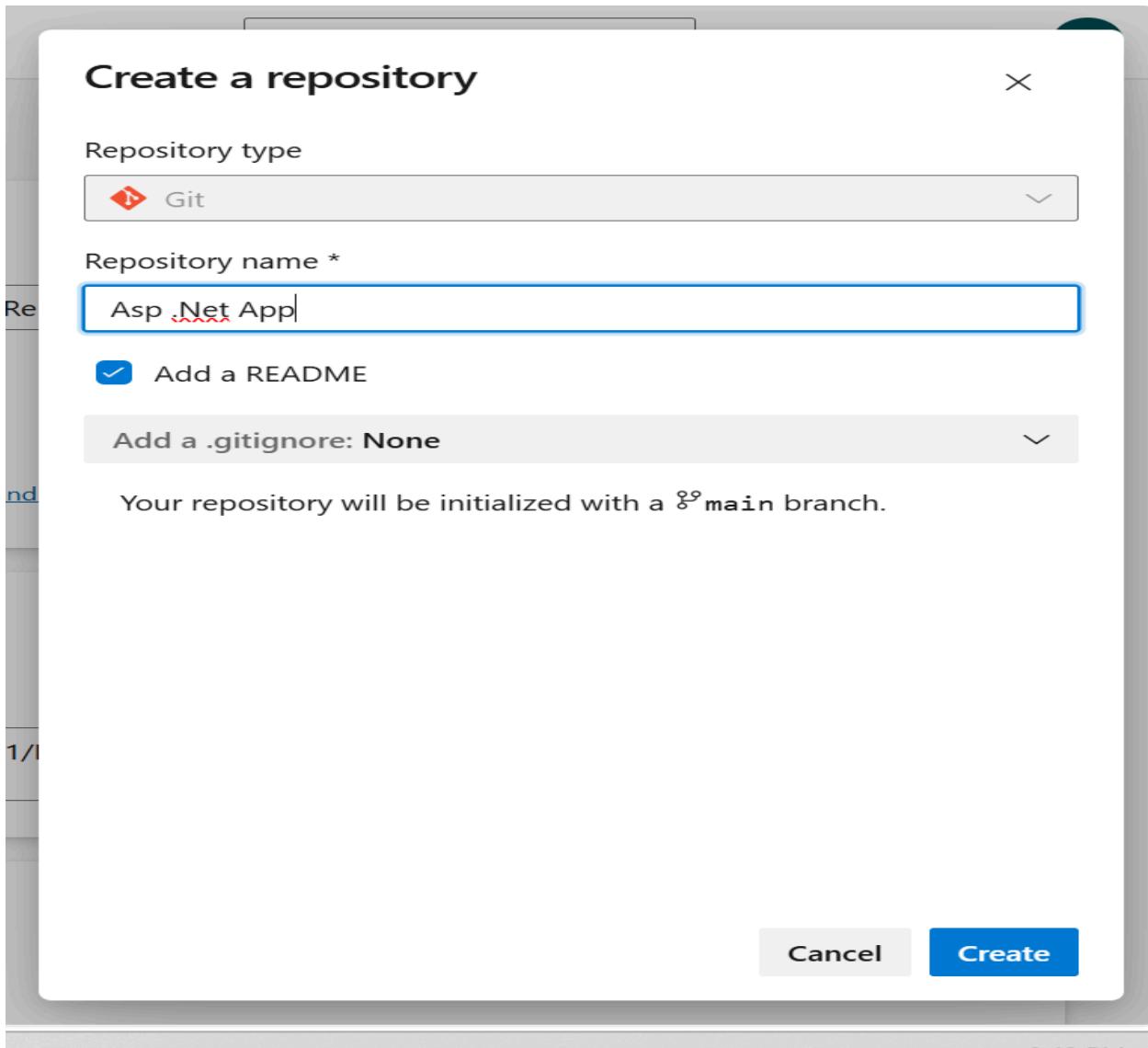


## Asp Net App Pipeline on AzureDevops:

Create repository on AzureDevops



Click on the Clone button to add this repo on local machine

The screenshot shows the repository details for 'Asp .Net App'. The 'Files' tab is selected, showing a single file 'README.md'. The 'Clone' button in the top right corner is highlighted with a red box. The URL for cloning is 'https://dev.azure.com/haideralibjs1/\_git/Asp-.Net-App'.

```
User@LAPTOP-NS5GPVIA MINGW64 ~/Downloads
$ git clone https://haideralibjs1@dev.azure.com/haideralibjs1/Repo/_git/Asp%20.Net%20App
Cloning into 'Asp%20.Net%20App'...
remote: Azure Repos
remote: Found 3 objects to send. (14 ms)
Unpacking objects: 100% (3/3), 740 bytes | 35.00 KiB/s, done.
```

## Create Dockerfile for Asp .Net Core App

The screenshot shows the Visual Studio Code interface with the following details:

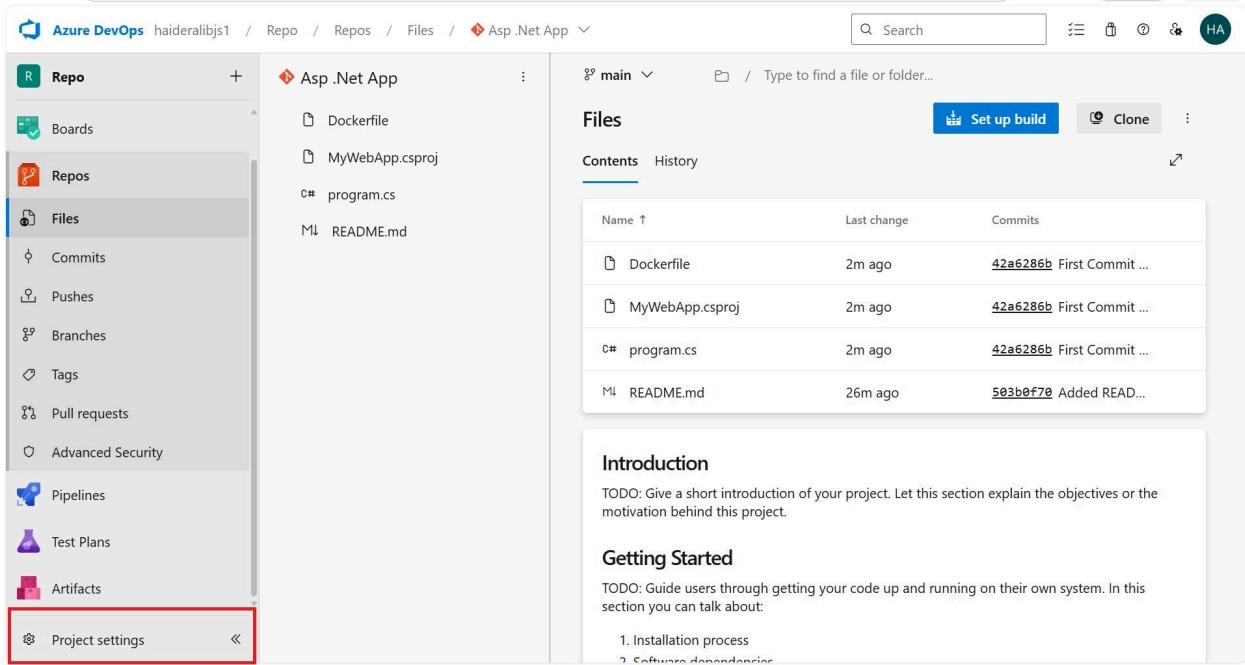
- File Explorer:** Shows a project named "ASP%20.NET%20APP" containing "Dockerfile", "MyWebApp.csproj", "program.cs", and "README.md".
