VRE::VRE_Window

- int mWidth
- int mHeight bool mFrameBufferResized
- const std::string mWindowName
- GLFWwindow * mWindow
- + VRE_Window(int width,
- int height, std::string name) + ~VRE_Window()
- + VRE_Window(const VRE
- _Window &)=delete + VRE_Window & operator
 - =(const VRE_Window &) =delete
 - + bool ShouldClose() + void CreateWindowSurface (VkInstance instance, VkSurface
 - KHR *surface) + VkExtent2D GetExtent()
 - + bool HasWindowResized()
 - + void ResetWindowResizedFlag()
 - + GLFWwindow * GetGLFWwindow () const
 - void Init() static void FrameBufferResized
 - Callback(GLFWwindow *window, int width, int height)
 - -mWindow

VRE::VRE Device + const bool mEnableValidation

VkPhysicalDeviceProperties

mProperties VkInstance mInstance VkDebugUtilsMessengerEXT

Layers

Device

Layers

- mDebugMessenger VkPhysicalDevice mPhysical
- VkDevice mVkDevice VkSurfaceKHR mVkSurface

VkCommandPool mCommandPool

- VkQueue mGraphicsQueue VkQueue mPresentQueue
- const std::vector const char * > mValidation
- const std::vector const char * > mDeviceExtensions

+ VRE Device(VRE Window

+ VRE_Device(const VRE

- &window) + ~VRE_Device()
- Device &)=delete + VRE_Device & operator
- =(const VRE_Device &) =delete
- + VRE_Device(VRE_Device
- =(VRE_Device &&)=delete + VkCommandPool GetCommand Pool()

+ VkDevice GetVkDevice()

+ VRE_Device & operator

&&)=delete

Device() + VkSurfaceKHR Surface()

and 12 more...

+ VkPhysicalDevice GetPhysical

- void CreateInstance() void SetupDebugMessenger()
- void CreateSurface() void PickPhysicalDevice()

 void CreateLogicalDevice() void CreateCommandPool()

- bool IsDeviceSuitable (VkPhysicalDevice device)
- char * > GetRequiredExtensions() bool CheckValidationLayer Support()

FindQueueFamilies(VkPhysical

std::vector< const

QueueFamilyIndices

Device device) void PopulateDebugMessenger CreateInfo(VkDebugUtilsMessenger

CreateInfoEXT &createInfo) void HasGflwRequiredInstance

bool CheckDeviceExtension Support(VkPhysicalDevice device)

SwapChainSupportDetails QuerySwapChainSupport (VkPhysicalDevice device)

Extensions()

-mDevice

VRE::VRE_Pipeline VkPipeline mGraphicsPipeline VkShaderModule mVertShader

VkShaderModule mFragShader

Info &configInfo, const std ::string &vertShaderPath, const std::string &fragShaderPath)

+ ~VRE_Pipeline() + VRE_Pipeline(const

+ VRE_Pipeline(VRE_Device &device, const PipelineConfig

Module

+ VRE_Pipeline & operator =(const VRE_Pipeline &) =delete

VRE_Pipeline &)=delete

commandBuffer) + static void GetDefaultPipeline ConfigInfo(PipelineConfigInfo &configInfo)

void CreateGraphicsPipeline

IIIY

+ void Bind(VkCommandBuffer

- &configInfo, const std::string &vertShaderPath, const std::string &fragShaderPath) void CreateShaderModule
- (const std::vector< char > &shaderCode, VkShaderModule *shaderModule)
 - static std::vector < char > ReadFile(const std::string &filePath)