

# Environnement logiciel pour l'apprentissage de l'exploration visuelle d'une image

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2 mai 2017

# Sommaire

## 1 Introduction

## 2 Environnement

## 3 Agent

## 4 Étude expérimentale

## 5 Conclusion

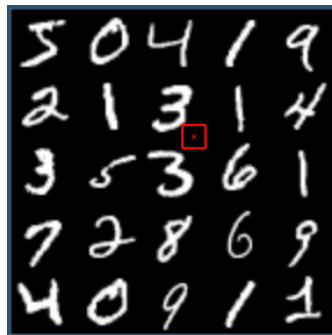
# Contexte

Environnement

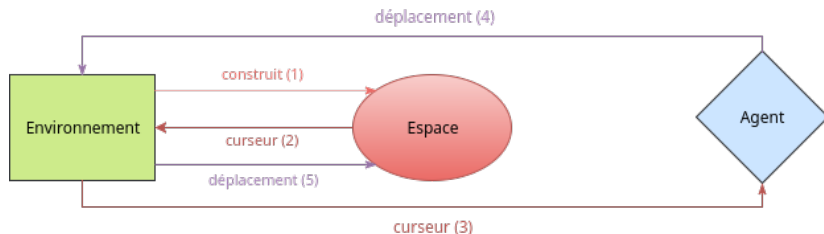
TODO

Agent

TODO



# Interaction agent-environnement



- 1 Construction de l'**espace**
- 2 Boucle d'interaction

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**2 Environnement**

3 Agent

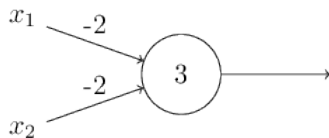
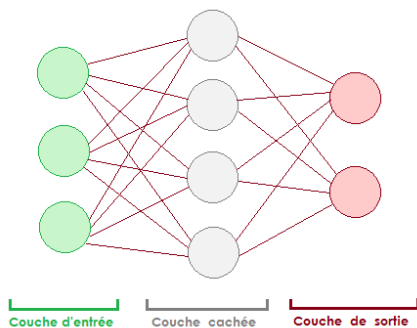
4 Étude expérimentale

5 Conclusion

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# Réseaux de neurones






Commentaires ?

# Prédicteurs

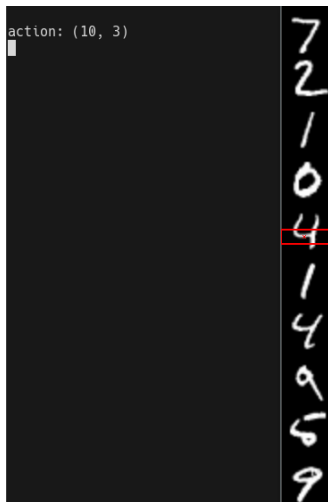




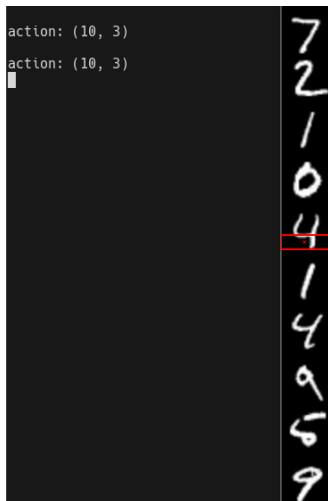
# Prise de décisions

			$t$
0	0	0	0
0	0	0	
0.81	0.86	0.83	1
0	1	0	
0.84	0.83	0.80	2
1	1	0	
0.82	0.89	0.85	3
1	2	0	
0.83	0.91	0.86	4
1	3	0	

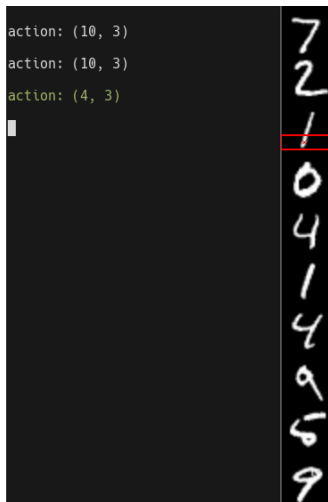
# Exemple d'une séquence d'identification