- Dockerfile Content:**

```
1 # Stage 1: Build the application
2 FROM mcr.microsoft.com/dotnet/sdk:8.0 AS build
3 WORKDIR /src
4
5 # Copy project files and restore dependencies
6 COPY ["MyWebApp.csproj", "./"]
7 RUN dotnet restore "MyWebApp.csproj"
8
9 # Copy source code and build
10 COPY .
11 RUN dotnet build "MyWebApp.csproj" -c Release -o /app/build
12
13 # Stage 2: Publish the application
14 FROM build AS publish
15 RUN dotnet publish "MyWebApp.csproj" -c Release -o /app/publish /p:UseAppHost=false
16
17 # Stage 3: Create runtime image
18 FROM mcr.microsoft.com/dotnet/aspnet:8.0 AS runtime
19 WORKDIR /app
20 COPY --from=publish /app/publish .
21
22 ENV ASPNETCORE_URLS=http://+:80
23 EXPOSE 80
24 ENTRYPOINT ["dotnet", "MyWebApp.dll"]
25
```
- Welcome to Copilot Panel:** Displays "Welcome to Copilot", "Let's get started", and buttons for "Add context (#, ext)", "Build Workspace", and "Show Config". It also includes a note: "Review AI output carefully before use."
- Bottom Status Bar:** Shows "Line 1 Col 1 Spaces: 4 UFT-8 LF - / Docker".

