

DQN visualization

Minyoung Jeong

Yonsei Univ.

2023. 01. 06.

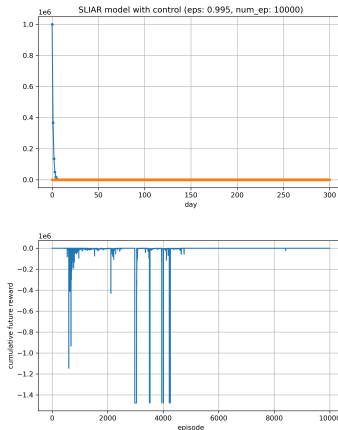
Case 1

Initial

max time: 300

epsilon start: 1

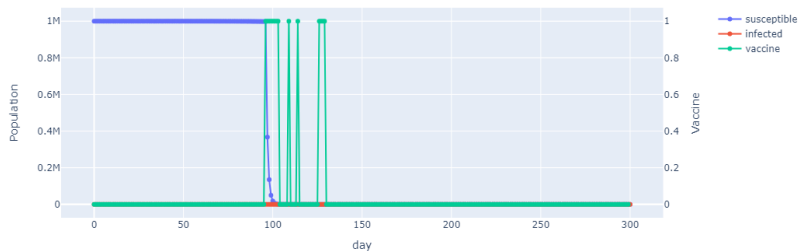
epsilon decay: 0.995



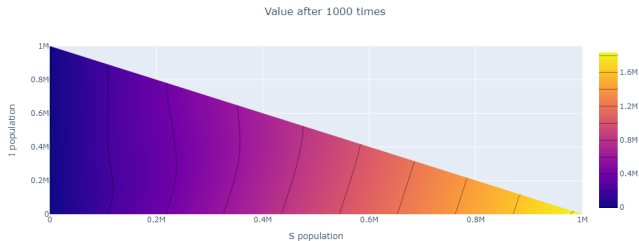
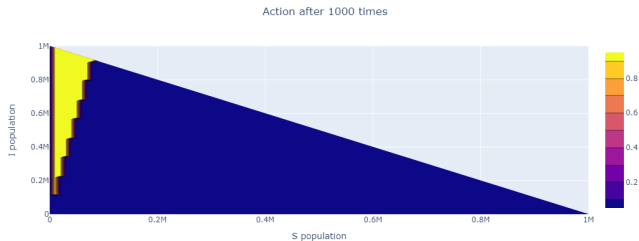
Case 1_ Learning result

After 1000 episodes learning:

-4818.45: SLIAR model with control - 1000



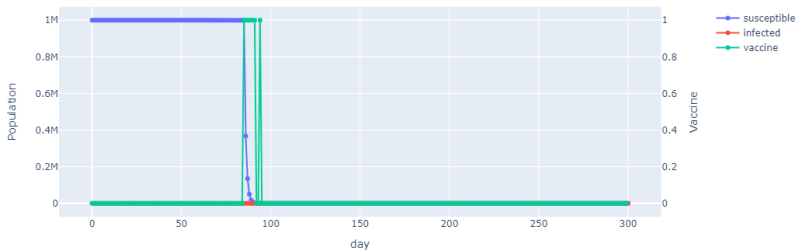
Case 1_ Learning result



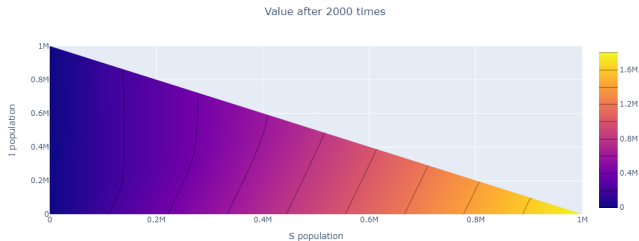
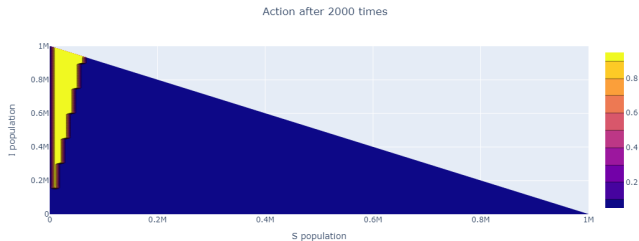
Case 1 _ Learning result

