

AUTODESK® FIRE®  2008 SP5

AUTODESK® SMOKE®  2008 SP5

AUTODESK® BACKDRAFT® CONFORM 2008 SP5

Release Notes

Autodesk®



© 2008 Autodesk, Inc./Autodesk Canada Co. All rights reserved. Except as otherwise permitted by Autodesk, Inc./Autodesk Canada Co., this publication, or parts thereof, may not be reproduced in any form, by any method, for any purpose.

Autodesk® Inferno® 2009, Autodesk® Flame® 2009, Autodesk® Flint® 2009, Autodesk® Smoke® 2009, Autodesk® Backdraft® Conform 2009

Portions relating to MXF-SDK was developed by Media, Objects and Gadgets - Soluções de

Software e Hardware, S.A. (<http://www.mog-solutions.com>) in co-operation with Institut für Rundfunktechnik GmbH (<http://www.irt.de>).

Portions relating to Libxalan-c 1.9.0 are Copyright © 1999-2004. The Apache Software Foundation. Licensed under the Apache License, Version 2.0 (the "License"); you may not use this file except in compliance with the License. You may obtain a copy of the License at <http://www.apache.org/licenses/LICENSE-2.0>. Unless required by applicable law or agreed to in writing, software distributed under the License is distributed on an "AS IS" BASIS, WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, either express or implied. See the License for the specific language governing permissions and limitations under the License.

Portions relating to Libxerces-c 2.6.0 are copyright 1999-2000, 2004 The Apache Software Foundation. Licensed under the Apache License, Version 2.0 (the "License"); you may not use this file except in compliance with the License. You may obtain a copy of the License at <http://www.apache.org/licenses/LICENSE-2.0>. Unless required by applicable law or agreed to in writing, software distributed under the License is distributed on an "AS IS" BASIS, WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, either express or implied. See the License for the specific language governing permissions and limitations under the License.

Portions relating to JPEG © Copyright 1991-1998 Thomas G. Lane. All rights reserved. This software is based in part on the work of the Independent JPEG Group.

Portions relating to Libnuma Copyright 2002, 2004, Andi Kleen, SuSE Labs. Libnuma is under the GNU Lesser General Public License, v 2.1.

Portions relating to Libelf v 0.97 © 2008 Michael Riepe. Distributed under the terms of the GNU Lesser General Public License, v 2.1.

Portions relating to OpenMotif Copyright © 2007 by Integrated Computer Solutions, Inc. This material may be distributed only subject to the terms and conditions set forth in the Open Publication License, v2 .3 or later (the latest version is presently available at <http://www.opencontent.org/openpub/>).

Portions relating to LAPACK © 1999. LAPACK Users' Guide Third Edition is the official reference for LAPACK.

Portions relating to BLAS © 2005. ACM Transactions on Mathematical Software.

Portions relating to MD5 Copyright © 1991-2, RSA Data Security, Inc. Created 1991. All rights reserved. License to copy and use this software is granted provided that it is identified as the "RSA Data Security, Inc. MD5 Message-Digest Algorithm" in all material mentioning or referencing this software or this function. License is also granted to make and use derivative works provided that such works are identified as "derived from the RSA Data Security, Inc. MD5 Message-Digest Algorithm" in all material mentioning or referencing the derived work. RSA Data Security, Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind. These notices must be retained in any copies of any part of this documentation and/or software.

Portions relating to LibGCC Copyright © 2007 The GCC Team. Distributed under the terms of the GNU General Public License (or the Lesser GPL) <http://www.gnu.org/copyleft/library.html>.

Portions relating to ALSA version 1.0.6 Copyright © 2004 Jaroslav Kysela, Abramo Bagnara, Takashi Iwai, and Frank van de Pol.

Portions relating to Audiobogus Copyright © 1998-1999, Michael Pruett (michael@68k.org).

Portions relating to Audiofile 0.2.6 Copyright © 2005 Michael Pruett. Distributed under the terms of GNU General Public License, v2.

Portions relating to Berkeley Database software Copyright ©1990-2002, Sleepycat Software. All rights reserved. Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met: 1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer. 2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution. 3. Redistributions in any form must be accompanied by information on how to obtain complete source code for the DB software and any accompanying software that uses the DB software. The source code must either be included in the distribution or be available for no more than the cost of distribution plus a nominal fee, and must be freely redistributable under reasonable conditions. For an executable file, complete source code means the source code for all modules it contains. It does not include source code for modules or files that typically accompany the major components of the operating system on which the executable file runs. THIS SOFTWARE IS PROVIDED BY SLEEPYCAT SOFTWARE "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, OR NON-INFRINGEMENT, ARE DISCLAIMED. IN NO EVENT SHALL SLEEPYCAT SOFTWARE BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Portions relating to DIRAC Time Stretch/Pitch Shift technology licensed from The DSP Dimension, <http://www.dsdimension.com> Developed and © 2005 Stephan M. Bernsee.

Portions relating to GLEE Copyright © 2006 Ben Woodhouse. All rights reserved. Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met: 1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer as the first lines of this file unmodified. 2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution. THIS SOFTWARE IS PROVIDED BY BEN WOODHOUSE "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL BEN WOODHOUSE BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Portions of LibFreeType 2.1.19 are copyright © 2000. The FreeType Project (www.freetype.org). All rights reserved.

Portions relating to LibImageDL software are Copyright © 1991, 1999 Free Software Foundation, Inc.

Portions relating to Libpopt Copyright © 1998 Red Hat Software. Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions: The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software. THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE X CONSORTIUM BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the X Consortium shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the X Consortium.

Portions relating to libquicktime, Copyright © 2007. Distributed under the terms of the GNU General Public License (or the Lesser GPL).

Portions relating to Mesa Copyright © 1999-2007 Brian Paul. All Rights Reserved. Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions: The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software. THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL BRIAN PAUL BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Portions relating to Open Inventor 2.1.5-9 Copyright © 1991, 1999 Free Software Foundation, Inc.

Portions relating to Python version 2.3.3 Copyright © 2001, 2002, 2003 Python Software Foundation; All Rights Reserved.

Portions relating to XXDiff Copyright © 1999-2004, Martin Blais. All Rights Reserved.

Portions powered by Automatic Duck. © 2006 Automatic Duck, Inc. All rights reserved.

PORTIONS OF THIS PRODUCT IS LICENSED UNDER THE VC-1 PATENT PORTFOLIO LICENSE FOR THE PERSONAL AND NON-COMMERCIAL USE OF A CONSUMER TO (i) ENCODE VIDEO IN COMPLIANCE WITH THE VC-1 STANDARD ("VC-1 VIDEO") AND/OR (ii) DECODE VC-1 VIDEO THAT WAS ENCODED BY A CONSUMER ENGAGED IN A PERSONAL AND NON-COMMERCIAL ACTIVITY AND/OR WAS OBTAINED FROM A VIDEO PROVIDER LICENSED TO PROVIDE VC-1 VIDEO. NO LICENSE IS GRANTED OR SHALL BE IMPLIED FOR ANY OTHER USE. ADDITIONAL INFORMATION MAY BE OBTAINED FROM MPEG LA, L.L.C. SEE [HTTP://WWW.MPEGLA.COM](http://WWW.MPEGLA.COM).

Portions relating to Glibc file contains the copying permission notices for various files in the GNU C Library distribution that have copyright owners other than the Free Software Foundation. These notices all require that a copy of the notice be included in the accompanying documentation and be distributed with binary distributions of the code, so be sure to include this file along with any binary distributions derived from the GNU C Library.

Portions relating to X11-libs v. 6.8.2 Copyright © 1994-2003 The XFree86 Project, Inc. All Rights Reserved. Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions: The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software. THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE XFREE86 PROJECT BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE. Except as contained in this

notice, the name of the XFree86 Project shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the XFree86 Project.

Portions relating to zlib ©1995-2004 Jean-loup Gailly and Mark Adler. This software is provided 'as-is', without any express or implied warranty. In no event will the authors be held liable for any damages arising from the use of this software.

Portions relating to FireFox 2 are © 2005-2008. Mozilla. All rights reserved. Distributed under the Mozilla Public License Version 1.1.

