

МІНІСТЕРСТВО ОСВІТИ І НАУКИ УКРАЇНИ

Національний технічний університет «Дніпровська політехніка»



Кафедра Системного аналізу та управління

ЗВІТ

Лабораторна робота №5

З дисципліни «Аналіз програмного забезпечення»

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м. Дніпро

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Тема: AWS EC2.

Мета роботи: набування навичок створення та розміщення віртуального сервера за допомогою AWS EC2.

Хід роботи

1. Створюємо та запускаємо Instance.

Натискаємо launch instances

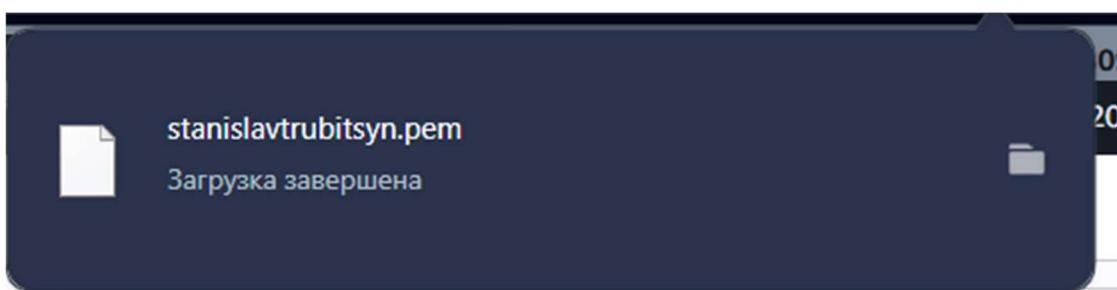
The screenshot shows the AWS EC2 Instances page. The left sidebar has sections for EC2 (Dashboard, EC2 Global View, Events), Instances (Instances Types, Launch Templates, Spot Requests, Savings Plans, Reserved Instances, Dedicated Hosts, Capacity Reservations, Capacity Manager), Images (AMIs, AMI Catalog), and Elastic Block Store (Volumes, Snapshots). The main content area is titled 'Instances Info' with a search bar and filters for Name, Instance ID, Instance state, Instance type, Status check, Alarm status, Availability Zone, and Public IPv4. A message says 'No instances' and 'You do not have any instances in this region'. A prominent blue button labeled 'Launch instances' is at the bottom right. The top navigation bar includes tabs for VPN, us-east-1.console.aws.amazon.com/ec2/home, and account information (Account ID: 9934-5809-6262, Stanislav%20Trubitsyn).

Вводимо ім'я та обираємо ОС

The screenshot shows the 'Launch an instance' wizard. Step 1: Name and tags. It asks for a name (stanislav-trubitsyn) and allows adding additional tags. Step 2: Application and OS Images (Amazon Machine Image). It shows a search bar for 'Search our full catalog including 1000s of application and OS images' and a 'Quick Start' section with buttons for Amazon Linux, macOS, Ubuntu, Windows (which is selected), Red Hat, SUSE Linux, and Debian. Step 3: Summary. It shows the number of instances (1), the software image (Microsoft Windows Server 2025), the virtual server type (t3.micro), the firewall (New security group), and storage (1 volume(s) - 30 GB). A large orange 'Launch instance' button is at the bottom right. The top navigation bar is identical to the previous screenshot.

Створюємо ключ доступу

The screenshot shows the 'Create key pair' step in the 'Launch an instance' wizard. A modal window titled 'Create key pair' is open, prompting for a 'Key pair name' (set to 'stanislavtrubitsyn'). It explains that key pairs allow secure connection to the instance. Below, 'Key pair type' is set to 'RSA'. A note indicates that RSA is supported for Linux instances but not for Windows. 'Private key file format' is set to '.pem'. A warning message states: 'When prompted, store the private key in a secure and accessible location on your computer. You will need it later to connect to your instance.' The 'Create key pair' button is highlighted.



Налаштування

The screenshot shows the 'Network settings' and 'Summary' steps of the 'Launch an instance' wizard. In 'Network settings', a new security group named 'launch-wizard-1' is being created with rules for RDP, HTTPS, and HTTP traffic. In 'Summary', the instance configuration is reviewed: 1 instance, Microsoft Windows Server 2025 AMI, t3.micro instance type, and 1 volume (30 GB). The 'Launch instance' button is visible at the bottom right.