After 2000 episodes learning:

-2300.37: SLIAR model with control - 2000



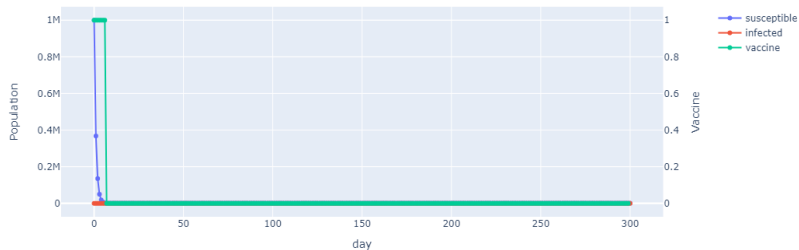
Case 1_ Learning result



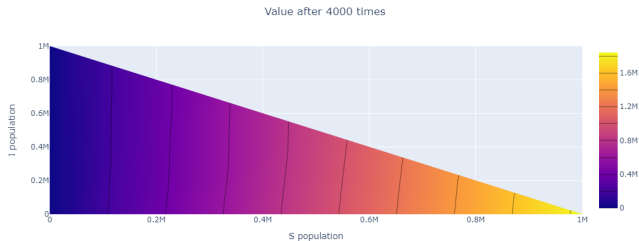
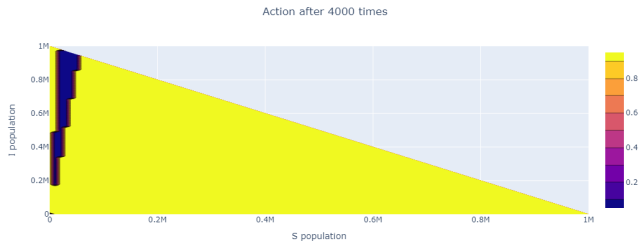
Case 1 _ Learning result

After 4000 episodes learning:

-11.23: SLIAR model with control - 4000



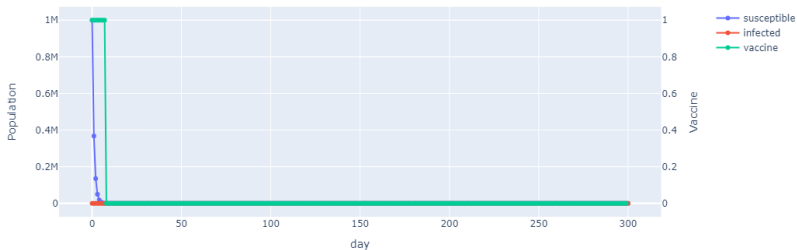
Case 1_ Learning result



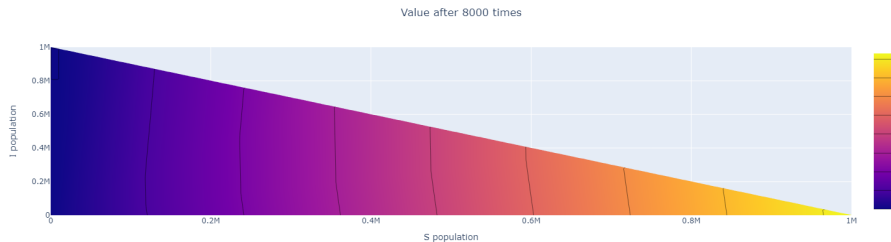
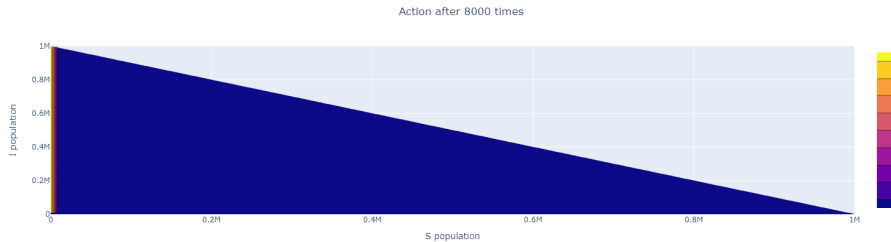
Case 1 _ Learning result

