JCSDK Docking Documentation Description

Version： 1.0.0

目录

I 、SDK Introduction：

JCSDK is a set of advertising SDK provided by MS Company, which integrates the advertising SDKs of major advertisers and related statistical SDKs to facilitate the joint operation and data analysis of in-app advertising between platforms.

1.1、Supported ad types：

splash Ads, banner ads, rewardVideo ads, interstitial ads, native ads

1.2、version：

See： version

II 、SDK Access Configuration：（Contains bridging and configuration cs）

We provide bridge and configuration files, please refer to cs file and download：

2.1、info.plist configuration：

Support http network configuration

```
<key>NSAppTransportSecurity</key>
<dict>
   <key>NSAllowsArbitraryLoads</key>
   <true/>
</dict>
```

Google-related parameter configuration：

```
<key>GADApplicationIdentifier</key>
<string>ca-app-pub-9488501426181082/7319780494</string>
<key>GADIsAdManagerApp</key>
```

<true/>

2.2、build setting configuration：

Xcode - build setting ：

Bitcode set NO,

“Other linker flags” add “-ObjC”

2.3、Importing related SDKs：

Here is the MS ad-supported library and documentation： check out the JCSDK download

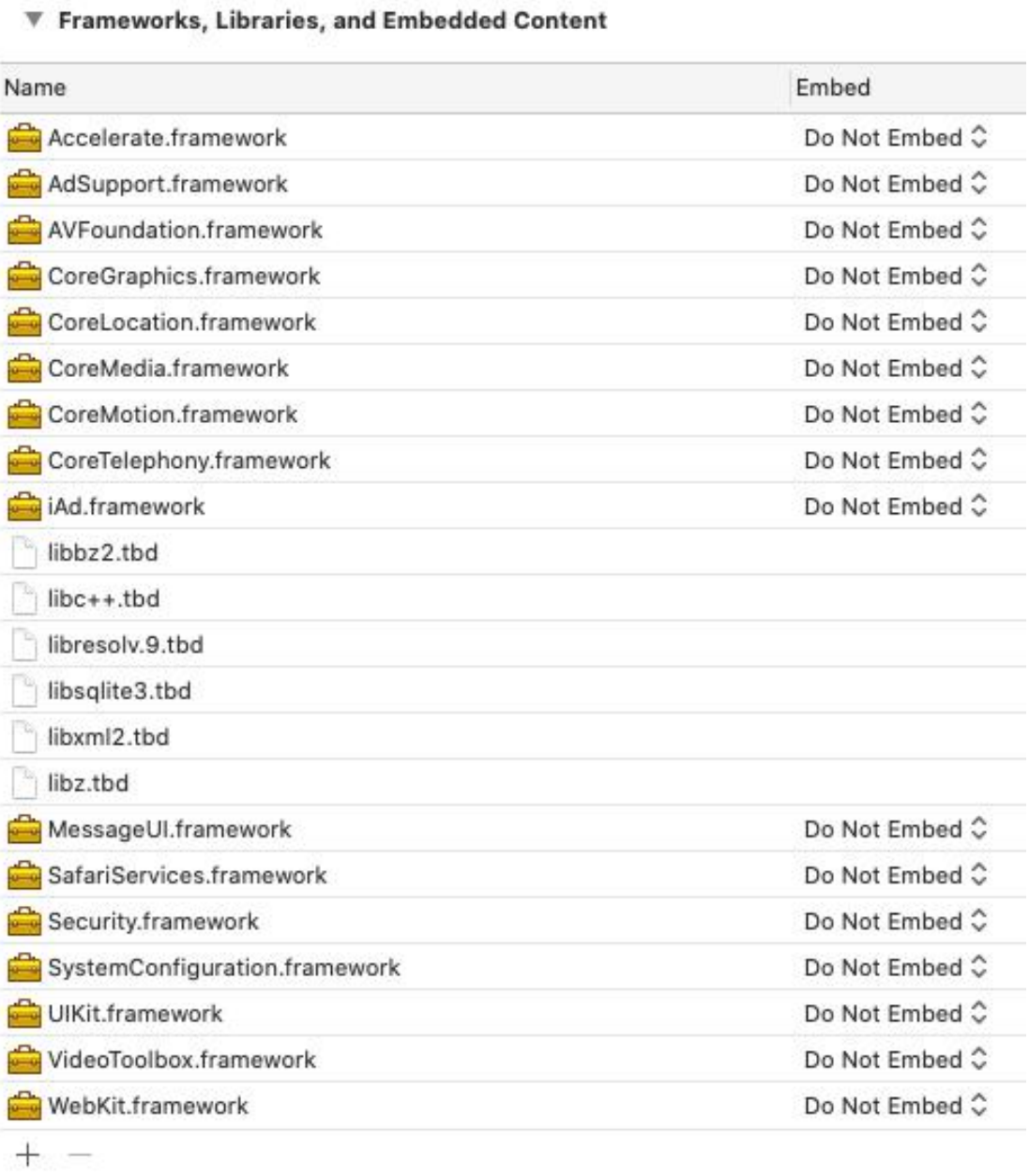
JCSDK.framework、JCiOSConfig.plist

Third-party advertising support library and related documents：

We only provide manual import for now, check out the ADThirdParty_SDK file and download.

Data platform library and related documents ： check out the DataCollection_SDK file download.

2.4、Required system support library：



AppTrackingTransparency.framework （iOS14 support）

2.5、JCiOSConfig.plist file description：

KEY	Value explain
