



Pylon Daylight

Lighting in formZ just got a lot easier.

www.pylontechnical.com

©2006 Pylon Technical

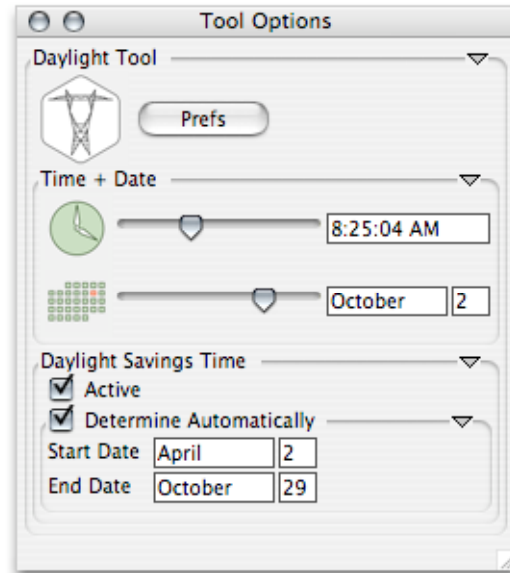
formZ® is a registered trademark of auto•des•sys, Inc

CONTENTS

1 INTRODUCTION	3
2 GETTING STARTED	3
2.1 Finding Daylight	3
2.2 Setting up the Sun	3
3 DAYLIGHT TOOL OPTIONS	4
4 PREFERENCES.....	5
5 OBTAINING VERSION INFORMATION	6
6 TIPS FOR USING DAYLIGHT	6
7 KNOWN ISSUES.....	7

1 Introduction

The Daylight tool allows architects and landscape designers the freedom to interactively 'move' through time, observing how the sun will affect their virtual structure throughout the day or over the course of a year. Moving the cursor in the modeling window scrubs back and forth in time, just like a non-linear video editor. Daylight was designed to be used with Interactive shaded mode configured to display shadows, or with small RenderZone renders. Additionally, Pylon Daylight can apply daylight savings time automatically, according to user-defined start and end dates.



2 Getting Started

2.1 Finding Daylight

After installing the Pylon Lighting Collection, a new row of tools will be added to your tool palette, called 'Lighting and Rendering.' You'll find Daylight in this new row. (If you want, you can move your new tools to another location by selecting Palettes > Customize Tools.)

2.2 Setting up the Sun

To use Pylon Daylight, select a Sun light whose Light direction from Sun parameter has been set to By Site, Date, and time Zone. If you have not selected an appropriate light, Daylight's Tool Options are greyed out.

To convert an existing light to a Sun light of the appropriate type, first click on its Distant icon in the Lights palette to make it the Sun. The double-click on the light's name to invoke the Light Parameters dialog. Make the light a Distant light, then click on the Light direction from Sun... button. In the resulting dialog, select By Site, Date, and time Zone, and then enter the location of your site. For more information, consult the formZ user manual.

3 Daylight Tool Options

Time



Click on this icon to engage interactive time scrubbing. Click anywhere in the modeling window (near the center is usually best), then move the cursor horizontally to adjust the time of day. Click again to confirm the change. You can change the action of the mouse movement in Preferences.

Time Slider

Drag the slider to jump to a different time of day. The AM is located on the left side of the slider, noon is at the center, and the PM on the right.

Time Text Entry

Enter a time value and the sun will jump to that time. Values may be entered in any number of formats: 3:00 PM, 3 PM, 3, and 15 will all set the time to 3 o'clock in the afternoon.

Date



Click on this icon to engage interactive date scrubbing. Click anywhere in the modeling window (near the center is usually best), then move the cursor horizontally to adjust the date. Click again to confirm the change. If daylight savings is set to be determined automatically, you will see the sun jump at the start and end dates.

Date Slider

Drag the slider to jump to a different date. January 1st on the left side of the slider, December 31st on the right.

Date Text Entry

Enter a date value and the sun will jump to that date. The month parameter may be entered in any number of formats: October, Oct, and 10 are all valid. The way months are displayed can be changed though preferences (see below).

Daylight Savings Time: Active

If **Daylight Savings Time: Determine Automatically** is checked, this checkbox will indicate whether the position of the sun is currently being affected by daylight savings time (i.e., if daylight savings time is in force). If **Determine Automatically** is not checked, this checkbox serves as a control instead, allowing you to toggle daylight savings time on and off directly, regardless of the date. (The latter mode is the way that the checkbox in formZ's Sun dialog works.)

Daylight Savings Time: Determine Automatically

When this option is on, whether daylight savings time is active or not determined automatically, by the start and end dates indicated in the text fields below. The month parameter may be entered in any number of formats: October, Oct, and 10 are all valid. The month display format may be changed though preferences (see below).

4 Preferences

Cursor Tracking: Sensitivity

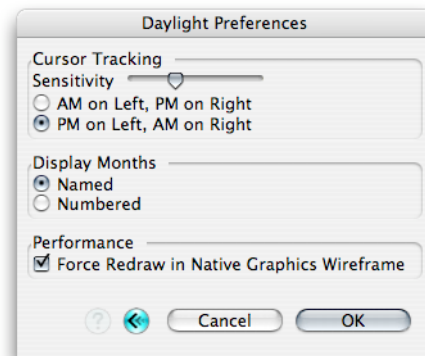
When set at left, mouse movements result in more precise but slower control of time; at right, mouse movements result in faster but coarser control.

Cursor Tracking: AM on Left, PM on Right

When interactively manipulating time, moving the cursor to the left sets the time earlier in the day, to the right, later.

Cursor Tracking: PM on Left, AM on Right

When interactively manipulating time, moving the cursor to the left sets the time later in the day, to the right, earlier. This breaks with the convention of lower values being on the left, but is more intuitive when viewing your scene from the south--- moving the cursor from the right to left will make the sun rise in the east (right side of screen) and set in the west (left side of screen).



Display Months: Named or Numbered

Controls display of Months in all Daylight text fields. Text entry be made in any format (October, Oct, 10) , regardless of this setting.

Performance: Force Redraw in native Graphics Wireframe

If you are experiencing 'screen artifacts' while orbiting lights, turn this on. This doesn't seem necessary after some recent formZ patches, but we're leaving it in just in case. Turning this on will slow screen updates somewhat, so leave it off if your system doesn't need it. Off by default.

Saving Preferences

Changes made to Daylight Preferences are by default only saved for the duration of your modeling session. Like all other tools, If you want to save your preferences for subsequent modeling sessions, go to formZ's general preference dialog (formZ > Preferences > System > General) and save a new general preference set (or save over your old one).

formZ tech support recommends that you make save your preferences only at the beginning of your modeling session. We at Pylon concur.

5 Obtaining Version Information

Click on the Pylon Logo in *Tool Options* for version information and credits.

6 Tips for Using Daylight

Display mode

In general, Daylight is most useful in Interactive Shaded mode with shadows turned on, or in with a small Renderzone window (so re-rendering is relatively quick).

7 Known Issues

The following minor issues are due to bugs in the formZ Application Programming Interface (API). They will be corrected if/when ADS attends to the underlying problems.

- The 'time' field currently displays military (24 hour) time rather than in the native time format of the user's system. This should be resolved soon.

www.pylontechnical.com

©2006 Pylon Technical

formZ® is a registered trademark of auto•des•sys, Inc

rev. 1.0.3