# KIDNEY STONE DETECION USING IMAGE PROCESSING TECHNIQUE

**A PROJECT REPORT**

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***In partial fulfilment for the Award of the degree***

***of***

**BACHELOR OF TECHNOLOGY**

**IN**

**ELECTRONICS AND COMMUNICATION ENGINEERING**

**Under the guidance of**

**Mr.V.Jayachandra Naidu**
**Associate Professor**


**SRI VENKATESWARA COLLEGE OF ENGINEERIN AND TECHNOLOGY(AUTONOMOUS)**

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**(Approved by AICTE ,New Delhi, Affiliated to JNTUA, Anantapuram)**

**(Accredited by NBA, NEW Delhi AND NAAC, Bengaluru)**

**(An ISO 9001:2000 Certified Institution)**


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This is to certify that the project entitled "**KIDNEY STONE DETECTION IS USING PROCESSING TECHNIQUE"** is the bonafide work carried out by **"M.NIRMALA (20781A04A7), M.VANAJA LAKSHMI(20781A04A9), P.BHOOMIKA(20781A04C5) P.G. RAVIKIRAN(20781A04D7), P.VISHNU VARDHA REDDY (20781A04E2)"** students of B.TECH. ECE, SVCET, during the academic year 2020-2024, in partial fulfilment of the requirements for the award of Degree of Bachelor of Technology in ELECTRONICS AND COMUUNICATION ENGINEERING.

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Viva Voce conducted on:

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# ABSTACT

The solid concretion named a kidney stone typically forms inside the kidney. The majority of the time, medical professionals utilize imaging techniques such as X-rays to find kidney stones. These techniques' precision, though, may be restricted. Deep learning has demonstrated great potential in the analysis of medical imaging in recent years. With the support of ultrasound images, we aim to develop a deep learning model in this project that accurately recognizes the presence of kidney stones in patients. We'll make use of a collection of ultrasound images taken from individuals who have been told they have stones in their kidneys. We will use the algorithms to mask and segment the pictures from the gathered dataset after preprocessing the data using quite a few of image processing techniques, such as feature extraction.