This document explains how to use the Remix IDE to work with smart contracts.
It shows how to:

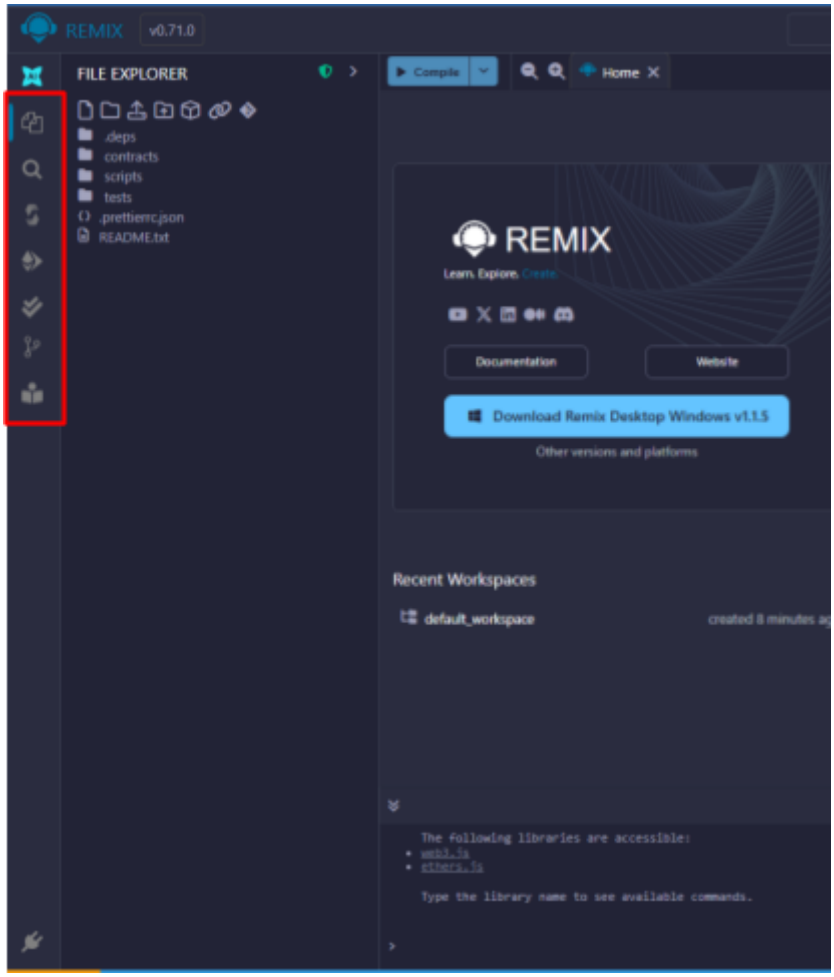
- Load a contract into Remix and compile it,
- Select MetaMask as the environment
- Load a contract using its address so you can interact with it.

Prerequisites

- The smart contract code.
- The address of the deployed smart contact
- A MetaMask account with the Sepolia Testnet added.
- Some Sepolia test tokens in your MetaMask wallet to interact with the contract.

