Digital Linear Tape (DLT™) Media
Product Technology and Care & Handling Seminar
March 28, 2008

Fujifilm Recording Media Division
Fujifilm U.S.A., Inc.
200 Summit Lake Drive
Valhalla, NY 10595

Customer Service: 800-488-3854

For more information, go to:
www.fujifilmusa.com/tapestorage
One Gigabyte equals one billion bytes (1 GB = 1,000,000,000 bytes).
One Megabyte equals one million bytes (1 MB = 1,000,000 bytes).
Fujifilm DLT tape
Digital Linear Tape
DLTtape

DLT 4000 – 20 GB at 1.5 MB/s (Native)
DLT 7000 – 35 GB at 5 MB/s (Native)
DLT 8000 – 40 GB at 6 MB/s (Native)
DLT 1
DLT VS80

* The DLT1 and DLT VS80 Drives write DLTtape IV in a non-DLT 8000 format.
Note: Native capacity & transfer rates shown; double these values for assumed 2:1 compression.

One Gigabyte equals one billion bytes (1 GB = 1,000,000,000 bytes).
One Megabyte equals one million bytes (1 MB = 1,000,000 bytes).
<table>
<thead>
<tr>
<th>MEDIA</th>
<th>DRIVES</th>
<th>CAPACITY (Native-Compressed)</th>
<th>PERFORMANCE (Native-Compressed)</th>
</tr>
</thead>
<tbody>
<tr>
<td>DLTtape III – TK85</td>
<td>DLT 260 (1) - Tz85</td>
<td>2.6 GB</td>
<td>0.8 MB/s</td>
</tr>
<tr>
<td></td>
<td>DLT 600 (1) - Tz86</td>
<td>6 GB</td>
<td>0.8 MB/s</td>
</tr>
<tr>
<td></td>
<td>DLT 2000 (1) - Tz87</td>
<td>10 GB – 20 GB</td>
<td>1.25 MB/s – 2.5 MB/s</td>
</tr>
<tr>
<td>DLTtape IIIXT –</td>
<td>DLT 2000XT (1) -</td>
<td>15 GB – 30 GB</td>
<td>1.25 MB/s – 2.5 MB/s</td>
</tr>
<tr>
<td>DLTtape IV – TK88</td>
<td>DLT 4000 (1) - Tz88</td>
<td>20 GB – 40 GB</td>
<td>1.5 MB/s – 3 MB/s</td>
</tr>
<tr>
<td></td>
<td>DLT 7000 (1) - Tz89</td>
<td>35 GB – 70 GB</td>
<td>5 MB/s – 10 MB/s</td>
</tr>
<tr>
<td></td>
<td>DLT 8000 (1)</td>
<td>40 GB – 80 GB</td>
<td>6 MB/s – 12 MB/s</td>
</tr>
<tr>
<td></td>
<td>DLT 1 (1)</td>
<td>40 GB – 80 GB</td>
<td>3 MB/s – 6 MB/s</td>
</tr>
<tr>
<td></td>
<td>DLT VS80 (1)</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

DLTtape Fujifilm P/N MEDIA DESCRIPTION
III  26112085  III  26112085 1200’ Metal Particle Media (MP)
IIIXT 26112092  IIIXT 26112092 1828’ Metal Particle Media (MP)
IV  26112088   IV  26112088  1828’ ATOMM (Advanced super Thin-layer and high-Output Metal Media)

Note 1: These drives retired by the manufacturer.
Fujifilm DLTtape

DLTtape IV  TK88
P/N 26112088

Note: Old packaging shown above – a new silver color packaging insert was introduced in 2006.
Generations of Success – DLTtape Drives

Beyond the DLT 8000, the DLT family splits into the Super and Value Lines.

Super DLT (Super Line) and DLT1 (Value Line) Roadmaps continue on Page 19 + Extended Roadmap!!

- The DLT-8000 drive is the end of the DLT Family’s Roadmap – Future DLT Generations split into two Families: the DLT Super and DLT Value Drives.
- DLT 1 (& ValueSmart 80) are Benchmark* DLT 1 format drives. *Acquired by Quantum 11/02.
DLT Questions?

