# Basketball Shooting Game Starter Kit

READ ME

Thank you for purchasing this package.

This package help you to create a basketball shooting game.
Scripts to fire the ball by flicking, ball model, basket goal model
and sample game scene are included in this package.

Sample game is quite simple.
When you get a goal, score will increase.
Please make up an interesting game with your great ideas.

Installation From Unity Asset Store

After you download and import this package from the Unity Asset Store,
this product containing the fully scripts and the sample will be automatically
installed.
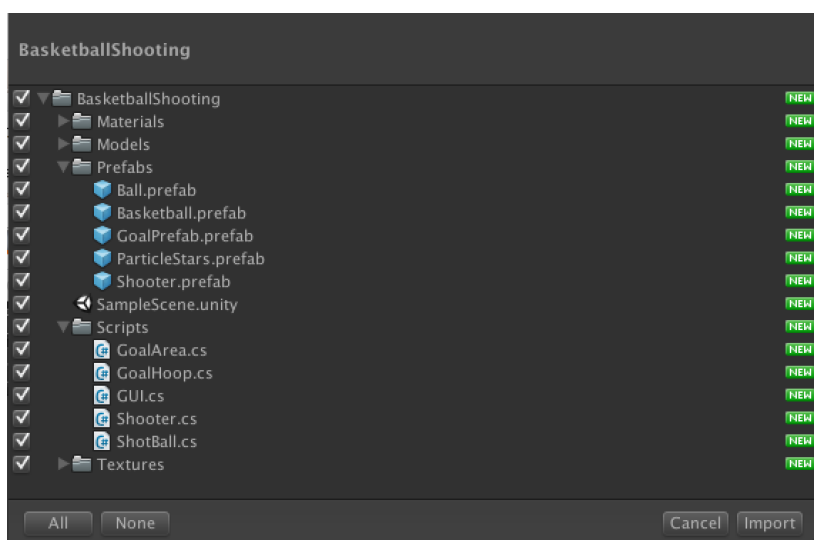
Sample Project

SampleScene.unity is under in BasketballShooting folder.
Open the scene and run, you can play a sample game.
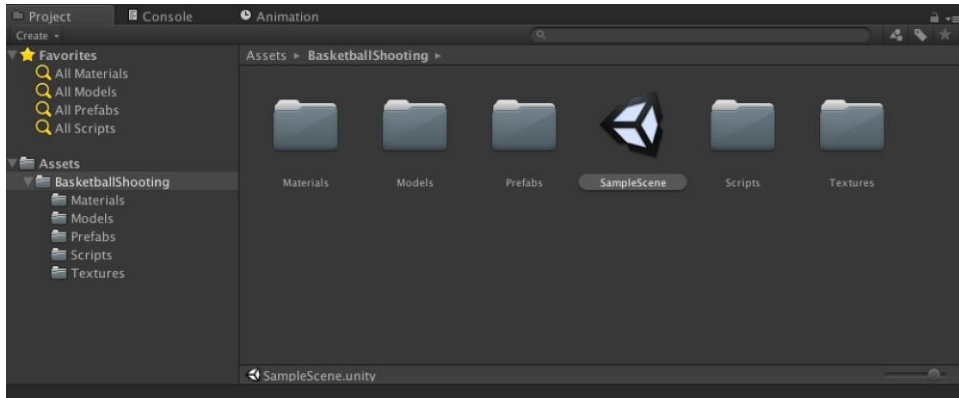
1. How to Play

You shoot the ball by flicking.
Direction of the ball depends on where you release your finger.
The ball will fly higher if you release your finger at a higher position.
A quick flick gives the ball a power, and flicking slowly makes the ball go slower.
It will be a good orbit when you flick a little slower and higher.

2. Explanation of Sample

・Shooter (prefab) is the system to fire the ball.
 Stage is a invisible platform.
 Shot Point is the firing position of the ball.
 ShooterCamera has Camera component and Shooter script.
> Shooter script is the core of this product. It has a few parameters.
> References of camera, ball prefab, shot point transform are set in
> these parameters. Also, if you change the values (for example "Shot
> Power"), the flying trajectory of the ball and the speed of ball will be
> changed. More details later.
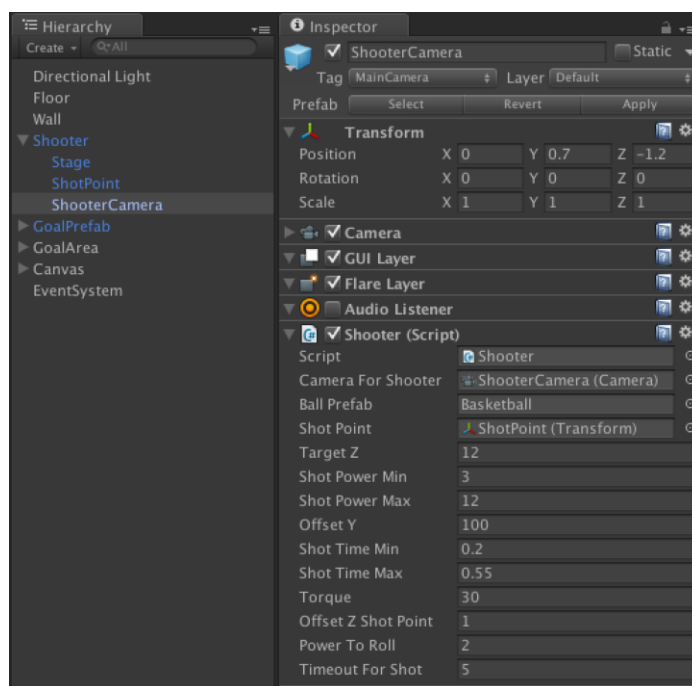
・GoalPrefab is the basket goal object.
 This is under in BasketballShooting/Prefabs folder.

