Denys Pustovyi

A graduate of the Master's program at Kyiv Polytechnic Institute, focused on developing algorithms and back-end logic for software applications. The Master's theses, written in Python using neural network technologies, were graded 95 out of 100. Aimed at growth in programming and creating high-quality solutions.

Skills

Programming Languages: Java, Python. • Technologies and Tools: Microsoft SQL Server, PyQt, GitHub, Jakarta EE, Neural Networks. • Additional Skills: Experienced in HTML and CSS, experience with Unity, knowledge of AR technologies, C#, C++. • Soft Skills: Ability to follow instructions, Feedback processing, Flexibility in learning, Modesty, Constructive communication, Effective work under tight deadlines, Responsibility, Continuous learning, Discipline, Active listening, Openness to new things, Information gathering, Self-learning, Systems thinking.

Education

JUNE 2023 Y.

Bachelor's Degree in Information Systems and Technologies/National Technical University of Ukraine "Igor Sikorsky Kyiv Polytechnic Institute"

DECEMBER 2024 Y.

Master's Degree in Software Engineering/National Technical University of Ukraine "Igor Sikorsky Kyiv Polytechnic Institute"

Languages

Ukrainian - Native

English - B1 Technical

Projects

Application-Builder for Dataset Formation and Neural Network Training

Description: A software application was developed individually as part of a diploma thesis. The following tasks were set and successfully completed: creating a system for automated dataset generation, developing a system for automated neural network model creation, and organizing the training process for the created models. As a result, an application was developed that facilitates the convenient creation of datasets for training neural networks in classification tasks.

Tools: Python, PyQt5, TensorFlow, PyTorch.

Outcome: Gained experience in developing user interfaces using PyQt, strengthened neural network skills, acquired experience in multithreading, and expanded Python knowledge.

Resource Access Mode: https://github.com/PDionys/DiplomProject

Text-to-Speech Application Powered by Neural Networks

Description: An individual software application was developed as part of a master's thesis. The following tasks were set and successfully completed: creating a text-to-speech generation system and developing a system for recording and editing audio for further playback. As a result, a prototype application was created that enables voice generation from text based on a recorded and edited audio track.

Tools: Python, PySide6, Coqui-TTS, Pydub.

Outcome: Gained expertise in neural network-based voice generation technologies, acquired skills in audio signal processing, and analyzed the dataset requirements for this task.

Resource Access Mode: https://github.com/PDionys/Text-To-Speech-Prototype

Web Dictionary

Description: An individual web application was developed as part of a master's program course. The following tasks were set and successfully completed: creating a website on a specified topic using Jakarta EE, integrating a database, and implementing a CRUD system. As a result, a dictionary website was developed using Jakarta EE technologies.

Tools: Java EE (Jakarta EE), Enterprise Java Beans (EJB), Servlets, GlassFish, Jakarta Persistence (JPA), Jakarta Server Pages (JSP).

Outcome: Gained proficiency in Jakarta EE technologies, particularly EJB for injecting models into servlets, using servlets for back-end logic, JPA for database integration, and JSP for creating dynamic web pages.

Resource Access Mode: https://github.com/PDionys/WebDictionary

AR Assistant

Description: A team-based AR application was developed as part of a master's program course. The following tasks were set and successfully completed: designing a User Experience Flowchart, creating Wireframes, and developing a prototype. As a result of my work, the project Wireframes were created, and the codebase for the functionality of the AR assistant, which constitutes the core part of the project, was developed.

Tools: Unity, C#, Blockbench.

Outcome: Acquired skills in using Unity and libraries for working with AR technologies. Additionally, refreshed knowledge of C# and gained basic 3D modeling skills.

Resource Access Mode: https://github.com/PDionys/AR_Assistent

Lovecraft-Mod-Fabric-1.19

Description: An individual modification for the game Minecraft was developed as part of a personal initiative to explore an external API. The following tasks were set and successfully completed: studying the new API, working with the code of an existing product, and testing personal skills in solving non-trivial tasks. As a result, a small mod for Minecraft was created, which includes a new resource for the player and the implementation of a notebook system.

Tools: Java, Fabric, Audacity

Outcome: Gained expertise in the Fabric library for creating Minecraft mods, as well as studied the client-server architecture upon which Minecraft and other tools are built. Additionally, worked with rendering and audio processing systems, specifically using Audacity.

Resource Access Mode: https://github.com/PDionys/Lovecraft-Mod-Fabric-1.19