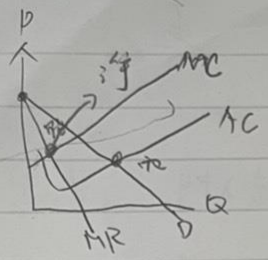
week 11

1.



完全競爭 $\Rightarrow P=D=AC$

自然獨占 $\Rightarrow MR=0$

寡占 $\Rightarrow MR=MC$

2. (a) $a-2bQ=c+eQ$ $\quad P=a-b\left[\frac{a-c}{2b+e}\right]$

$Q=\frac{a-c}{2b+e}$ $\quad P=\frac{ab+ae+bc}{2b+e}$

(b) $Q=\frac{a-c}{2b+e}$

(c) $e\geq 0$ $\quad \frac{P-ab+ae+bc}{2b+e}$

3. (A) $MR=MC$ $\quad \pi=160\times 20-2\times 20=1200$, $E_d=\frac{160}{2b}=5$

$120-2q=4q$, $q=20\rightarrow P=160$ $\quad MC=4q=80$

獨佔 $=\left(\frac{160-80}{160}\right)=0.2$

(B) $20\times\frac{4}{2}=40$

(C) $P=MC$ $\quad 120-4=4q$, $q=24$ $P_c=96$

$96\times 24-24^2\times 2=1152$, MC 定價 $\Rightarrow 0$

(D) $P=AC$ $\quad 120-4=2q$ $q=40$

$\pi=80\times 40-2\times 40^2=0$

$(120-80)\times\frac{40}{2}=800$

$1440-800=640$