Натискаємо launch instance

The screenshot shows the AWS EC2 'Launch an instance' success page. At the top, there's a green success message: 'Successfully initiated launch of instance (i-07db81f1204e818ec)'. Below it, a 'Launch log' section lists several steps with status icons: 'Initializing requests' (Succeeded), 'Creating security groups' (Succeeded), 'Creating security group rules' (Succeeded), and 'Launch initiation' (Succeeded). A 'Next Steps' section contains links for 'Create billing usage alerts', 'Connect to your instance', 'Connect an RDS database', and 'Create EBS snapshot policy'. The bottom of the page includes standard AWS navigation links like CloudShell, Feedback, and cookie preferences.

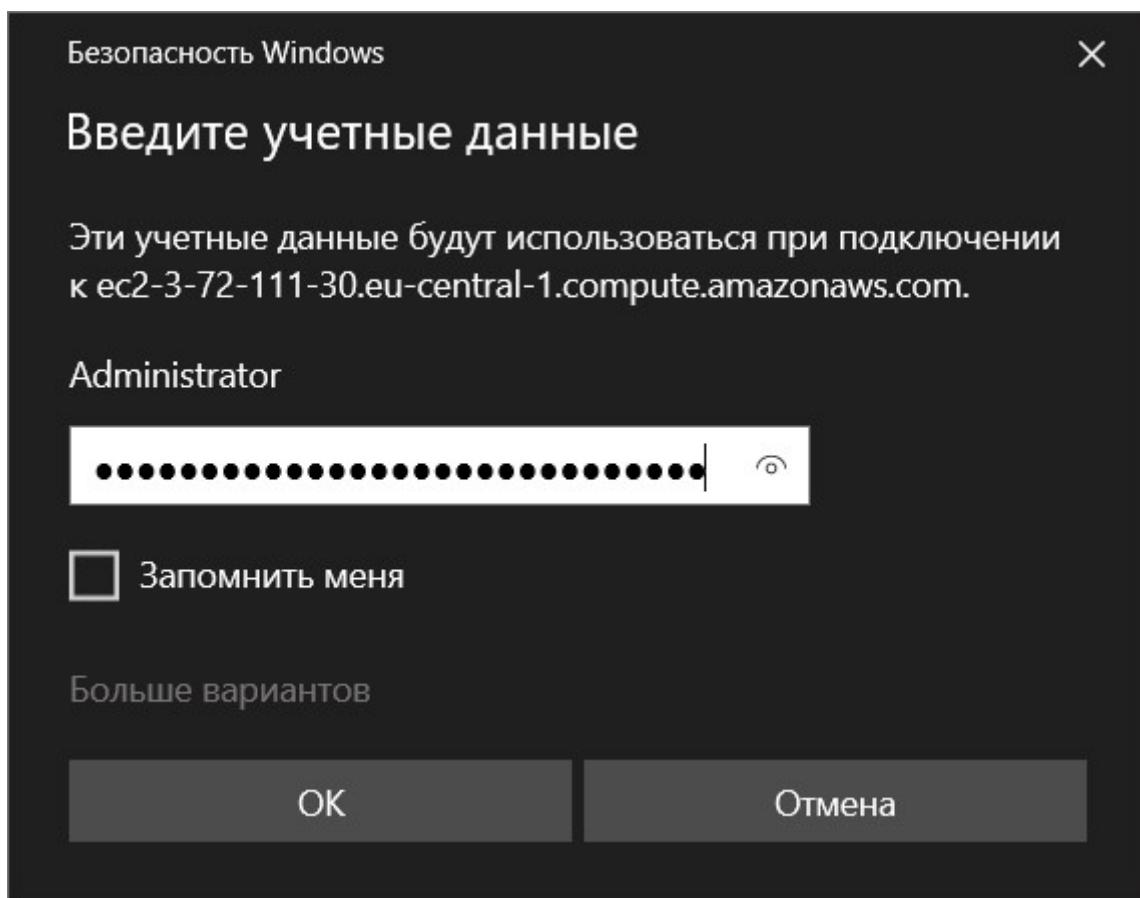
Створений instance

