Dogs In Motion Documentation

Table of Contents

Introduction	2
Demo Scene Overview	3
Controls:	3
Package details	4
Animations file:	4
Demo Scene file:	5
The Main Camera :	5
The Cm Freelook :	5
The Scene:	6
The 4 Dogs:	7
The Third Person Movement Script:	8
The Canvas:	9
The UI Manager Object:	10
Dogs file:	10
Materials file:	11
Textures file:	13

Introduction

This is *The Dogs In Motion* documentation. In here you will learn how to use *The Dogs In Motion* pack!

This pack includes 4 3d model dogs with their Textures, Materials and Animations. This pack also includes a Demo Scene which is an example of what you can do with the 4 3d models and their animations.

You'll get an overview on how to start using the Demo Scene, then you'll get a detailed explanation on the Dogs themselves and finally a more detailed explanation of the Demo Scene.

Demo Scene Overview

This Overview will show you how to get started with the Demo Scene and see the Dogs in action!

Note:

Make sure you have Cinemachine package installed for use in the demo scene.

Here are the Instructions:

- 1. Click on the file called Demo Scene.
- 2. In here you will find a Scene file called Demo Scene.
- 3. Open the Demo Scene file, Click Play and then maximize Game View.
- 4. You then Click on the dog you want to try out!

Controls:

- Moving the mouse moves the camera.
- WASD for Walking.
- WASD + SHIFT for Running.
- WASD + C for Creeping.
- **SPACE** for Jumping.
- LEFT CLICK for Barking.
- Hold **Q** for IdleLookLeft.

- Hold E for IdleLookRight.
- **RIGHT CLICK** for Sitting.
- While Sitting Press **SHIFT** for Sitting.1.
- Press **SPACE** while Sitting to Stand Up.

Package details

When you first import The Dogs In Motion package you'll find that there are 5 files:

Animations, Demo Scene, Dogs, Materials, Textures.

Animations file:

The animations file Contains 3 Sub-files: BeagleAnimations, BoxerAnimations, PugAnimations.

Each one of the 3 files contains 12 animations:

Barking, Creep, Idle, Idle_LookLeft, Idle_LookLeftIdle, Idle_LookRight, Idle_LookRightIdle, Jump, Running, Sitting, Sitting, Walking.

Each one of those animations can be used with their corresponding dog by using something like The Unity Animator as demonstrated in the Demo Scene.

Demo Scene file:

In here you'll find everything relating to the demo scene. There are 6 Sub-files: Animator, Materials, Scene, Scripts, Sprites, Textures.

When you first open the Demo Scene you'll find in the hierarchy several items. Firstly, the Camera System which uses the Cinemachine Package.

The **Main Camera**:

This is a standard main camera which has a cinemachine brain attached to it.

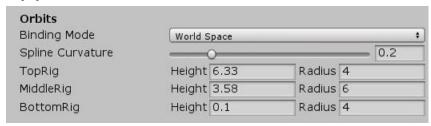
The Cm Freelook:

The <u>Cinemachine Freelook Camera</u> is attached to the Main Camera's Cinemachine brain.

Notice:

- If you didn't already import the cinemachine package, simply import the cinemachine package then reimport the Dogs in Motion Package. All cinemachine scripts should automatically be added.
- If the scripts still don't properly be added just go to the CM Freelook object in the hierarchy and add a CM Freelook component with these settings

applied to the **Orbits** section.



- Lastly, Add the CM Freelook Object to the UI manager script in the **UI Manager Object.**

The Scene:

This Scene prefab is placed in the **Scene** file as **Scene.fbx** inside the prefab there are 6 objects:

Leaves, Fence, Grass, Ground, Light, Tree.

The Fence, Ground and Tree all have a Mesh Colliders attached to them. The Mesh Collider Physics Material is a Basic Physics Material with no changes added to it. It is located in the **Scene** File. All Textures in the **Scene Textures** file are no more than 2048X2048.

Notice:

- All materials use Standard Shaders. These materials should work when using LWRP or HDRP or URP.
- If the materials don't work then you should upgrade the materials by going to Edit -> render pipeline -> upgrade all materials to...

- If the Fence Bushes in the scene don't have any texture applied just simply open the Fence_Bushes Material and add the Fence_Bushes Texture.
- The lighting may not work. This usually happens when importing to HDRP. If this happens the problem usually is that the Intensity is too high.

The 4 Dogs:

Then you'll see the 4 Parent objects: Beagle, Dark Pug, Boxer, Light Pug. Each Parent object has its corresponding Dog applied as a Child Prefab. The Child Prefab applied is the MeduimPoly but if you want use the LowPoly or HighPoly then Simply:

- 1. Delete the Child Prefab of the dog you want to change.
- 2. Open the **Dogs** file.
- 3. Choose anyone of the 3 sub-files depending on which Polycount you want to try out.
- 4. Drag and drop the dog on the corresponding parent object.

Each one of the Parent objects has 3 components applied: Character Controller, Animator, Third Person Movement Script.

The Third Person Movement Script:

This script controls the dogs third person movement using the <u>Character Controller</u> and controllers the animation of the dogs using the <u>Animator</u>. This script is located in the **Scripts** file.



The Controller:

This area is where the dogs Character Controller is applied.