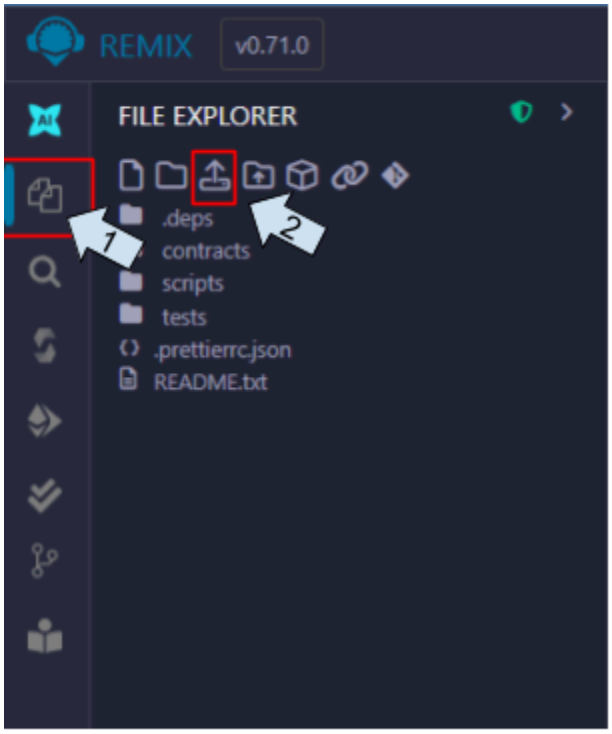
Step1 : Open Remix IDE

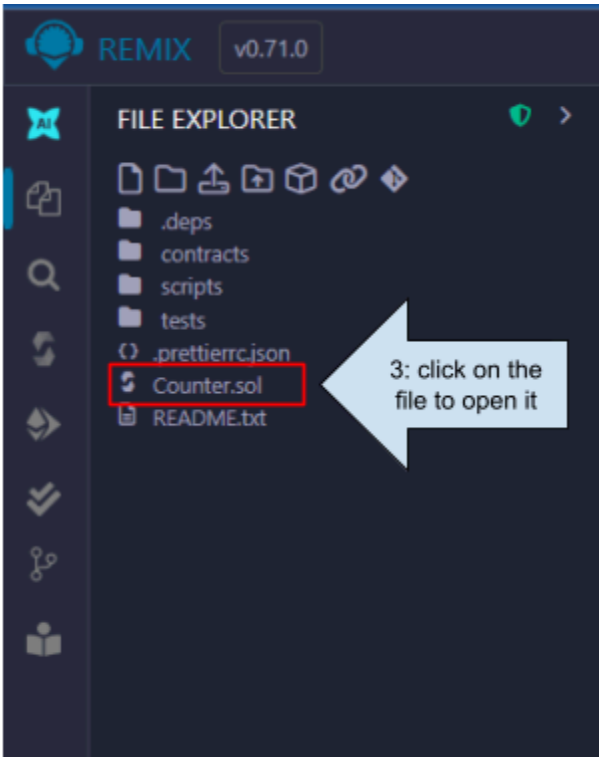
- Open a web browser and go to https://remix.ethereum.org/.
- The Remix IDE will load. Most of the tools you'll use are in the **left-hand panel**.(highlighted in red)

