

Abstract

One of difficulties in image searching is looking the correct keywords to describe the desired image. Moreover the query result often doesn't match with the intended. To minimize that kind of error a solution is given by providing an image searching system using image. The approach that is used is similarity-based method, it is a technique that take an image as input and return images as output, based on similarity kind and level. So that this final assignment objectives are, first, to build image database; second, to make image query to retrieve data from the database, and third, to test image query performance with similarity-based method.

The steps handled by system in query processing started after user inserting image query. Then system extracting its color and texture features based on color histogram and co-occurrence matrix. After that, system will count similarity-level between query image and database image. The query result then sorted by descending order based on similarity-level.

This system provide database contains images with 384 X 256 pixel with various characteristics such as non-texture image, texture image, landscape, monotonicity background color, picture of full-frame face, black and white image, image with low /high contrast, and bright/dark image.

The result of this final assignment is a software that can search images in the database with similarity type and similarity level based on what user want. After software testing, the appropriate similarity-based method that compatible with image characteristic will be known.

Keywords: *query image, database multimedia, similarity-based, content image*