The Camera:

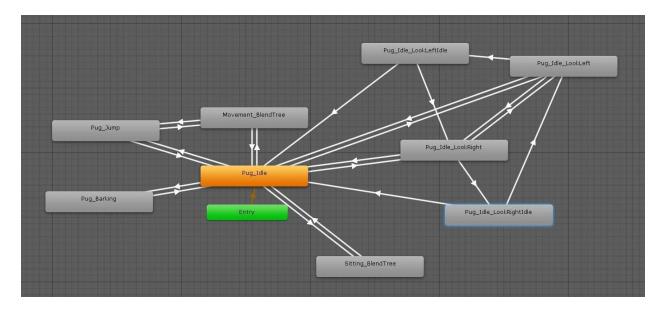
This is where the Main Camera is applied.

The Turn Smooth Time:

This value controls the smoothness of the dogs turns. You can play with the value if u want.

The *Animator* Component:

The Animator Component has the corresponding dog avatar and animator applied to it. The 3 Animators are placed in the **Animator** file.



The Animators all consist of:

- 1 Idle Animation which is the default state.
- 2 BlendTrees: Sitting_BlendTree,
 Movement_BlendTree.
- 6 other animations.

The Movement_BlendTree transitions between the Creep, Walking and Running animations.

The Sitting <u>BlendTree</u> transitions between the Sitting and Sitting.1 animations.

The Canvas:

This Canvas holds the start menu of the Demo Scene. Inside the Canvas object is a child object called Start Menu. The Start Menu has 6 child objects:

- The *Panel* which has the start menu background Image.
- 4 Buttons: LightPug_Button, Boxer_Button,
 Beagle_Button, DarkPug_Button. Each Button has
 its matching Sprite and Text. All 4 Sprites are
 located in the Sprites file. The Buttons logic is
 written in the UI Manager Script which is attached
 to the UI Manager Object.
- Lastly, The Choose a Dog Text.

The **UI Manager Object**:

Assigned to the UI Manager Object is the UI Manager Script. This Script is located in the **Scripts** file.

The purpose of the UI Manager Script is to control the On-Click function of the 4 Buttons in the start menu. When you first start the demo scene the Time.timeScale is equal to 0. After Clicking on one of the dogs the script deactivates the start menu and activates the dog you chose. Then, the Time.timeScale is set to 1 and the CM Freelook Camera is set to Follow and LookAt the dog.

Dogs file:

In here there are 3 sub-files for the 3 PolyLevels.

High Poly Models:

Beagle: 94631 tris/42 Bones;

Boxer: **87767 tris/42 Bones**;

LightPug: 93527 tris/42 Bones;

DarkPug: 93527 tris/42 Bones;

Medium Poly Models:

Beagle: 46501 tris/42 Bones;

Boxer: 40673 tris/42 Bones;

LightPug: 46791 tris/42 Bones;

DarkPug: 46791 tris/42 Bones;

Low Poly Models:

Beagle: **17915tris/42 Bones**;

Boxer: 20535 tris/42 Bones;

LightPug: 18903 tris/42 Bones;

DarkPug: 18903 tris/42 Bones;

Materials file:

Inside this file there are 9 Materials: Beagle Nose, Beagle Skin, Boxer Skin, Dark Pug Skin, Eyes, Light Pug Skin, Pug Mouth, Teeth, Tongue.

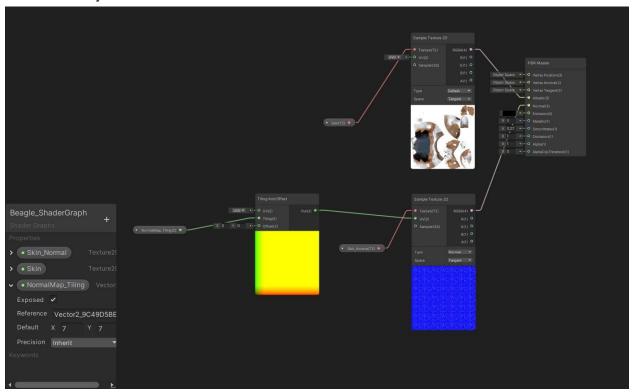
Notice:

- All materials ending in *Skin* use a Secondary map for the Skin_NormalMap.
- All materials use Standard Shaders. These materials should work when using LWRP or HDRP or URP.
- If the materials don't work then you should upgrade the materials to the specific render pipeline that you are using by going to Edit -> render pipeline -> upgrade all materials to...
- If you upgrade the materials the Beagle Skin,
 Boxer Skin, LightPug_Skin might not have the
 NormalMap applied. To solve this problem you
 can change the Shader From Standard to one of
 the ShaderGraphs in the ShaderGraphs File by
 going to Standard -> ShaderGraphs -> Choose the
 ShaderGraph corresponding to each dog.

ShaderGraph file:

In this file you will find 3 ShaderGraphs:
Boxer_ShaderGraph, Beagle_ShaderGraph,
LlghtPug_ShaderGraph. These 3 Shader Graph
produce the exact same result as the Standard Shader
and can be used in LWRP, URP, HDRP if the Standard

Shaders for the Beagle, LightPug, Boxer aren't working correctly.



The 3 ShaderGraphs are just an Albedo and Normal Map added to a PBR Master Node but with a Tiling and Offset node connected to the Normal Map allowing the Normal Map to be tiled.

Textures file:

In here there are 11 Textures which have a Maximum size of 1024X1024 except for the Normal Map which is 2048X2048. These are the Textures:

Beagle_Nose, Beagle_Skin, Boxer_Skin, DarkPug_Skin, Eyes, LightPug_Skin, Pug_EyeLiner, Pug_Mouth, Skin NormalMap, Teeth, Tongue.

Notice:

The Pug_EyeLiner and Pug_Mouth Textures are both used in the Pug Mouth Material.

If you need any help, please Contact Us and we will answer as quick as possible:

paradox-designs.github.io