appid	As with the appId required on the initialization Api,

	Select one to configure
channelid	As with the channelId required on the initialization Api, Select one to configure
splashAreaID	Splash ad position ID
bannerAreaID	banner ad position ID
interAreaID	intersitial ad position ID
rewardVideoAreaID	rewardVideo ad position ID
nativeAreaID	native ad position ID
ReYunAppID	reyun parameter appid (cannot be null)
ReYunChannelID	reyun parameter channelId (cannot be null)
UmengAppID	UMeng parameter appid (as a local cache parameter, can be empty but not recommended)
ShuShuAppID	ShuShu parameter appid (as a local cache parameter, can be empty but not recommended)
TalkingDataAppID	talkingDataSDK parameter appid (as a local cache parameter, can be empty but not recommended)

III 、unity access configuration and Api description：

3.1 JC_unityAdApi.h Interface Description：

```
V1.0.0
-(void)initJCSDKWithLog:(BOOL)isOpenLog
isFirstShowSplash:(BOOL)isShow
splashClose:(unityBlock)block;

V2.0.0 change init
-(void)initJCSDKWithUnityShow:(unityBlock)block;


/// Intersitial Ads isReady
bool isReadyIntersitial();

/// show Intersitial Ads
void showIntersitial();

/// rewardVideo Ads isReady
bool isReadyRewardVideo();

/// show rewardVideo Ads
void showRewardVideo();

/// isReady - banner
bool isReadyBanner();

/// show banner Ads
void showBannerView();
```

```
/// remove banner Ads
void removeBannerView();

/// Send Event UMeng、talkingData
/// @param event event
/// @param jsonEventInfo key-value converted json string, if there is no content to pass, you can set a null value
void sendEvent(char *event,char *jsonEventInfo);
```

