

# MaxTRAQ AutoTracking

## Quick Guide



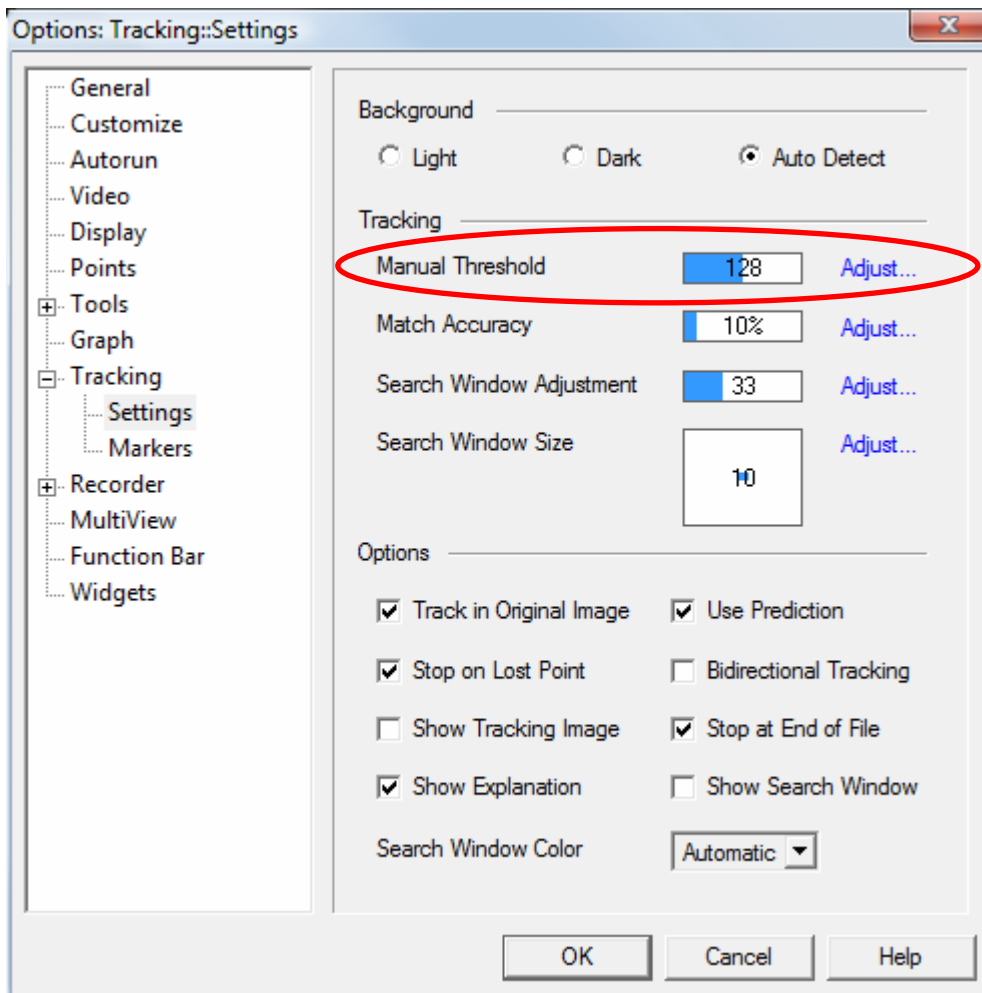
## Introduction


MaxTRAQ can automatically track markers in a video. It uses so called threshold tracking, i.e. it uses markers that are either brighter or darker than the background. Normally we use white markers or reflective markers together with IR or visible light to create bright white markers. The tracking is done in 8 bit monochrome image so the color of the markers doesn't affect the tracking.

This document gives you a quick introduction on how to track markers using MaxTRAQ. For more in depth information please see the help files distributed with MaxTRAQ.

## Step 1 – Configuring MaxTRAQ for Auto Tracking (first time only)

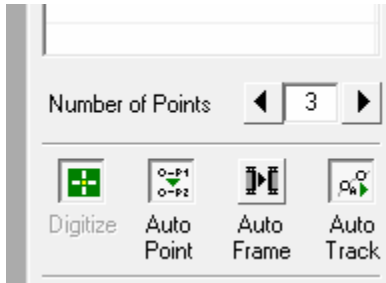
- Open or record a video using File->Open or File->New Recording
- From the View Menu select the following
  - √ Table Check Boxes
  - √ Point Markers->Cross
  - √ Zoom->Keep Aspect
  - √ Tracking Outline
- From the menu select Tools->Options. Click on the + sign next to Tracking and then select Settings. This will display the tracking options dialog.



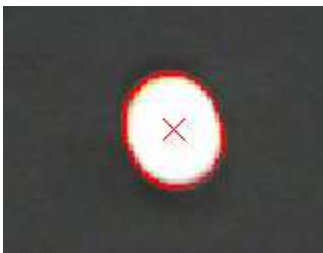
Next we need to change from Automatic Threshold to Manual Threshold by clicking on [Adjust...](#) Select Manual from the dropdown and leave the level at the default. Click on  to close. Click on OK to close the Tracking Setup Dialog.

## Step 2 – Tracking Markers

- Select number of points to track and then turn on Digitize with Auto Point and Auto Track



- Click on the center of each marker in the video. If the threshold is set correctly then the marker(s) should be outlined with a red line. See below.



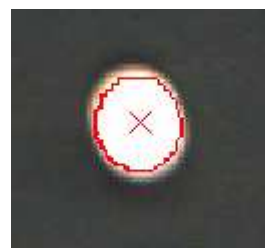
- Use the threshold slider to the right of the video controls to adjust the threshold



Adjust the threshold so it looks like the picture above.



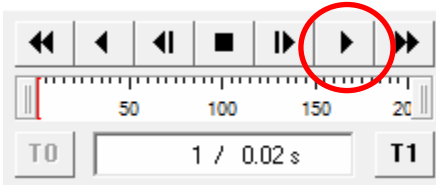
Threshold to low, move slider to the right



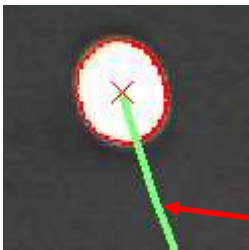
Threshold to high, move slider to the left

**Note:** You will always have a small amount of “false” markers, i.e. bright spots that are not a marker. In most cases these will not interfere with the tracking.

- After you have identified all the markers in the first frame you can start the automatic tracking by clicking on the play button. You can also track step by step using the Step Forward button.



If you have turned on traces you will see how the markers are tracked.



Marker Trace

- If you receive the following error while tracking make sure that the marker is still outlined or try to increase the Search Window Size in the Tracking Options Dialog.



Outline ok, increase Search Window Size in Tracking Options



No marker outline. Threshold too high, move threshold slider to the left