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| **Raspberry pi based Surveillance Robot for Real Time Intrusion Detection and Tracking** | | | |
| **Abstract :**  Security of home becomes important when it’s members are not present. This can be done done using a autonomous robot. Autonomous vision based robots are intelligent robots  which take visual data, process it and provide appropriate output. A robot can be designed on Raspberry-Pi using OpenCV which is capable of human detection. This robot will be an independent machine for human detection.  We plan to build an autonomous robot which is capable for identifying a person, following him, sending his actions to the owner over telegram. | | | |
| **Objectives:**  The robot will be able to do the following:   * Identify the person , when the person enters the premises. * Alert the owner, send an image of the person to the owner. * Identifies the person as known or unknown while following. * Take next set of instruction from owner and work accordingly. * Send the captured activity to the owner after getting reset command. * Return to its original position.. | | | |
| **Libraries and Framework/ Platform –**   * Opencv * Numpy * Imutils * Telegram * Socket | | | |
| **Machine Learning Algorithm- Single Shot Detection Algorithm** | | | |
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