1、Model Preparation and Standard Binding
  (1) A binding-ready FBX file for the model needs to be prepared.
  (2) For the body skeleton structure of the model, our plugin provides basic data redirection functionality, which can redirect the majority of humanoid skeletons.
  (3) For facial binding, we use the Apple ARKit standard of 52 blendshapes. If facial expressions and mouth movements are required, they need to adhere to this binding specification.
2、Create a new Unity project by selecting the "3D Core Module" template. Once you've chosen the template, create the project and wait for a moment until the project is successfully created.
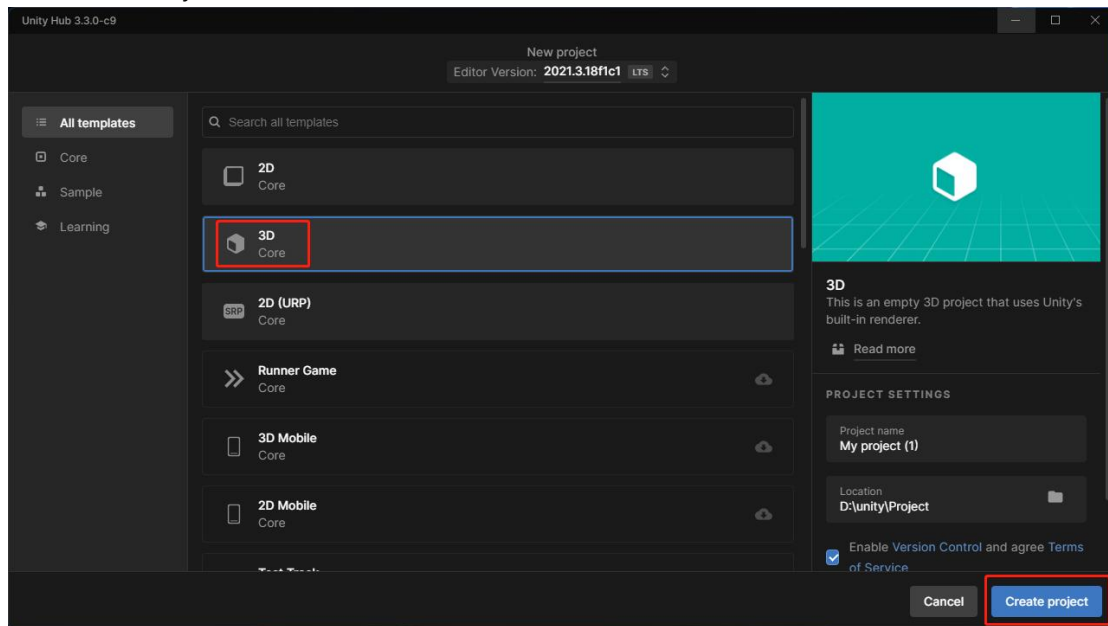

