

Removing Moving Objects from a Scene

January 24th, 2011

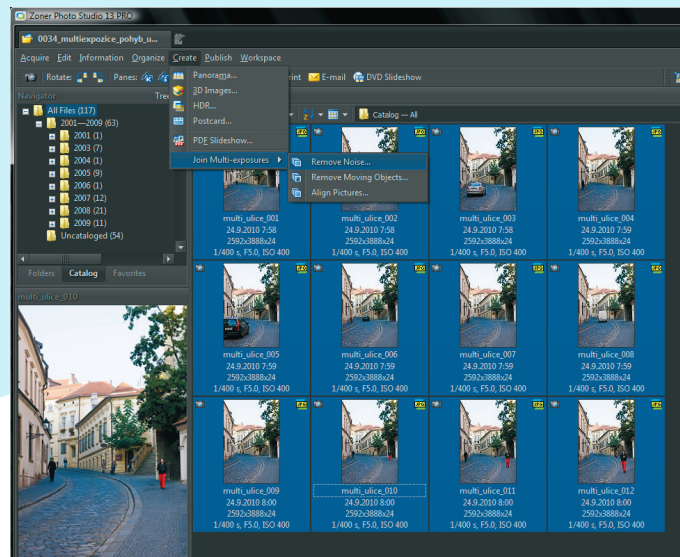
Intended for: [pros](#)

[Zoner Photo Studio 13](#) brings to the series an attractive way to remove moving objects from a picture. At first it may just seem like a toy, but really it can be much more than that—for example, for making your picture of Notre Dame Cathedral be about Notre Dame, and not about 86 people walking around in front of Notre Dame.



Removing moving objects is one of the major new features in version 13.

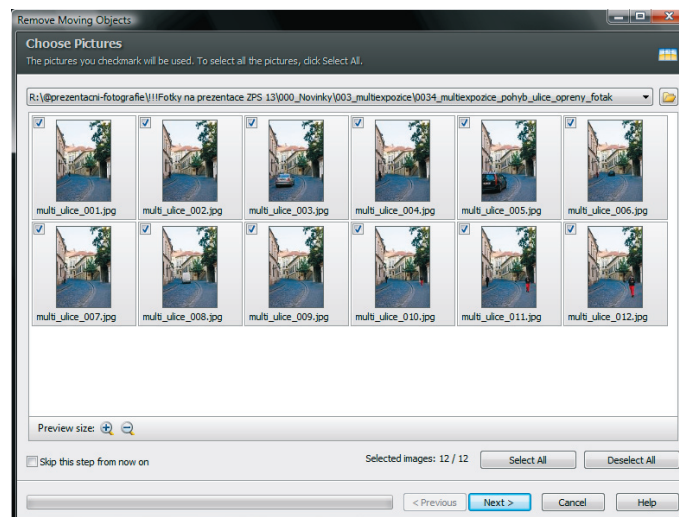
This feature is in the **Create** menu, under **Join multi-exposures**. All the tools in this group join multiple source pictures into one image, even if they were shot without a tripod. It's enough to shoot the pictures by hand and let the program automatically align them and send them onwards to e.g. Remove Moving Pictures.



The new Create menu has a Join Multi-exposures submenu with three new features.

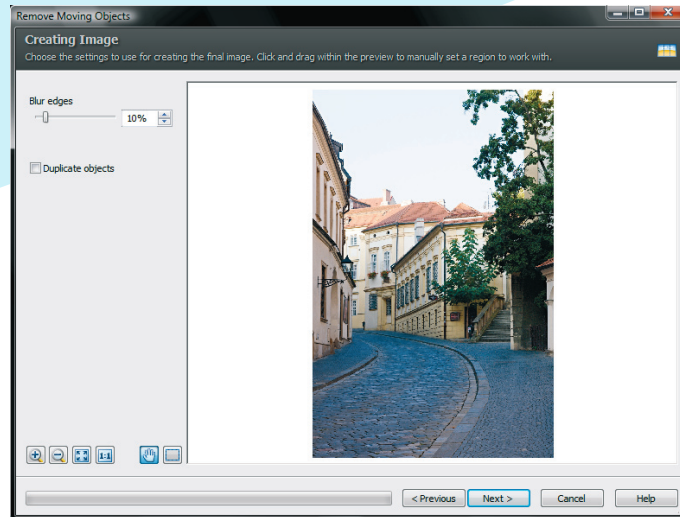
Delete Reality

Before starting work with multi-exposures, visit (or create and fill) the folder with the source pictures for the job. To use only some pictures in the folder, select them. To select them, use Ctrl+clicking and Shift+clicking as needed. If you simply want to use all pictures in the folder, don't select any pictures. Next use **Create | Join Multi-exposures | Remove Moving Objects...** to start the wizard. Use the first step of the wizard to deselect any pictures that were selected by mistake.



Use the first step to fix selection mistakes... or sometimes just as the most convenient way to make the selection.