After 8000 episodes learning:

-12.23: SLIAR model with control - 8000



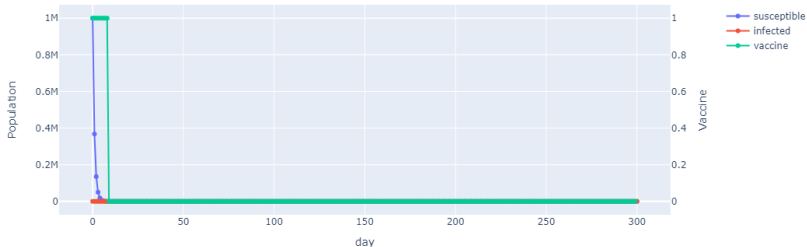
Case 1_ Learning result



Case 1_ Learning result

After 16000 episodes learning:

-13.23: SLIAR model with control - 16000



Case 1_ Learning result



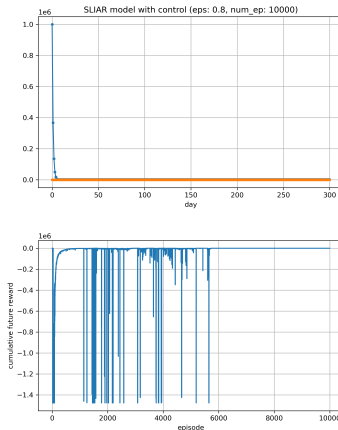
Case 2

Initial

max time: 300

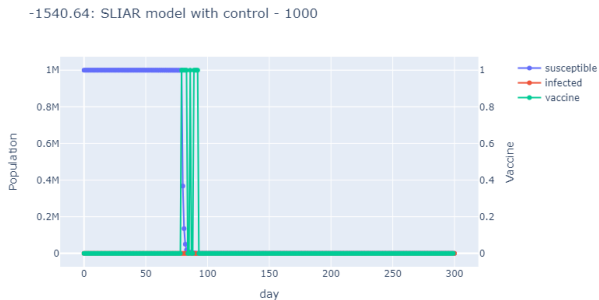
epsilon start: 1

epsilon decay: 0.8



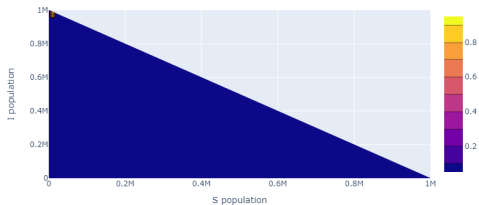
Case 2_ Learning result

After 1000 episodes learning:

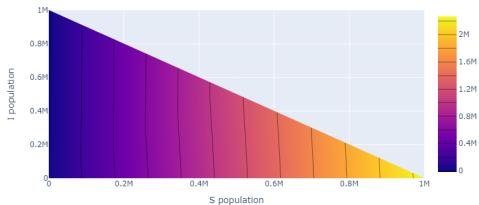


Case 2_ Learning result

Action after 1000 times



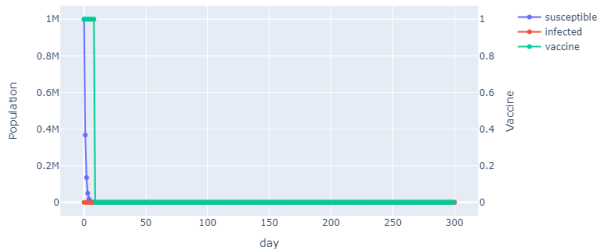
Value after 1000 times



Case 2_ Learning result

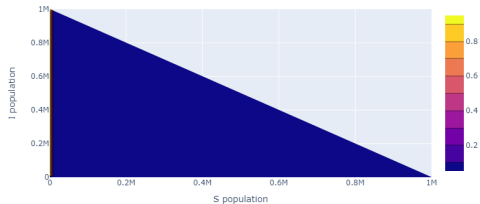
After 2000 episodes learning:

-13.23: SLIAR model with control - 2000

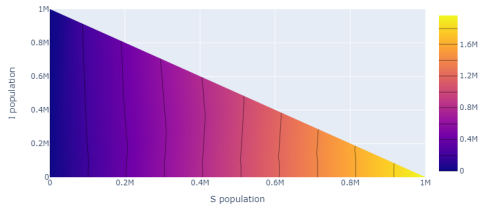


Case 2_ Learning result

Action after 2000 times



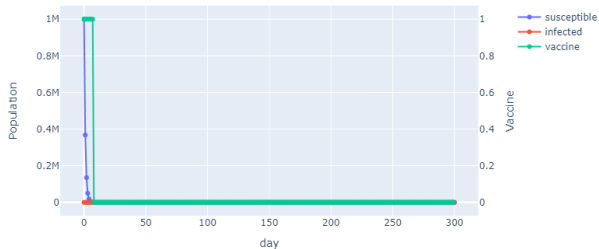
Value after 2000 times



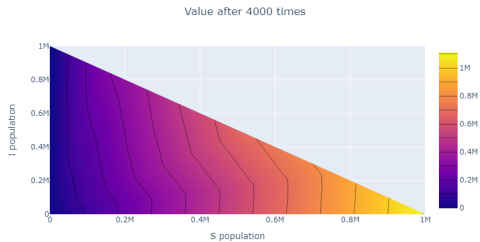
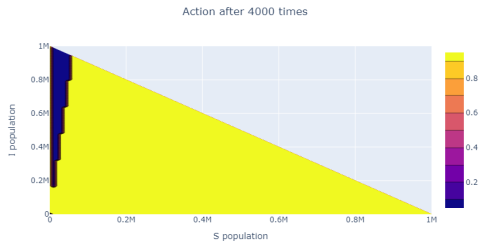
Case 2_ Learning result

After 4000 episodes learning:

-12.23: SLIAR model with control - 4000



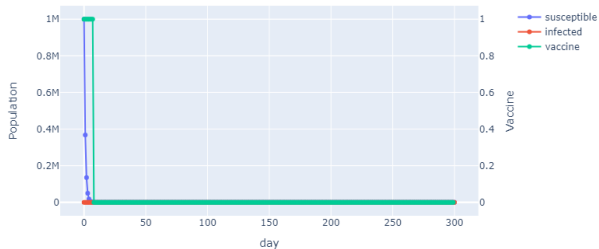
Case 2_ Learning result



Case 2_ Learning result

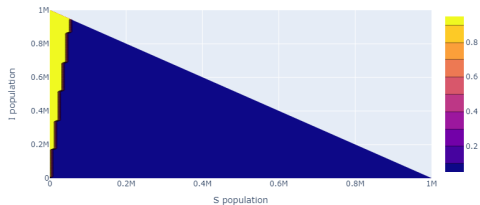
After 8000 episodes learning:

-12.23: SLIAR model with control - 8000

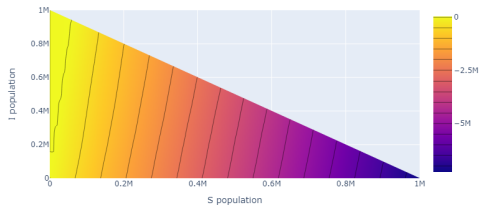


Case 2_ Learning result

Action after 8000 times



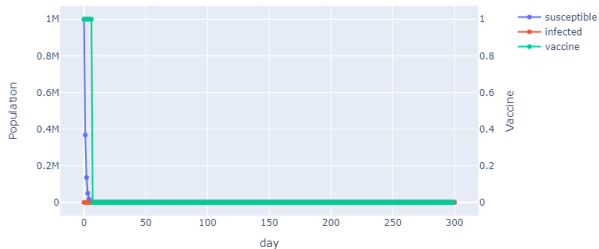
Value after 8000 times



Case 2_ Learning result

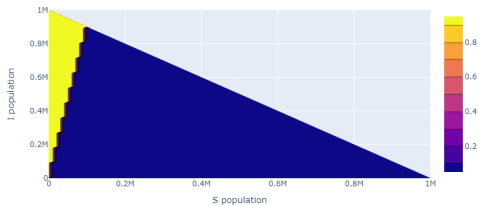
After 12000 episodes learning:

-11.23: SLIAR model with control - 12000



Case 2_ Learning result

Action after 12000 times



Value after 12000 times

