Paper title: Object Identification For Computer Vision using Image Segmentation

In this paper here proposed a method for object detection from such chaotic background by using image segmentation and graph partitioning and this is the objectives of this paper. Today most of the time device face a problem to accurately identify an object from where are present in a large number similar shaped, colour and size objects because it is difficult part choosing the right item from among many other similar shaped, colour and size objects. In this paper discussed about a graph based image segmentation and object identification method, especially where the background is chaotic and contains several same type of object.

In this paper mentioned two types techniques for object detection and they are bottom-up approach and top down approach. In these two method here used bottom up approach with a graph based co-segmentation of the image where the background may contain same type of objects. The work process are first they build groups of image classes for a training and then from the test image they search for the object after partitioning the image using a graph partitioning algorithm.

- i. First they work for image class preparation. They prepared a set of characteristics from sample images where the objects are segmented manually for every object class.
- ii. After class preparation they work for segmentation of the same type of object from background. Then we used the segmentation algorithm to partition different class of objects Here they took two images for segmentation. One of the two having the object used in the class preparation and another one having number of overlapping objects. They used Maximum Ownership Labeling to mark the desired object and they stored the weight matrix difference as a parameter for the graph partitioning. For this the Mixture of Gaussians Model.
- iii. Finally they work graph construction. After training the system we combined all classes of objects and search for a particular class of object. In this part they identify an object for this they take a Graph based approach to segmentation.

As a result of this device gains the ability to make decisions and a device to accurately identify an object from where are present in a large number similar shaped, colour and size objects.

In this paper which type of work they do for this type of work they need deep learning concept. But in this paper they do not discussed about deep learning. Deep learning is an AI function that simulate the workings of the human brain in processing data for use in detecting objects, recognizing speech, translating languages, and making decisions. Here also a device detecting objects and it's a part of deep learning.

I have no deep knowledge how to apply computer vision concept in a project. To do this type of project which type of other knowledge I need that I learn from here. In this work I know how to prepared sample data. For my project I got a general idea and this will help at my project time. Here a device can detected an objects and in my project there is this type of work so its help me when I do my project

Paper title: Computer Vision Imaging Based on Artificial Intelligence

Here the objective is using artificial intelligence based on computer vision imaging to extract visual information from an image or image sequence. The researcher's wanted to improve the computer vision using artificial intelligence based on biological vision and evolutionary computation, the method of improving self-adaptation.

Here researcher's talked about three methodology of computer vision. Basic theory of evolutionary computing, the dynamic model of evolutionary computation and Pattern recognition based on evolutionary computing. Pattern recognition uses various sensors as sources of information. The core of theoretical technology is information processing and pattern recognition. Mathematical methods and computers are the main tools for exploring ways to process, classify, and understand various media information. The basic ideas of statistical pattern recognition based on evolutionary computation is to determine pattern-related features and form feature sets.

- i. the range of values for each feature.
- ii. the legal solution space.
- iii. the initial state or group.
- iv. the evaluation function.
- v. the evolutionary strategy of the solution.
- vi. the evolution termination conditions.

Help of this project any device can get information from the image or image sequence a relevant information of the object is collected. The study of biological visual perception includes computer vision and a device can simulate human vision with the help of this project.

Many advance thing there are discourse but many basic thing they can't discuss. Because of this reason many person cannot understand this first time. Many things are not given a clear idea or knowledge here.

I have learned a lot of advance thing from this paper and it has increased my knowledge a lot. A device can get information from the image or image sequence and in my project there is this type of work so its help me when I do my project. In this paper I know about Turing machine and this thing is totally new for me and its knowledge will help me a lot in my project. To read this paper I learn many new thing and the study of computational theory can guide the research of computer vision, and various applications provide a good background and platform for the study of computer vision. In this way the project will help me in my project work.