

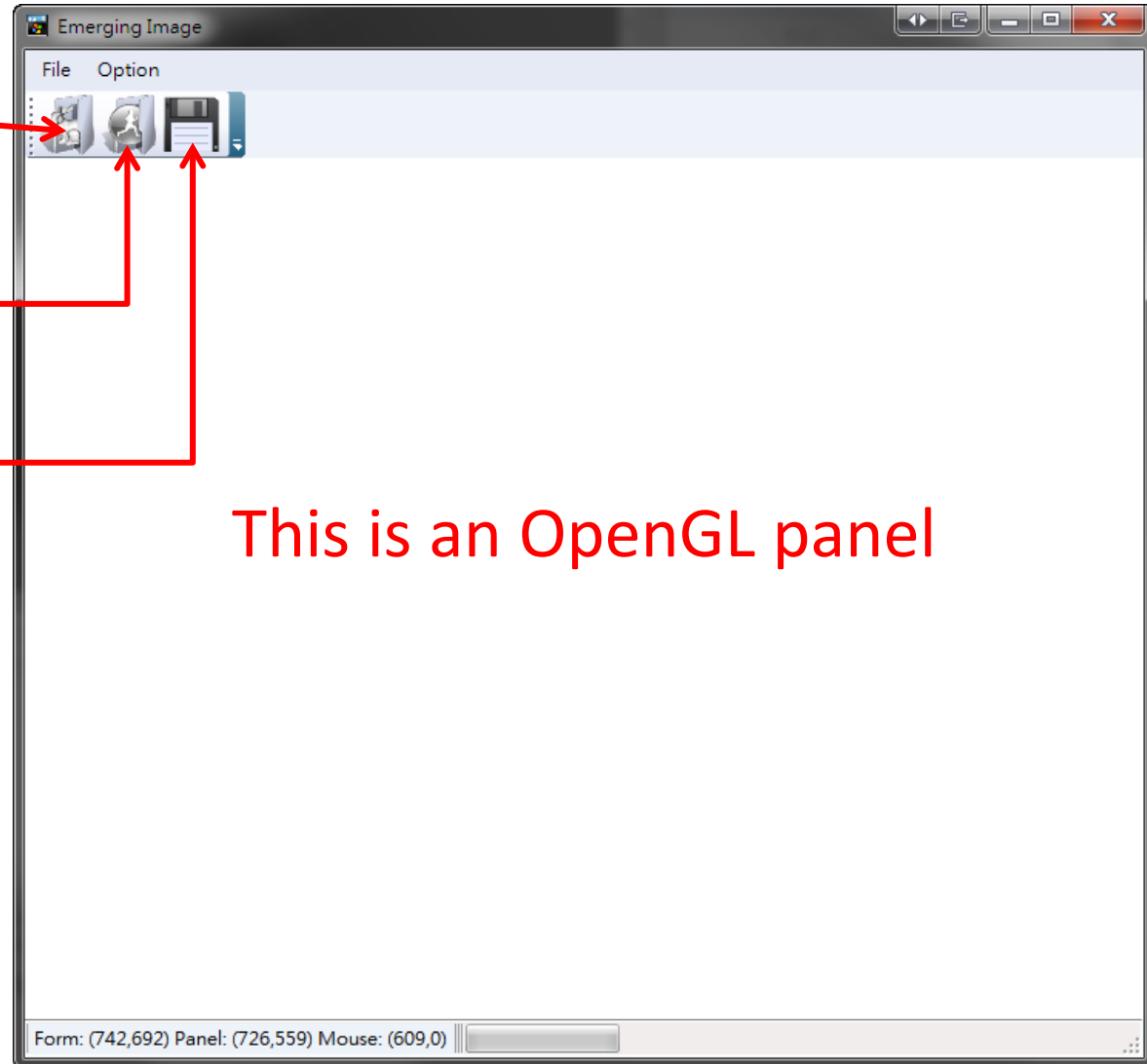
Emerging System User Manual

System I/O

Open single model and
Enter “Emerging Image(EI)” mode

Open keyframe models and
Enter “Emerging Video(EV)” mode

Save result as emerging image(s)