3.2 JC_unityCallBackApi.h Interface Description：

```
/// Sign up for a callback monitor to be invoked before creating a bridge back to the advertiser.
void RegistCallBacknotifition();

/// splash callback bridge
/// @param failLoad
/// @param didShow
/// @param didClick
/// @param didClose
void splash_CallBack(ResultHandler failLoad,ResultHandler didShow, ResultHandler didClick, ResultHandler didClose);

///  intersitial callback bridge
/// @param failLoad
/// @param didShow
/// @param failToShow
/// @param didClose
```

```
/// @param didClick
/// @param failToPlayVideo
/// @param startPlayingVideo
/// @param endPlayingVideo
void Intersitial_CallBack(ResultHandler
failLoad,ResultHandler didShow, ResultHandler failToShow,
ResultHandler didClose,ResultHandler
didClick,ResultHandler failToPlayVideo, ResultHandler
startPlayingVideo, ResultHandler endPlayingVideo);

/// banner callback bridge
/// @param failLoad load
/// @param didShow
/// @param didClick
/// @param didAutoRefresh
/// @param tapCloseBtn
/// @param failToAutoRefresh
void banner_CallBack(ResultHandler failLoad,ResultHandler
didShow,ResultHandler didClick,ResultHandler
didAutoRefresh, ResultHandler tapCloseBtn, ResultHandler
failToAutoRefresh);

/// rewardVideo  callback bridge
/// @param failLoad
/// @param didRewardSuccess
/// @param didClose
/// @param didClick
/// @param failToPlayVideo
/// @param startPlayingVideo
/// @param endPlayingVideo
```

```
void rewardVideo_CallBack(ResultHandler
failLoad,ResultHandler didRewardSuccess, ResultHandler
didClose,ResultHandler didClick,ResultHandler
failToPlayVideo, ResultHandler startPlayingVideo,
ResultHandler endPlayingVideo);

/// native  callback bridge（Not in use yet）
/// @param failLoad
/// @param didShow
/// @param didClick
/// @param startPlayingVideo
/// @param endPlayingVideo
/// @param tapCloseBtn
/// @param enterFullScreenV
/// @param exitFullScreenV
void native_CallBack(ResultHandler failLoad,ResultHandler
didShow, ResultHandler didClick, ResultHandler
startPlayingVideo, ResultHandler
endPlayingVideo,ResultHandler tapCloseBtn,ResultHandler
enterFullScreenV,ResultHandler exitFullScreenV);
```

IV、Advertising interface API and callback usage

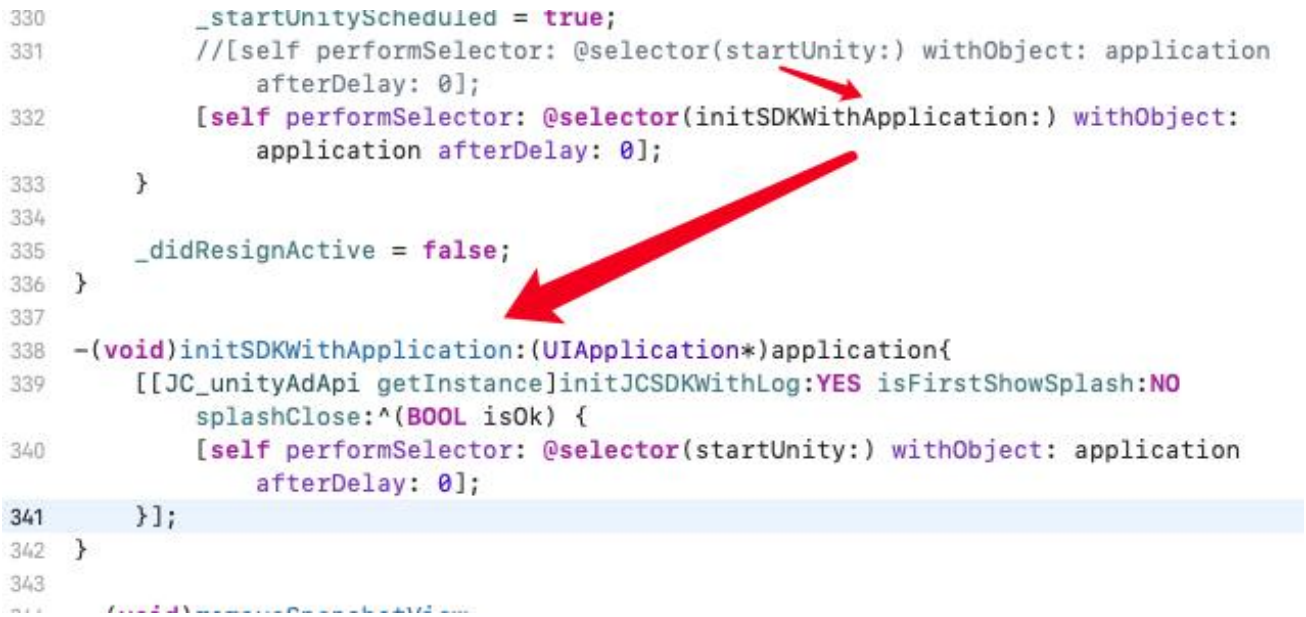
4.1、Initialization and splash ad api descriptions：

header file：

```
#import<JCSDK/JCSDK.h>
```

We internally demonstrate splash at program startup and when the program returns to the foreground.