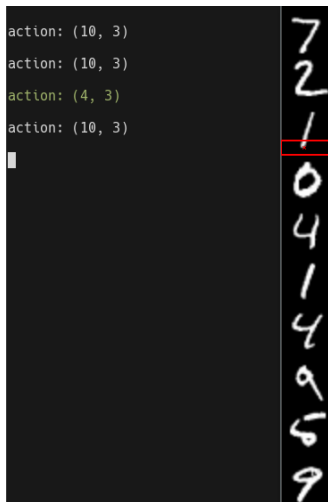
# Exemple d'une séquence d'identification



# Exemple d'une séquence d'identification

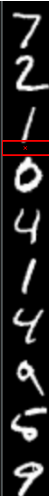


# Exemple d'une séquence d'identification



# Exemple d'une séquence d'identification

```
action: (10, 3)
action: (10, 3)
action: (4, 3)
action: (10, 3)
action: (10, 3)
-
```




A vertical sequence of handwritten digits: 7, 2, 1, 0, 4, 1, 4, 9, 5, 9. The digit '0' is highlighted with a red box.

# Exemple d'une séquence d'identification

```
action: (10, 3)
action: (10, 3)
action: (4, 3)
action: (10, 3)
action: (10, 3)
action: (1, 3)

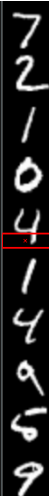
```



A vertical sequence of handwritten digits: 7, 2, 1, 0, 4, 4, 1, 4, 9, 5, 9. The second '4' is highlighted with a red box.

# Exemple d'une séquence d'identification

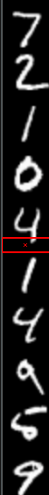
```
action: (10, 3)
action: (10, 3)
action: (4, 3)
action: (10, 3)
action: (10, 3)
action: (1, 3)
action: (10, 3)
```





# Exemple d'une séquence d'identification

```
action: (10, 3)
action: (10, 3)
action: (4, 3)
action: (10, 3)
action: (10, 3)
action: (1, 3)
action: (10, 3)
action: (10, 3)
```




A vertical strip of handwritten digits: 7, 2, 1, 0, 4, 1, 4, 9, 5, 9. The digit '1' at the 6th position is highlighted with a red box.

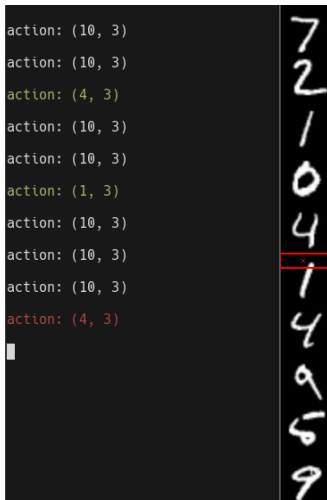
# Exemple d'une séquence d'identification

```
action: (10, 3)
action: (10, 3)
action: (4, 3)
action: (10, 3)
action: (10, 3)
action: (1, 3)
action: (10, 3)
action: (10, 3)
action: (10, 3)

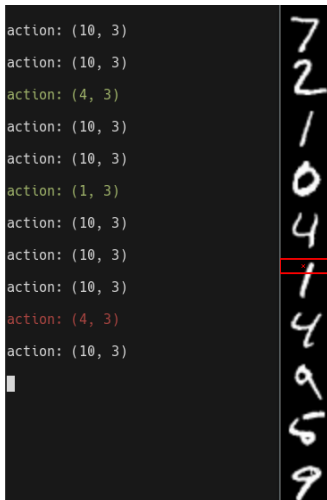
```

A vertical strip of handwritten digits. From top to bottom, the digits are: 7, 2, 1, 0, 4, a red box containing a dot, 1, 4, 9, 5, 9. The red box highlights a specific point in the sequence.

# Exemple d'une séquence d'identification



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