Autodesk® WiretapCentral™ 2009

Portions relating to Libxalan-c 1.8.0 are Copyright © 2004 The Apache Software Foundation. Licensed under the Apache License, Version 2.0 (the "License"); you may not use this file except in compliance with the License. You may obtain a copy of the License at <http://www.apache.org/licenses/LICENSE-2.0>. Unless required by applicable law or agreed to in writing, software distributed under the License is distributed on an "AS IS" BASIS, WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, either express or implied. See the License for the specific language governing permissions and limitations under the License. This product includes software developed by the Apache Software Foundation (<http://www.apache.org/>).

Portions relating to Libxerces-c 2.5.0 are Copyright © 1999-2004 The Apache Software Foundation. All rights reserved. Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met: 1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer. 2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution. 3. The end-user documentation included with the redistribution, if any, must include the following acknowledgment: "This product includes software developed by the Apache Software Foundation (<http://www.apache.org/>)." Alternately, this acknowledgment may appear in the software itself, if and wherever such third-party acknowledgments normally appear. 4. The names "Xerces" and "Apache Software Foundation" must not be used to endorse or promote products derived from this software without prior written permission. For written permission, please contact apache@apache.org. 5. Products derived from this software may not be called "Apache" nor may "Apache" appear in their name, without prior written permission of the Apache Software Foundation. THIS SOFTWARE IS PROVIDED "AS IS" AND ANY EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE APACHE SOFTWARE FOUNDATION OR ITS CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Portions relating to JPEG are copyright © 1991-1996, Thomas G. Lane. All Rights Reserved except as specified below. The authors make NO WARRANTY or representation, either express or implied, with respect to this software, its quality, accuracy, merchantability, or fitness for a particular purpose. This software is provided "AS IS", and you, its user, assume the entire risk as to its quality and accuracy.

Autodesk® SystemCentral™ 2009

Portions relating to pySerial Copyright © 2001-2004 Chris Liechti cliechti@gmx.net; All Rights Reserved.

Autodesk® Inferno® 2009, Autodesk® Flame® 2009, Autodesk® Flint® 2009, Autodesk® Smoke® 2009, Autodesk® Backdraft® Conform 2009, and Autodesk® WiretapCentral™ 2009

Portions relating to OpenExr 1.2.1 Copyright © 2004, Industrial Light & Magic, a division of Lucasfilm Entertainment Company Ltd. Portions contributed and copyright held by others as indicated. All rights reserved. Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met: Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution. Neither the name of Industrial Light & Magic nor the names of any other contributors to this software may be used to endorse or promote products derived from this software without specific prior written permission. THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Portions relating to libtiff are Copyright © 1988-1997 Sam Leffler. Copyright © 1991-1997 Silicon Graphics, Inc. Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that (i) the above copyright notices and this permission notice appear in all copies of the software and related documentation, and (ii) the names of Sam Leffler and Silicon Graphics may not be used in any advertising or publicity relating to the software without the specific, prior written permission of Sam Leffler and Silicon Graphics. THE SOFTWARE IS PROVIDED "AS-IS" AND WITHOUT WARRANTY OF ANY KIND, EXPRESS, IMPLIED OR OTHERWISE, INCLUDING WITHOUT LIMITATION, ANY WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT SHALL SAM LEFFLER OR SILICON GRAPHICS BE LIABLE FOR ANY SPECIAL, INCIDENTAL, INDIRECT OR CONSEQUENTIAL DAMAGES OF ANY KIND, OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR

PROFITS, WHETHER OR NOT ADVISED OF THE POSSIBILITY OF DAMAGE, AND ON ANY THEORY OF LIABILITY, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Portions relating to libffmpeg Copyright © 2003-2006, Fabrice Bellard.

Portions relating to LAME 3.97 Copyright © 2006 Mark Cheng. www.mp3dev.org. Distributed under the terms of the GNU General Public License (or the Lesser GPL) <http://www.gnu.org/copyleft/library.html>.

PORTIONS RELATING TO H. 264 IS LICENSED UNDER THE AVC PATENT PORTFOLIO LICENSE FOR THE PERSONAL AND NON-COMMERCIAL USE OF A CONSUMER TO (i) ENCODE VIDEO IN COMPLIANCE WITH THE AVC STANDARD ("AVC VIDEO") AND/OR (ii) DECODE AVC VIDEO THAT WAS ENCODED BY A CONSUMER ENGAGED IN A PERSONAL AND NON-COMMERCIAL ACTIVITY AND/OR WAS OBTAINED FROM A VIDEO PROVIDER LICENSED TO PROVIDE AVC VIDEO. NO LICENSE IS GRANTED OR SHALL BE IMPLIED FOR ANY OTHER USE. ADDITIONAL INFORMATION MAY BE OBTAINED FROM MPEG LA, L.L.C. SEE [HTTP://WWW.MPEGLA.COM](http://WWW.MPEGLA.COM).

PORTIONS OF THIS PRODUCT IS LICENSED UNDER THE MPEG-4 VISUAL PATENT LICENSE PORTFOLIO LICENSE FOR THE PERSONAL AND NON-COMMERCIAL USE OF A CONSUMER FOR (i) ENCODING VIDEO IN COMPLIANCE WITH THE MPEG-4 VISUAL STANDARD ("MPEG-4 VIDEO") AND/OR (ii) DECODING MPEG-4 VIDEO THAT WAS ENCODED BY A CONSUMER ENGAGED IN A PERSONAL AND NON-COMMERCIAL ACTIVITY AND/OR WAS OBTAINED FROM A VIDEO PROVIDED LICENSED BY MPEG LA TO PROVIDE MPEG-4 VIDEO. NO LICENSE IS GRANTED OR SHALL BE IMPLIED FOR ANY OTHER USE. ADDITIONAL INFORMATION INCLUDING THAT RELATING TO PROMOTIONAL, INTERNAL USES AND LICENSING MAY BE OBTAINED FROM MPEG LA, LLC. SEE [HTTP://WWW.MPEGLA.COM](http://WWW.MPEGLA.COM).

PORTIONS OF THIS PRODUCT IS LICENSED UNDER THE MPEG-2 PATENT PORTFOLIO LICENSE ANY USE OF THIS PRODUCT OTHER THAN CONSUMER PERSONAL USE IN ANY MANNER THAT COMPLIES WITH THE MPEG-2 STANDARD FOR ENCODING VIDEO INFORMATION FOR PACKAGED MEDIA IS EXPRESSLY PROHIBITED WITHOUT A LICENSE UNDER APPLICABLE PATENTS IN THE MPEG-2 PATENT PORTFOLIO, WHICH LICENSE IS AVAILABLE FROM MPEG LA, L.L.C., 250 STEELE STREET, SUITE 300, DENVER, COLORADO 80206.

Portions relating to MPEG Layer- 3, supply of this product does not convey a license under the relevant intellectual property of Thomson multimedia and/or Fraunhofer Gesellschaft nor imply any right to use this product in any finished end user or ready-to-use final product. An independent license for such use is required. For details, please visit <http://www.mp3licensing.com>.

The following are registered trademarks or trademarks of Autodesk, Inc., in the USA and other countries: 3DEC (design/logo), 3December, 3December.com, 3ds Max, ActiveShapes, Actrix, ADI, Alias, Alias (swirl design/logo), AliasStudio, Alias|Wavefront (design/logo), ATC, AUGI, AutoCAD, AutoCAD Learning Assistance, AutoCAD LT, AutoCAD Simulator, AutoCAD SQL Extension, AutoCAD SQL Interface, Autodesk, Autodesk Envision, Autodesk Insight, Autodesk Intent, Autodesk Inventor, Autodesk Map, Autodesk MapGuide, Autodesk Streamline, AutoLISP, AutoSnap, AutoSketch, AutoTrack, Backdraft, Built with ObjectARX (logo), Burn, Buzzsaw, CAiCE, Can You Imagine, Character Studio, Cinestream, Civil 3D, Cleaner, Cleaner Central, ClearScale, Colour Warper, Combustion, Communication Specification, Constructware, Content Explorer, Create>what's>Next> (design/logo), Dancing Baby (image), DesignCenter, Design Doctor, Designer's Toolkit, DesignKids, DesignProf, DesignServer, DesignStudio, Design|Studio (design/logo), Design Web Format, Design Your World, Design Your World (design/logo), DWF, DWG, DWG (logo), DWG TrueConvert, DWG TrueView, DXF, EditDV, Education by Design, Exposure, Extending the Design Team, FBX, Filmbox, FMDesktop, Freewheel, GDX Driver, Gmax, Heads-up Design, Heidi, HOOPS, HumanIK, i-drop, iMOUT, Incinerator, IntroDV, Inventor, Inventor LT, Kaydara, Kaydara (design/logo), LocationLogic, Lustre, Maya, Mechanical Desktop, MotionBuilder, Mudbox, NavisWorks, ObjectARX, ObjectDBX, Open Reality, Opticore, Opticore Opus, PolarSnap, PortfolioWall, Powered with Autodesk Technology, Productstream, ProjectPoint, ProMaterials, Reactor, RealDWG, Real-time Roto, Recognize, Render Queue, Reveal, Revit, Showcase, ShowMotion, SketchBook, SteeringWheels, StudioTools, Topobase, Toxik, ViewCube, Visual, Visual Bridge, Visual Construction, Visual Drainage, Visual Hydro, Visual Landscape, Visual Roads, Visual Survey, Visual Syllabus, Visual Toolbox, Visual Tugboat, Visual LISP, Voice Reality, Volo, Wiretap, and WiretapCentral.