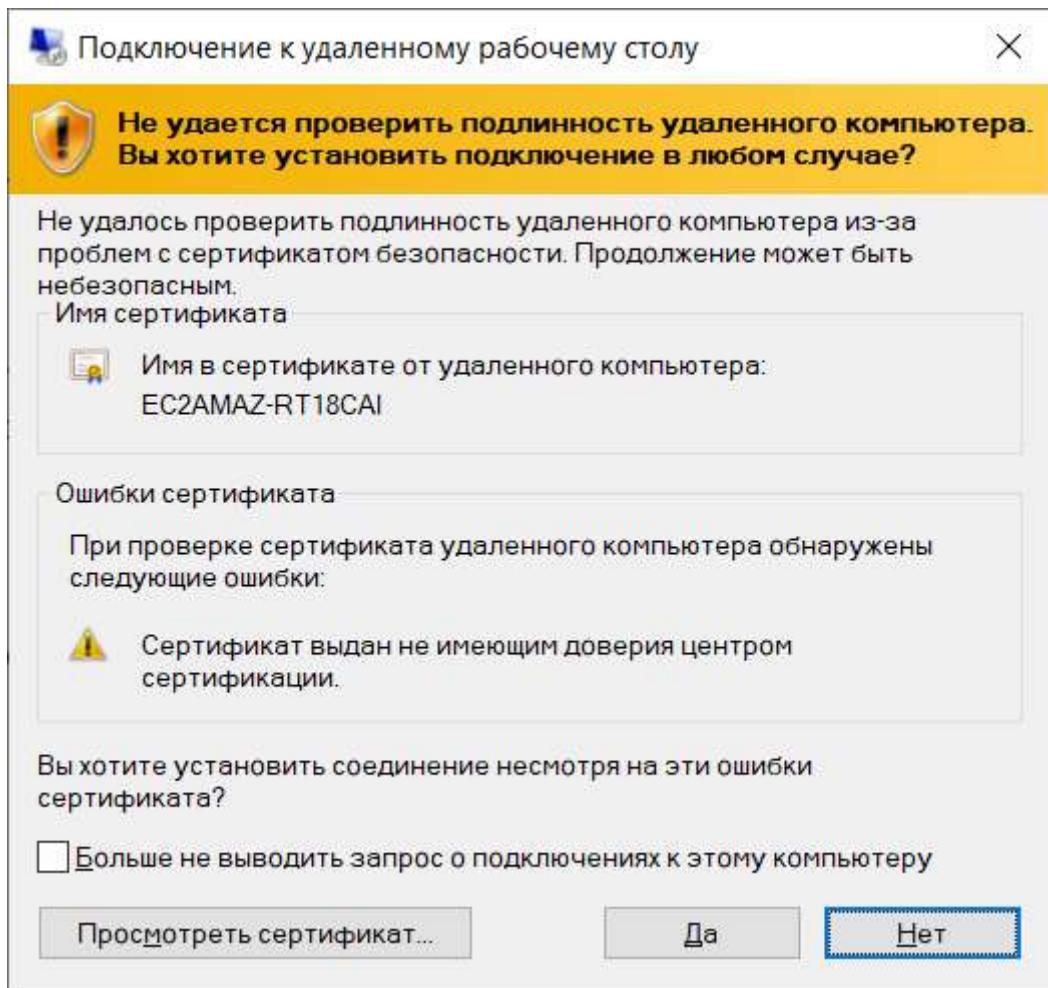
The screenshot shows the AWS EC2 Instances page. On the left, a sidebar menu is open under the 'EC2' heading, showing options like Dashboard, AWS Global View, Events, Instances (selected), Instance Types, Launch Templates, Spot Requests, Savings Plans, Reserved Instances, Dedicated Hosts, Capacity Reservations, Capacity Manager, Images, AMIs, AMI Catalog, and Elastic Block Store. The main area displays a table titled 'Instances (1) Info' with one row: 'stanislav-trub...' (Instance ID: i-07db81f1204e818ec, State: Running, Type: t3.micro, Status: Initializing). Below the table, a 'Select an instance' dropdown is visible. The bottom of the page includes standard AWS navigation links like CloudShell, Feedback, and cookie preferences.