This is an OpenGL panel

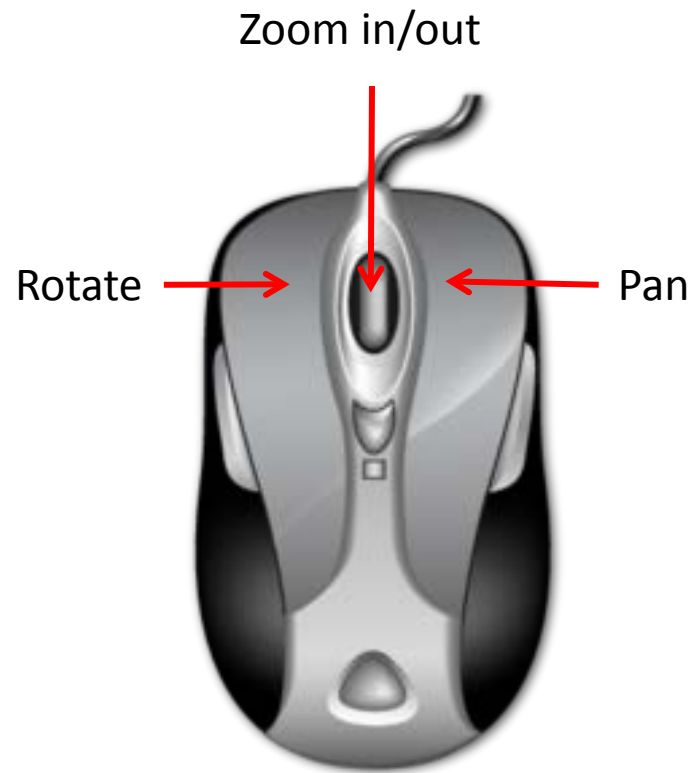
System I/O

- Open single model (EI mode)
 - File->Open->EI Data
 - Drag *.obj file to OpenGL panel
- Open keyframe models (EV mode)
 - File->Open->EV Data
 - Drag *.ev file to OpenGL panel
- Save result(s)
 - File->Save->Image(s)
 - In EI mode, the output is an emerging image (*.eps)
 - In EV mode, emerging image of each frame will be saved to the target folder