3、After successfully creating the project, import the MotionverseSDK by clicking on "import".
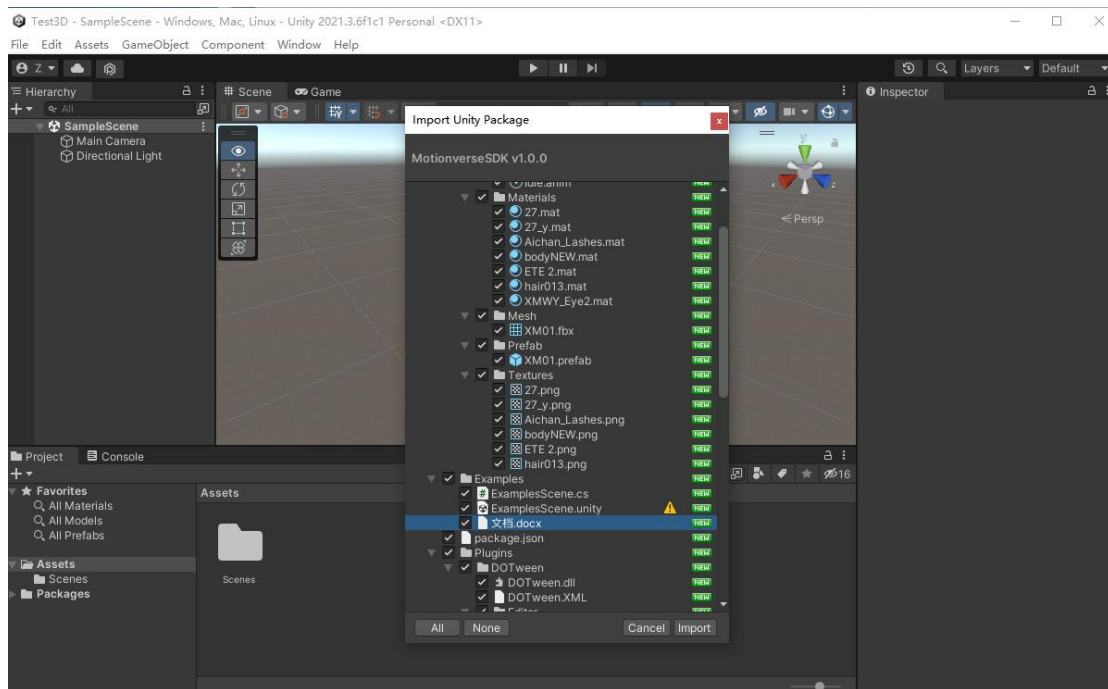
4、Click on Assets/MotionverseSDK/Samples scene to explore and utilize the samples provided.
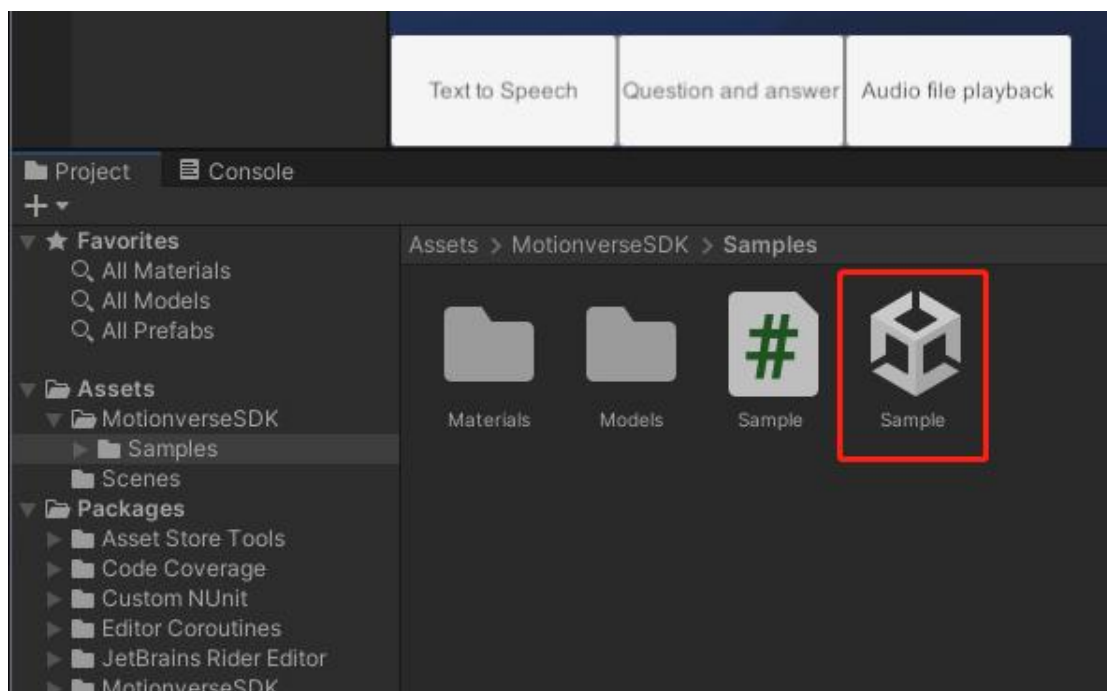
5、Select "TokenClient" and then set up the information in the Inspector. Choose the Region based on your location, and make sure your account registration address is consistent with the selected region. Then input the created App ID and Secret Key.
