Ex 1)

$m_1 = 2$, $m_2 = 4$, $N = 3K+1$ ($K \geq 0$ and K is integer)

Ex 2)

sum	turn	call	time
S_{t-2}	a	n'_a	t-2
S_{t-1}	b	n_b	t-1
S_t	a	n_a	t

$S_t = n_a + n_b + S_{t-1}$ $\therefore S_{t-2}$

$S_{t-1} = n_b + n'_a + S_{t-2}$

Ex 3) $|\pi| =$ (length of policy matrix) finite number

Ex 4)

State : $0 \leq$ State ≤ 31 and S is int

action : State add 1 or State add 2

Policy

```
if state == 0:
    state += 1
elif state % 2 == 0
    state += 2
else if state % 2 == 1
    state += 1
```

reward :

```
if state == 31
    reward += 100
```

transition : $State_t = State_{t-1} + 3$, $State_t = State'_0 + 1$