Task: Solving the Puzzle; A MATLAB Approach to Image Reconstruction

Problem Statement:
The objective is to accurately determine the correct spatial arrangement of the puzzle pieces to reconstruct the original colorful image.

Consider the following steps:

1. The original colorful image and its grayscale 16 puzzle pieces are provided in this link: https://drive.google.com/drive/u/1/folders/17Mv-e3lBXpCEVScgly4Zk0T3mPfnneut
   Load the colorful image and its corresponding grayscale puzzle pieces.

2. **Perform** image processing techniques to assess similarity and **identify** the optimal placement of each puzzle piece in a 4x4 grid format. You can achieve this by making 4x4 blocks of the original colorful image and comparing them to the puzzle pieces.

3. **Reconstruct** the full image in grayscale form placing the puzzle pieces in the identified optimal positions.

4. **Display** the position of the puzzle pieces in the form of a 4x4 matrix (Consider the names of the puzzle pieces as the elements of the matrix) and also, **display** the final reconstructed image.

N.B.

- You might need to **resize** or **rotate** some of the puzzle blocks in your code to achieve the best fit.
- You are permitted to crop the images of the puzzle pieces if necessary.
- **You can change the image file format if necessary** (not mandatory). For example, if you need to work with **.tif** image files instead of the provided **.jpg** files, you may change the image format accordingly to ensure compatibility; inside or outside of the code.