## Push Code to Azure Devops

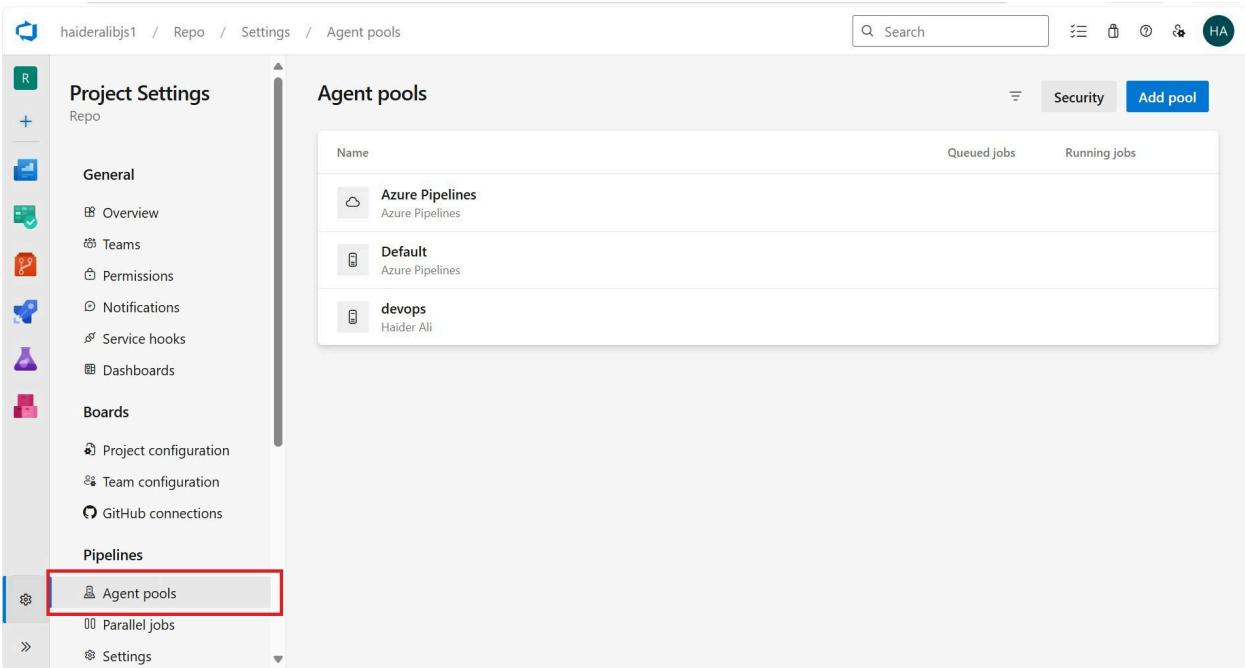
```
User@LAPTOP-NS5GPVIA MINGW64 ~/Downloads/Asp%20.Net%20App (main)
$ git add .
warning: in the working copy of 'Dockerfile', LF will be replaced by CRLF the next time Git touches it
warning: in the working copy of 'MyWebApp.csproj', LF will be replaced by CRLF the next time Git touches it
warning: in the working copy of 'program.cs', LF will be replaced by CRLF the next time Git touches it
User@LAPTOP-NS5GPVIA MINGW64 ~/Downloads/Asp%20.Net%20App (main)
$ git commit -m "First Commit"
[main 42a6286] First Commit
 3 files changed, 39 insertions(+)
 create mode 100644 Dockerfile
 create mode 100644 MyWebApp.csproj
 create mode 100644 program.cs
User@LAPTOP-NS5GPVIA MINGW64 ~/Downloads/Asp%20.Net%20App (main)
$ git branch
* main
User@LAPTOP-NS5GPVIA MINGW64 ~/Downloads/Asp%20.Net%20App (main)
$ git push
Enumerating objects: 6, done.
Counting objects: 100% (6/6), done.
Delta compression using up to 12 threads
Compressing objects: 100% (5/5), done.
Writing objects: 100% (5/5), 969 bytes | 323.00 KiB/s, done.
Total 5 (delta 0), reused 0 (delta 0), pack-reused 0 (from 0)
remote: Analyzing objects... (5/5) (4 ms)
remote: Validating commits... (1/1) done (0 ms)
remote: Storing packfile... done (88 ms)
remote: Storing index... done (33 ms)
remote: Updating refs... done (96 ms)
To https://dev.azure.com/haideralibjs1/Repo/_git/Asp%20.Net%20App
 503b0f7..42a6286  main -> main
User@LAPTOP-NS5GPVIA MINGW64 ~/Downloads/Asp%20.Net%20App (main)
$
```