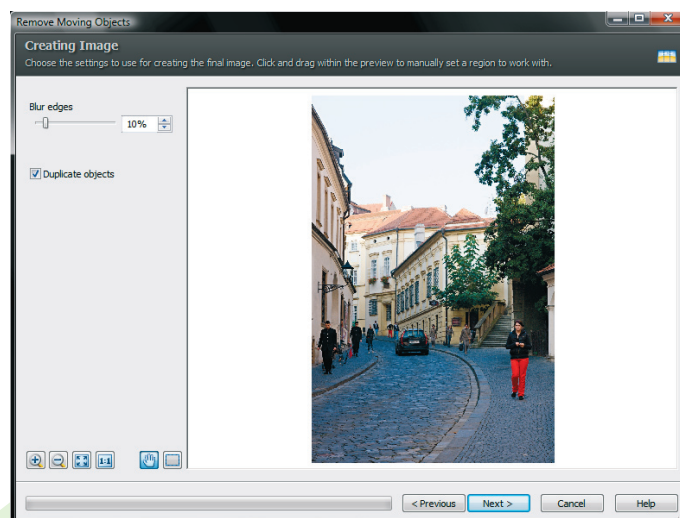
Like many steps in Zoner Photo Studio wizards, this step can be turned off for the future, using **Skip this step from now on**. In the next step, the program loads the source pictures into memory, aligns them, and crops them. Without this, the rest of the job would be practically impossible. In the step after that, the program automatically removes moving objects from the selected pictures. In practice this typically means removing cars, people, etc. from the scene.



With the right source photos (see below), it's just a few clicks to an empty street.

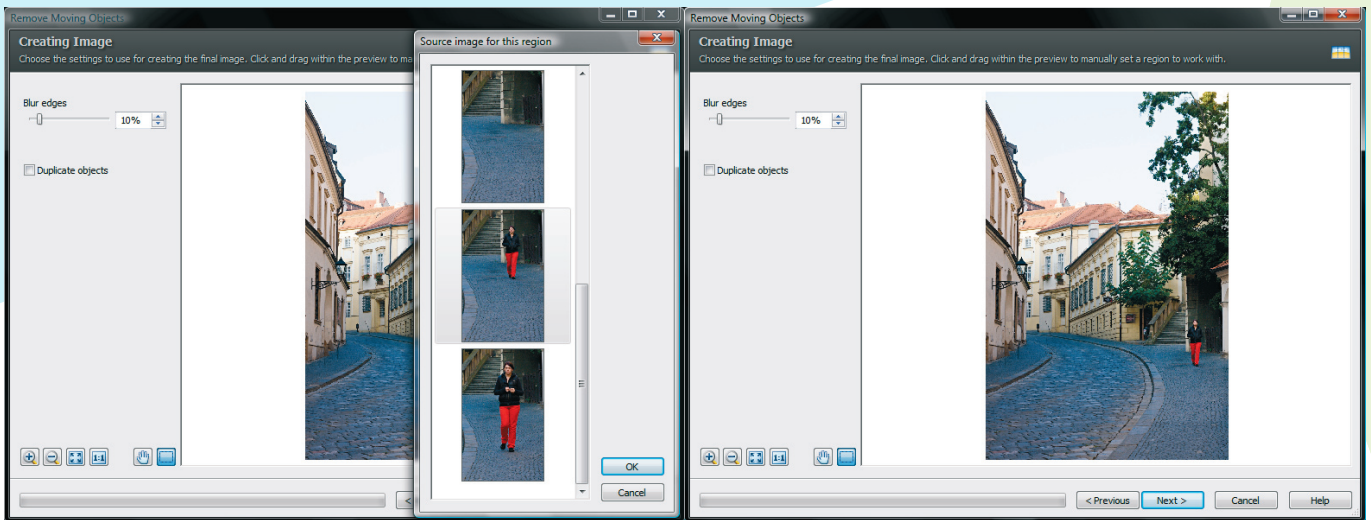
Multiply Reality

Note the **Duplicate objects** option in this step. Turn it on to make the final picture not remove the moving objects, but instead include copies of them from multiple source pictures.



Just a few clicks to an empty street... or an amusingly full one.

To make adjustments to which duplicates are included and where, click the “rectangle” button to the left of the preview pane. When you activate this function, the cursor changes to a crosshairs. Use the crosshairs to select an area of the picture. The window that then appears shows how that area looks in all source photos. To include the local contents of a specific source photo in the final picture, select the preview from that source photo and click OK.



The bigger the difference between the source photos, the easier your work.

Taking Good Source Photos

You may have noticed that in the illustration, there is a “ghost” image of one person. There are also a few too many “ghosts” when duplicating objects here. This is due to a less than ideal set of source pictures. They were taken using bracketing with a speed of about 1.3 pictures/second. The distances travelled by the moving people between photos were very small, and so the program does not have enough information to completely remove moving objects in all parts of the picture. To remove moving objects effectively, you need a set of pictures where, for every part of the scene that you want to be “empty,” there is at least one source photo that does have that part of the scene completely empty. Otherwise, ghost images like above are unavoidable.

Thus the ideal way to take source pictures for use with this feature is not bracketing, but instead giving two or more seconds between shots. Just how many seconds depends on how many moving objects there are in the scene.

If you haven't tried this tool out yet, we recommend you download the trial of [Zoner Photo Studio 13](http://www.zoner.com) and give it a shot!