4.1.1 、 If your app is a game app, please implement it in UnityAppController.mm. In order to display the splash ad in front of unity, you need to find the following code and replace it, either insert it by force using unity code, or convert it to xcode project and write it manually.



4.2、banner api description：

Showbanner Recommended Call Order： isReady （YES）- show ， When you use "removebanner", the ad caching logic is automatically called internally, so don't call the banner's other api (which has a data buffer) right after you use "removebanner"!

```
[DllImport("__Internal")]
static extern void showBannerView();

[DllImport("__Internal")]
static extern void removeBannerView();



  public static void ShowBanner()
    {
        showBannerView();
    }

    public static void removeBanner()
    {
        removeBannerView();
    }
```

4.3、intersitial api description：

It is advisable to determine whether IsInterReady has internal advertising space available, and then show the advertisement.

```
    [DllImport("__Internal")]
    static extern bool isReadyIntersitial();

    [DllImport("__Internal")]
    static extern void showIntersitial();
```

```
public static bool IsInterReady()
{
    var value = isReadyIntersitial();
    Debug.Log("-----> IsInterReady:" + value);
    return value;
}

public static void ShowInter()
{
    showIntersitial();
}
```

4.4、rewardVideo api description：

It is advisable to determine whether IsRewardVReady has internal advertising space available, and then show the advertisement.

```
[DllImport("__Internal")]
static extern bool isReadyRewardVideo();

[DllImport("__Internal")]
static extern void showRewardVideo();
public static bool IsRewardVReady()
{
    var value = isReadyRewardVideo();
    Debug.Log("-----> isReadyRewardV:" + value);
    return value;
}
```

```
public static void ShowRewardV()
{
    showRewardVideo();
}
```

4.5、Callback Example:

intersitial callback example：

```
[DllImport("__Internal")]
static extern void Intersitial_CallBack(IntPtr failLoad, IntPtr didShow, IntPtr failToShow, IntPtr didClose, IntPtr didClick, IntPtr failToPlayVideo, IntPtr startPlayingVideo, IntPtr endPlayingVideo);
```

```
//Register
var handler11 = new ResultHandler(interFailLoad);
var fp11 = Marshal.GetFunctionPointerForDelegate(handler11);
var handler12 = new ResultHandler(interDidShow);
var fp12 = Marshal.GetFunctionPointerForDelegate(handler12);
var handler13 = new ResultHandler(interFailtoShow);
var fp13 = Marshal.GetFunctionPointerForDelegate(handler13);
var handler14 = new ResultHandler(interDidClose);
var fp14 = Marshal.GetFunctionPointerForDelegate(handler14);
var handler15 = new ResultHandler(interDidClick);
var fp15 = Marshal.GetFunctionPointerForDelegate(handler15);
var handler16 = new ResultHandler(interFailToPlayVideo);
var fp16 = Marshal.GetFunctionPointerForDelegate(handler16);
var handler17 = new ResultHandler(interStartPlayingVideo);
```

```
        var fp17 = Marshal.GetFunctionPointerForDelegate(handler17);
        var handler18 = new ResultHandler(interEndPlayingVideo);
        var fp18 = Marshal.GetFunctionPointerForDelegate(handler18);
        Intersitial_CallBack(fp11, fp12, fp13, fp14, fp15, fp16, fp17, fp18);
```

```
    //
    [MonoPInvokeCallback(typeof(ResultHandler))]
    static void interEndPlayingVideo(string resultString)
    {
        Debug.Log("intersitial callback----->interEndPlayingVideo");
    }
    [MonoPInvokeCallback(typeof(ResultHandler))]
    static void interStartPlayingVideo(string resultString)
    {
        Debug.Log("intersitial callback----->interStartPlayingVideo");
    }
    [MonoPInvokeCallback(typeof(ResultHandler))]
    static void interFailToPlayVideo(string resultString)
    {
        Debug.Log("intersitial callback----->interFailToPlayVideo");
    }
    [MonoPInvokeCallback(typeof(ResultHandler))]
    static void interDidClick(string resultString)
    {
        Debug.Log("intersitial callback----->interDidClick");
    }
    [MonoPInvokeCallback(typeof(ResultHandler))]
    static void interDidClose(string resultString)
    {
```

```
        Debug.Log("intersitial callback----->interDidClose");
    }
    [MonoPInvokeCallback(typeof(ResultHandler))]
    static void interFailtoShow(string resultString)
    {
        Debug.Log("intersitial callback----->interFailtoShow");
    }

    [MonoPInvokeCallback(typeof(ResultHandler))]
    static void interDidShow(string resultString)
    {
        Debug.Log("intersitial callback----->interDidShow");
    }

    [MonoPInvokeCallback(typeof(ResultHandler))]
    static void interFailLoad(string resultString)
    {
        Debug.Log("intersitial callback----->interFailLoad");
    }
```

