# **QR Code Generator – Assignment Deliverable**

# **Student Name: Bhawesh Shrestha**

# **Course: Advance Artificial Intelligence**

# **(MSCS-633-M50)**

# **Submission Date: 2025-09-20**

**Abstract**

This document presents a Python application that generates a QR code image (PNG) for a user-provided URL using the 'qrcode' library (with Pillow). The tool validates the URL, supports multiple error-correction levels (L/M/Q/H), and saves the QR code to disk. A screenshot of the generated QR code and the GitHub repository link are included as required.

## **Introduction & Background**

A QR Code (Quick Response code) is a two-dimensional barcode invented in 1994 by the Japanese company Denso Wave. QR codes can store more data than traditional barcodes and are widely used for URLs, payments, product tracking, and app downloads. This assignment implements a small, well-documented Python tool to encode a URL into a scannable QR code image.

**Project Artefacts**

• Python source code: qr\_generator.py

• Manifest file: requirements.txt (qrcode, Pillow)

• README.md with setup, usage, and GitHub steps

• This Word document with screenshot and repository link

## **Requirements & Environment**

• Python 3.8 or newer (3.10+ recommended)

• OS: Windows, macOS, or Linux

• Optional: Visual Studio Code, Git (for GitHub upload)

## **Environment Setup**

Windows (PowerShell):

cd "

## **QR Code Image:**



## **Github Link:**

<https://github.com/Bhawesh-03/Qr-code-generator.git>