(http://people.revoledu.com/kardi/)

MENU

Q-Learning By Examples

by Kardi Teknomo (../../index.html)


(purchase.html)

Share this: Google+ (https://plus.google.com/+KardiTeknomo?rel=author)
| Next (Modeling-Environment.htm) >

Q-Learning By Examples

In this tutorial, you will discover step by step how an agent learns through training without teacher in unknown environment. Reinforcement learning is training paradigm for agents in which we have example of problems but we do not have the immediate exact answer. For playing a game, for instance, an agent will make series of decisions to move and only later will find out whether those decisions are right or wrong. Reinforcement learning paradigm is similar to real life of how we learn.

In this tutorial, you will find out part of reinforcement learning algorithm called Q-learning . Reinforcement learning algorithm has been widely used for many applications such as robotics, multi agent system, game, motion planning, navigation, and etc.

Instead of learning the theory of reinforcement that you can read it from many books and other web sites (see Resources for more references (Resources.html)), this tutorial will introduce the concept through simple but comprehensive numerical examples. If you purchase the e-book of this tutorial, you will also receive the companion worksheet and the matlab files (purchase.html) .

Read this tutorial comfortably off-line on any device. Click here to purchase the complete E-book of this tutorial (purchase.html)

Let us start the tutorial (clicks the topic below).

Share and save this tutorial (../ShareYourBookmark.htm)

(http://del.icio.us/) (http://digg.com/) (http://www.stumbleupon.com/) (http://www.reddit.com/) (http://slashdot.org/) (http://www.technorati.com/) (http://netscape.aol.com/) (http://www.newsvine.com/) (http://www.mister-wong.de/) (http://www.webnews.de/) (http://www.folkd.com/) (http://www.yigg.de/) (http://linkarena.com/) (http://www.simpy.com/) (http://www.furl.net/) (http://www.yahoo.com/) (http://www.google.com/) (http://www.blinklist.com/) (http://blogmarks.net/) (http://www.diigo.com/) (http://www.blinkbits.com/) (http://ma.gnolia.com/) (http://en.wikipedia.org/wiki/Social_bookmarking)

Send your feedback and comments for this tutorial (../Rating/RateTutorial.php?TutorialName=QLearning)

Preferable reference for this tutorial is

Teknomo, Kardi. 2005. Q-Learning by Examples. http://people.revoledu.com/kardi/tutorial/ReinforcementLearning/index.html