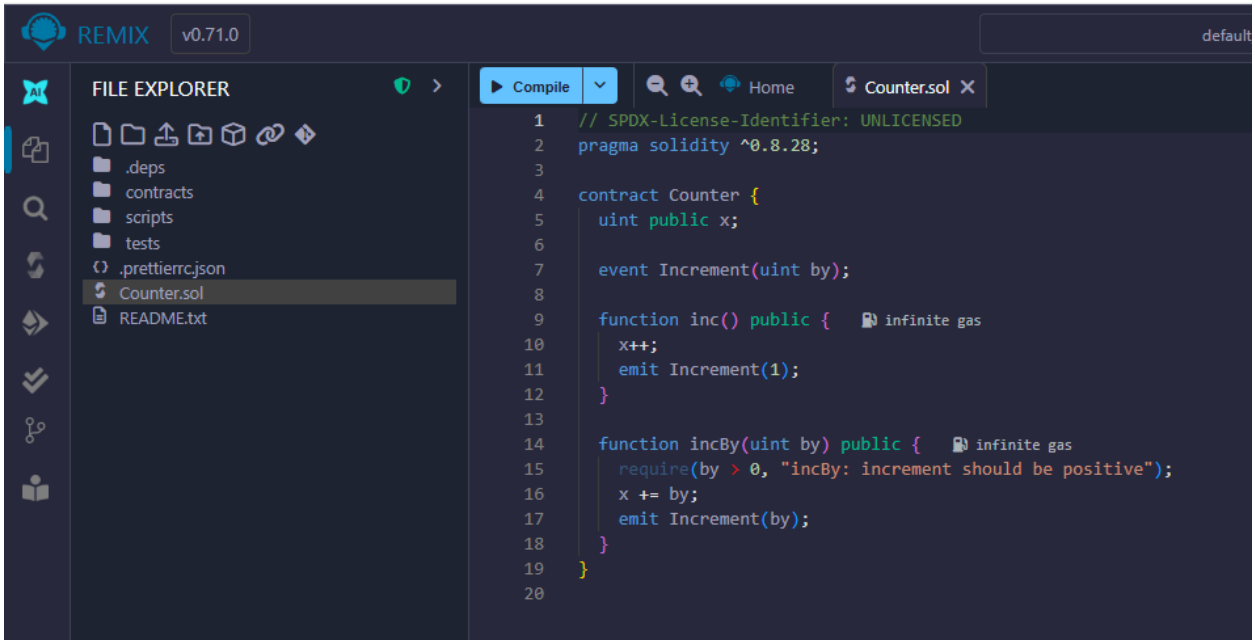


Step2 : Load the Solidity Contract

1. Click the **File Explorer** icon on the left sidebar.
2. Use the **upload button** to select a file from your computer.
3. Once the file appears in Remix, click on it to open and view it.

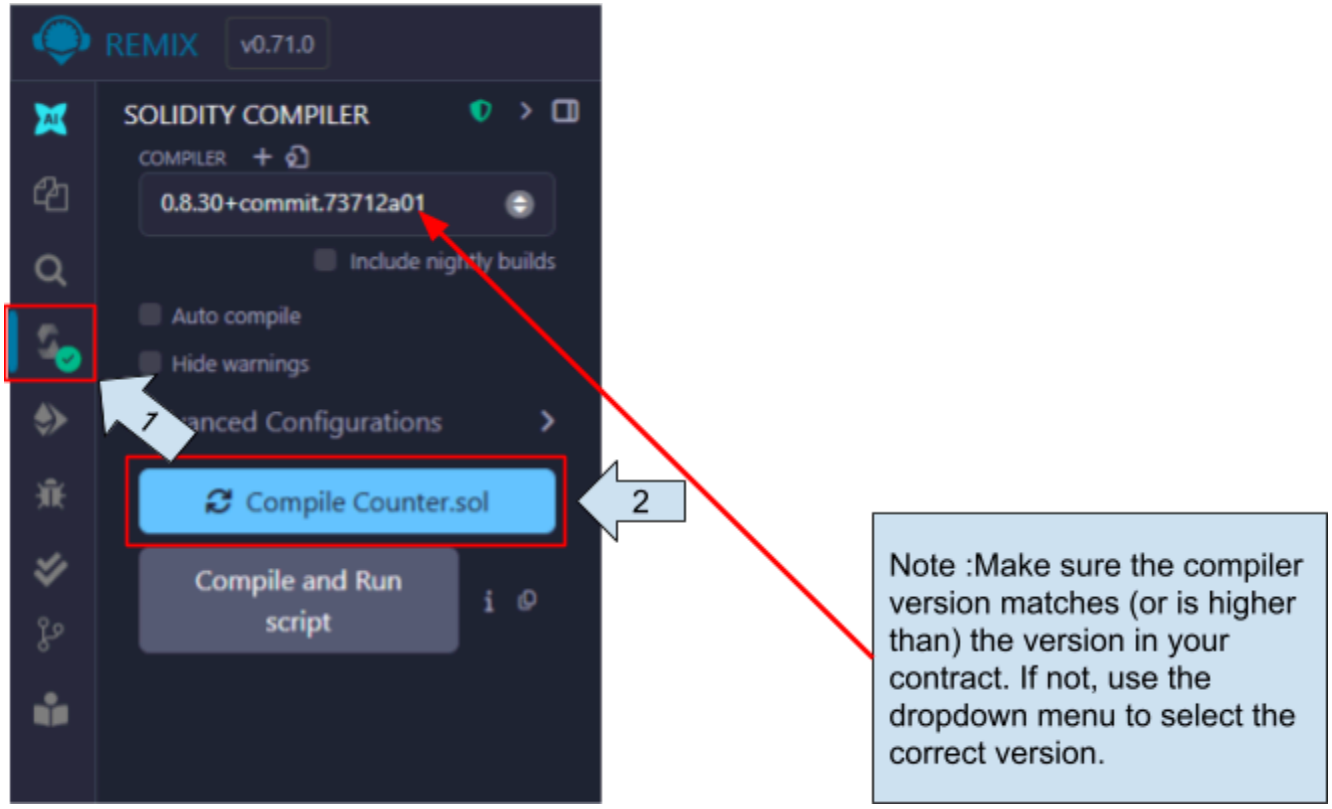






Step3: Compile the Contract

1. Compile the smart contract by clicking on the **Solidity Compiler** icon on the left sidebar of Remix IDE.
2. Then click the **Compile ERC20.sol** button. You should see a green checkmark once the file is successfully compiled.