V、Related Error Reporting

5.1、Crash on startup

The application crashes at startup because you are missing certain configurations, we give a few examples here

Missing "-ObjC flag" configuration item for "Other Linker Flags" in "Build Settings".

Solutions: Add "-ObjC"

The program starts and crashes after introducing the "Admob" SDK.

Solution: Add the key Google needs to "info.plist".

```
<key>GADApplicationIdentifier</key>
<string>ca-app-pub-9488501426181082/7319780494</string>
<key>GADIsAdManagerApp</key> <true/>
```

Introduction of "快手/KS" SDK compilation crash

Solution: Modify "Embed" in "KSAdSDK.framework" to "Embed&Sign".

Crashes while displaying a wide-spread incentive video or interstitial ad -[AppDelegate window]

Solution: Add "window" attribute to "AppDelegate.h".

4.2 AppPacket failure/packet submission failure

KSadSDK contains x86 binaries, the Apple Store does not support emulator resources.

solutions:

Build Phase -> New Run Scrip Phase

After adding "new Run Script Phase", "Run Script" will appear, then add a

script code as follows

```
APP_PATH="${TARGET_BUILD_DIR}/${WRAPPER_NAME}"



# This script loops through the frameworks embedded in the application and

# removes unused architectures.

find "$APP_PATH" –name '*.framework' –type d | while read –r FRAMEWORK

do

    FRAMEWORK_EXECUTABLE_NAME=$(defaults read "$FRAMEWORK/Info.plist" CFBundleExecutable)


FRAMEWORK_EXECUTABLE_PATH="$FRAMEWORK/$FRAMEWORK_EXECUTABLE_NAME"

    echo "Executable is $FRAMEWORK_EXECUTABLE_PATH"



    EXTRACTED_ARCHS=()
```

```
    for ARCH in $ARCHS
    do
        echo "Extracting $ARCH from $FRAMEWORK_EXECUTABLE_NAME"
        lipo -extract "$ARCH" "$FRAMEWORK_EXECUTABLE_PATH" -o "$FRAMEWORK_EXECUTABLE_PATH-$ARCH"

EXTRACTED_ARCHS+=("$FRAMEWORK_EXECUTABLE_PATH-$ARCH")
    done

    echo "Merging extracted architectures: ${ARCHS}"
    lipo -o "$FRAMEWORK_EXECUTABLE_PATH-merged" -create "${EXTRACTED_ARCHS[@]}"
    rm "${EXTRACTED_ARCHS[@]}"
```

```
    echo "Replacing original executable with thinned
version"
    rm "$FRAMEWORK_EXECUTABLE_PATH"
    mv "$FRAMEWORK_EXECUTABLE_PATH-merged"
"$FRAMEWORK_EXECUTABLE_PATH"

done
```

After adding the script block, check the "Run script only when installing" box and repackage it for submission.

VI、iOS14 support

Please refer to the JCSDK_iOS14 support documentation for details.