &= (x + 3 + 4i)(x + 3 - 4i) \\
x^2 - 6x + 34 &= (x + 3 + 5i)(x + 3 - 5i) \\
x^2 - 6x + 45 &= (x + 3 + 6i)(x + 3 - 6i) \\
x^2 - 6x + 58 &= (x + 3 + 7i)(x + 3 - 7i) \\
x^2 - 6x + 73 &= (x + 3 + 8i)(x + 3 - 8i) \\
x^2 - 6x + 90 &= (x + 3 + 9i)(x + 3 - 9i) \\
x^2 - 6x + 109 &= (x + 3 + 10i)(x + 3 - 10i) \\
x^2 - 8x + 116 &= (x + 4 - 10i)(x + 4 + 10i) \\
x^2 - 8x + 97 &= (x + 4 - 9i)(x + 4 + 9i) \\
x^2 - 8x + 80 &= (x + 4 - 8i)(x + 4 + 8i) \\
x^2 - 8x + 65 &= (x + 4 - 7i)(x + 4 + 7i) \\
x^2 - 8x + 52 &= (x + 4 - 6i)(x + 4 + 6i) \\
x^2 - 8x + 41 &= (x + 4 - 5i)(x + 4 + 5i) \\
x^2 - 8x + 32 &= (x + 4 - 4i)(x + 4 + 4i) \\
x^2 - 8x + 25 &= (x + 4 - 3i)(x + 4 + 3i) \\
x^2 - 8x + 20 &= (x + 4 - 2i)(x + 4 + 2i) \\
x^2 - 8x + 17 &= (x + 4 - 1i)(x + 4 + 1i) \\
x^2 - 8x + 16 &= (x + 4 + 0i)(x + 4 - 0i) \\
x^2 - 8x + 17 &= (x + 4 + 1i)(x + 4 - 1i) \\
x^2 - 8x + 20 &= (x + 4 + 2i)(x + 4 - 2i) \\
x^2 - 8x + 25 &= (x + 4 + 3i)(x + 4 - 3i) \\
x^2 - 8x + 32 &= (x + 4 + 4i)(x + 4 - 4i) \\
x^2 - 8x + 41 &= (x + 4 + 5i)(x + 4 - 5i) \\
x^2 - 8x + 52 &= (x + 4 + 6i)(x + 4 - 6i) \\
x^2 - 8x + 65 &= (x + 4 + 7i)(x + 4 - 7i) \\
x^2 - 8x + 80 &= (x + 4 + 8i)(x + 4 - 8i) \\
x^2 - 8x + 97 &= (x + 4 + 9i)(x + 4 - 9i) \\
x^2 - 8x + 116 &= (x + 4 + 10i)(x + 4 - 10i) \\
x^2 - 10x + 125 &= (x + 5 - 10i)(x + 5 + 10i) \\
x^2 - 10x + 106 &= (x + 5 - 9i)(x + 5 + 9i) \\
x^2 - 10x + 89 &= (x + 5 - 8i)(x + 5 + 8i) \\
x^2 - 10x + 74 &= (x + 5 - 7i)(x + 5 + 7i) \\
x^2 - 10x + 61 &= (x + 5 - 6i)(x + 5 + 6i)
\end{aligned}$$

$$\begin{aligned}
x^2 - 10x + 50 &= (x + 5 - 5i)(x + 5 + 5i) \\
x^2 - 10x + 41 &= (x + 5 - 4i)(x + 5 + 4i) \\
x^2 - 10x + 34 &= (x + 5 - 3i)(x + 5 + 3i) \\
x^2 - 10x + 29 &= (x + 5 - 2i)(x + 5 + 2i) \\
x^2 - 10x + 26 &= (x + 5 - 1i)(x + 5 + 1i) \\
x^2 - 10x + 25 &= (x + 5 + 0i)(x + 5 - 0i) \\
x^2 - 10x + 26 &= (x + 5 + 1i)(x + 5 - 1i) \\
x^2 - 10x + 29 &= (x + 5 + 2i)(x + 5 - 2i) \\
x^2 - 10x + 34 &= (x + 5 + 3i)(x + 5 - 3i) \\
x^2 - 10x + 41 &= (x + 5 + 4i)(x + 5 - 4i) \\
x^2 - 10x + 50 &= (x + 5 + 5i)(x + 5 - 5i) \\
x^2 - 10x + 61 &= (x + 5 + 6i)(x + 5 - 6i) \\
x^2 - 10x + 74 &= (x + 5 + 7i)(x + 5 - 7i) \\
x^2 - 10x + 89 &= (x + 5 + 8i)(x + 5 - 8i) \\
x^2 - 10x + 106 &= (x + 5 + 9i)(x + 5 - 9i) \\
x^2 - 10x + 125 &= (x + 5 + 10i)(x + 5 - 10i) \\
x^2 - 12x + 136 &= (x + 6 - 10i)(x + 6 + 10i) \\
x^2 - 12x + 117 &= (x + 6 - 9i)(x + 6 + 9i) \\
x^2 - 12x + 100 &= (x + 6 - 8i)(x + 6 + 8i) \\
x^2 - 12x + 85 &= (x + 6 - 7i)(x + 6 + 7i) \\
