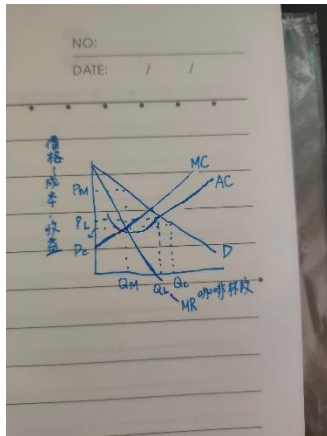


1. 如下圖所示，悟空會根據平均成本 (AC) 曲線與需求曲線 (D) 的交點訂出 (P_L, Q_L) 的價量組合。悟能會根據 $MR=0$ 決定出 Q_C 的產量，並將價格訂在 P_C 。悟淨會根據 $MR=MC$ 決定出 Q_M 的產量，並將價格定為 P_M 。



- 2.a. The monopolist will operate where $MR = MC$. With demand $P = a - bQ$, marginal revenue is given by $MR = a - 2bQ$. Setting this equal to marginal cost implies $a - 2bQ = c + eQ$, $Q = \frac{a - c}{2b + e}$. At this quantity price is $P = a - b(\frac{a - c}{2b + e})$, $P = \frac{ab + ae + bc}{2b + e}$.
- b. Since $Q = \frac{a - c}{2b + e}$, increasing c or decreasing a will reduce the numerator of the expression, reducing Q .
- c. Since $e > 0$ and $= 0$ and $P = \frac{ab + ae + bc}{2b + e}$, increasing a will increase the numerator for this expression. This will therefore increase the equilibrium price.

3. (A) 利用 $MR = MC$, $120 - 2q = 4q$, 解出 $q^* = 20$, 代回需求函數解得 $P^* = 100$ 。 $\pi^* = 100 \times 20 - 2(20)^2 = 1200$, $E_d = 100/20 = 5$, $MC^* = 4q^* = 80$, 獨占力 $= (100 - 80)/100 = 0.2$