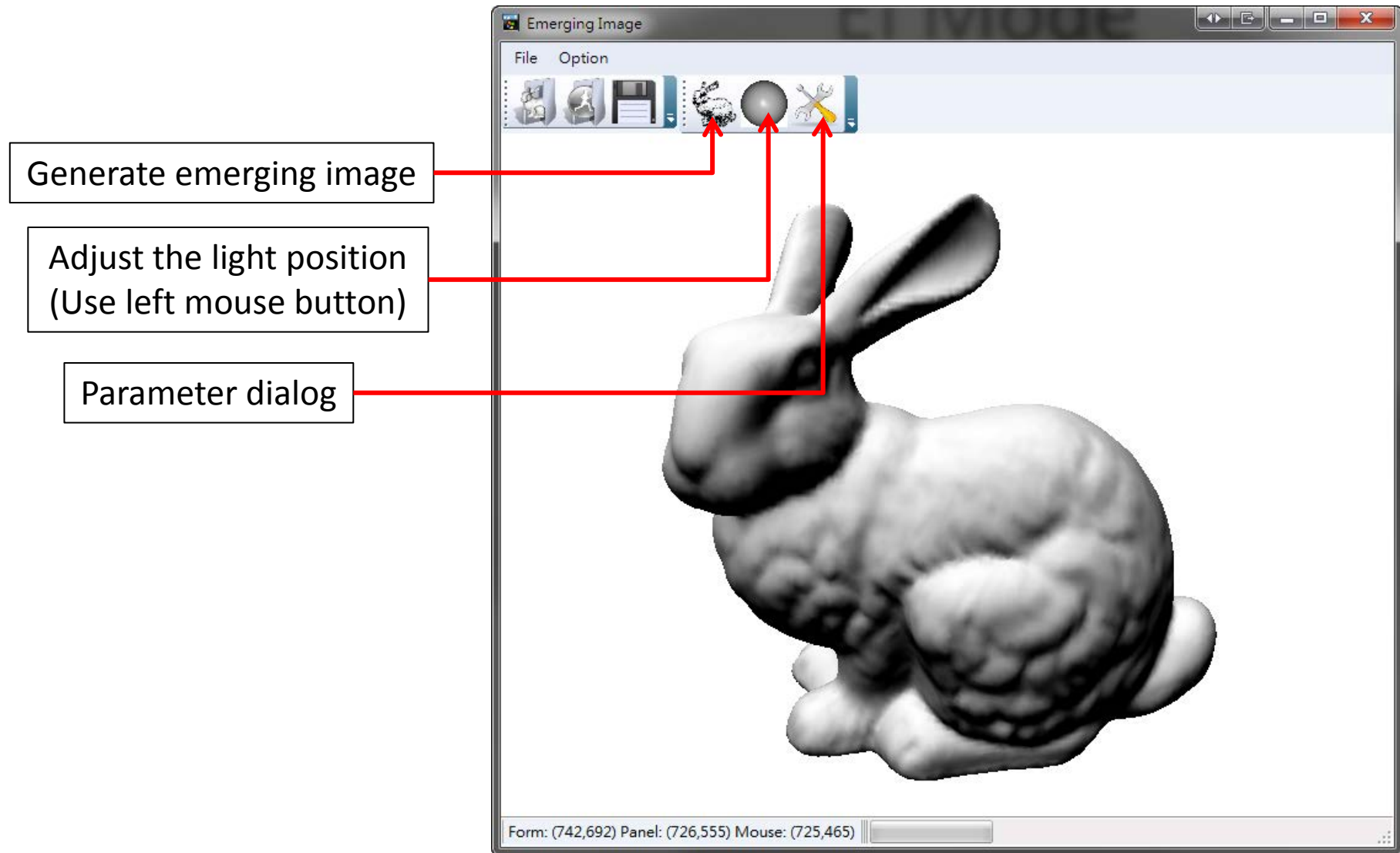
System I/O

- Open camera setting
 - File->Open->Camera
 - Drag *.view file to the main panel
- Save camera setting
 - File->Save->Camera
- Open light setting
 - File->Open->Light
 - Drag *.view file to the light panel 
- Save light setting
 - File->Save->Light

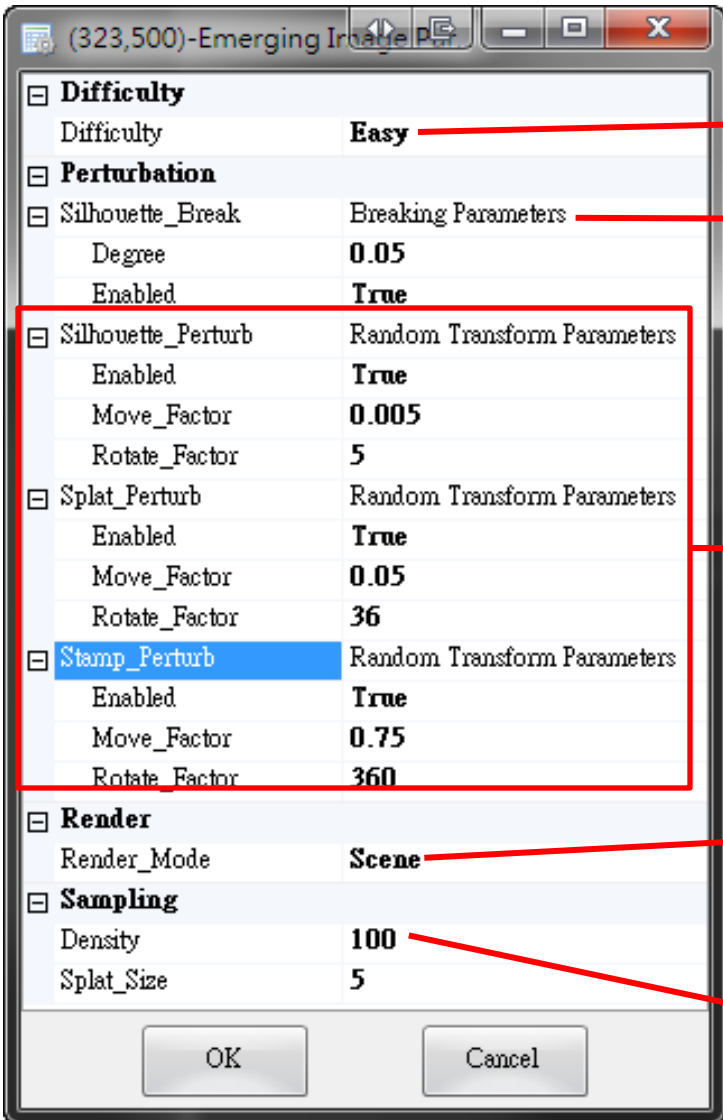
OpenGL Panel Manipulation



EI Mode



El Parameters



Difficulty levels. Value= Easy, Medium and Hard

Breaking the silhouette. Value=0.0(Disabled)~0.5

Rand. perturbation.

