



$$a^3 - b^3 - 3a^2b + 3ab^2$$

Q25  
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(4)  $(5 - 3i)^3$ .

$$\begin{aligned} &= (5)^3 - (3i)^3 - 3 \times (5)^2 \times 3i + 3 \times 5 \times (3i)^2 \\ &= 125 - 27i^3 - 225i + 15 \times 3i^2 \\ &= 125 + 27i - 225i + 45i^2 \\ &= 125 + 27i - 225i - 45 \\ &= 125 - 45 + 27i - 225i \\ &= \boxed{80 - 182i} \quad (\text{Ans}) \\ a &= 80, \quad b = -182, \quad b = -182. \end{aligned}$$

(5)  $(x+2y-z)(x+2y-z)(x+x-y) = kxyz.$

$$= x+2y+z - 2y + 2y + z - x + 2 + xy - y$$

$$\begin{aligned} &= x + 2y + y + 2 \\ &= x + 3y + 2. \end{aligned}$$

$$kxyz = x \times 3y \times z = 3xyz. \quad (\text{Ans})$$

K=3