


MAX 2006 Beyond Boundaries

Thom Parker
Not All PDFs are Created Equal
WindJack Solutions Inc.
www.windjack.com



© 2006 Adobe Systems Incorporated. All Rights Reserved.

PDF is not just one thing

- PDF is a complex data structure that can contain just about any electronic data
- PDFs vary from simple image containers to complex interactive applications
- Because of the variety of ways PDFs can be constructed, seemingly similar documents can have vast differences in size, usability, printability, performance, accessibility, etc.
 - Many differences are not easily detected visually, but require special tools

*Not All PDFs are Created Equal
© 2006 Adobe Systems Incorporated. All Rights Reserved.

PDFs Have Differences

PDFs can be described in terms of their features

- Size/ Compression
- Color Space
 - CMYK, RGB, calibrated, etc.
- Fonts/Font Embedding
- Behavior
 - Static, Interactive
- Multimedia
- 3D Annots
- Web Enabled
- Secure
 - Digitally signed
 - Encrypted
 - Reader Enabled
 - Commented
 - Layer Content
 - Custom PDF
 - Requires special plug-in to enable custom features
 - AcroForm
 - XFA Form

*Not All PDFs are Created Equal
© 2006 Adobe Systems Incorporated. All Rights Reserved.

Different Kinds of PDF (Common Terminology)

PDFs can be described in terms of their source or usage

- Scanned/OCR'd
- Print Path Conversion
 - PostScript -> Distiller -> PDF
- PDF Library Creation
 - From Adobe Tools: Illustrator, etc.
- 3rd Party Library/Custom Creation
 - iText, Appligent Tools, ScanSoft, etc.
- Fillable or Static Form
- LiveCycle Form
- Searchable (Has Metadata)
- Savable (Reader Enabled)
- Accessible (Sec 508 compliance)
 - Archived
 - Indexed
 - Protected
 - eBook
 - PDF Standards
 - PDF/A – Prepress data exchange
 - PDF/E – Engineering
 - PDF/UA – Universal Accessibility

*Not All PDFs are Created Equal
© 2006 Adobe Systems Incorporated. All Rights Reserved.

Why Do We Care?

- Printing
 - Fonts (embedded)
 - Color Space (CMYK, Spot Colors)
 - Unsupported features in RIP
 - Transparency
 - Hierarchical XObjects
- Web Use
 - Size – As small as possible
 - Linearized PDF, pseudo-streaming
 - Color Space (RGB)
 - Security
 - Searchable Metadata
- Usability
 - Tagged for Accessibility
 - Interactive Features (JS & Forms)
 - Dynamic Form Features (LiveCycle)
 - Reader Enabling
- Legal Issues
 - Digital Signatures
 - Security (encryption)
 - Digital Rights Management
 - Integrity and Verifiability
 - Audit trail
 - Redaction

*Not All PDFs are Created Equal
© 2006 Adobe Systems Incorporated. All Rights Reserved.

How do You Know What Kind of PDF You Have?

Tools that come with Acrobat Professional


- Document Properties Panel**
 - Size, Metadata, Security, Font Info
- Navigation Tabs**
 - Content – All the drawing operators, images, etc. on pages
 - Fields – All interactive Form Fields on document.
 - Tags, Bookmarks, Comments, and others
- PDF Optimizer (6.0 and later)**
 - Does Space Audit - Amount of memory used by different types of PDF objects
- Preflight Tool**
 - Various Printer and PDF standards (PDF/a...) Analysis
- JavaScript**

*Not All PDFs are Created Equal
© 2006 Adobe Systems Incorporated. All Rights Reserved.

How do You Know What Kind of PDF You Have?

3rd Party Tools


- **Enfocus (Acrobat plug-ins)**
 - PitStop - Print Related Analysis
 - Enfocus Browser – Cos Object Browser (Discontinued in ver 6.0)
- **WindJack Solutions (Acrobat plug-ins)**
 - PDF CanOpener – Interactive Analysis/Cos Object Browser
- **Apago (Stand-Alone Tools and Acrobat plug-ins)**
 - PDF Enhancer – Swiss Army Knife of PDF Tools
 - PDF Spy – Analysis report generator. Creates XML files of specified PDF features (server usage)
 - PDF Appraiser – PDF/A compliance tool
- Many, many more tools available, from free to very expensive.

*Not All PDFs are Created Equal
©2004 Adobe Systems Incorporated. All Rights Reserved. 

How Do You Modify/Fix PDFs?

Tools that come with Acrobat Professional


- **SaveAs** – Acrobat Menu Item
 - Clean up file structure and reduce size
- **PDF Optimizer (6.0 and later)** – Menu Item and in Batch Processing
 - Clean up file structure and reduce size
 - Remove PDF internal structures of all kinds
 - Down sample/Compress images
 - Unembed Fonts
- **Preflight Tool** – Menu Item and in Batch Processing)
 - Convert to a particular PDF version Compatibility
 - Convert to a PDF/A or PDF/X compliant
 - Convert Color Spaces
 - Flatten Transparency
- Many other options in Acrobat for manipulating PDFs

*Not All PDFs are Created Equal
©2004 Adobe Systems Incorporated. All Rights Reserved. 

How Do You Modify/Fix PDFs?

Other Adobe Tools


- **The Acrobat SDK** – Write your own tool
 - C Library for accessing Acrobat features and PDF Objects from within Acrobat (i.e. plug-ins)
 - VB and AppleScript Libraries for accessing Acrobat features and PDF features from an external application
- **LiveCycle Servers** – J2EE based
 - LiveCycle Assembler
 - Manipulates existing PDFs: add, remove, and modify PDF features
 - LiveCycle PDF Generator
 - Creates PDF files from other document types
 - LiveCycle Policy Server
 - Applies Security Policies, from simple password to internet based DRM

*Not All PDFs are Created Equal
©2004 Adobe Systems Incorporated. All Rights Reserved. 

How Do You Modify/Fix PDFs?


3rd Party Tools

- **Enfocus (Acrobat Plug-ins)**
 - PitStop - Print Related fixes and modifications
 - Enfocus Browser – Cos Object Manipulation (Discontinued)
- **WindJack Solutions (Acrobat Plug-ins)**
 - PDF CanOpener – Modify/Create/Copy/Paste COS Object structure
- **Apago (Stand Alone and Acrobat Plug-ins)**
 - PDF Enhancer – Resamples Images, converts color spaces, removes unused and unwanted PDF structure, etc. etc.
 - PDF Constructor – Compliment to PDF Spy, reads XML files of specified PDF features and modifies or builds a PDF. (Server Tool)
 - PDF Appraiser – Converts to PDF/A compliance
- Many, many 3rd party tools for creating/manipulating PDFs

*Not All PDFs are Created Equal
©2004 Adobe Systems Incorporated. All Rights Reserved. 

Examples of PDF Differences/Different PDFs

- Scanned PDF vs Converted PDF
- Saved/Optimized
- Different Kinds of PDF
 - AcroForm
 - XFA
 - Secured
 - Certified
 - Rights Enabled
 - eBook
 - Layered

*Not All PDFs are Created Equal
©2004 Adobe Systems Incorporated. All Rights Reserved. 

Thank you for attending this session

Please Visit <http://www.windjack.com>

Better by Adobe.™

*Not All PDFs are Created Equal
©2004 Adobe Systems Incorporated. All Rights Reserved. 