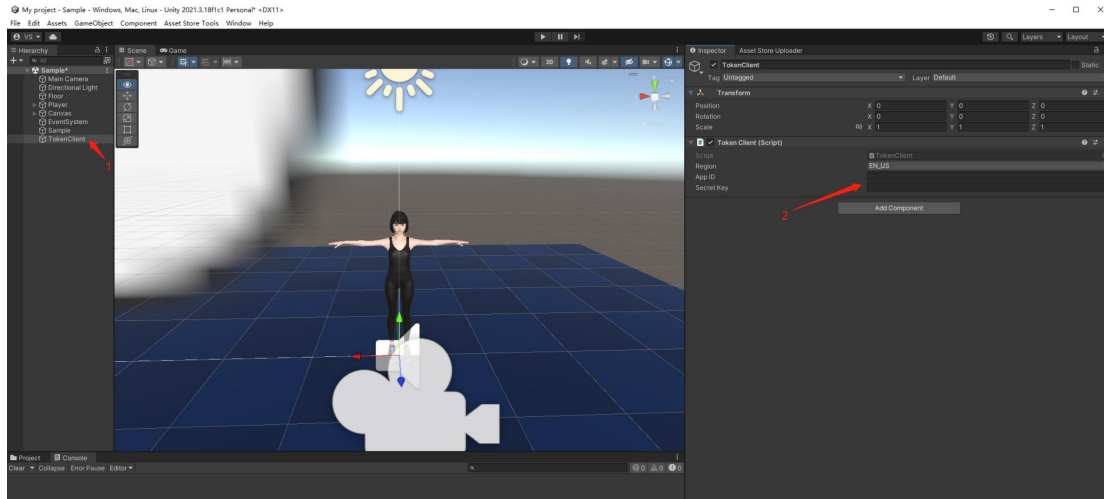
The App ID and Secret Key can be obtained after registering on usercenter.motionverse.ai and creating an application.
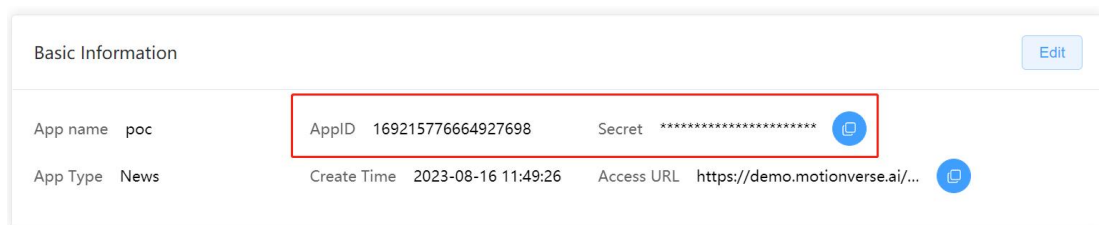
6、Move the character to the Player directory and add the Player component to the Player directory.
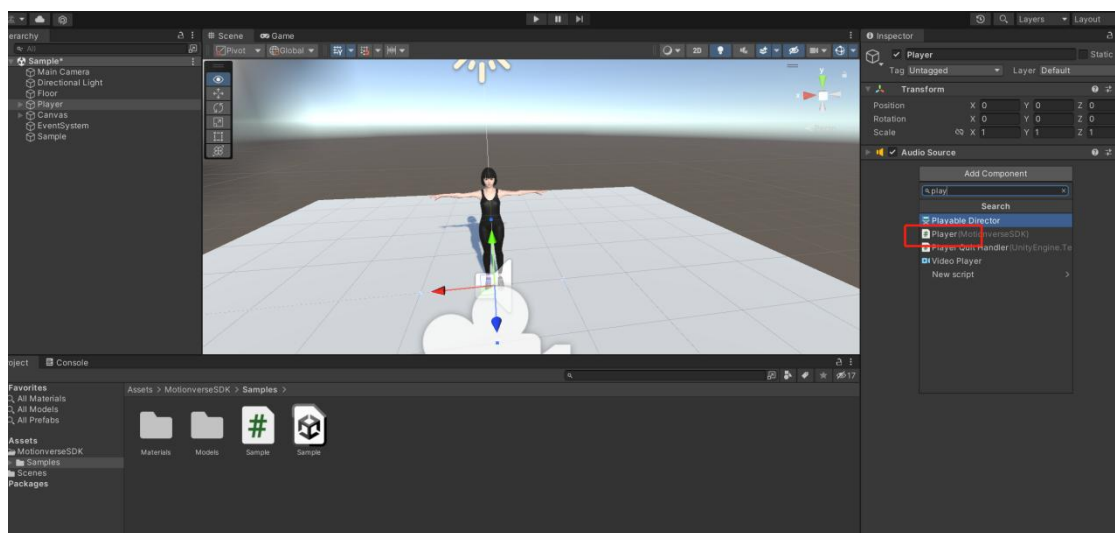
Configure the parameters for the Player component:

VoiceName: Set the TTS synthesis voice name. Detail
BodyMotion: Set the type of motion. Detail
FaceType: Set the facial expression driving type. 1 = Voice-driven, 2 = Visual-driven. Phoneme-driven effects produce better results and more accurate lip synchronization.

Voicespeed: Set the speed of the synthesized voice. Default value is 50, range is 0-100.

VoiceVolume: Set the volume of the synthesized voice. Default value is 50, range is 0-100.

Voice FM: Set the pitch of the synthesized voice. Default value is 50, range is 0-100.

Body Head X Rot: Control the tilting of the character's head during motion playback. Use a negative value for tilting, e.g., -10.
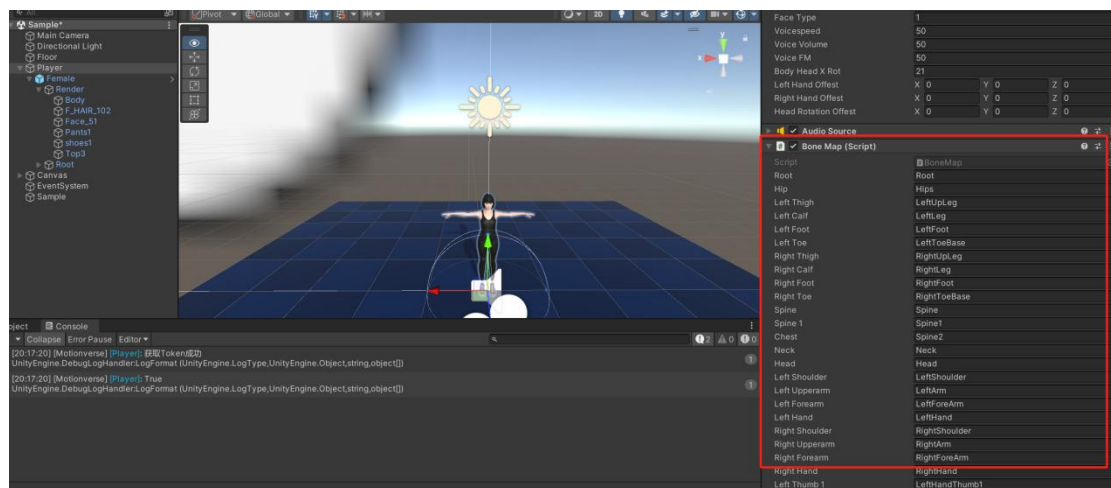
Left Hand Offset

Right Hand Offset

Head Rotation Offset

These three parameters are used for adjusting the position information of the head and hands during redirection.

7、To configure redirection parameters, for models with redirection requirements, the mapping relationship of the model's skeleton needs to be configured.
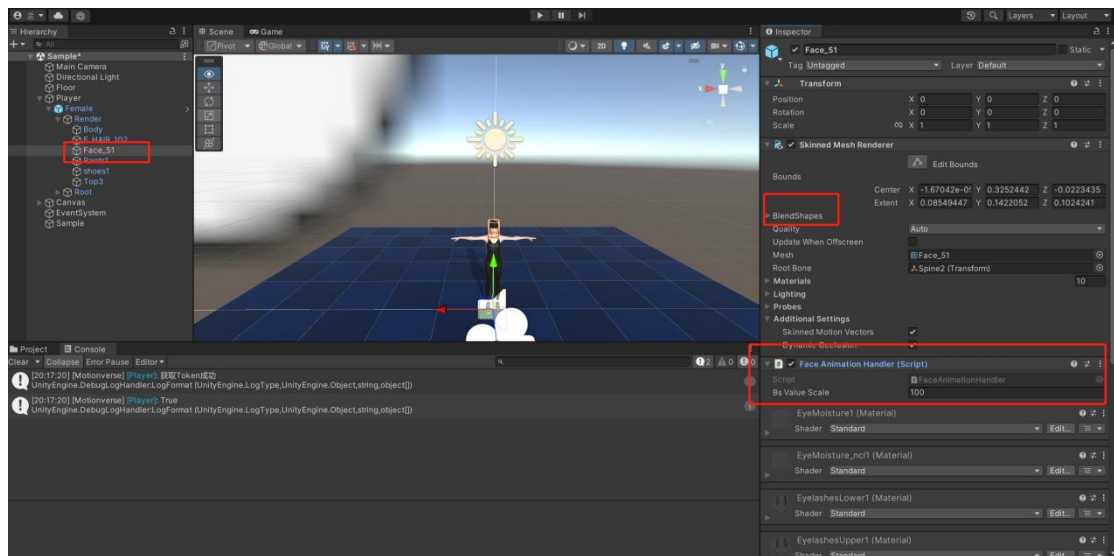