The following are registered trademarks or trademarks of Autodesk Canada Co. in the USA and/or Canada and other countries: Backburner, Discreet, Fire, Flame, Flint, Frost, Inferno, Multi-Master Editing, River, Smoke, Sparks, Stone, and Wire.

Automatic Duck and the duck logo are trademarks of Automatic Duck, Inc. All other brand names, product names or trademarks belong to their respective holders.

FFmpeg is a trademark of Fabrice Bellard, originator of the FFmpeg project.

All other brand names, product names or trademarks belong to their respective holders.

Disclaimer

THIS PUBLICATION AND THE INFORMATION CONTAINED HEREIN IS MADE AVAILABLE BY AUTODESK, INC./AUTODESK CANADA CO., "AS IS." AUTODESK, INC. DISCLAIMS ALL WARRANTIES, EITHER EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO ANY IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE REGARDING THESE MATERIALS.

Published by:

Autodesk, Inc.

111 McInnis Parkway
San Rafael, CA 94903, USA

Title: Autodesk Fire, Smoke, and Backdraft Conform 2008 SP5 Release Notes

Document Version: 1

Date: October 10, 2008

contents

Contents

1	Release Information	1
	Summary	1
	About These Release Notes	1
	New Information for This Release	1
	Related Documentation	2
	Compatibility	3
	Contacting Customer Support	4
2	System Information	7
	Summary	7
	Overview	7
	Licensing Requirements	8
	Operating System Requirements	9
	DKU Version Requirement	10
	Hardware System Requirements	11
	Mandatory AJA OEM 2K Firmware Upgrade	12
	XR Configuration Utility Error	12
	Standard Filesystem Support (Linux Only)	13
	Support for 720p and Custom Resolutions in sw_io_perf_tool	14
	Soft-Imported or Published Media is Not Backward Compatible	15
	Stone and Wire Compatibility	15
	Preventing Symbolic Links Across Filesystems	17
	Installing the Standalone Stone and Wire Package	18
	Changes to the Linux installation for Burn nodes	18
	Troubleshooting Missing Frames	19
	Recommended Archiving Strategies for Linux Workstations	20

About Data Archiving Devices	21
File Archiving Over NFS	22
Cleaner® XL Version 1.5.2 Required	23
Linux vs. IRIX Product Characteristics	23
Miscellaneous	24

3 User's Guide Addendum 27

Summary	27
DI Specific Features In The User Guides	27
FBX 2006.11 Support	27
Clip Input Using a Spirit DataCine System	28
DVE	28
EditDesk	28
Hot Keys	29
Managing Projects and Users	29
Preferences	30
New Feature Supported for AAF/XML Files	30
Soft-Import	30

4 Installation Documentation Workflows 31

Summary	31
Overview	31
Reinstalling from Scratch	31
Connecting New or Expanded Stone Direct Storage	32
Upgrading Your Effects or Editing Application	33
Upgrading Your Operating System	34
Which Document Do I Need	34



Release Information

Summary

About These Release Notes	1
New Information for This Release	1
Related Documentation	2
Compatibility	3
Contacting Customer Support	4

About These Release Notes

This document provides important release information for the Service Pack 5 release of Autodesk® Fire® 2008, Autodesk Smoke® 2008, and Autodesk Backdraft® Conform 2008. You can find the latest version of this document at <http://www.autodesk.com/me-documentation>.

This document contains the following chapters:

Chapter 1: Release Information — Provides information about related documentation, compatibility, and contacting customer support.

Chapter 2: System Information — Provides infrastructure and hardware-related information.

Chapter 3: User’s Guide Addendum — Provides new information that was released after the *User’s Guide* went to print and applies to both Service Packs and Extension users.

Chapter 4: Installation Documentation Workflows — Provides common installation workflows, such as reinstalling your entire system and upgrading your operating system.

New Information for This Release

The following table highlights new information related to the 2008 Service Pack 5 release.

Item	Page
“Mandatory AJA OEM 2K Firmware Upgrade”	12

Related Documentation

The 2008 release has documentation that helps you install, configure, and use the software. Download these documents from the documentation library at <http://www.autodesk.com/me-documentation>.

User and Reference Guides

Autodesk Fire 2008 What's New

Autodesk Fire 2008 User's Guide

Autodesk Smoke 2008 What's New

Autodesk Smoke 2008 User's Guide

Autodesk Backdraft Conform 2008 What's New

Autodesk Backdraft Conform 2008 User's Guide

Hot Keys Reference Guide for Autodesk Fire 2008, Autodesk Smoke 2008, and Autodesk Backdraft Conform 2008

Installation and Configuration Guides

Autodesk Stone and Wire 2008 Filesystem and Networking Guide

Autodesk Stone Direct 2008 Configuration Guide

Autodesk Stone Switched 2008 Installation and User's Guide

Hardware Setup Guide for HP xw9400 Workstations

RedHat 4.0, Update 2 Installation and Configuration Guide

RedHat 4.0, Update 3 Installation and Configuration Guide

IRIX 6.5.28 Installation and Configuration Guide

Software Installation Guide for Linux Workstations

Software Installation Guide for IRIX Workstations

Configuration File Reference Guide for Linux Workstations

Configuration File Reference Guide for IRIX Workstations

NOTE: For workstations other than the HP xw9400, consult the 2007 version of the hardware guides, located at <http://www.autodesk.com/me-documentation>.

Other Product and Reference Guides

Autodesk Burn 2008 Installation and User's Guide

Autodesk Backburner 2008 Installation Guide

Autodesk Backburner 2008 User's Guide

Autodesk Wiretap 2008 Web Installation and User Guide

Using Cleaner XL with Autodesk Effects and Editing Applications

Lustre Color Management User's Guide

Sparks API Reference Guide

Consulting the Latest Version of Release Notes

Always check the Web for the most recent updates to the *Release Notes*. The information contained in this document is continuously updated and the version provided on your product CD may already be lacking important release information. You can get the latest version of all documents from the Autodesk Web site at <http://www.autodesk.com/me-documentation>.

Fixed and Known Bugs

You can consult a list of fixed and known bugs for this release and previous releases, on the Autodesk Web site at <http://www.autodesk.com/me-documentation>.

Accessing Documentation and Online Help

You can also access PDF documentation from the *documentation* directory on the application CD and from the Preferences menu in the application.

Included with the application is an HTML online help system that is displayed in a Web browser. The online help contains comprehensive information on the full feature set of the software. You can launch the help by pressing the left **CTRL+=** key combination.

For complete information on accessing PDF and online help documentation, see the "Introduction" chapter of your application *User's Guide*.

Compatibility

Autodesk makes every effort to ensure that the compatibility of media and resources is as complete as possible when you upgrade your application, share projects between Autodesk Effects and Editing applications on both Linux and IRIX operating systems, and collaborate with Autodesk compositing and modeling applications such as Autodesk Combustion®.

Complete compatibility exists between Effects or Editing applications, starting with the 2008 release.

For information on compatibility with releases that pre-date the 2008 version of your application, see the “Compatibility” chapter of your application’s *User’s Guide*.

Contacting Customer Support

You can contact Autodesk Media and Entertainment Customer Support at www.autodesk.com/support. Refer to the following table for additional contact information.

