GameManagerScript.cs

using System.Collections;

using System.Collections.Generic;

using UnityEngine;

public class GameManagerScript : MonoBehaviour

{

    // Inspector settings (populated by dragging from the hierarchy)

    public GameObject camera, mars;

    public GameObject phobos, deimos;

    public GameObject asteroidObject;

    // Use this for initialization

    void Start()

    {

        camera.transform.position = new Vector3(0f, 0f, -200f);

        camera.transform.LookAt(mars.transform);

        mars.GetComponent<Rigidbody>().AddTorque(new Vector3(0f, 20f, 0f));

    }

    // Update is called once per frame

    void Update()

    {

        //mars.GetComponent<Rigidbody>().AddTorque(new Vector3(0f, 20f, 0f));

        //make mars move on its y axis

        mars.transform.RotateAround(Vector3.zero, Vector3.up, 10f \* Time.deltaTime);

        phobos.transform.RotateAround(Vector3.zero, Vector3.up, 3f \* Time.deltaTime);

        deimos.transform.RotateAround(Vector3.zero, Vector3.up, 2f \* Time.deltaTime);

        // NB we are using the camera's own coordinate system (rather than the global coordinate system) to specify the axis of rotation

        if (Input.GetKey(KeyCode.LeftArrow))

            camera.transform.RotateAround(Vector3.zero, camera.transform.up, 50f \* Time.deltaTime);

        else if (Input.GetKey(KeyCode.RightArrow))

            camera.transform.RotateAround(Vector3.zero, camera.transform.up, -50f \* Time.deltaTime);

        if (Input.GetKey(KeyCode.UpArrow))

            camera.transform.RotateAround(Vector3.zero, camera.transform.right, 50f \* Time.deltaTime);

        else if (Input.GetKey(KeyCode.DownArrow))

            camera.transform.RotateAround(Vector3.zero, camera.transform.right, -50f \* Time.deltaTime);

        if (Random.Range(0, 150) < 1)

        {

            GameObject asteroid = GameObject.Instantiate(asteroidObject);

            //scale the asteroids to 0.1

            asteroid.transform.localScale = new Vector3(0.1f, 0.1f, 0.1f);

            //asteroid.transform.position = new Vector3(Random.Range(-100, 100), Random.Range(-100, 100), Random.Range(-100, 100));

            asteroid.transform.position = new Vector3(Random.Range(-100, 100), Random.Range(-100, 100), Random.Range(-100, 100));

        }

    }

}

AsteroidScript.cs

using System.Collections;

using System.Collections.Generic;

using UnityEngine;

public class AsteroidScript : MonoBehaviour

{

    // Start is called before the first frame update

    void Start()

    {

        //initialise the asteroids starting position to somewhere

        //to the left of mars

        this.transform.position = new Vector3(-100, 0, 0);

        //Set the asteroid moving (using physics) using GetComponent<RigidBody>().AddForce()

        this.GetComponent<Rigidbody>().AddForce(new Vector3(200, 0, 0));

        //Set the asteroid rotating (using physics)

        this.GetComponent<Rigidbody>().AddTorque(new Vector3(0, 100, 0));

    }

    // Update is called once per frame

    void Update()

    {

        if (this.transform.position.x > 300)

        {

            GameObject.Destroy(this.gameObject);

        }

    }

    void OnCollisionEnter() {

        GameObject.Destroy(this.gameObject);

    }

}