Picture this: new directions for legacy graphics

Technical Track – Legacy Data Conversion Methodology, Issues, and Best Practices

John Sillari
Dayton T. Brown, Inc.
Agenda

• Evolving use cases
• Drivers for efficiency
• Standards
• Types
• Conversion challenges and solutions
• Value proposition
• Benefits
Use Cases

Traditional:

– Visual supplement
– Product assembly/disassembly
– Parts ordering
– Narrative support
– Conceptual overview
– Navigation
Use Cases

Emergent:

– Product lifecycle support
– Prognostics
– Intrusive diagnostics
– Automated logistics
– Asset health monitoring
– Interactive navigation
Drivers for Efficiency

- Integrated logistics
- Data tailoring
- User profiling
- Mobility
- Remote maintenance
- Data reuse
Standards

• Bridge processes
  – Links together concurrent or serial work
  – Promotes data sharing between related processes

• Resist entropy
  – Ensure product information longevity
  – Mitigate technological dependencies
Standards

- **Model**
  - ASME: MBD/MBE
  - ISO: STEP

- **Pictorial**
  - CGM / WebCGM
  - EPS
  - SVG

- **Web**
  - W3C: XML
  - OASIS

- **ILS**
  - ASD/ATA/AIA: S-Series Specs
  - ISO: PLCS
  - ISO: DEX
Types

Dynamic
- 2D / 3D
- Interactive

Static
- Bitmap
- Vector

Integrative
Utilitarian
This Old Box

- Manage expectations
- Dump and run like heck?
- Not so much
Conversion Challenges

• Poor quality
• Non-original data (copy of a copy...)
• Versioning
• Editable
• Intelligibility
• Unsupported native format
• Re-sizing or re-scaling
Conversion Solutions

- Automated processing
- Manual re-tracing and vectorizing
- Re-scanning
- Translation to standard format
- Filtering and reprocessing
- Re-drawing
- Manage expectations
Value Proposition

- Requirements for efficiency-driven logistics
- Standards provide the bridge
- Overcome conversion challenges
- Reap benefits of repurposed legacy graphics
Benefits
Re-purposed legacy graphics:
• Re-usable content
• Extended life of asset data
• Decoupled institutionalized knowledge
• Opportunity for ILS and ALE
• Enhanced accessibility for next generation users
Thank you