x^2 - 12x + 72 &= (x + 6 - 6i)(x + 6 + 6i) \\
x^2 - 12x + 61 &= (x + 6 - 5i)(x + 6 + 5i) \\
x^2 - 12x + 52 &= (x + 6 - 4i)(x + 6 + 4i) \\
x^2 - 12x + 45 &= (x + 6 - 3i)(x + 6 + 3i) \\
x^2 - 12x + 40 &= (x + 6 - 2i)(x + 6 + 2i) \\
x^2 - 12x + 37 &= (x + 6 - 1i)(x + 6 + 1i) \\
x^2 - 12x + 36 &= (x + 6 + 0i)(x + 6 - 0i) \\
x^2 - 12x + 37 &= (x + 6 + 1i)(x + 6 - 1i) \\
x^2 - 12x + 40 &= (x + 6 + 2i)(x + 6 - 2i) \\
x^2 - 12x + 45 &= (x + 6 + 3i)(x + 6 - 3i) \\
x^2 - 12x + 52 &= (x + 6 + 4i)(x + 6 - 4i) \\
x^2 - 12x + 61 &= (x + 6 + 5i)(x + 6 - 5i) \\
x^2 - 12x + 72 &= (x + 6 + 6i)(x + 6 - 6i) \\
x^2 - 12x + 85 &= (x + 6 + 7i)(x + 6 - 7i) \\
x^2 - 12x + 100 &= (x + 6 + 8i)(x + 6 - 8i) \\
x^2 - 12x + 117 &= (x + 6 + 9i)(x + 6 - 9i) \\
x^2 - 12x + 136 &= (x + 6 + 10i)(x + 6 - 10i) \\
x^2 - 14x + 149 &= (x + 7 - 10i)(x + 7 + 10i) \\
x^2 - 14x + 130 &= (x + 7 - 9i)(x + 7 + 9i) \\
x^2 - 14x + 113 &= (x + 7 - 8i)(x + 7 + 8i) \\
x^2 - 14x + 98 &= (x + 7 - 7i)(x + 7 + 7i) \\
x^2 - 14x + 85 &= (x + 7 - 6i)(x + 7 + 6i) \\
x^2 - 14x + 74 &= (x + 7 - 5i)(x + 7 + 5i) \\
x^2 - 14x + 65 &= (x + 7 - 4i)(x + 7 + 4i) \\
x^2 - 14x + 58 &= (x + 7 - 3i)(x + 7 + 3i) \\
x^2 - 14x + 53 &= (x + 7 - 2i)(x + 7 + 2i) \\
x^2 - 14x + 50 &= (x + 7 - 1i)(x + 7 + 1i) \\
x^2 - 14x + 49 &= (x + 7 + 0i)(x + 7 - 0i) \\
x^2 - 14x + 50 &= (x + 7 + 1i)(x + 7 - 1i) \\
x^2 - 14x + 53 &= (x + 7 + 2i)(x + 7 - 2i) \\
x^2 - 14x + 58 &= (x + 7 + 3i)(x + 7 - 3i) \\
x^2 - 14x + 65 &= (x + 7 + 4i)(x + 7 - 4i) \\
x^2 - 14x + 74 &= (x + 7 + 5i)(x + 7 - 5i) \\
x^2 - 14x + 85 &= (x + 7 + 6i)(x + 7 - 6i) \\
x^2 - 14x + 98 &= (x + 7 + 7i)(x + 7 - 7i)
\end{aligned}$$

$$\begin{aligned}
x^2 - 14x + 113 &= (x + 7 + 8i)(x + 7 - 8i) \\
x^2 - 14x + 130 &= (x + 7 + 9i)(x + 7 - 9i) \\
x^2 - 14x + 149 &= (x + 7 + 10i)(x + 7 - 10i) \\
x^2 - 16x + 164 &= (x + 8 - 10i)(x + 8 + 10i) \\
x^2 - 16x + 145 &= (x + 8 - 9i)(x + 8 + 9i) \\
x^2 - 16x + 128 &= (x + 8 - 8i)(x + 8 + 8i) \\
x^2 - 16x + 113 &= (x + 8 - 7i)(x + 8 + 7i) \\
x^2 - 16x + 100 &= (x + 8 - 6i)(x + 8 + 6i) \\
x^2 - 16x + 89 &= (x + 8 - 5i)(x + 8 + 5i) \\
x^2 - 16x + 80 &= (x + 8 - 4i)(x + 8 + 4i) \\
x^2 - 16x + 73 &= (x + 8 - 3i)(x + 8 + 3i) \\
x^2 - 16x + 68 &= (x + 8 - 2i)(x + 8 + 2i) \\
x^2 - 16x + 65 &= (x + 8 - 1i)(x + 8 + 1i) \\
x^2 - 16x + 64 &= (x + 8 + 0i)(x + 8 - 0i) \\
x^2 - 16x + 65 &= (x + 8 + 1i)(x + 8 - 1i) \\
x^2 - 16x + 68 &= (x + 8 + 2i)(x + 8 - 2i) \\
x^2 - 16x + 73 &= (x + 8 + 3i)(x + 8 - 3i) \\