Location:	Contact Information:
North America:	Telephone support: 8 am - 8 pm EST, Monday - Friday (excluding certain holidays) Hotline (from Montreal): 1.800.925.6442 or 1.514.954.7199 Fax: 1.514.954.7254 <i>me.support@autodesk.com</i>
UK, Europe, Middle-East, and Africa:	Telephone support: 9 am - 5:30 pm, local time, Monday - Friday (excluding certain holidays) Hotline (from London): +44.207.851.8080 Fax: +44.20.7851.8001 <i>me.emea.support@autodesk.com</i>
India:	Telephone support: 9:30 am - 6:30 pm, local time, Monday - Friday (excluding certain holidays) Hotline (from Mumbai): +91.22.6695.2244 Fax: ++91.22.66952211 <i>me.support.india@autodesk.com</i>
Japan :	Telephone support: 10 am - 6 pm, local time, Monday - Friday (excluding certain holidays) Hotline (from Tokyo): +81.3.6221.1810 Fax: +81.3.6221.1800 <i>me.support.jp@autodesk.com</i>
Singapore and Asia Pacific:	Telephone support: 9 am - 6 pm, local time, Monday - Friday (excluding certain holidays) Hotline (from Singapore): +65.555.0399 Fax: +65.6552.0483 <i>me.support.singapore@autodesk.com</i>

Location:	Contact Information:
Australia and New Zealand:	Telephone support: 9 am - 6 pm, AEST, Monday - Friday (excluding certain holidays) Hotline (Melbourne): +1.300.36.8355 Hotline (New Zealand): +0800.555.301 <i>me.support.anz@autodesk.com</i>
China:	Telephone support: 9 am - 6 pm, local time, Monday - Friday (excluding certain holidays) Hotline: +86.10.6505.6848 <i>me-support-china@autodesk.com</i>

Customer support is also available through your Autodesk reseller. To find a reseller near you, consult the reseller look-up database at www.autodesk.com/resellers.

System Information



Summary

Overview	7
Licensing Requirements	8
Operating System Requirements	9
DKU Version Requirement	10
Hardware System Requirements	11
Mandatory AJA OEM 2K Firmware Upgrade	12
XR Configuration Utility Error	12
Standard Filesystem Support (Linux Only)	13
Support for 720p and Custom Resolutions in <code>sw_io_perf_tool</code>	14
Soft-Imported or Published Media is Not Backward Compatible	15
Stone and Wire Compatibility	15
Installing the Standalone Stone and Wire Package	18
Changes to the Linux installation for Burn nodes	18
Preventing Symbolic Links Across Filesystems	17
Troubleshooting Missing Frames	19
Recommended Archiving Strategies for Linux Workstations	20
About Data Archiving Devices	21
File Archiving Over NFS	22
Cleaner® XL Version 1.5.2 Required	23
Linux vs. IRIX Product Characteristics	23
Miscellaneous	24

Overview

This chapter describes important installation-related and hardware-related notes and procedures.

Licensing Requirements

A New License Is Required for 2008 Effects and Editing Applications

Users need a new license to install the base 2008 release of Autodesk Effects and Editing applications. All users under subscription receive this license as part of their subscription agreement. New users or users who are not currently under subscription must contact their sales representative to request the 2008 license update.

The following is an example of a typical license string:

```
smoke_x86_64_2008 discreet_1 2008
```

For information on requesting or installing a license code, see the *Software Installation Guide* for your operating system.

No New License Is Required when Upgrading to 2008 SP5

No new license is required when installing 2008 SP5 over 2008 SP1, SP2, SP3, or SP4, or over a valid base 2008 license.

Optional Effects and Editing Extension License Upgrade is Not Required

Extension licenses from previous Effects and Editing releases are no longer required and do not need to be updated for the 2008 release.

Optional DI License Upgrade is Not Required

Users with the optional DI license can continue using their existing DI license. New users or existing users who wish to add the optional DI license must contact their sales representative to obtain it.

NOTE: The DI license is optional and enables features for working with film in digital intermediate processes. For more details about the DI features, see “DI Specific Features In The User Guides” on page 27.

Optional HDIO License is Deprecated

HDIO licenses from previous releases are no longer required and do not need to be updated for the 2008 release.

Autodesk Wire No Longer Requires a License

As of the 2007 SP3 release, Autodesk Wire licenses are no longer required to enable Wire services. Any system on the Wire network can wire to and from a system running 2007 SP3 or later. No action is required on your part. Old Wire license strings can be left in or removed from the license file, as they will simply be ignored by the application.

Operating System Requirements

No Upgrade Required When Upgrading From a 2007 Release

When upgrading from a 2007 release of your Effects or Editing application to the 2008 release, no operating system upgrade is required.

Upgrade Required When Upgrading From a pre-2007 Release

When upgrading from a pre-2007 release of your Effects or Editing application, you must update your operating system. See the following for requirements for your platform.

Linux Systems

Autodesk Editing and Effects 2007 and 2008 applications run on:

- Red Hat® Enterprise Linux WS 4, Update 2 (64-bit) on IBM® workstations
- Red Hat Enterprise Linux WS 4, Update 3 (64-bit) on HP workstations

If you are upgrading from a pre-2007 version of an Effects or Editing application, you must perform a fresh installation of the Linux operating system. You cannot upgrade to Red Hat Enterprise Linux WS 4 from a previous version. A fresh installation of Linux erases the contents of the system disk so you must archive any user settings, project settings, and media that you want to preserve, prior to performing the upgrade.

Your Linux installation media should be as follows:

- *Autodesk's 64-bit distribution of Red Hat Enterprise Linux Workstation 4 Update 2* (for 64-bit IBM workstations) or *Update 3* (for HP workstations)

This is packaged on one DVD with your release shipment. The Autodesk distribution installs the Linux software packages required by Autodesk Effects and Editing applications; these applications will not run under the commercial distribution of Red Hat Enterprise Linux WS 4. If you received a new workstation with this release, your shipment also included the CD set for commercial distribution of Red Hat Enterprise Linux WS 4 Update 2. You should not use this commercial distribution, but use the DVD distribution instead. You can use the commercial distribution to activate your Red Hat subscription if it is not already activated.

- *Discreet® Kernel Utility for Linux*

This is packaged on one CD with your release shipment. The Discreet Kernel Utility (DKU) is a set of drivers, utilities, and a customized Linux kernel, that is required by Autodesk Effects and Editing applications.

NOTE: Throughout a release cycle, it is possible that service packs releases require DKU upgrades that are downloadable only. Consult the *Release Notes* for each release for exact DKU requirements.

If you do not have the correct CD or DVD distribution, contact Customer Support or your local sales representative.

For complete operating system upgrade information, see the *Linux RHEW 4.0, Update 3 Installation and Configuration Guide*.

IRIX Systems

Autodesk Editing and Effects 2007 and 2008 applications run on IRIX 6.5.28. If your SGI® workstation is running an earlier version of IRIX, you must upgrade to or install IRIX 6.5.28. Autodesk recommends upgrading only if you are currently running IRIX version 6.5.19f or above, as this is a non-destructive upgrade. Otherwise, perform a fresh installation of IRIX 6.5.28.

To install IRIX 6.5.28, you require the following SGI CDs:

- IRIX 6.5.28 Installation Tools and Overlays (1 of 3) August 2005—P/N 812-0818-028
- IRIX 6.5.28 Overlays (2 of 3) August 2005—P/N 812-0819-028
- IRIX 6.5.28 Overlays (3 of 3) August 2005—P/N 812-0817-028
- IRIX 6.5 Applications August 2005—P/N 812-0877-028
- IRIX 6.5 Foundation 1—P/N 812-0759-002
- IRIX 6.5 Foundation 2—P/N 812-0760-002
- ONC3/NFS version 3, for IRIX 6.2, 6.3, 6.4, and 6.5—P/N 812-0774-002

Make sure that your CDs match this list precisely. If you do not have the correct CDs, contact your SGI support representative.

For IRIX upgrade and fresh installation procedures, see the *IRIX 6.5.28 Installation Guide*.

DKU Version Requirement

The 2008 SP5 Linux release of your Effects or Editing application requires DKU version 2.5.2. If you are upgrading from a previous release or service pack, you must perform a DKU upgrade.

The basic DKU CD is provided with your product CD distribution, but its ISO image can also be downloaded. You can burn the DKU ISO image to a CD or you can mount the ISO image directly on your system, without burning it to a CD.

To mount an ISO image and install the DKU:

1. Download the appropriate DKU ISO image from Autodesk.
2. Create a temporary directory where the DKU image will be mounted. For example:

```
mkdir /mnt/dku
```

3. Mount the DKU image on the newly created directory:

```
mount -o loop <DKU image> /mnt/dku
```

where `<DKU image>` is the ISO file you downloaded, for example `DKU-2_5_2.iso`.

