using System;

using System.Collections.Generic;

using System.Linq;

using System.Text;

using System.Threading.Tasks;

namespace ConsoleApp2

{

interface IAdapter

{

void Add();

void Update();

string Get(int id);

}

class SqlAdapter : IAdapter

{

private SqlDb \_db;

public SqlAdapter(SqlDb db)

{

\_db = db;

}

public void Add()

{

\_db.Add();

}

public string Get(int id)

{

return \_db.Get(id);

}

public void Update()

{

\_db.Update();

}

}

class MangoAdapter : IAdapter

{

private MangoDb \_db;

public MangoAdapter(MangoDb db)

{

\_db = db;

}

public void Add()

{

\_db.Insert();

}

public string Get(int id)

{

return \_db.GetData(id);

}

public void Update()

{

\_db.Modify();

}

}

class SqlDb

{

public void Add()

{

Console.WriteLine("Add Data To Sql");

}

public void Update()

{

Console.WriteLine("Update in Sql");

}

public string Get(int id)

{

return "Data from Sql Db";

}

}

class MangoDb

{

public void Insert()

{

Console.WriteLine("Data Inserted to MangoDb");

}

public void Modify()

{

Console.WriteLine("Data Modified in MangoDb");

}

public string GetData(int id)

{

return "Data from Mango Db";

}

}

class Converter

{

private readonly IAdapter \_adapter;

public Converter(IAdapter adapter)

{

\_adapter = adapter;

}

public void Add()

{

\_adapter.Add();

}

public void Update()

{

\_adapter.Update();

}

public string Get(int id)

{

return \_adapter.Get(id);

}

}

class Application

{

private readonly Converter \_converter;

public Application(IAdapter adapter)

{

\_converter=new Converter(adapter);

}

public void Start()

{

\_converter.Add();

\_converter.Update();

Console.WriteLine(\_converter.Get(10));

}

}

class Program

{

static void Main(string[] args)

{

while (true)

{

Console.WriteLine("For Mango Db [1] ");

Console.WriteLine("For Sql Db [2]");

int select=int.Parse(Console.ReadLine());

IAdapter adapter;

if (select == 1)

{

MangoDb mangoDb = new MangoDb();

adapter = new MangoAdapter(mangoDb);

}

else

{

SqlDb sqlDb=new SqlDb();

adapter=new SqlAdapter(sqlDb);

}

Application app=new Application(adapter);

app.Start();

}

}

}

}