Once configured, the redirecting functionality will be automatically supported, allowing you to drive the digital character directly with data.
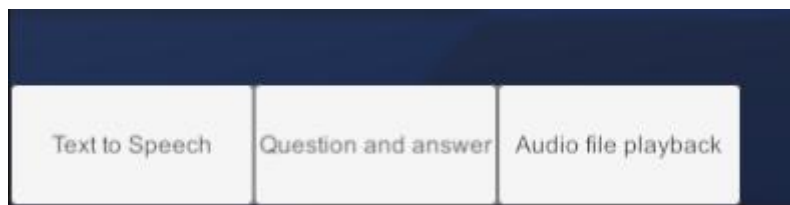
8、Add a Poser Animation Handler to the model.
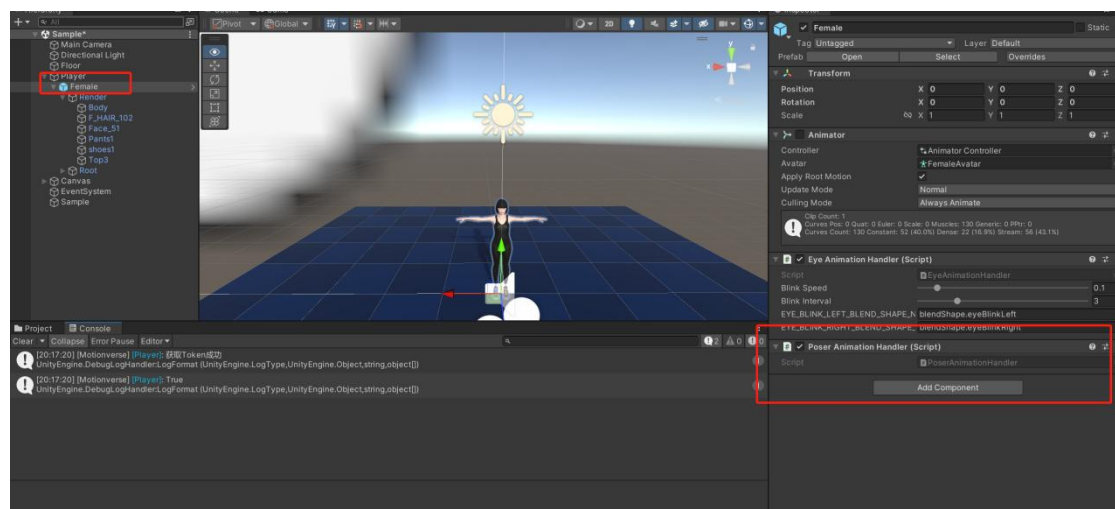
9、In the part where facial blendshapes (BS) are present, add the Face Animation Handler.

10、Click on the corresponding button to start debugging the digital character drive. Note: If the Region selected is EN_US, the Question and Answer feature will not be available.

11、After familiarizing yourself with the digital character plugin, developers can start developing digital character applications according to their own needs!