4. Go to the directory where the DKU image was mounted and run the DKU install script:

```
cd /mnt/dku
```

```
./INSTALL_DKU
```

NOTE: You must have root privileges to execute the `mount` command.

For information about upgrading the DKU on your workstation using the DKU CD, see “Installing the Discreet Kernel Utility” in the *Autodesk Effects and Editing 2008 Linux RHEW 4 (Update 3) Installation and Configuration Guide*.

If you have an AJA OEM 2K board, you must also upgrade its firmware after upgrading the DKU. See [“Mandatory AJA OEM 2K Firmware Upgrade”](#) on page 12.

Hardware System Requirements

Linux workstations — This release fully supports all previously certified 64-bit Linux workstations. 32-bit workstations are not supported. If you are upgrading from a pre-2007 version of your Effects or Editing application, you may have to make some minor changes to video I/O connections or update your BIOS. Consult these *Release Notes* and the *Hardware Setup Guide* for your workstation for information on BIOS requirements, connection to audio/video I/O hardware, and other peripherals.

SGI workstations — This release fully supports the Tezro™ and Onyx 350 workstations. No changes in hardware configuration are required. For specifications, consult your existing documentation or download the *Hardware Setup Guide* for your workstation at <http://www.autodesk.com/me-documentation>.

Storage — XR-series Autodesk Stone® Direct storage is supported in 4Gb or 2Gb mode for all supported Linux workstations (depending on fibre-channel adapter configuration), and in 2Gb mode only on SGI workstations. IR-series is supported in 2Gb mode only on Linux IBM and SGI workstations. For information on how to connect and configure your XR and IR series Stone Direct, refer to the *Stone Direct 2008 Configuration Guide* and the *Stone Storage Manager 2007*.

For guaranteed real-time playback and capture performance, Stone Direct storage (XR or IR) is required.

Mandatory AJA OEM 2K Firmware Upgrade

The firmware of your AJA OEM 2K board must be at version 0x73 to use it with the 2008 SP5 release of your Effects or Editing application.

To verify the AJA PCI-X firmware version:

- Open a terminal, and type:

```
cat /proc/driver/aja
```

If `PCI version` lists a version older than 0x73, you must upgrade the firmware. The instructions for upgrading and verifying your firmware version are found in *Hardware Setup Guide for HP xw9400 Workstations*, in the section “AJA OEM-2K PCI-X Firmware.”

NOTE: Before upgrading your firmware, make sure you have upgraded your DKU, as described in [“DKU Version Requirement”](#) on page 10, and that you have restarted the system.

XR Configuration Utility Error

A few XR storage arrays have exhibited errors while being configured using the XR Configuration utility available on the CD labeled “Storage V5” included with each XR shipment. The error displayed is similar to the following:

```
====> Detected Linux Operating System
```

```
*** The XR storage is running unsupported firmware. ***
```

If you encounter the preceding error, download version 1.1 of the XR Configuration utility from:

```
ftp://ftp2.discreet.com/support/ESCALATION/XR_configuratorLinux_v1.1.tar
```

For more information on running the XR Configuration utility, see “X-Series LUN Creation Using the XR Configuration Utility” in the “LUN Management Guidelines” chapter in the latest version of the *Autodesk Stone Direct 2008 Configuration Guide*.

Standard Filesystem Support (Linux Only)

Standard filesystem support (also known as standard FS) provides the ability to store media created and managed by Effects or Editing applications on standard UNIX-compatible filesystems. This capability is transparent to the artist, as clip library workflows and procedures remain the same. Clip libraries and the clips they contain can be manipulated in exactly the same manner, whether they are referencing media stored on a Stone FS or a standard FS.

As opposed to the Stone FS proprietary filesystem, which provides guaranteed performance for real-time operations such as video I/O, standard FS is by definition open and therefore ideal for sharing media across several creative applications, without needing to transfer and replicate media files. Standard FS support also allows Effects and Editing applications to access third-party storage infrastructure, such as SAN, NAS, or direct-attached RAID arrays, as their main media storage volume.

For more details and information on how to set up standard FS media storage for Effects and Editing applications, see the *Autodesk Stone® and Wire®2008 Filesystem and Networking Guide*.

Highlights

Important aspects of standard filesystem support include:

- Supported UNIX-compatible filesystems can be used for media storage in the same capacity as a Stone FS.
- No functional changes or limitations to Effects and Editing applications are introduced.
- When stored on a standard FS volume, all clip material in a project, such as managed sources, intermediates, and proxies, can be stored in any supported standard file format, including DPX and RAW. The preferred file format is user-definable for each standard FS volume.
- Stone FS and standard FS partitions can co-exist on a workstation and can be mounted simultaneously.
- Shared volume configurations obtain significant workflow improvements, saving time on publish and soft-import operations, and avoiding needless media replication.
- Major Volume Integrity Check (VIC) performance improvements can be seen on a Stone FS volume. Even more dramatic is the performance improvement of the VIC over soft-imported media. This is due to a complete redesign of the soft-import link mechanism.

NOTE: The redesign of the soft-import link mechanism breaks backward compatibility for soft-imported media created on previous versions of Effects and Editing applications. Such soft-imported media will have to be re-imported or restored from archives before being available to the 2008 version of the applications. See [“Soft-Imported or Published Media is Not Backward Compatible”](#) on page 15, for guidelines on how to migrate soft-imported media to the 2008 release.

Standard FS Performance Expectations

Real time performance while using a standard FS configuration is not guaranteed. Customer Support will not investigate calls about the performance of a standard FS configuration.

This is significantly different from Stone FS configurations, which do offer guaranteed real-time performance specifications, depending on configuration and formats.

Although Effects and Editing applications are optimized for I/O, filesystem performance may fluctuate depending on various external factors, such as:

- Storage hardware configuration
- Filesystem optimization
- Fragmentation management
- Access from remote users or third-party applications

See the appendix “*Configuring Standard Filesystems*” in the *Autodesk Stone® and Wire®2008 Filesystem and Networking Guide* for suggestions on how to optimize your standard FS configuration for best performance.

Support for 720p and Custom Resolutions in *sw_io_perf_tool*

The storage performance test tool *sw_io_perf_tool* has been enhanced to support the 720p preset resolution, as well as custom resolutions.

- To use the tool with the new 720p preset resolution, type the following command in a shell:

```
sw_io_perf_tool -v HD720
```

- To run the tool with a custom resolution, use the following syntax:

```
sw_io_perf_tool -v <frame_width>,<frame_height>
```

where *<frame_width>* represents the frame width and *<frame_height>* represents the frame height in pixels. For example:

```
sw_io_perf_tool -v 1600,900
```

Soft-Imported or Published Media is Not Backward Compatible

To provide support for standard FS and fully benefit from the VIC's performance improvements, the soft-import link mechanism has been completely redesigned, effectively breaking backward compatibility for media that was soft-imported in pre-2008 versions of Effects and Editing applications. This limitation only affects users who are using a soft-import based workflow and does not affect Stone FS based workflows. You can work around this limitation by observing the following guidelines.

Do Not Do the Following

- If you have soft-imported / published clips, do not upgrade Stone and Wire to the 2008 version before having implemented one of the measures described in [“Do the Following”](#) on page 15.
- Do not transfer soft-imported or published clips between a workstation running the 2008 version and one running a 2007 version of an Effects or Editing application.

Do the Following

- You can load a clip (local or remote) from an older version of the application in the 2008 release, but be aware that soft-imported media will appear as a checkerboard. You can re-link and save such a clip in the 2008 version. Use the Hi-res only option to avoid proxy regeneration.
- Make sure you stonifise soft-imported clips in the older version of the application prior to opening the clip in the 2008 version. Note that this will consume extra disk space on the Stone volume.
- Archive a library with soft-imported media in the older version of the application (with the Link option), and restore in the 2008 release.

Stone and Wire Compatibility

Please consider the following compatibility guidelines when preparing to use the 2008 release in a facility where several versions of Effects and Editing workstations co-exist.

Stone and Wire Version Must Be the Same on All Workstations

The 2008 version supports the reading of older projects, libraries and media going back two versions (the 2007 release, or 64-bit versions of Flame 9.5, Inferno 6.5, Fire 7.0, and Backdraft 7.0).