・Goal Area is sphere collider to use to determine the ball reaches the goal.
 When a ball reaches the goal, the particle system is played.

・Canvas and EventSystem are Unity GUI for displaying information about
shooting balls. And score is displayed.

Basketball shooting game would be completed by simply making the rules,
such as the limit of balls or time.

Usage

1. Select [Menu] File->New Scene
2. Drop Assets/BasketballShooting/Shooter.prefab into Scene or Hierarchy.
3. Delete (or disable) default camera "Main Camera".
4. Run

Package Structure
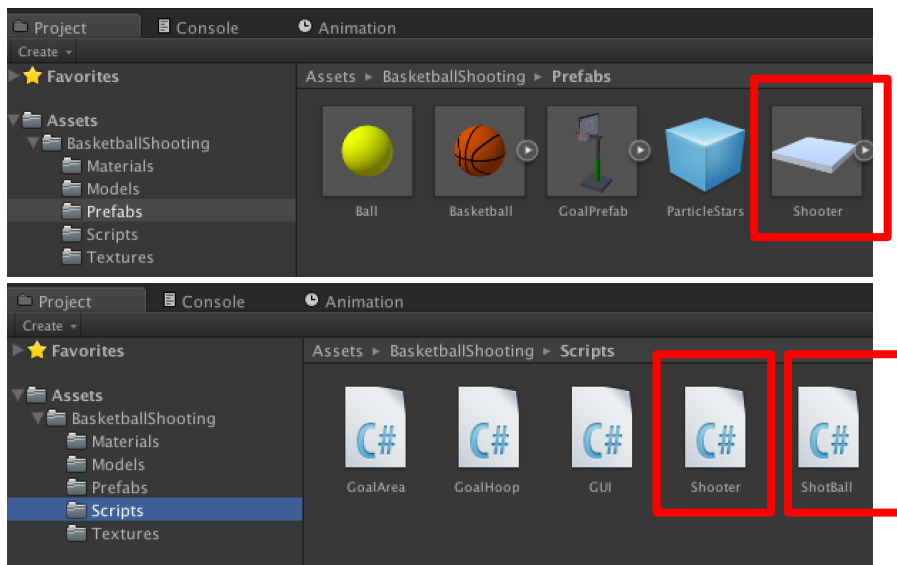
Materials ... All sample product materials
Models ... Basketball and Basket goal models (fbx)
Prefabs
    Ball ... yellow ball for sample
    Basketball ... basketball for sample
    GoalPrefab ... basket goal for sample
    Shooter ... complete system for firing the balls
 Scripts
    GoalArea ... a trigger for goal
    GoalHoop ... It allocates sphere colliders in basket hoop
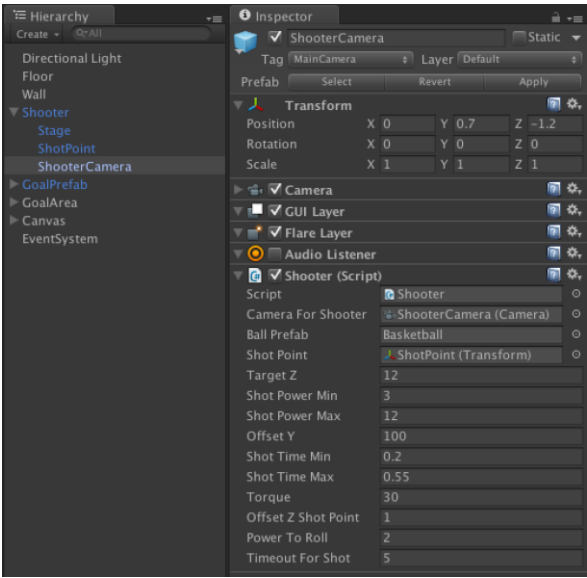   GUI ... gui for sample
    Shooter ... core script for firing the balls (It is attached "ShooterCamera")
    ShotBall ... It attaches to the ball objects for judging active ball
        (It can be extended for various uses.)
  Texture ... All sample product textures

Parameters (Shooter.cs)

Name	Type	Note
Camera For Shooter	Camera	Set a gameobject with camera component.
Ball Prefab	Gameobject (Prefab)	Set a ball prefab for shooting. (If you want to change the ball, set your own ball prefab.)
Shot Point	Transform	Set a gameobject of shot point.
Target Z	float	screen point z to world point
Shot Power Min	float	minimum shot power
Shot Power Max	float	maximum shot power (If you want to fire the ball far ahead, increase this value.)
Offset Y	float	offset Y for trajectory (If you want to fire the ball higher, increase this value.)
Shot Time Min	float	minimum time (sec.) till to release finger (If you release your finger shorter than this time, it is treated as the maximum power.)
Shot Time Max	float	maximum time till to release finger
Torque	float	torque (backspin)
Offset Z Shot Point	float	for rolling ball
Power To Roll	float	for rolling ball
Timeout For Shot	float	for error handling

The Others

- Coded in C#
- Mobile Support iOS & Android (tested)
- WebPlayer Demo
  http://wasabi-apps.co.jp/unityasset/demo/BasketballShootingGameStarterKit.html
- Application Example
  iOS :
  https://itunes.apple.com/app/id826260711?mt=8
  Android :
  https://play.google.com/store/apps/details?id=jp.co.wasabiapps.swishshot

Support

If you have any questions regarding this product, please send us an email at
support@wasabi-apps.co.jp

Thanks for your interest in our components.
Good luck with your modifications!

Wasabi Applications Inc.