Vertex Form-Completing the Square

Rewrite each function into vertex form by completing the square.

1. f(x) = x2 + 6x – 59
2. f(x) = 2x2 – 24x + 46
3. f(x) = x2 – 10x + 18
4. f(x) = 2x2 – 24x + 24
5. f(x) = -2x2 + 12x – 72
6. f(x) = x2 + 14x – 38
7. f(x) = x2 + 14x – 51
8. f(x) = -3x2 – 6x – 9
9. f(x) = x2 + 14x – 15

 10. f(x) = x2 – 16x – 17