To use Wire to transfer media between workstations running the 2008 release and workstations running one of the supported older releases, the older workstations must be upgraded to the most recent 2008 Stone and Wire service pack release.

See [“Installing the Standalone Stone and Wire Package”](#) on page 18 for details on how to perform this upgrade.

NOTE: Attempting to transfer media between systems running different Stone and Wire versions is unsupported and may lead to clip library corruption. There is no stand-alone Stone and Wire installer for 32-bit workstations, or for legacy SGI workstations. To transfer clips from such workstations to a workstation running the most recent Stone and Wire 2008 service pack release, you must use the following workflow:

To transfer media from a legacy system to a 2008 system:

1. Use a legacy version of the application on the 2008 system, or Backdraft Conform on the legacy system, to create a project and a clip library on the 2008 system. The project and library will have the format of the legacy system.
2. Use the legacy application to move clips from the legacy system over the network into the previously created project on the 2008 system. You can use Background Wire.
3. Use the 2008 application to open the legacy library (the library will be in read-only mode).
4. Use Dual View to drag the clips from the legacy library into a 2008 library.

Wire Operations

The following statements apply when transferring media between Effects and Editing applications using Wire.

Between 2008 releases — Media can be freely transferred using Wire between workstations mounting any type of filesystem (Stone or standard FS). On a single workstation, media can be freely moved or replicated between Stone FS and standard FS volumes.

Between 2008 and 2007 releases — Media can be freely transferred using Wire between workstations running the 2008 and 2007 releases, provided that the media managed by the workstation running the 2007 release is stored on a Stone FS volume. Soft-imported and published media on the 2007 release cannot be transferred using Wire to the 2008 release, and will appear as checkered-pattern clips if a Wire transfer is attempted.

NOTE: Soft-imported or published media must be stonitized to be transferred using Wire to the 2008 release, or archived by the 2007 release, then restored on the standard FS of the 2008 release workstation.

Between 2008 and earlier releases — The same guidelines as for 2007 releases (see previous) apply to Flame 9.5, Inferno 6.5, Fire 7.0 and Backdraft 7.0. Wire transfers with older releases are only possible through the workflow described in [“Stone and Wire Version Must Be the Same on All Workstations”](#) on page 15.

Archive Operations

The following statements apply when working with archives on different versions of Effects and Editing applications.

Between 2008 releases — Archives are fully compatible. They can be created from Stone FS or standard FS volumes, and restored to any other Stone FS or standard FS volume.

Between 2008 and older releases — Archives created on older releases can be restored by the 2008 release to a Stone FS or standard FS volume. Archives created on the 2008 release are not backward compatible.

Stone Switched Operations

Stone Switched only supports switching between StoneFS volumes of similar hardware configurations. Switching between standard FS volumes is not supported currently.

Making the Transition from 2007 to 2008

The 2008 and 2007 releases can coexist on a workstation, and you can continue using both versions interchangeably. If your 2007 projects contain only clips stored on a Stone FS volume (in other words, media that is not soft-imported or published), you can use the clips in 2008 projects, regardless of whether the 2008 version is using a Stone FS or a standard FS volume.

If your 2007 projects contain clips with soft-imported sources (or published results), these clips cannot be brought into the 2008 version through Wire and will appear as checkerboard patterns. You will have to Stonifize them first, or archive and restore them to the 2008 version.

You can continue working in a 2007 version with soft-imported media, as long as this media will not be transferred using Wire to a 2008 version.

Preventing Symbolic Links Across Filesystems

When publishing clips from one mounted standard filesystem to another using the Link option, it might be desirable to prevent the use of symbolic links between the source and the published media. Using symbolic links across filesystems means that if the source frames are deleted or overwritten, the published frames are also affected, which may not be the desired result in certain workflows.

To prevent this from occurring, either intentionally or through operator error, uncomment the following keyword in the *stone+wire.cfg* configuration file:

SymlinkAcrossFilesystems=False

NOTE: The default value for this keyword is True.

For more details on configuring the *stone+wire.cfg* file, see the *Autodesk Stone and Wire 2008 Filesystem and Networking Guide*.

Installing the Standalone Stone and Wire Package

To facilitate upgrading Stone and Wire on workstations running version 2007, Flame 9.5, Flint 9.5, Inferno 6.5, Smoke 7.0, Fire 7.0 and Backdraft 7.0 and later, a standalone version of the Stone and Wire 2008 release is available as a download for the appropriate workstation type:

- HP workstations: *SW_2008-xxxx_HP_LINUX64.tar.gz*
- IBM workstations: *SW_2008-xxxx_LINUX64.tar.gz*
- IRIX workstations: *SW_2008-xxxx_IRIX.tar.gz*

To upgrade Stone and Wire using the standalone package:

NOTE: This procedure is not required if you are installing the complete software package on a workstation.

1. On the workstation where you want to upgrade Stone and Wire, log in as root.
2. Download the appropriate Stone and Wire standalone package.
3. Extract the downloaded Stone and Wire package by typing the following command:

```
tar -zxvf <package_name>.tar.gz
```

The file is uncompressed and an install directory is created.

4. Go to the install directory. Launch the installation script by typing:
./INSTALL
5. Reboot the system to complete the installation.

Changes to the Linux installation for Burn nodes

In order to avoid display detection problems by the Linux installer with customer-supplied monitors, the Red Hat Enterprise Linux and Fedora Core Kickstart configuration files have been modified to force text-mode installation. Note that now there are separate Kickstart files for each of the two distributions: *RHEL40_kickstart.cfg* for Red Hat Enterprise Linux WS 4.0 and *FC4_kickstart.cfg* for Fedora Core 4. These files cannot be used interchangeably, as they install distribution-specific packages.

Troubleshooting Missing Frames

If the application cannot find some of the frames referenced by your clips, the following error message is displayed when the application starts:

- In the terminal:

```
WARNING: <nnnn> <volume_type> frames are missing on this
volume; see Release Notes for corrective measures.
```

Where <nnnn> represents the number of missing frames, and <volume_type> can be `stonefs` or `standardfs`.

- In the application start-up screen:

```
VOLUMEMGT: WARNING: Some frames not found; see Release Notes for corrective measures.
```

NOTE: By default, the message only appears in the terminal. To have it appear also in the start-up screen, you must configure the application. See [“Setting the Start-up Screen Message”](#) on page 20.

The error message appears in one or both of the following situations:

- Some clips in your libraries or desktops reference missing frames on a remote volume.
- Some clips in your libraries or desktops reference local frames that no longer exist.

To identify the type of issue:

- Open a terminal and type:

```
vic -v <volume_name> -s remote -s lost
```

where <volume_name> is the name of the affected volume, for example `stonefs` or `standardfs`.

The output of this command should be similar to the following:

```
Checking libraries for remote and lost frames...
```

```
/usr/discreet/clip/stonefs/My_Project1/editing.000.desk has
none
```

```
/usr/discreet/clip/stonefs/My_Project1/Default.000.clib
references 30 missing frames.
```

```
/usr/discreet/clip/stonefs/My_Project2/editing.000.desk has
none
```

```
/usr/discreet/clip/stonefs/My_Project2/from_caplan.000.clib
references 70 remote frames.
```

Depending on the result of the previous command, do one of the following:

- For clips with frames listed as `missing`, contact your local Autodesk support representative for help on resolving this issue.
- For clips with frames listed as `remote`, perform the following procedure.

To recover remote frames:

1. Archive all clip libraries that are reported as containing `remote` frames. In the previous example, the fourth library (`from_captan`) contains remote frames.
2. Rename the libraries you just archived, such as by adding the `remote` suffix to the library name.
3. Restore the clip libraries from the archives.
All the frames referenced by the clips should now be stored locally.
4. Delete the original libraries.

Setting the Start-up Screen Message

By default, the message about missing frames only appears in the terminal. To make it appear in the application start-up screen, create an environment variable called `DL_IC_NOTIFY_MISSING`. Open a terminal and type:

```
setenv DL_IC_NOTIFY_MISSING 1.
```

NOTE: The environment variable is set for the current session only. To set it permanently, open the `~/.cshrc` file in a text editor and add the following on a new line:
`setenv DL_IC_NOTIFY_MISSING 1.`

Recommended Archiving Strategies for Linux Workstations

Due to the prevalence of low-cost commodity storage and networking solutions, as well as their technological maturity, there is no longer a need for Autodesk to further develop tape archive technology. Customers are responsible for maintaining archive device setups for reading IRIX legacy archives in order to transfer them to Linux workstations.

