

Exercise Files

Starter – "Kit/gpgt/server/scripts/gpgt/chapter7/exercise003.cs"

Answers – "Kit/gpgt/server/scripts/gpgt/chapter7/answers/ch3/exercise003_f.cs"

Exercise Mission

Chapter 7: "003 AIPlayer: Looping path following"

Synopsis

In this exercise, we double-check that you are clear on how to create an AIPlayer and how to create a path for that bot to follow. Additionally, we'll check to see that you know how to cause the bot to navigate to an initial point on the path, and then to follow that path in a loop.

Prerequisites

- 1. ch1_001.pdf "Using The Kit"
- 2. ch7_001.pdf "AIPlayer: Basic Creation"
- 3. ch7_002.pdf "AIPlayer: Point-to-Point"

Exercises

- 1. Create Path + Bot and Start Moving (pg 2)
- 2. Navigating (pg 4)

AIPLAYER: LOOPING PATH

1 Create Path + Bot and Start Moving

Goal: Make sure you understand how to create a path, how to create a new AIPlayer (using the tools in the kit), and lastly, how to start that bot moving towards a destination.

Starter Code: You are provided with a fully defined datablock definition (loopingPathFollower) and a starter function (startexercise003.)

```
datablock PlayerData( loopingPathFollower : BlueGuy )
   category = "gpgt";
};
package exercisePackage_003
function startexercise003()
   // 1
   // ?????
   // 2
   // ?????
   // 3
   // ?????
   // 4
   // ?????
   // 5
   // ?????
   // ?????
   %pathNode.visibleMarker.setSkinName("green");
}
```

Steps:

- 1. Create a path for our AIPlayer to follow.
- 2. Create an AI player using the supplied datablock.
- 3. Assign the path to the AIPlayer.
- 4. Tell the AIPlayer to start at node 0.
- 5. Start the AI player moving towards the initial node.

AIPLAYER: LOOPING PATH
Output Goal: If you run the mission after editing this code, the AIPlayer will walk to node 0 (in the path) and then stop moving.

AIPLAYER: LOOPING PATH

2 Looping Navigation

Goal: Learn how to make a bot follow a path in a loop.

Starter Code: You are provided with a partially defined method (onReachDestination).
function loopingPathFollower::onReachDestination(%DB , %theBot)
{
 %pathNode = %theBot.myPath.getObject(%theBot.currentPathNodeNum);
 %pathNode.visibleMarker.setSkinName("red");

// 1
// ?????
// ?????
// ?????

%pathNode.visibleMarker.setSkinName("green");
}

Steps:

- 1. Select a new node from the path as the bot's next navigation point.
- 2. Tell the bot to move to this new navigation point.

Output Goal:

If you run the mission after editing this code, the AIPlayer will run to node 0, and then start running in a loop from node 0, to 1, to 2, ..., to 7, to 8, ad infinitum.

Hints:

1. Remember, the path only has eight nodes.