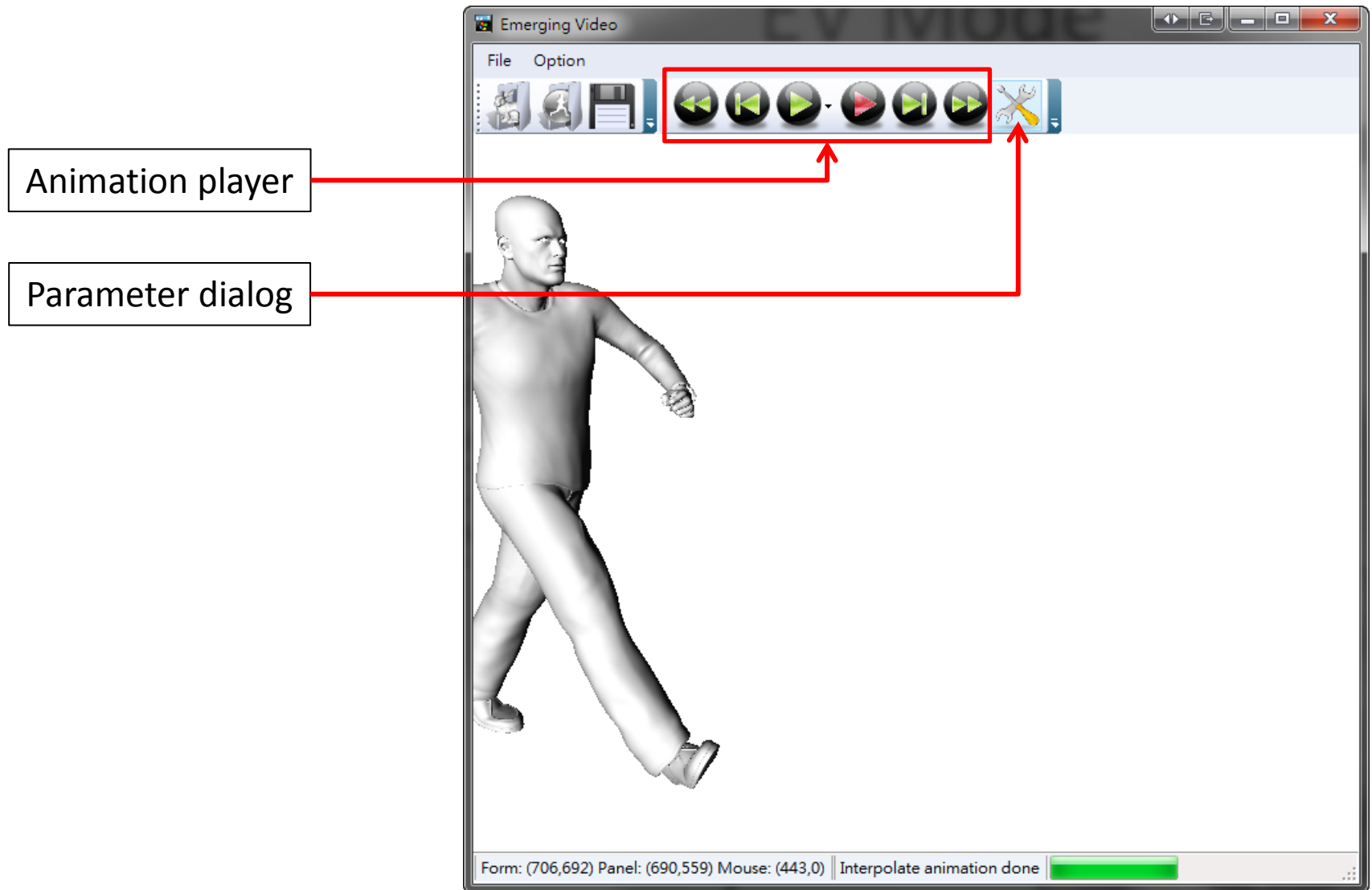
Move_Factor is the fraction of displacement
Rotate_Factor is the angle of rand. rotation between [angle, -angle]

Rendering states.