x^2 - 16x + 80 &= (x + 8 + 4i)(x + 8 - 4i) \\
x^2 - 16x + 89 &= (x + 8 + 5i)(x + 8 - 5i) \\
x^2 - 16x + 100 &= (x + 8 + 6i)(x + 8 - 6i) \\
x^2 - 16x + 113 &= (x + 8 + 7i)(x + 8 - 7i) \\
x^2 - 16x + 128 &= (x + 8 + 8i)(x + 8 - 8i) \\
x^2 - 16x + 145 &= (x + 8 + 9i)(x + 8 - 9i) \\
x^2 - 16x + 164 &= (x + 8 + 10i)(x + 8 - 10i) \\
x^2 - 18x + 181 &= (x + 9 - 10i)(x + 9 + 10i) \\
x^2 - 18x + 162 &= (x + 9 - 9i)(x + 9 + 9i) \\
x^2 - 18x + 145 &= (x + 9 - 8i)(x + 9 + 8i) \\
x^2 - 18x + 130 &= (x + 9 - 7i)(x + 9 + 7i) \\
x^2 - 18x + 117 &= (x + 9 - 6i)(x + 9 + 6i) \\
x^2 - 18x + 106 &= (x + 9 - 5i)(x + 9 + 5i) \\
x^2 - 18x + 97 &= (x + 9 - 4i)(x + 9 + 4i) \\
x^2 - 18x + 90 &= (x + 9 - 3i)(x + 9 + 3i) \\
x^2 - 18x + 85 &= (x + 9 - 2i)(x + 9 + 2i) \\
x^2 - 18x + 82 &= (x + 9 - 1i)(x + 9 + 1i) \\
x^2 - 18x + 81 &= (x + 9 + 0i)(x + 9 - 0i) \\
x^2 - 18x + 82 &= (x + 9 + 1i)(x + 9 - 1i) \\
x^2 - 18x + 85 &= (x + 9 + 2i)(x + 9 - 2i) \\
x^2 - 18x + 90 &= (x + 9 + 3i)(x + 9 - 3i) \\
x^2 - 18x + 97 &= (x + 9 + 4i)(x + 9 - 4i) \\
x^2 - 18x + 106 &= (x + 9 + 5i)(x + 9 - 5i) \\
x^2 - 18x + 117 &= (x + 9 + 6i)(x + 9 - 6i) \\
x^2 - 18x + 130 &= (x + 9 + 7i)(x + 9 - 7i) \\
x^2 - 18x + 145 &= (x + 9 + 8i)(x + 9 - 8i) \\
x^2 - 18x + 162 &= (x + 9 + 9i)(x + 9 - 9i) \\
x^2 - 18x + 181 &= (x + 9 + 10i)(x + 9 - 10i) \\
x^2 - 20x + 200 &= (x + 10 - 10i)(x + 10 + 10i) \\
x^2 - 20x + 181 &= (x + 10 - 9i)(x + 10 + 9i) \\
x^2 - 20x + 164 &= (x + 10 - 8i)(x + 10 + 8i) \\
x^2 - 20x + 149 &= (x + 10 - 7i)(x + 10 + 7i) \\
x^2 - 20x + 136 &= (x + 10 - 6i)(x + 10 + 6i) \\
x^2 - 20x + 125 &= (x + 10 - 5i)(x + 10 + 5i) \\
x^2 - 20x + 116 &= (x + 10 - 4i)(x + 10 + 4i) \\
x^2 - 20x + 109 &= (x + 10 - 3i)(x + 10 + 3i) \\
x^2 - 20x + 104 &= (x + 10 - 2i)(x + 10 + 2i) \\
x^2 - 20x + 101 &= (x + 10 - 1i)(x + 10 + 1i)
\end{aligned}$$

$$\begin{aligned}
x^2 - 20x + 100 &= (x + 10 + 0i)(x + 10 - 0i) \\
x^2 - 20x + 101 &= (x + 10 + 1i)(x + 10 - 1i) \\
x^2 - 20x + 104 &= (x + 10 + 2i)(x + 10 - 2i) \\
x^2 - 20x + 109 &= (x + 10 + 3i)(x + 10 - 3i) \\
x^2 - 20x + 116 &= (x + 10 + 4i)(x + 10 - 4i) \\
x^2 - 20x + 125 &= (x + 10 + 5i)(x + 10 - 5i)
\end{aligned}$$

$$\begin{aligned}
x^2 - 20x + 136 &= (x + 10 + 6i)(x + 10 - 6i) \\
x^2 - 20x + 149 &= (x + 10 + 7i)(x + 10 - 7i) \\
x^2 - 20x + 164 &= (x + 10 + 8i)(x + 10 - 8i) \\
x^2 - 20x + 181 &= (x + 10 + 9i)(x + 10 - 9i) \\
x^2 - 20x + 200 &= (x + 10 + 10i)(x + 10 - 10i)
\end{aligned}$$