# MarkerBased AR Sample 1.1.7

#### iOS & Android support

WindowsStoreApps8.1 & WindowsPhone8.1 & Windows10 UWP(beta) support

Win & Mac & Linux Standalone support

Support for preview in the Editor

Work with Unity Free & Pro

#### System Requirements

Build Win Standalone & Preview Editor: Windows7 or later Build Mac Standalone & Preview Editor: OSX 10.8 or later

The execution of this asset is required "OpenCV for Unity".

This asset is the Augmented Reality Sample that detect and recognize NxN block markers and display 3d model in WebCamTexture in real-time.

Code is the rewrite of <a href="https://github.com/MasteringOpenCV/code/tree/master/Chapter2\_iPhoneAR">https://github.com/MasteringOpenCV/code/tree/master/Chapter2\_iPhoneAR</a> using the "OpenCV for Unity".

- Texture2DMakerBasedARSample By detecting the marker from Texture2D, display AR model.
- WebCamTextureMakerBasedARSample By detecting a marker from WebCamTexture, display AR model in real-time.

Please download <u>Demo Application</u> for Android and watch <u>Demo Video</u>.

Cardboard With OpenCV for Unity Sample is available.

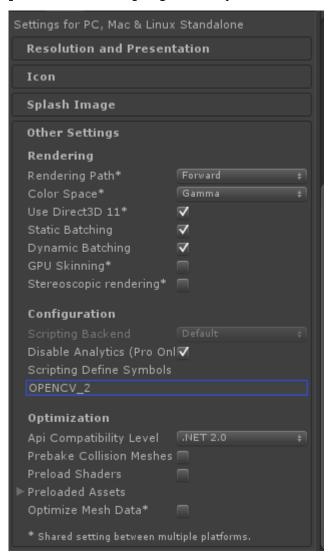
#### Version changes

- 1.1.7 [Common] Changed namespace to OpenCVMarkerBasedAR. (To avoid namespace and classname conflict.) [Common] Fixed CS0618 warnings: `UnityEngine.Application.LoadLevel(string)' is obsolete: `Use SceneManager.LoadScene'.
- **1.1.6** [Common]Added namespace. [Common]Added flipVertical flag, flapHorizontal flag and GetWebCamDevice() method to WebCamTextureToMatHelper.cs.
- **1.1.5** [Common] Changed to methods of moving the AR object.
- **1.1.4** [Common] Support for "OpenCV for Unity 2.0.0".
- **1.1.3** [Common]Fixed WebCamTextureToMatHelper.cs.(Add didUpdateThisFrame 0 method)
- **1.1.2** [Common] Renewed the samples using WebCamTextureToMatHelper.(Supports all screen orientation.)
- 1.1.1 [Common]Added Marker Design Inspector.( Improved procedures to change the marker image)
- 1.1.0 [Common] Change to use uGUI in SampleScene.
- 1.0.9 [iOS] Fix WebCamTexture bug of SampleScene in Unity5.2.
- 1.0.8 [Common]Rewrite SampleScene.
- **1.0.7** [Common]Add the code to support Beta Version of "OpenCV for Untiy" based on "OpenCV3.0.0".
- 1.0.6 [Common] Fix Sample Scene.
- **1.0.5** [Common] Fix SampleScene. [Common] Change Property of Platform Dependent Compilation from UNITY\_IPHONE to UNITY\_IOS.
- **1.0.4** [Common]Fix the direction of rotation of the mat that is converted from WebCamTexture.
- **1.0.3** [Common] Fix direction of WebCamTexture.
- **1.0.2** [Common] Divide asset for Unity4 and Unity5.
- 1.0.1 [Common] Support for "OpenCV for Unity 1.0.9"
- 1.0.0 Initial version

#### Setup

- Import and Setup "OpenCVForUnity".
- Import "MarkerBasedARSample".
- Print the marker image(MarkerBasedARSample/Resources/maker.png).

If you want to use the Beta Version of "OpenCV for Untiy" based on "OpenCV2.4.11", please set the "Scripting Define Symbols" to "OPENCV\_2".



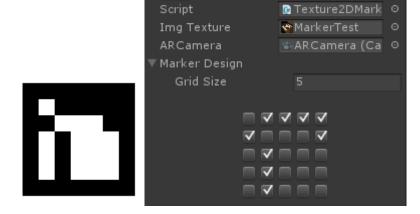
## Q&A

Q.

I want to change the Marker Image.

### A.

Marker design is changeable from the Inspector.



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