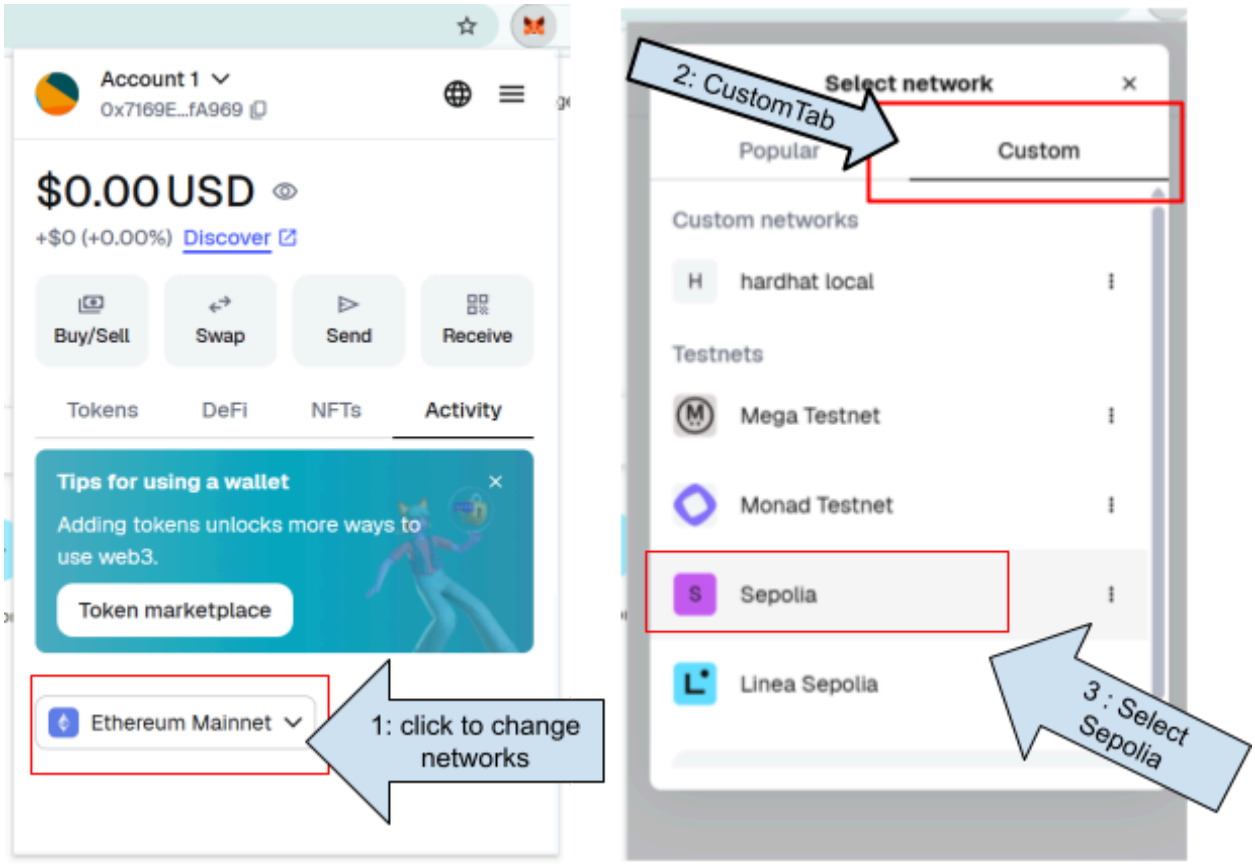
For this contract, the compiler version is **0.8.30**, which is higher than the contract's version **0.2.28**, so it's okay to use.

```
1   // SPDX-License-Identifier: UNLICENSED
2   pragma solidity ^0.8.28;
```

Step4 : Load a Contract from Its Address

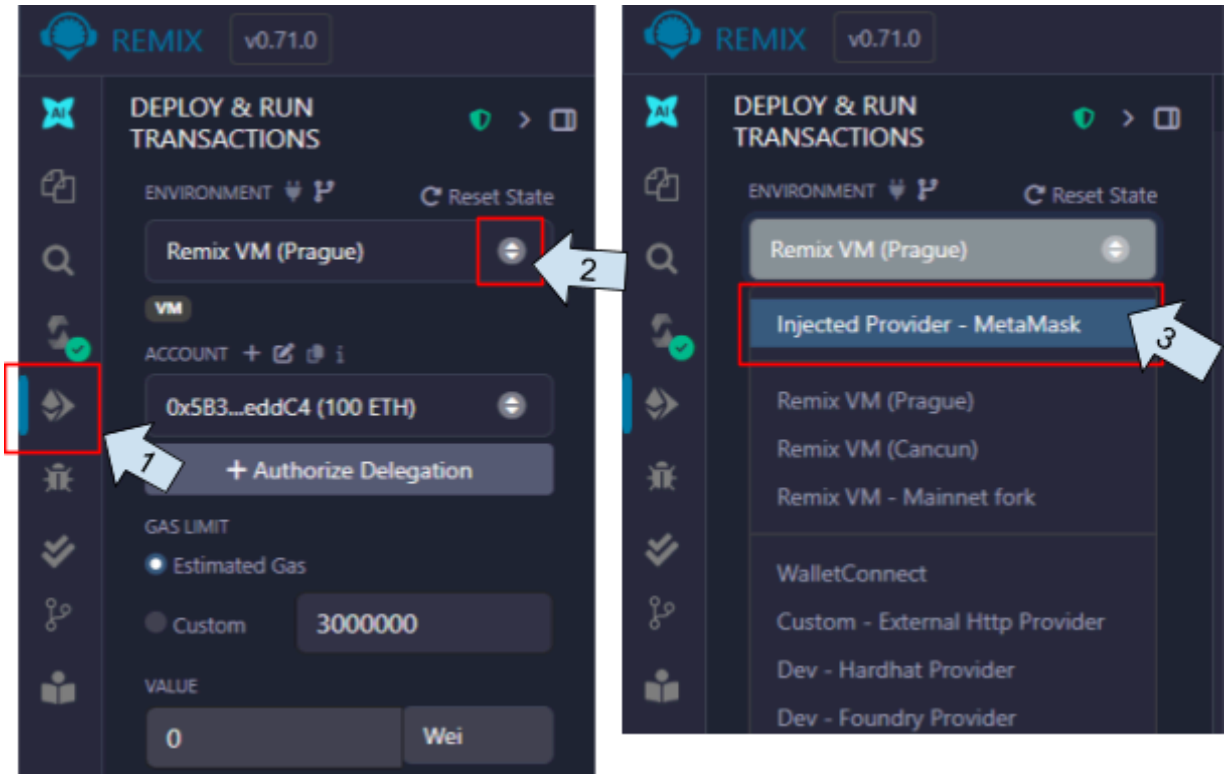
Step 4.1 Ensure MetaMask is on Sepolia Testnet

- We first need to switch the network to **Sepolia** in the MetaMask extension.
- On the MetaMask home screen, click on the current network name at the bottom-left corner (e.g., "Ethereum Mainnet").
- This will open the **Select Network menu**. In the menu, click on the **Custom** tab.
- From the list, select **Sepolia Testnet** and exit back to the homepage.