You can refer to Sample.cs.

```csharp
using UnityEngine;
namespace MotionverseSDK {
    public class Sample : MonoBehaviour
    {
        public void OnTextDrive(string text)
        {
            TextDrive.GetDrive(text);
        }

        public void OnAudioUrlDrive(string url)
        {
            AudioUrlDrive.GetDrive(url);
        }

        public void OnNLPDrive(string text)
        {
            NLPDrive.GetDrive(text);
        }
    }
}
```
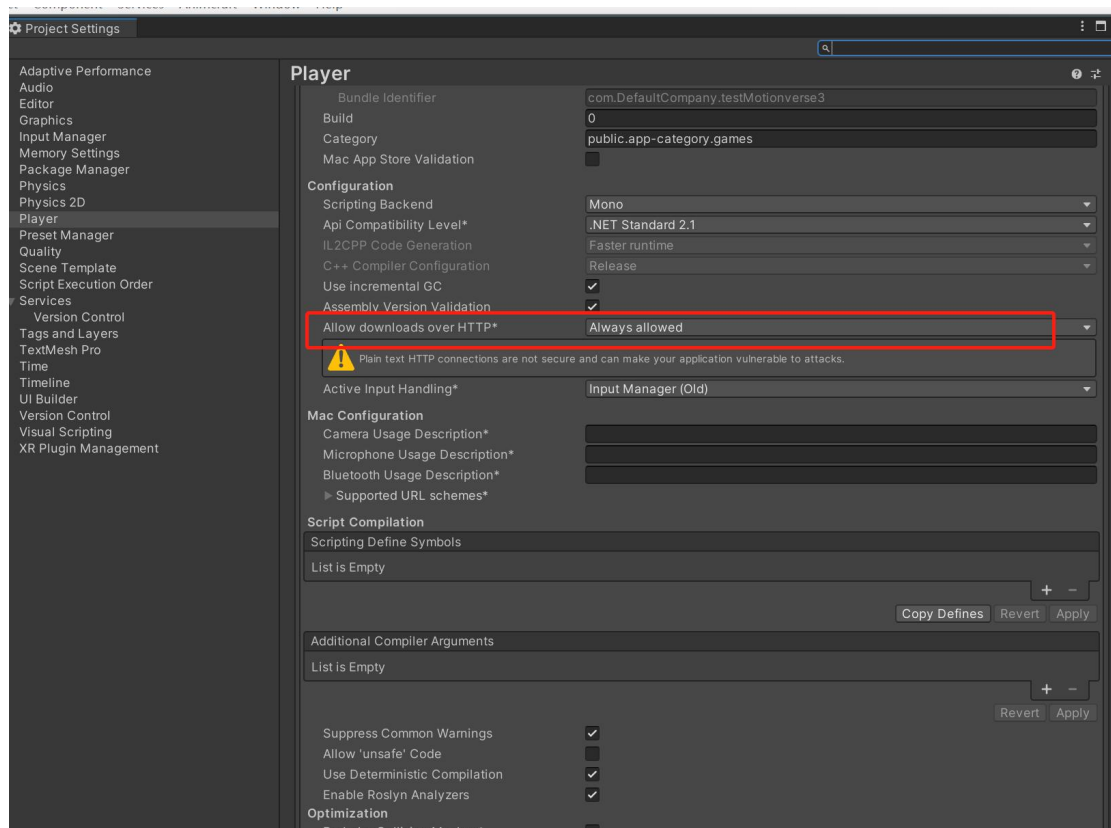
TextDrive: Input text and the synthesized voice, actions, and expressions will be returned to drive the digital avatar.

AudioUrlDrive: Input the URL of an audio file, and actions and expressions will be returned to drive the digital avatar.

12、For Unity 2022 version, you need to allow HTTP downloads in the Player Settings.

TTS voice list：
en-US-JennyMultilingualNeural
en-US-JennyNeural
en-US-GuyNeural
en-US-AriaNeural
en-US-DavisNeural
en-US-AmberNeural
en-US-AnaNeural
en-US-AshleyNeural
en-US-BrandonNeural
en-US-ChristopherNeural
en-US-CoraNeural
en-US-ElizabethNeural
en-US-EricNeural
en-US-JacobNeural
en-US-JaneNeural

en-US-JasonNeural

en-US-JennyMultilingualV2Neural

en-US-MichelleNeural

en-US-MonicaNeural

en-US-NancyNeural

en-US-RogerNeural

en-US-RyanMultilingualNeural

en-US-Saraen-US-AIGenerate1Neural

en-US-SteffanNeural

en-US-Tonyen-US-Saraen-US-AIGenerate1Neural

en-US-AIGenerate1Neural

en-US-AIGenerate2Neural

en-US-BlueNeural

zh-CN-XiaoxiaoNeural

zh-CN-YunxiNeural

zh-CN-YunjianNeural

zh-CN-XiaoyiNeural

zh-CN-YunyangNeural

zh-CN-XiaochenNeural

zh-CN-XiaohanNeural

zh-CN-XiaomengNeural

zh-CN-XiaomoNeural

zh-CN-XiaoqiuNeural

zh-CN-XiaoruiNeural

zh-CN-XiaoshuangNeural

zh-CN-XiaoxuanNeural

zh-CN-XiaoyanNeural

zh-CN-XiaoyouNeural

zh-CN-XiaozhenNeural

zh-CN-YunfengNeural

zh-CN-YunhaoNeural

zh-CN-YunxiaNeural

zh-CN-YunyeNeural

zh-CN-YunzeNeural