Autodesk Effects and Editing applications provide several certified archiving approaches suited for diverse types of environments. These approaches include:

- File archiving (Preferred method)
- Video tape archiving
- EDL export (metadata loss)

- Wiretap SDK (metadata loss)

File Archiving is the preferred archiving approach as it offers complete media and metadata compatibility as well as wide-ranging versatility, without having to rely on third party hardware tape technology. And since files archives are digital files, the risk introduced by tape degradation or defects is non-existent.

File archives can be saved directly to any type of storage available at your facility, including:

- Locally connected disk arrays, Firewire or USB devices
- Remote NFS/SAMBA file servers
- SAN/NAS infrastructures

You are then free to use any commercially available backup solution to ensure your archives are protected for as long as required.

About Data Archiving Devices

For data archiving, your Effects or Editing 2008 application uses standard UNIX tape device calls. You should confirm with the archiving device vendors that the device is certified for use with your operating system. For this release, the operating systems required are Linux Red Hat Enterprise Workstation 4.0, Update 2 (for IBM workstations) or Update 3 (for HP workstations), and IRIX 6.5.28.

You should also note the following guidelines:

- On IRIX, you may be required to purchase tape device driver support from SGI to use SCSI or fibre channel archiving devices.
- On Linux, you can use USB 2 and FireWire® (IEEE 1394) attached devices to save data archives generated from your Effects or Editing application. These devices can be formatted as ext2, ext3, XFS, or HFS+ (Mac®) file systems. NTFS is not supported.

- On Linux, fibre channel devices that may be used are the ones for which the vendor confirms the following:
 - The device driver is compliant with standard UNIX tape device calls.
 - The specific version of your operating system and kernel is supported.
- While Autodesk Media and Entertainment makes no certification statement about any device, the following SCSI devices have been tested and found to be reliable when connected using an ATTO Fibre Channel to SCSI Bridge 2390:
 - Quantum DLT8000
 - Quantum DLT7000
 - Sony AIT3 SDX-D700C
 - Sony AIT2
 - Quantum LT03 (* speed decrease with the SCSI Bridge/LTO3 has been seen).
- The software initialization file (*init.cfg*) for your Effects or Editing 2008 application contains examples for the “ClipMgtDevice Tape” keyword to help you set up the appropriate block size value for your tape device and define a text label to identify the device in the Archiving module. Please refer to the documentation from your archiving device vendor for guidelines on the actual block size to use.

File Archiving Over NFS

When performing file archiving and saving the file archives to an NFS mounted volume, better performance results can be achieved by using the *async* NFS export option.

On the NFS server workstation, that is, the workstation exporting the volume where the file archives are being saved, log in as root and edit the */etc/exports* file as follows.

On Linux:

```
/mnt/array1 *(rw,async,no_root_squash)
```

On IRIX:

```
/mnt/array1 -rw,anon=0,async
```

WARNING: Do not use the *async* option on the */usr/discreet* export path, as this could lead to data corruption. Default NFS export settings use the *sync* option. Please consult your network administrator to confirm whether the *async* option is appropriate for your network.

Cleaner® XL Version 1.5.2 Required

To set up network encoding services, Cleaner® XL version 1.5 and the Cleaner XL 1.5.2 upgrade are required. You cannot install the Cleaner XL 1.5.2 upgrade without having installed Cleaner XL 1.5 first.

This upgrade is available online at <http://www.autodesk.com/support>. To download the upgrade, select Autodesk Cleaner XL from the drop-down list, click Data & Downloads, and then click Updates & Services Packs.

For information on setting up Cleaner XL network encoding, see the guide *Using Cleaner XL with Autodesk Effects and Editing Applications*, available from the application and the Autodesk Media and Entertainment Documentation Library on the Web.

Linux vs. IRIX Product Characteristics

The following table lists the specific differences between Linux and IRIX characteristics for the current version of your Effects or Editing application.

Feature	IRIX	Linux
Audio		
• VST® audio Sparks®	Yes	No
• Apply audio trim levels to monitoring during capture	Yes	No
• Embedded Audio	No	Yes
Video I/O		
• 1035i video format	Yes	No
• NTSC/PAL cross synchronization with HD reference	Yes	No NOTE: TL sync required
• 10-bit (and higher)	Yes	Yes * Except on IBM 6224

Media Import and Export

NOTE: For an extensive list of supported file formats on both IRIX and Linux, see the *Importing Media Files* chapter of your application *User's Guide*.

• Expanded Quicktime broadcast, web and audio codecs	No (Except for 8-bit Uncompressed video, Apple® Animation, JPEG, Motion JPEG A, Apple Compact Video (Cinepak), Indeo® Video, Apple Video)	Yes
------------------------------------------------------	-------------------------------------------------------------------------------------------------------------------------------------------	-----

Feature	IRIX	Linux
• Video file format: MPEG-1 and AVI	Yes	No
• Audio file format: MPEG-1, MP3, Sound Designer, Audio Visual Research, Creative Labs VOC, Sample Vision, Sound Font2	Yes	No
Graphics to Video Preview		
• Number of frames delay	<1	2
Storage		
• IR Series Stone Direct	Yes	IBM = Yes HP = No
• XR Series Stone Direct	Yes * 2Gb mode only	Yes
• Standard filesystem support	No	Yes
• Standard filesystem capacity	n.a	Filesystem dependant
• Stone FS filesystem support	Yes	Yes
• Stone FS filesystem capacity	8 TB	8 TB
• Software RAID parity disk	Yes	No
• 4 Gbit FC	No	Yes
• 2 loop / 4 loop	4 loop	4 loop
• HIPPI support	Yes	No
• Infiniband HBAs	No	Yes
• SCSI Archiving devices	Yes	No

Miscellaneous

Consult this section for material not described in other sections of this document.

Recommended Audio Delays for 720p with the AJA-OEM-2K

Set broadcast and hi-res audio delays to 1.00 for projects with a resolution of 720p. Audio delays are set in the Audio section of the Preferences panel. To sync audio with the broadcast monitor, select Sync To Broadcast. To sync audio with the hi-res display, select Sync To Hi-res.

For more information on setting audio delays for high resolution and broadcast monitors, refer to your application *User's Guide*.

Autodesk Wiretap 2008 SDK

The Autodesk Wiretap 2008 SDK is not included on the 2008 product CD. You can download it from the Autodesk Developer Network at <http://www.autodesk.com/adn>.

User's Guide Addendum



Summary

DI Specific Features In The User Guides	27
FBX 2006.11 Support	27
Clip Input Using a Spirit DataCine System	28
DVE	28
EditDesk	28
Hot Keys	29
Managing Projects and Users	29
Preferences	30
New Feature Supported for AAF/XML Files	30
Soft-Import	30

DI Specific Features In The User Guides

The optional DI license is available for users who wish to obtain features geared towards working with film in digital intermediate processes.

The *User's Guide* for your Effects and Editing application describes all features without distinction, including features that are only enabled with a DI license. Some information may not be relevant for your installation. Such DI specific features include:

- 3D LUTs support in the Player and the image window of all modules that support multiple viewports, including the reference area and reference overlay.

NOTE: 3D LUTs must be defined in the software initialization configuration file. See "Configuring Smoke to Display 3D LUTs" in the Colour Management with LUTs chapter of the *User's Guide*.

FBX 2006.11 Support

This release now supports FBX® version 2006.11.

Clip Input Using a Spirit DataCine System

There have been minor changes to the menus for inputting Spirit DataCine clips. These changes are not reflected in the images in the chapter “Clip Input Using a Spirit DataCine System.”

DVE

To help identify media, you can **ALT+CLICK** a surface in schematic, result, or camera view to automatically select the media in the Media list. If the Media menu is not selected, press **ALT** and double-click the surface to switch to the Media menu, and automatically select the media in the Media list. Also, when you select multiple surfaces, you can press **ALT** to select all associated media in the Media list. In this case, the first item selected is framed in yellow in the Media list as the current selection.

DVE Hot Keys

The following DVE hot keys have been added or adjusted, and supersede those listed in the User's Guide or Hot Keys Guide.