## Add Agent: Click on Project Settings



Azure DevOps interface showing the 'Repo' section for a project named 'Asp .Net App'. The left sidebar has a red box around the 'Project settings' link under the 'Pipelines' category. The main area shows the repository structure with files like Dockerfile, MyWebApp.csproj, program.cs, and README.md. A 'Files' tab is selected, showing a table of contents with columns for Name, Last change, and Commits.

## Add New Agent pools:



Azure DevOps interface showing the 'Project Settings' section for a repository. The left sidebar has a red box around the 'Agent pools' link under the 'Pipelines' category. The main area shows the 'Agent pools' list, which includes 'Azure Pipelines' (Azure Pipelines), 'Default' (Azure Pipelines), and 'devops' (Haider Ali). There are tabs for 'Security' and 'Add pool' at the top right of the list.

Project Settings

Repo

General

- Overview
- Teams
- Permissions
- Notifications
- Service hooks

Agent pools

Name	Queued jobs	Running jobs
Azure Pipelines Azure Pipelines		
Default Azure Pipelines		
devops Haider Ali		

Add pool

Add New Agent:

## Add agent pool

Agent pools are shared across an organization.

Reduce the effort spent in maintaining custom agents by creating a Microsoft managed pool of scalable agents. [Learn more](#).

Self-hosted

Create a pool of custom agents hosted on your own infrastructure for maximum control and flexibility. [Learn more](#).

Azure virtual machine scale set

Create a pool of custom agents based on an Azure Virtual machine scale set hosted in your own Azure subscription. [View configuration instructions](#).

Name:

Description (optional):

① Markdown supported.