2. Підключаємося до створеного ПК.

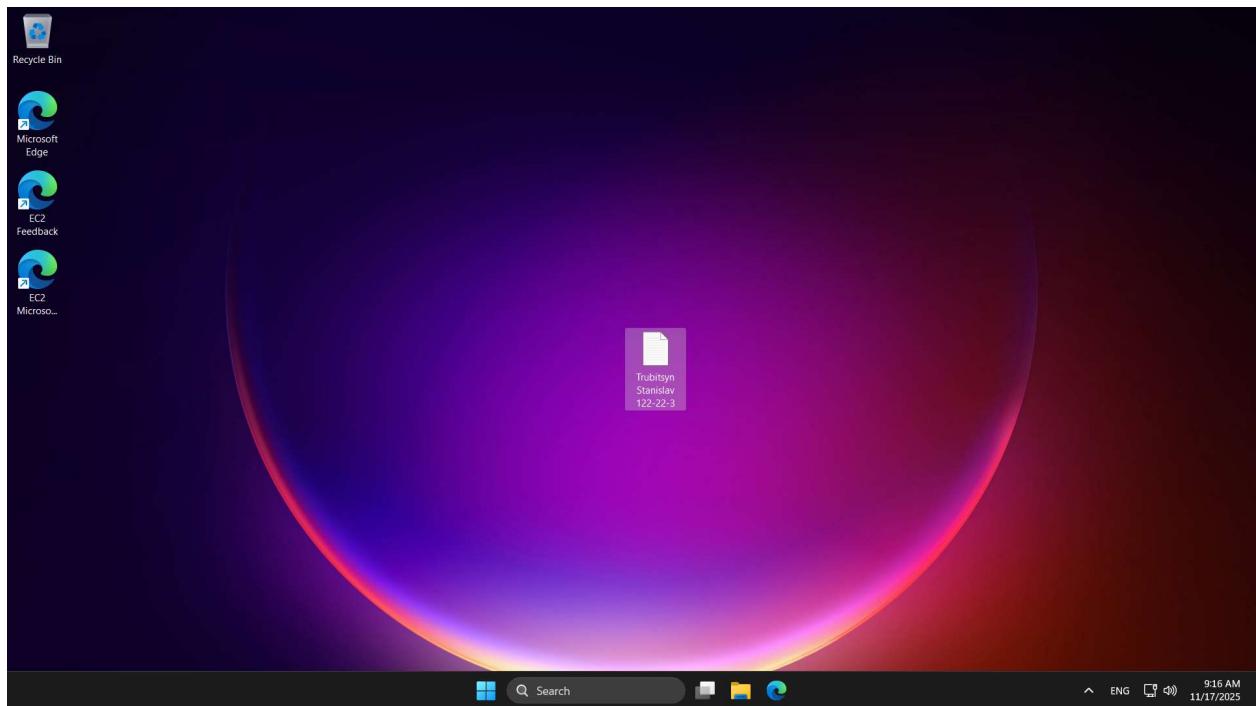
The screenshot shows the AWS Management Console interface for the EC2 service. In the top navigation bar, the URL is eu-central-1.console.aws.amazon.com/ec2/home. The main content area displays the 'Instances' section with a table titled 'Instances (1/1)'. The table lists one instance: 'i-07db81f1204e818ec (stanislav-trubisyn)'. The instance details include its state as 'Running', type as 't3.micro', and various metadata fields like 'Host ID', 'Affinity', 'Tenancy', 'Placement group', etc. On the left sidebar, the 'Instances' section is expanded, showing sub-options like 'Instance Types', 'Launch Templates', 'Spot Requests', etc.

Расшифруємо пароль та доєднуємося до віддаленого ПК





Підключились до робочого столу – кінцевий результат.



Public IP-Adress: 3.72.111.30

Username: Administrator

Password: TaSHY@f2EfX%IrMqSQcCN4ztEC;f8Vd\$

Висновок: у ході виконання лабораторної роботи було набуті практичні навички створення та налаштування віртуального сервера за допомогою AWS EC2. Було опановано процес створення та запуску інстансу, його конфігурацію, а також підключення до сервера через Remote Desktop.