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| **University Institute of Engineering, Chandigarh University**  **Department of Computer Science & Engineering**  **Phase I (Project Scope, Planning and Task Definition)**  **Date: 06/03/2022** | | | | | | | | | | | | | | | | | |
| **Project Title** | | | | | | | | | | | | | | | | | |
| Image Processing in Python | | | | | | | | | | | | | | | | | |
| **Project Team** | | | | | | | | | | | | | | | | | |
| **Team Designation** | | **Name** | | | | | | | | | **UID** | | | **Section** | | | |
| **Lead** | | **Sahul Kumar Parida** | | | | | | | | | **20BCS4919** | | | **703-A** | | | |
| **Member 1** | | **Aditya Raj** | | | | | | | | | **20BCS4955** | | | **703-A** | | | |
| **Member 2** | | **Kumar Shubham** | | | | | | | | | **20BCS4965** | | | **703-A** | | | |
| **Member 3** | | **Shaswat Rai** | | | | | | | | | **20BCS4905** | | | **702-B** | | | |
| **Member 4** | | **Sahul Kumar Parida** | | | | | | | | | **20BCS4919** | | | **703-A** | | | |
| **Project Scope** | | | | | | | | | | | | | | | | | |
| Our project is mainly concerned with basic operations on the image. So that user can get a requested visual appearance. Image processing is the use of computer algorithm to perform, improve or change some quality of the image. Now a days, it is important in different fields.  The Python Image Processing Library adds image processing capabilities to the Python Interpreter. This library provides extensive file format, an efficient internal representation, and fairly powerful image processing tools. Actually, the Image Library designed for fast access.  The Python Image Library is ideal for image archival and batch processing application.  Here our project is providing an image processing tool through which user can give desired effects to an image. It accepts input via mouse and keyboard and gives output on the screen.  So, just one click by mouse, you will get the image with the expected result. In this project, we are providing different image processing tool with GUI so it makes easy for the user to give desired effects to the image. Image processing is booming technology.  Image processing has the lot of application in different fields like medical, traffic signals, computer science etc. In this project, we have implemented some of the image processing operations which will help the user to understand the concept of image processing. Therefore, the scope of this project is increasing.  The purpose of this project is to allow users to explore how digitized images can be processed using computer software. | | | | | | | | | | | | | | | | | |
| **Project Planning and Task Definition** | | | | | | | | | | | | | | | | | |
| The entire Python source code for this project will be prepared by Sahul Kumar Parida, who will also be acting as the Project Leader as well as Technical Lead. He will also be responsible for contributing to the overall objectives of the project and the specific team deliverables.  The different Python libraries, modules required for the project like OpenCV, Scikit-Image, SciPy, Pillow or PIL (Python Imaging Library) and NumPy as well as collecting content and resources for the project will be done by Aditya Raj, who will also be managing the deliverables of the project.  The Presentation and Synopsis for the project will be prepared by Kumar Shubham, who will also look into the Hardware and Software Configuration and all the necessary requirements required to implement our project successfully.  And last, but not the least the Project Report will be prepared by Shaswat Rai, who will also be acting as the Project Manager. He will be responsible to plan and schedule tasks and provide a framework for our project activities. His primary purpose will be helping the group to prepare, execute, and control all aspects of a project with optimal time management. | | | | | | | | | | | | | | | | | |
| **Project ID (If selected from project basket)** | | | | | | | |  | | | | | | | | | |
| **Project Outcome (Tick the Column)** | | | **Patent** | |  | **Journal Paper** | |  | **S/W Project** | | |  | **H/W + S/W Project** | |  | **Other** |  |
| **Remark of Supervisor** | | | | | | | | | | | | | | | | | |
|  | | | | | | | | | | | | | | | | | |
| **Name of Supervisor** | | Rohini Bawa | | | | | **Signature** | | |  | | | | | | | |
| **S.No.** | **Signature of the Students** | | | **Contact No.** | | | | | | | | **Signature** | | | | | |
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| **4.** | **Shaswat Rai** | | | **+91 8572990284** | | | | | | | | **Shaswat Rai** | | | | | |

**Signature**

**(Project Teacher)**