4 (VII) $\quad (m^2 - n^2 m)^2 + 2m^3 n^2$

$= (m^2)^2 - 2 \times m^2 \times n^2 m + (n^2 m)^2 + 2m^3 n^2$

$= m^4 - 2m^3 n^2 + n^4 m^2 + 2m^3 n^2$

$= m^4 + n^4 m^2$

5 (I) $\quad$ LHS $= (3x+7)^2 - 84x$

$= (3x)^2 + 7^2 + 2 \times 3x \times 7 - 84x$

$= (3x)^2 + 7^2 + 42x - 84x$

$= (3x)^2 + 7^2 - 42x$

$= (3x)^2 + 7^2 - 2 \times 3x \times 7$

$= (3x - 7)^2$

$= RHS$

5 (II) $\quad$ LHS $= (9p - 5q)^2 + 180pq$

$= (9p)^2 + (5q)^2 - 2 \times 9p \times 5q + 180pq$

$= (9p)^2 + (5q)^2 - 90pq + 180pq$

$= (9p)^2 + (5q)^2 + 90pq$

$= (9p)^2 + (5q)^2 + 2 \times 9p \times 5q$

$= (9p + 5q)^2$

$= RHS$