Press:	To:
' (ON THE TILDE KEY)	Exit the DVE module
ESC	Toggle between Schematic and current view
8	Set the selected viewport to the Media list
9	Set the selected viewport to the Priority list
0	Access the Load DVE menu
SHIFT+0	Access the Save DVE menu
F7	Access the DVE Setup menu
F8	Access the DVE Animation menu
Q	Set Magnet scale

EditDesk

There is an undocumented swipe bar available for the Record Area of the EditDesk. The swipe bar is about four inches long and is located on the left side of the screen below the Record Area. **CTRL**-swipe it to switch between large and regular versions of the following views:

- History
- Clip List
- Source Timeline
- Record Timeline

Hot Keys

So far, the hot keys in this section apply to Smoke and Fire only, so this whole section is conditionalized as Smoke and Fire. If hotkeys from other applications crop up, we may need to unconditionalize the section and create two separate tables with their own conditions, or come up with some other arrangement.

The following hot keys have been added or adjusted, and supersede those listed in the User's Guide or Hot Keys Guide.

NOTE: Updated DVE hot keys are listed separately in ["DVE Hot Keys"](#) on page 28.

In Module:	Press:	To:
Keyer	SHIFT+S	Adjust colour spill
Paint	Q	Set brush size

Managing Projects and Users

The Managing Projects and Users chapter states that IBM 6224 systems support a bit depth of 8 bits only. Although this is true, the EditDesk in these systems can contain higher depth clips that were imported or created on other systems, and you can work with these clips in certain modules.

The functions that support working with clips with a bit depth higher than 8 on IBM 6224 systems are as follows:

- Video
 - Consolidate
 - Deal
 - Deinterlace
 - Field Merge
 - Interlace
 - Interleave
 - Repeat
 - Resize
 - Dominance
- Film
 - Add Pulldown
 - Remove Pulldown
 - LUT Editor
- Timecode
 - Change Timecode
 - Convert Rate

Preferences

The Timeline preference Auto-Scroll is now disabled by default. When this preference is enabled, performance issues, such as dropped frames may occur during playback.

New Feature Supported for AAF/XML Files

FCP XML or AAF files containing embedded, animated audio gain effects applied to segments are now supported when importing into .

Soft-Import

When soft-importing files, ensure that the file has a valid extension. Otherwise, the file will not load.



Installation Documentation Workflows

Summary

Overview	31
Reinstalling from Scratch	31
Connecting New or Expanded Stone Direct Storage	32
Upgrading Your Effects or Editing Application	33
Upgrading Your Operating System	34
Which Document Do I Need	34

Overview

Your Autodesk Effects or Editing System is shipped preconfigured with the appropriate operating system and application already installed. In normal situations, the final configuration procedures are simple and well documented. In certain instances, you may be required to perform partial or complete reinstallation of some system components. Such instances might include a hardware or software upgrade, or an exceptional recovery procedure.

It is always recommended to identify and gather all relevant documentation before you proceed with these more involved configuration procedures.

This chapter highlights four of the more common installation workflows that you may need to perform on your Effects or Editing system. It also lists the documentation relevant to each step in each workflow.

Reinstalling from Scratch

Perform the tasks described in this workflow in cases where you need to rebuild your Effects or Editing system in its entirety, from cross-connecting the hardware peripherals and storage arrays, to installing the operation system, and installing, licensing, and configuring your Effects or Editing application.

To reinstall your system from scratch:

1. Prepare for the installation.
Consult the latest *Release Notes* for your release before you begin any installation. They contain the most current and updated information about requirements, late-breaking features and procedures, as well as a detailed list of all updated related documents and URLs to download the documents directly to your workstation.
2. Connect your workstation's hardware peripherals.
Consult the *Hardware Setup Guide* for your workstation.
3. Install the operating system and the DKU.
Consult the *Installation and Configuration Guide* for your operating system.
4. Connect your storage.
Consult the *Autodesk Stone Direct Configuration Guide* for your release.
5. Configure the RAID volumes and mount the storage.
Consult the *Autodesk Stone Direct Configuration Guide* for your release.
6. Install and license your Effects or Editing application.
Consult the *Software Installation Guide*.
7. Configure your Stone filesystem.
Consult the *Autodesk Stone and Wire Filesystem and Networking Guide* for your release.
8. Configure your application settings.
Consult the *Configuration File Reference Guide* for your operating system.
9. Get going.
Read the *User's Guide*, *What's New*, and *Hot Keys Reference Guide* to get familiar with your Effects or Editing application's powerful features.

Connecting New or Expanded Stone Direct Storage

Perform the tasks described in this workflow in cases where you need to rebuild your Autodesk Effects and Editing workstation's Stone Direct storage array. For instance, this could happen when you purchase supplementary storage enclosures to expand available disk space.

To connect new or expanded Stone Direct storage:

1. Prepare for the installation.
Consult the *Release Notes* for your release before you begin any installation. They contain the most current and updated information about requirements, late-breaking features and

procedures, as well as a detailed list of all updated related documents and URLs to download documents directly to your workstation.

2. Connect your storage.

Consult the *Autodesk Stone Direct Configuration Guide* for your release.

3. Configure the RAID volumes and mount the storage.

Consult the *Autodesk Stone Direct Configuration Guide* for your release.

4. Configure your Stone filesystem.

Consult the *Autodesk Stone and Wire Filesystem and Networking Guide* for your release.

5. Get going.

Read the *User's Guide*, *What's New*, and *Hot Keys Reference Guide* to get familiar with your Effects or Editing application's powerful features.

Upgrading Your Effects or Editing Application

Perform the tasks described in this workflow in cases where you need to install or upgrade your Effects or Editing application. Typically, upgrading the application does not require the Stone filesystem to be reformatted or the operating system to be upgraded.

To upgrade your operating system:

1. Prepare for the installation.

Consult the *Release Notes* for your release before you begin any installation. They contain the most current and updated information about requirements, late-breaking features and procedures, as well as a detailed list of all updated related documents and URLs to download the documents directly to your workstation.

2. Install and license your Effects or Editing application.

Consult the *Software Installation Guide* for your operating system.

3. Configure your application settings.

Consult the *Configuration File Reference Guide* for your operating system.

4. Get going.

Read the *User's Guide*, *What's New* and *Hot Keys Reference Guide* to get familiar with your Effects or Editing application's powerful features.

Upgrading Your Operating System

Perform the tasks described in this workflow in cases where you need to upgrade your operating system. For instance, this could be required by a new version of your Effects or Editing application. Typically, upgrading the operating system does not require the hardware components to be rewired or the Storage RAID devices to be reconfigured.

To upgrade your operating system:

1. Prepare for the installation.

Consult the *Release Notes* for your release before you begin any installation. They contain the most current and updated information about requirements, late-breaking features and procedures, as well as a detailed list of all updated related documents and URLs to download the documents directly to your workstation.

2. Install the operating system.

Consult the *Installation and Configuration Guide* for your operating system.

3. Install and license your Effects or Editing application.

Consult the *Software Installation Guide* for your operating system.

4. Configure your Stone filesystem.

Consult the *Autodesk Stone and Wire Filesystem and Networking Guide* for your operating system.

5. Configure your application settings.

Consult the *Configuration File Reference Guide* for your operating system.

6. Get going.

Read the *User's Guide*, *What's New* and *Hot Keys Reference Guide* to get familiar with your Effects or Editing application's powerful features.

Which Document Do I Need

Here are a few examples of common installation enquiries, and the documentation that provides the answers to each.

I would like to request a license for my Effects or Editing application

Consult the *Software Installation Guide* for installation procedures and information on obtaining and installing the licenses required to launch the Effects or Editing application.

Do I connect the DVI ramp to serial port #1 or serial port #2

Consult the *Hardware Setup Guide* for your workstation for diagrams and guidelines on how to connect the hardware peripherals and video I/O components to your workstation.

I need to reformat my Stone FS partition

Consult the *Autodesk Stone and Wire Filesystem and Networking Guide* for procedures on how to create and mount the Stone filesystem.

I want to learn about the latest updates

Consult the *Release Notes* for your release. They contain the most current information about requirements and procedures, as well as a complete list of up-to-date related documents and URLs to download the documents directly to your workstation.

I want to know about all the new features for this release

Read the *What's New* for your Effects or Editing application for an overview of new features. For complete new feature information, consult the *User's Guide* for your application.

I need to upgrade the DKU

Consult the *Installation and Configuration Guide* for your operating system, for procedures on how to install the Linux operating system and DKU, or the IRIX operating system and required patches.

I would like to download the latest documentation

Consult the *Release Notes* for your release for a complete list of up-to-date related documentation and URLs to download the documents directly to your workstation.

