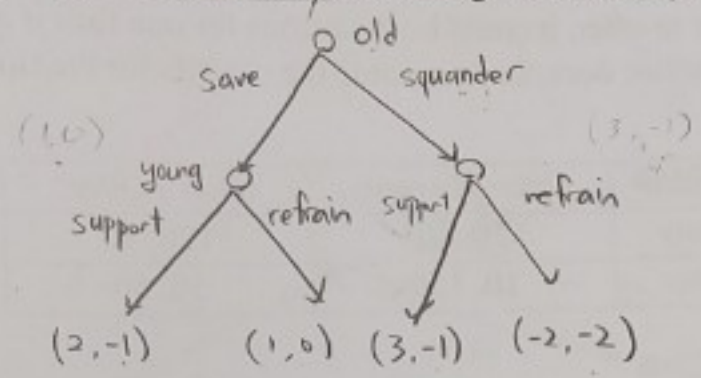
(b) The above game setting ignores the time structure: one of the (few) advantages of being old is that you get to move first. Draw the game tree for the extensive game. (4 points)



(c) Then draw the payoff matrix of the extensive game of (b). Find Nash equilibria from the payoff matrix. (8 points) Let's suppose S→ support , R→ refrain

old \ young	SS	SR	RS	RR
save	2, -1	2, -1	1, 0	1, 0
squander	3, -1	-2, -2	3, -1	-2, -2

∴ N_4

⇒ (save, RR)

(squander, SS)

(squander, RS)

(d) Lastly, find the subgame-perfect Nash equilibrium. (6 points)

After consider young's payoff, game reformed just like this,