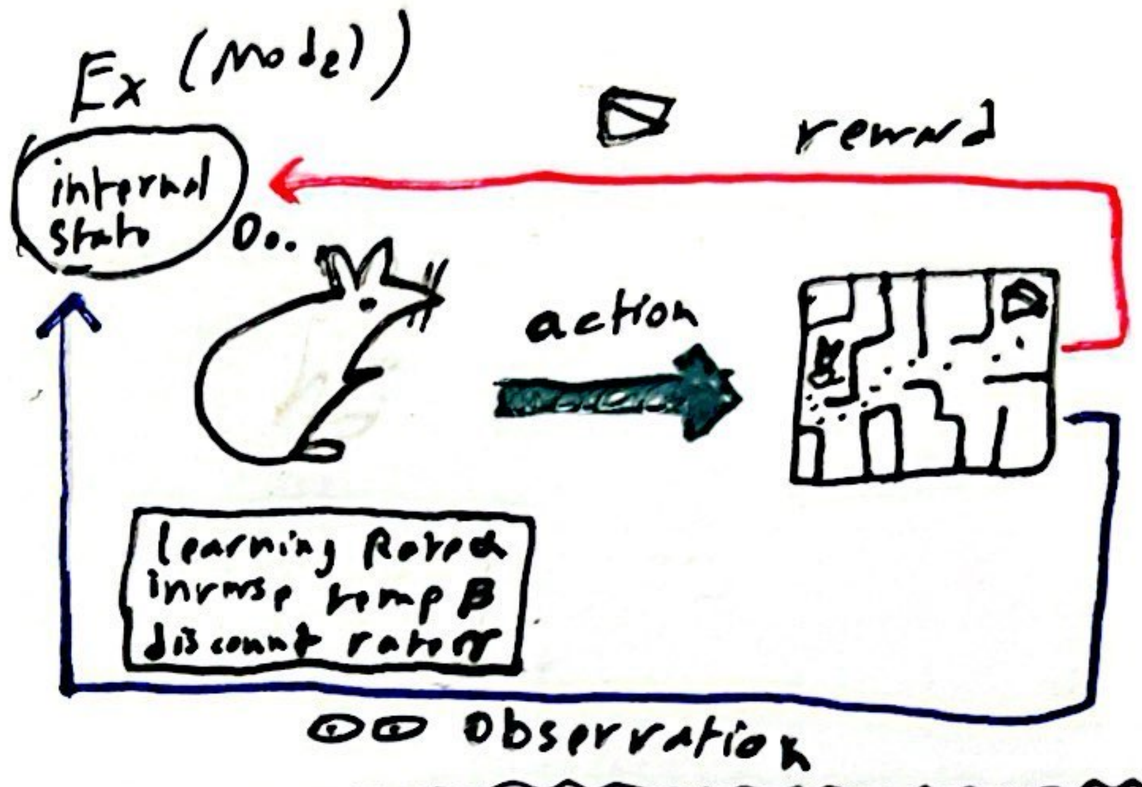
Reinforcement learning

- a new Branch of ML Different from supervised an unsupervis learning as it operates on a different principal.
instead of learing from pre labeled examples (supervised or finding patterns in unlabeld data (unsupervised) it learns from interaction and feed back

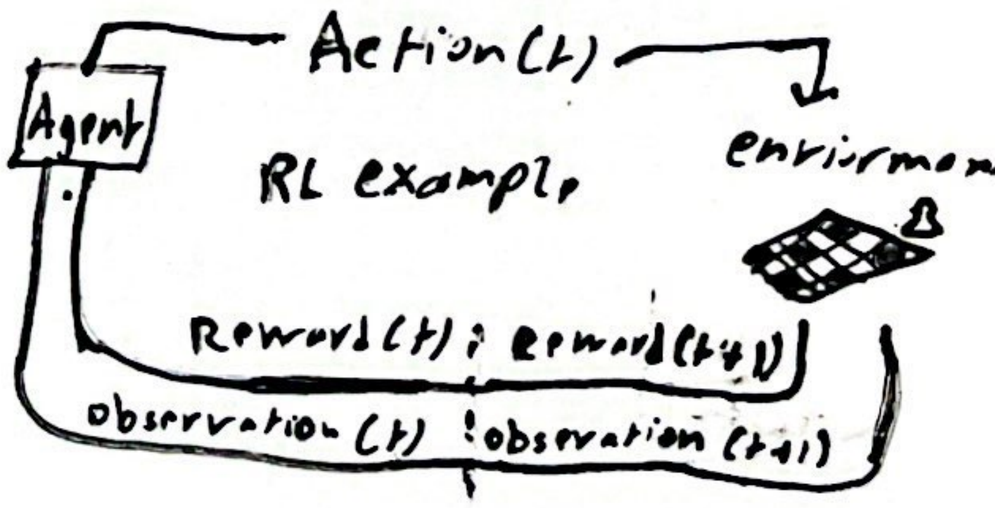
★ unlike supervised learing where Ex's have clear right answers RL is more like training a ppl the model
- learns from trail and error
- getting reward for good disions and
- penalized for poor ones

Ex (Model)



★ for ex a Reinforcement learning algorithm can learn to play chess by playing 1000's of game against itself. recieving positive reward for for winning moves and neg rewards for loosing ones

Good for: sequential decision making
Game control
Robotic control etc



Feature (input, indipendent var, predictor var, attr)

- is a specific peice of info or characteristic us. in put for a ML model (any mesurable prop that helps model make prediction)

Ex's:

Id	name	age	income	marage status
1	Tom	24	$1,000	single
2	Dor	41	121,000	married
.	.	.	.	.

Feature | target (answer)

ML algos: ← learn mapping from feature to target 6

- there can be many features

Ex img recognition → 8x8 grid of pixels with # 2

- 64 features with 10 targets (0-9)