

Introduction to Machine Learning

Proposition for assignment 3

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December 13, 2024

1 Proposal

1.1 General Idea

To use machine learning that learns how to play pong (1972), the dataset will be games of pong. The bot's task is to defend as many goals as possible. The way that we are going to do this is through neural network.

1.2 Simple goal

We will train a neural network that learns how to play a game of pong by playing 100 games of pong simultaneously, based on the amount of goals blocked as a metric the reproduction chance gets changed. The better the performance, the higher the chances of reproducing.

We will be creating pong ourselves so that we can easily give data to the algorithm and change it depending on our needs.

Accuracy: Goals blocked / number of balls going your way.

early end game condition: get 3 goals scored against you.

end the training condition: stopping 100 goals.

2 Contributions

	Who did What
Part 1	All of us.

In your report, please include a statement from all group members:

Jia Hao Zhang: "ping pong ching chong"

Santos Bril: "holy shit Jia, that's a good quote."

Oscar Schuyt: "epic proposal"