Scene= normal rendering
Develop= normal+emerging
Emerge= emerging

Splats density (0~100) and size (2~8)

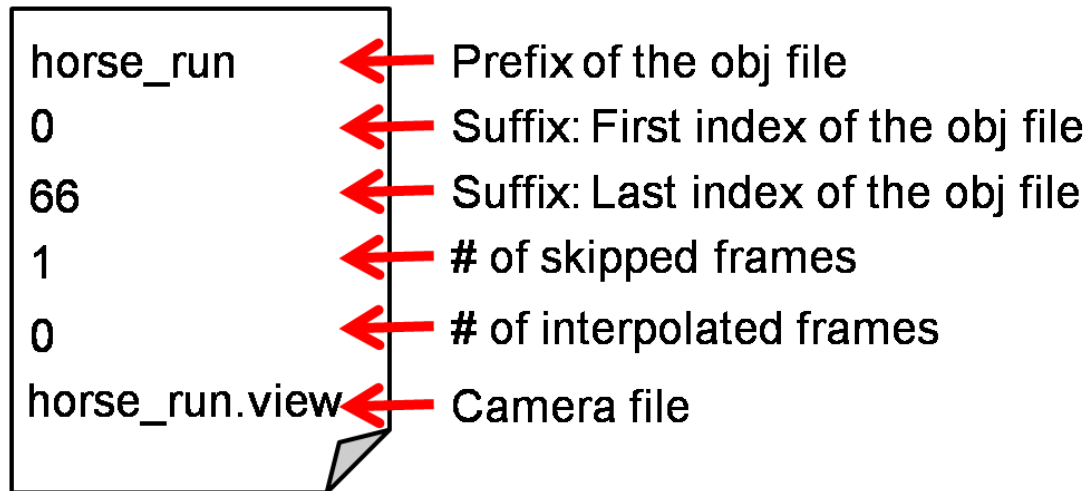
EV Mode



ev File Format


ev file format

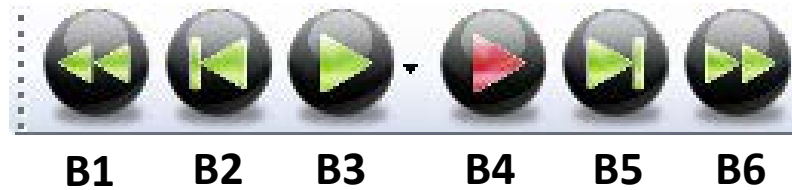
Example.ev



In this example, the program will read the following keyframe models, **horse_run_0.obj, horse_run_2.obj, ..., horse_run_65.obj, horse_run_66.obj**, and read the camera file “**horse_run.view**”.

Note that all obj files and view file must be put in the same folder as ev file.

- Generate emerging video
 - Open the parameter dialog and set Render_Mode to “Emerge” or “Develop”
 - Play the animation
 - (Optional) if you want to save emerging image of each frame, click  and pick a target location.
- Simple animation player



- B1:** Rewind the animation by one frame.
- B2:** Go to the first frame of the animation.
- B3:** Play the animation.
- B4:** Record the animation. When the button is pressed, the program will save the result (normal/emerging rendering) into a image file (bmp/eps).
- B5:** Go to the last frame of the animation.
- B6:** Forward the animation by one frame.

Parameters

The image shows a screenshot of a software window titled "(312,378)-Emerging Video". It contains a list of parameters organized into four sections, each with a collapse/expand icon (a small square with a minus sign). The parameters are as follows:

Section	Parameter	Value
Difficulty	Difficulty	Easy
Perturbation	Splat_Perturb	Random Transform Parameters
	Enabled	True
	Move_Factor	0.05
	Rotate_Factor	36
Stamp_Perturb	Stamp_Perturb	Random Transform Parameters
	Enabled	True
	Move_Factor	0.75
	Rotate_Factor	360
Render	Render_Mode	Scene
Sampling	Density	100
	Splat_Size	6

At the bottom of the window are two buttons: "OK" and "Cancel".

Difficulty levels (Easy, Medium and Hard).

Rand. perturbation.

Move_Factor is the fraction of displacement
Rotate_Factor is the angle of rand. rotation between
[angle, -angle]

Rendering states.

Scene= normal rendering
Develop= normal+emerging
Emerge= emerging

Splats density (0~100) and size (2~8)

Tested Platform/Environment

- Win XP, Win Vista and Win 7
- Support .Net framework 1.0 or above
- Support OpenGL 1.2 or above