Pipeline permissions:

Grant access permission to all pipelines

Create

Click on Agent pools:

The screenshot shows the 'Agent pools' section of the Azure Project Settings. On the left, there's a sidebar with 'Project Settings' and 'Repo' sections, and a 'General' category with options like Overview, Teams, Permissions, Notifications, Service hooks, and Dashboards. The main area is titled 'Agent pools' with tabs for Security and Add pool. It lists four agent pools: 'Azure Pipelines' (Queued jobs: 0, Running jobs: 0), 'Default' (Queued jobs: 0, Running jobs: 0), 'devops' (Queued jobs: 0, Running jobs: 0), and 'devops1' (Queued jobs: 0, Running jobs: 0). The 'devops1' row is highlighted with a red box.

The screenshot shows the details page for the 'devops1' agent pool. The top navigation bar includes 'Project Settings', 'Repo', and 'General'. Below it, the title is 'devops1' with tabs for Jobs, Agents (which is selected), Details, Security, Approvals and checks, and Analytics. There are buttons for 'Update all agents' and 'New agent'. The 'Agents' tab shows a single agent entry: 'devops1' (Haider Ali).

Download Agent:

The screenshot shows the 'System prerequisites' page for downloading the agent. It has tabs for x64 and x86. The x64 tab is selected. It features a 'Configure your account' section with a link to follow steps outlined [here](#), and a 'Download the agent' section with a 'Download' button and a file icon. A red box highlights the 'Download' button. Below this is a 'Create the agent' section.

Extract this folder and open in cmd

The screenshot shows a Windows File Explorer window displaying the contents of the 'vsts-agent-win-x64-4.261.0' folder. The folder structure includes 'externals' and 'bin' subfolders, and command-line scripts like 'config.cmd', 'reauth.cmd', and 'run.cmd'. The 'bin' folder was highlighted with a red box in the previous step.

Azure DevOps haideralibjs1 / Repo / Repos / Files / Asp .Net App

Repo Overview Boards Repos Files Commits Pushes Branches Tags Pull requests Advanced Security Pipelines Test Plans

Asp .Net App

Dockerfile MyWebApp.csproj program.cs README.md

main / Type to find a file or folder...

Files

Contents History

Name ↑ Last change

Dockerfile	25m ago
MyWebApp.csproj	25m ago
program.cs	25m ago
README.md	49m ago

Preview features Profile Time and Locale Permissions Notifications Theme Usage Personal access tokens SSH public keys Added README.md...

Create New Token:

### Create a new personal access token

Name  Asp Net App

Organization

Expiration (UTC)  10/31/2026

Scopes  Full access  Custom defined

**Create** **Cancel**

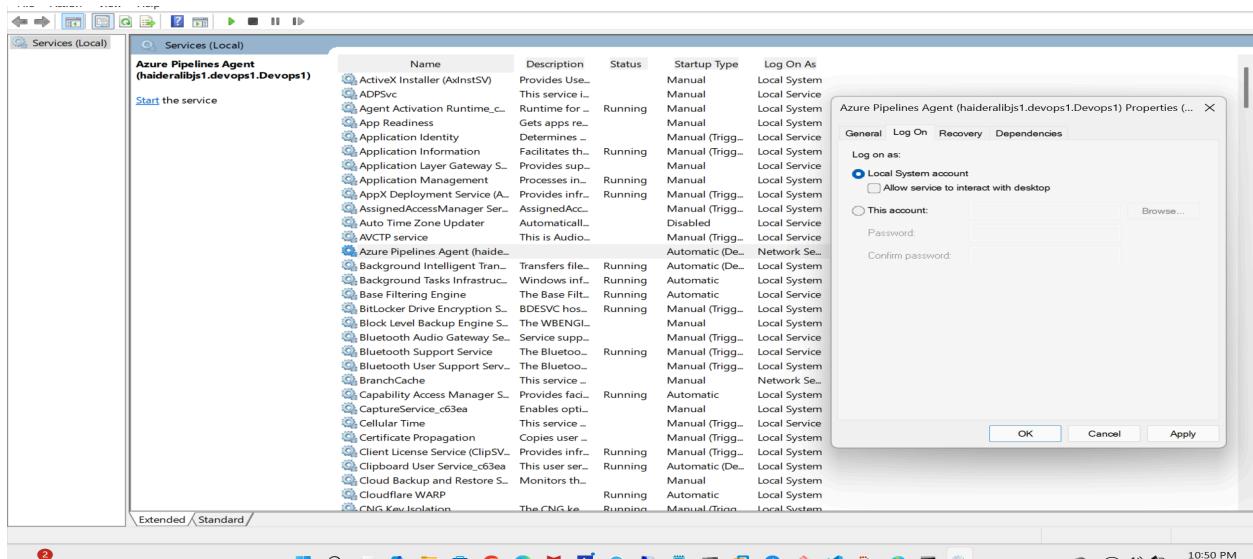
## Add Agent:

```
Administrator: Command Prompt
C:\Users\User\Downloads\vsts-agent-win-x64-4.261.0>.config.cmd

Azure Pipelines
agent v4.261.0
(commit 45f3f01)

>>> Connect:
Enter server URL > https://dev.azure.com/haideralibsl
Enter authentication type (press enter for PAT) >
Enter personal access token > *****
Connecting to server ...
>>> Register Agent:
Enter agent pool (press enter for default) > Devops1
Enter agent name (press enter for LAPTOP-NS5GPVIA) > Devops1
Enter replace? (Y/N) [press enter for N] > Y
Scanning for tool capabilities...
Connecting to the server...
Successfully added the agent.
Testing agent connection...
Enter agent name (press enter for _work) >
2025-11-01 17:40:03Z: Settings Saved
Enter run agent as service? (Y/N) [press enter for N] > Y
Enter enable SERVICE SID TYPE UNRESTRICTED for agent service (Y/N) (press enter for N) > Y
Enter User account to use for the service (press enter for NT AUTHORITY\NETWORK SERVICE) >
Granting file permissions to 'NT AUTHORITY\NETWORK SERVICE'.
Service vstsagent_haideralibsl.devops1.Devops1 successfully installed
Service vstsagent_haideralibsl.devops1.Devops1 successfully set to start in delayed auto start
Service vstsagent_haideralibsl.devops1.Devops1 successfully set SID type
Service vstsagent_haideralibsl.devops1.Devops1 successfully configured
Enter whether to prevent service starting immediately after configuration is finished? (Y/N) (press enter for N) > Y
C:\Users\User\Downloads\vsts-agent-win-x64-4.261.0>
```

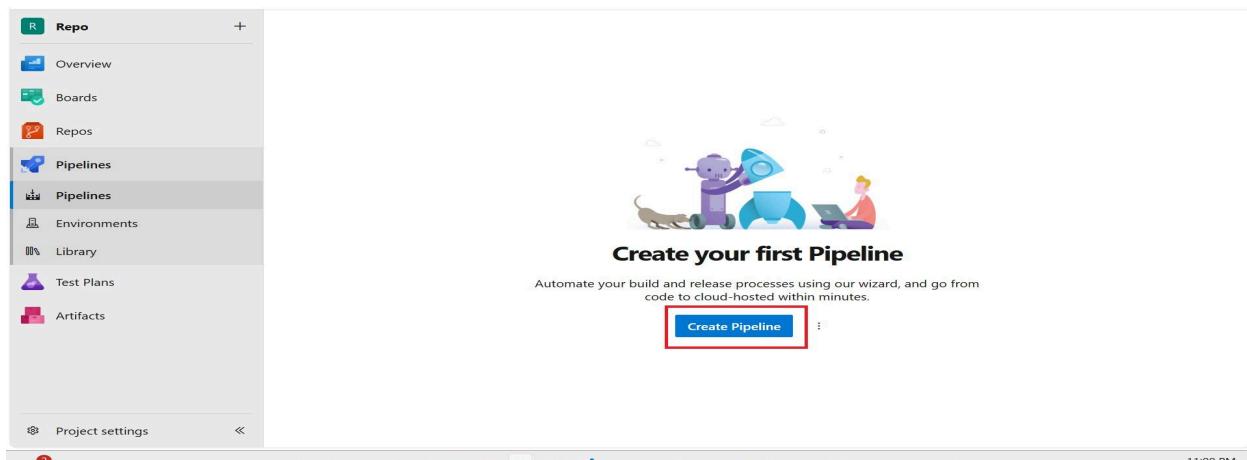
## Switch Pipeline user to local on window:



## Check Agent is live

Name	Last run	Current status	Agent version	Enabled
Devops1	Idle	4.261.0	<input checked="" type="checkbox"/> On	

## Create Pipeline



## Select Azure Repos Git:

This screenshot shows the 'Where is your code?' step in the pipeline creation wizard. The left sidebar remains the same. The main area has tabs for Connect, Select, Configure, and Review, with 'Select' being the active tab. The heading 'New pipeline' is followed by the question 'Where is your code?'. Three options are listed: 'Azure Repos Git' (selected and highlighted with a red box), 'GITHUB' (YAML), and 'Bitbucket Cloud' (YAML). A 'More options' dropdown is also visible.

## Select specific repo:

This screenshot shows the 'Select a repository' step in the pipeline creation wizard. The left sidebar is consistent. The main area has tabs for Connect, Select (active), Configure, and Review. The heading 'New pipeline' is followed by 'Select a repository'. A search bar with 'Filter by keywords' and a dropdown menu set to 'Repo' are at the top. Below is a list containing 'Asp .Net App' (highlighted with a red box).

New pipeline

## Configure your pipeline

Docker  
Build a Docker image

Docker  
Build and push an image to Azure Container Registry

Deploy to Azure Kubernetes Service  
Build and push image to Azure Container Registry; Deploy to Azure Kubernetes Service

**Starter pipeline**  
Start with a minimal pipeline that you can customize to build and deploy your code.

Existing Azure Pipelines YAML file  
Select an Azure Pipelines YAML file in any branch of the repository.

Show more

## Add Pipeline:

Contents History Compare Blame



```
1 trigger:
2 - main # or your branch name
3
4 pool:
5 | name: devops1 # your self-hosted agent pool
6
7 steps:
8 # Step 1: Checkout source
9 - checkout: self
10 | displayName: 'Checkout source code'
11
12 # Step 2: Build Docker image
13 - script: |
14 | echo "Building Docker image..."
15 | docker build -t mywebapp .
16 | displayName: 'Build Docker Image'
17
18 # Step 3: Remove old container if exists & run new one
19 - script: |
20 | echo "Stopping and removing existing container (if any)..."
21 | docker rm -f mywebapp_container || echo "No existing container"
22 | echo "Running new container..."
23 | docker run -d -p 8080:80 -e ASPNETCORE_URLS=http://+:80 --name mywebapp_container mywebapp
24 | displayName: 'Run Docker Container'
25
26 # Step 4: Verify container is running
27 - powershell: |
28 | Write-Host "Listing running containers..."
29 | docker ps
30 | Write-Host "Testing application endpoint..."
31 | Invoke-WebRequest -Uri http://localhost:8080 -UseBasicParsing
32 | displayName: 'Verify App is Running'
33
34
```

Check Pipeline Run Successfully:

The screenshot shows the Azure DevOps interface. On the left, there's a sidebar with icons for Repo, Overview, Boards, Repos, Pipelines (selected), Pipelines, Environments, Library, Test Plans, and Artifacts. The main area displays a pipeline named "Asp .Net App" under "Jobs in run #20251101.5". The pipeline consists of several steps: Initialize job (22s), Checkout source code (9s), Build Docker Image (43s), Run Docker Container (9s), Verify App is Running (7s), Post-job: Checkout so... (<1s), Finalize Job (<1s), and Report build status (<1s). All steps are marked with green checkmarks, indicating success. A status bar at the bottom right says "1 Set build status for commit f63d9d.".

Check App Is Working Successfully:

