

LAMPIRAN

I. Script C#

a. gameController

```
using System.Collections;
using UnityEngine;
using UnityEngine.UI;
using UnityEngine.SceneManagement;

namespace VRproject
{
    public class gameController : MonoBehaviour
    {
        public static gameController instance;

        public GameObject mainMenuScreen;

        public GameObject startMenu;
        public GameObject levelMenu;
        public GameObject titleText;
        public GameObject optionMenu;
        public GameObject creditsMenu;
        public GameObject scoreMenu;
        public GameObject tutorialMenu;

        public Text[] nameText;
        public Text[] scoreText;
        public Text[] dateText;

        public int score = 0;

        public AudioSource bgmSource;
        public AudioSource sfxSource;
        public AudioClip[] bgm;
        public AudioClip[] sfx;
        public Slider bgmVolume;
        public Slider sfxVolume;

        public Toggle timeToggle;

        [SerializeField] private Text scoreNameText = null;
        [SerializeField] private Text scoreNumberText = null;

        public bool isEasy;
        public bool isMedium;
        public bool isHard;
        public Text lvlText;

        public Dropdown scoreDropdown;

        void Awake()
        {
            if (instance == null)
            {
                instance = this;
            }
        }
    }
}
```

```
void Start()
{
    showMainMenu();
    bgmSource = GetComponent<AudioSource>();
    sfxSource = GetComponent<AudioSource>();

    if (!bgmSource.playOnAwake)
    {
        StartCoroutine(playMainBGM());
    }
}

public bool IsEasy()
{
    return isEasy = true;
}

public bool IsMedium()
{
    return isMedium = true;
}

public bool IsHard()
{
    return isHard = true;
}

public void scoreInitialization(ScoreEntryData entryData)
{
    scoreNameText.text = entryData.name;
    scoreNumberText.text = entryData.score.ToString();
}

private void playBGM(int sound)
{
    bgmSource.clip = bgm[sound];
    bgmSource.Play();
}

private void playSFX(int sound)
{
    sfxSource.clip = sfx[sound];
    sfxSource.Play();
}

public void regSliderBGM()
{
    bgmVolume.onValueChanged.AddListener(delegate {
changeBGMVolume(bgmVolume.value); });
}

public void regSliderSFX()
{
    sfxVolume.onValueChanged.AddListener(delegate {
changeSFXVolume(sfxVolume.value); });
}

public void changeBGMVolume(float sliderValue)
{
    bgmSource.volume = sliderValue;
}

public void changeSFXVolume(float sliderValue)
{
    sfxSource.volume = sliderValue;
}
```

```
private IEnumerator playMainBGM()
{
    yield return new WaitForSeconds(0f);
    playBGM(0);
}

public void showMainMenu()
{
    mainMenuScreen.SetActive(true);
    titleText.SetActive(true);
    startMenu.SetActive(true);
    levelMenu.SetActive(false);
    optionMenu.SetActive(false);
    creditsMenu.SetActive(false);
    scoreMenu.SetActive(false);
    tutorialMenu.SetActive(false);

    isEasy = false;
    isMedium = false;
    isHard = false;
}

public void showLevelMenu()
{
    mainMenuScreen.SetActive(true);
    titleText.SetActive(true);
    levelMenu.SetActive(true);
    startMenu.SetActive(false);
    optionMenu.SetActive(false);
    creditsMenu.SetActive(false);
    scoreMenu.SetActive(false);
    tutorialMenu.SetActive(false);
}

public void showOptionsMenu()
{
    titleText.SetActive(false);
    startMenu.SetActive(false);
    levelMenu.SetActive(false);
    optionMenu.SetActive(true);
    creditsMenu.SetActive(false);
    scoreMenu.SetActive(false);
    tutorialMenu.SetActive(false);
}

public void showCreditMenu()
{
    titleText.SetActive(false);
    startMenu.SetActive(false);
    levelMenu.SetActive(false);
    optionMenu.SetActive(false);
    creditsMenu.SetActive(true);
    scoreMenu.SetActive(false);
    tutorialMenu.SetActive(false);
}

public void showTutorialMenu()
{
    titleText.SetActive(false);
    startMenu.SetActive(false);
    levelMenu.SetActive(false);
    optionMenu.SetActive(false);
    creditsMenu.SetActive(false);
    scoreMenu.SetActive(false);
    tutorialMenu.SetActive(true);
}
```

```

public void showScoreMenu()
{
    titleText.SetActive(false);
    startMenu.SetActive(false);
    levelMenu.SetActive(false);
    optionMenu.SetActive(false);
    creditsMenu.SetActive(false);
    scoreMenu.SetActive(true);
    tutorialMenu.SetActive(false);

    scoreEntry(scoreDropdown);
}

public void clickEasyBtn()
{
    IsEasy();
    gameStart();
}

public void clickMediumBtn()
{
    IsMedium();
    gameStart();
}

public void clickHardBtn()
{
    IsHard();
    gameStart();
}

public void gameStart()
{
    SceneManager.LoadScene("SampleScene");
}

public void dropdownChange()
{
    scoreDropdown.onValueChanged.AddListener(delegate
    {
        scoreEntry(scoreDropdown);
    });
}

public void scoreEntry(Dropdown dropdown)
{
    if (dropdown.value == 0)
    {
        for (int i = 0; i < ScoreBoard.EntryCount; i++)
            ScoreBoard.GetEntry(i);

        for (int i = 0; i < nameText.Length; i++)
        {
            ScoreBoard.ScoreEntry entry = ScoreBoard.GetEntry(i);
            nameText[i].text = entry.name;
            dateText[i].text = entry.date;
            scoreText[i].text = entry.score.ToString();
        }
    } else if (dropdown.value == 1)
    {
        for (int i = 0; i < ScoreBoardMedium.EntryCount; i++)
            ScoreBoardMedium.GetEntry(i);
    }
}

```

```
        for (int i = 0; i < nameText.Length; i++)
    {
        ScoreBoardMedium.ScoreEntry entryMedium =
ScoreBoardMedium.GetEntry(i);
        nameText[i].text = entryMedium.name;
        dateText[i].text = entryMedium.date;
        scoreText[i].text = entryMedium.score.ToString();
    }
} else if (dropdown.value == 2)
{
    for (int i = 0; i < ScoreBoardHard.EntryCount; i++)
        ScoreBoardHard.GetEntry(i);

    for (int i = 0; i < nameText.Length; i++)
    {
        ScoreBoardHard.ScoreEntry entryHard =
ScoreBoardHard.GetEntry(i);
        nameText[i].text = entryHard.name;
        dateText[i].text = entryHard.date;
        scoreText[i].text = entryHard.score.ToString();
    }
}

public void hideMainMenu()
{
    mainMenuScreen.SetActive(false);
}

public void quitGame()
{
    Application.Quit();
}
}
```

b. inGameMune

```
using System.Collections;
using UnityEngine;
using UnityEngine.UI;
using UnityEngine.SceneManagement;

namespace VRproject
{
    public class inGameMune : MonoBehaviour
    {

        public GameObject endGameScreen;

        public static inGameMune main;

        public Text historyText1;
        public Text historyText2;
        public Text historyText3;
        public Text historyText3Sub;
        public Text historyText3Sub2;
        public GameObject inputScreen;
        public InputField input;
        public static string inputText;
        public GameObject gameOver;
        public Text scoreText;
        public GameObject UIHelper;
        private TouchScreenKeyboard keyboard;

        void Start()
        {
            showGameOver();
            historyText1.CrossFadeAlpha(1.0f, 0.0f, false);
            historyText2.CrossFadeAlpha(0.0f, 0.0f, false);
            historyText3.CrossFadeAlpha(0.0f, 0.0f, false);
            historyText3Sub.CrossFadeAlpha(0.0f, 0.0f, false);
            historyText3Sub2.CrossFadeAlpha(0.0f, 0.0f, false);
        }

        void Update()
        {
            scoreText.text = gameController.instance.score.ToString();
        }

        public void showGameOver()
        {
            endGameScreen.SetActive(true);
            inputScreen.SetActive(false);
            gameOver.SetActive(false);
            UIHelper.SetActive(false);

            StartCoroutine(fadeHistory());
        }
    }
}
```

```

IEnumerator fadeHistory()
{
    historyText1.CrossFadeAlpha(1.0f, 0.5f, false);
    Debug.Log("HT1 running");

    yield return new WaitForSeconds(10);

    historyText1.CrossFadeAlpha(0.0f, 0.5f, false);
    Debug.Log("HT1 withdrawing");

    yield return new WaitForSeconds(1);

    historyText2.CrossFadeAlpha(1.0f, 0.5f, false);
    yield return new WaitForSeconds(10);

    historyText2.CrossFadeAlpha(0.0f, 0.5f, false);
    yield return new WaitForSeconds(1);

    historyText3.CrossFadeAlpha(1.0f, 0.5f, false);
    yield return new WaitForSeconds(5);

    historyText3Sub.CrossFadeAlpha(1.0f, 0.5f, false);
    yield return new WaitForSeconds(2);

    historyText3Sub2.CrossFadeAlpha(1.0f, 0.5f, false);
    yield return new WaitForSeconds(10);

    historyText3.CrossFadeAlpha(0.0f, 0.5f, false);
    historyText3Sub.CrossFadeAlpha(0.0f, 0.5f, false);
    historyText3Sub2.CrossFadeAlpha(0.0f, 0.5f, false);

    yield return new WaitForSeconds(1);

    UIHelper.SetActive(true);
    inputScreen.SetActive(true);
    keyboard = TouchScreenKeyboard.Open("", 
    TouchScreenKeyboardType.Default);
    gameOver.SetActive(false);
}

public void GOscreen()
{
    inputText = input.text;

    inputScreen.SetActive(false);
    keyboard.active = false;
    gameOver.SetActive(true);
}

public void Restart()
{
    SceneManager.LoadScene("SampleScene");
}

public void toMainMenu()
{
    SceneManager.LoadScene("MainMenu");
}
}
}

```



KEMENTERIAN PENDIDIKAN, KEBUDAYAAN

RISET DAN TEKNOLOGI

POLITEKNIK NEGERI MALANG

JURUSAN TEKNOLOGI INFORMASI

PROGRAM STUDI TEKNIK INFORMATIKA

JL. Soekarno Hatta PO Box 04 Malang Telp. (0341) 404424 pes. 1122



No. Skripsi : 561

FORM VERIFIKASI

ABSTRAK BAHASA INGGRIS DAN TATA TULIS BUKU LAPORAN SKRIPSI

Nama Mahasiswa : Ika Puspa Fairuz Wiwanata **NIM** : 1741720018

Tanggal Ujian : 10 Juni 2021

Judul : Rancang Bangun Game Obscure History Menggunakan Media Virtual Reality

NO	BAGIAN YANG DIVERIFIKASI	NAMA VERIFIKATOR	TANGGAL VERIFIKASI	TTD
1	Abstrak Berbahasa Inggris	Atiqah Nurul Asri, S.Pd., M.Pd.	26 Agustus 2021	
2	Tata Tulis Buku Laporan Skripsi	Hendra Pradibta, SE., M.Sc	1 September 2021	