

Accepted Manuscript

Joint localization and target tracking with a monocular camera

Abdul Basit, Matthew N. Dailey, Jednipat Moonrinta, Pudit
Laksanacharoen

PII: S0921-8890(15)00126-8

DOI: <http://dx.doi.org/10.1016/j.robot.2015.05.012>

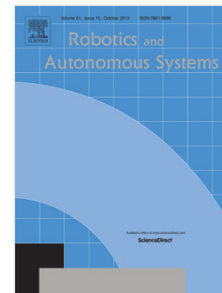
Reference: ROBOT 2484

To appear in: *Robotics and Autonomous Systems*

Received date: 3 March 2014

Revised date: 28 April 2015

Accepted date: 27 May 2015



Please cite this article as: A. Basit, M.N. Dailey, J. Moonrinta, P. Laksanacharoen, Joint localization and target tracking with a monocular camera, *Robotics and Autonomous Systems* (2015), <http://dx.doi.org/10.1016/j.robot.2015.05.012>

This is a PDF file of an unedited manuscript that has been accepted for publication. As a service to our customers we are providing this early version of the manuscript. The manuscript will undergo copyediting, typesetting, and review of the resulting proof before it is published in its final form. Please note that during the production process errors may be discovered which could affect the content, and all legal disclaimers that apply to the journal pertain.

Research Highlights

1. Joint localization fuses target dynamics and pursuit robot kinematics to improve trajectories estimation.
2. An adaptive histogram similarity threshold correctly suspend tracking and localization when target is occluded.
3. A fast target redetection method avoids false detections and improves accuracy.
4. Redetection successfully reinitialize visual tracking and state estimation correction.

Download English Version:

<https://daneshyari.com/en/article/10326925>

Download Persian Version:

<https://daneshyari.com/article/10326925>

[Daneshyari.com](https://daneshyari.com)