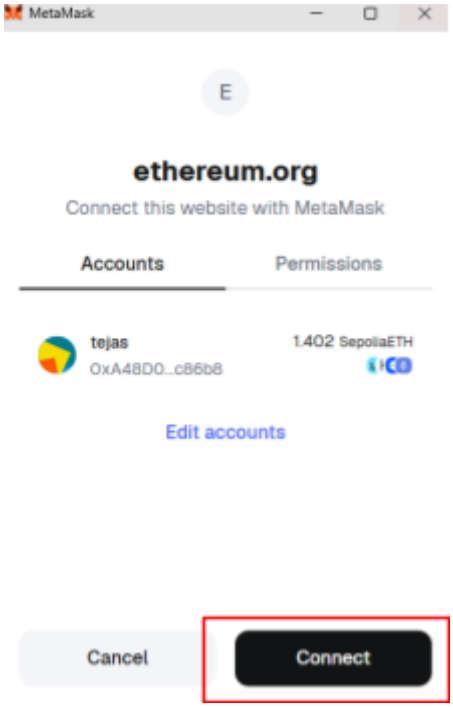


Step 4.2 Connect Remix to MetaMask and Load the Contract

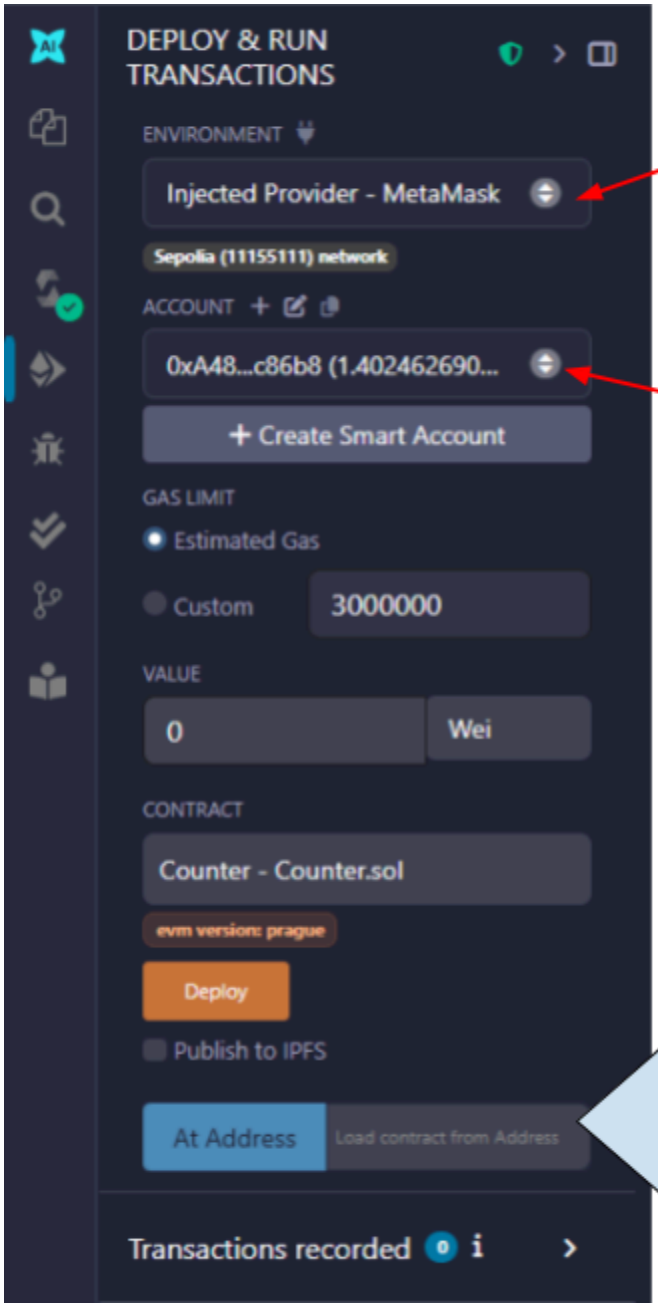
1. Once the smart contract has been compiled without any errors (step 3) , select the **Deploy & Run Transactions tab** located on the left-hand sidebar.
2. Click the **Environment** dropdown menu.
3. Choose **Injected Provider - MetaMask** to connect Remix to your MetaMask wallet.



4. Metamask might ask you to connect the website with metamask , if prompted click on connect



5. To load an already deployed contract, enter the contract's **address** in the **At Address** field and click the **Load** button.



Your **Deploy & Run Transactions** tab should now show **Injected Provider - MetaMask** as the selected environment.

If connected successfully, your MetaMask account should also appear under Account.

Enter the contract's address in the field and click **on the button** to access it's function on Remix.

Step 4.3: Interact with the Contract

1. You can now see your contract listed under the **Deployed Contracts** section.
2. To explore all the functions available in the contract, click the **arrow** next to the contract's name to expand it and view the full list of functions you can interact with.