Security Seal
Fujifilm SuperDLTtape
Super DLT Technology: Super DLTtape

- **Quantum** Super DLT Drives and Fujifilm Tape
- Product roadmap from 110 GB to ≥ 6 TB
  - 220 GB to ≥ 12 TB with 2:1 compression
- Enabled by four New Technologies
  - Advanced Metal Powder Media (AMP)
  - Optical Servo Guides
  - MR Read Heads
  - PRML Channel

New Packaging - 2006
Advanced Metal Powder Media

- Advanced technology supports multiple generations of Super DLTtape products.
- Reliable, proven multi-coated Metal Particle media.
- The anti-static backside coating has indelible guide tracks used for optical servo positioning of the drive’s read/write head. (1)

(1) The Optical Servo Positioning feature was introduced beginning with the SDLT-220 drive. Super DLTtape I, II, & DLTtape S4 have factory applied servo guide tracks on the back, non-recording side of the tape media. Note: DLTtape IV and earlier DLTtape media did not employ servo-positioning and do not have servo tracks.
Super DLTtape Combines the best of Magnetics & Optics (Laser Guided Magnetic Recording)

Advanced Multi-Channel MR Cluster Read-Write Head

Optical Guidance

Pivoting Optical Servo

Magnetic Data Tracks*

Four Servo Bands of 17 Servo Tracks in each optical band

* SDLT-220 & SDLT-320 Drives: 8-Channel Read-Write Head, 448 Data Tracks (56 Track Groups).
* SDLT-600 Drives: 16-Channel Read-Write Head, 640 Data Tracks (40 Track Groups).
* DLT-S4 Drives: 16-Channel Read-Write Head, 1280 Data Tracks (80 Track Groups).
Fujifilm Super DLTtape I

Two Drives for 1st Generation Super DLTtape I:

- The first Super-DLTtape (SDLT-I) is used on two (2) different capacity/performance drives to meet different end user needs:
  - **SDLT-220** -- 110 GB Capacity at 11 MB/sec Transfer Rate
  - **SDLT-320** -- 160 GB Capacity at 16 MB/sec Transfer Rate

- Both drives feature Backward Read Compatibility (BRC) for DLTtape IV, recorded by the DLT-4000, DLT-7000, DLT-8000, DLT-1, & DLT-VS80 drives.

* Native Capacity and Transfer Rates (without compression)  **The SDLT-220 first shipped 1Q 2001, the SDLT-320 on 2Q 2002.
***Added DLT-1 and DLT-VS80 Backward Read Compatibility (BRC) Feature 2Q 2002.
Fujifilm *Super DLTtape II*

**Super DLT 600 Drive**

- 300 GB Native Capacity, 36 MB/sec Native Transfer Rate
- Backward Read-only Compatible only with the SDLT-220 and SDLT-320 formats written to Super DLTtape I media & with DLTtape VS1* media written by DLT-VS160 drives.

<table>
<thead>
<tr>
<th>Tape Media</th>
<th>Drive Format Capacity</th>
<th>SDLT 220 Drive (448 Track, 8-channel)</th>
<th>SDLT 320 Drive (448 Track, 8-channel)</th>
<th>SDLT 600 Drive (640 Track, 16-channel)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Super DLTtape I</td>
<td>110/220 GB</td>
<td>R/W 11 MB/s</td>
<td>R/W</td>
<td>Read</td>
</tr>
<tr>
<td>558 m</td>
<td>160/320 GB</td>
<td>NC</td>
<td>R/W 16 MB/s</td>
<td>Read</td>
</tr>
<tr>
<td>Super DLTtape II</td>
<td>300/600 GB</td>
<td>NC</td>
<td>NC</td>
<td>R/W 36 MB/s</td>
</tr>
<tr>
<td>630 m</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

*Native Transfer Rate shown - Megabytes per Second (MB/s). Capacity Native/Compressed - Gigabytes (GB).
*Fujifilm brand DLTtape VS1 media for the DLT-VS160 [and DLT-V4] drive is not currently available.
SDLT-II WORM Feature for the SDLT-600 Drive

DLTice: SDLT-600 drive firmware, DLTice, has the option of formatting standard SDLT-II tapes as WORM (Write Once, Read Many) tapes using the DLTsage utility or supporting ISV backup & archive programs [on an SDLT-600 drive only].

Data written to WORM-formatted tapes cannot be altered or over-written, providing a cost effective solution to regulatory requirements to retain data (records and documents) for a certain number of years in an unalterable format.
Super DLTtape II & Quantum’s Professional Video Drive – SDLT 600A

Super DLT 600A Drive - Professional Video Drive

- The SDLT 600A drive offers the benefits of file-based data tape storage and the accessibility of video tape. The SDLT 600A's feature set makes the drive MXF-aware enabling videotape-like access to video subclips by timecode.

- The SDLT 600A is designed to use a standard Super DLTtape II media cartridge. With a native storage capacity of 300 GB, Super DLTtape II media provides native transfer rates of up to 288 Mb/second to ensure faster-than-real-time, on-demand availability of video content.

- 300 GB Native Capacity, 36 MB/sec Native Transfer Rate. Compression is not applicable for the SDLT-600A drive.

Note: Transfer rates for data are typically shown using the prefix B (Byte); for video the prefix b (bit) is commonly used. Eight bits (b) = one Byte (B).
New DLT-S4 Drive

- Uses New DLTtape S4 Media

- 800 GB Native Capacity
  - 1.6 TB assuming 2:1 compression

- 60 MB/sec Native Transfer Rate
  - 120 MB/sec assuming 2:1 compression

- Backwards Read-only Compatible with the SDLT-320 and SDLT-600 Drives.

- DLTsage WORM Functionality Feature and new DLTsage Tape Security Feature
# Fujifilm DLTtape Product Codes

<table>
<thead>
<tr>
<th>Product</th>
<th>Standard</th>
<th>Labeled</th>
</tr>
</thead>
<tbody>
<tr>
<td>DLTtape IV</td>
<td>26112088</td>
<td>26112089</td>
</tr>
<tr>
<td>DLT CleaningTape III</td>
<td>26112090</td>
<td>26112097</td>
</tr>
<tr>
<td>Super DLTtape I</td>
<td>26300001</td>
<td>26300071</td>
</tr>
<tr>
<td>Super DLTtape II</td>
<td>26300201</td>
<td>26300213</td>
</tr>
<tr>
<td>DLTtape S4</td>
<td>26360000</td>
<td>26320024</td>
</tr>
<tr>
<td>Super DLT CleaningTape</td>
<td>26300010</td>
<td>26300074</td>
</tr>
</tbody>
</table>

Not all configurations are shown. For other configurations, contact your sales representative or call Fujifilm’s Recording Media Division – Customer Service Department at 800-488-3854.
**Beyond the DLT-8000 Drive: DLT-S & DLT-V Roadmaps***

New DLT generations are offered in two families: one optimized for high performance, a second optimized for value.

<table>
<thead>
<tr>
<th>Generation - Availability</th>
<th>SDLT Performance Drive Family &amp; Performance DLT-S Roadmap</th>
<th>DLT Value Drive Family &amp; Value DLT-V Roadmap</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gen 1 -Now</td>
<td>SDLT-220 110 GB 11 MB/s</td>
<td>DLT-1 40 GB 3 MB/s</td>
</tr>
<tr>
<td>Gen 2 -Now</td>
<td>SDLT-320 160 GB 16 MB/s</td>
<td>DLT- VS80 40 GB 3 MB/s</td>
</tr>
<tr>
<td>Gen 3 -Now</td>
<td>SDLT-600 300 GB 36 MB/s</td>
<td>DLT-VS160 80 GB 8 MB/s</td>
</tr>
<tr>
<td>Gen 4 -Now</td>
<td>DLT-S4 800 GB 60 MB/s</td>
<td>DLT-V4 160 GB 10 MB/s</td>
</tr>
<tr>
<td>Gen 5*</td>
<td>DLT-S5 ≥ 1500 GB (1.5 TB) ≥ 100 MB/s</td>
<td>DLT-V5 ≥ 250 GB ≥ 17.5 MB/s</td>
</tr>
<tr>
<td>Gen 6*</td>
<td>DLT-S6 ≥ 3000 GB (3 TB) ≥ 200 MB/s</td>
<td>DLT-V6 ≥ 500 GB ≥ 25 MB/s</td>
</tr>
<tr>
<td>Gen 7*</td>
<td>DLT-S7 ≥ 6000 GB (6 TB) ≥ 400 MB/s</td>
<td>DLT-V7 ≥ 1000 GB (1 TB) ≥ 30 MB/s</td>
</tr>
</tbody>
</table>

The specifications shown above are native capacity and native data transfer rate (native = without compression).

Beyond the 1st three generations of the Performance line, the SDLT-220, SDLT-320 and SDLT-600 drives, future generations will be known as DLT-S4, DLT-S5, etcetera. The SDLT-220 and SDLT-320 drives can read DLTtape IV written by the DLT-8000, DLT-7000, DLT-4000, DLT-1 and DLT-VS80 drives.

The first two generations of the Value line were the DLT-1 and DLT-VS80 (a half-height version of the DLT-1). Both write to DLTtape IV and offer the same capacity as the earlier DLT-8000 drive (40 GB native); DLT-1 and DLT-VS80 drives write to tape in a different format than the DLT-8000. The DLT-1 and DLT-VS80 drives are backward read compatible with DLTtape IV written by the DLT-4000 drives only. Beyond the earlier existing three generations of the Value line, future generations will be known as DLT-V4, DLT-V5, etcetera. The DLT-V4 introduced on 10/03/05 uses the same DLTtape VS1 cartridge as the DLT-VS160 drive and features backward read compatibility with DLTtape VS1 cartridges written by the DLT-VS160 drives and DLTtape IV cartridges written by DLT-VS80 and DLT-1 drives.

* Future-looking roadmap statements are subject to change or withdrawal and represent potential objectives only.
Future-looking roadmap statements are subject to change or withdrawal and represent potential objectives only.
## DLT/SDLT

<table>
<thead>
<tr>
<th>TAPE MEDIA</th>
<th>TAPE DRIVES</th>
<th>CAPACITY NATIVE - COMPRESSED</th>
<th>PERFORMANCE NATIVE - COMPRESSED</th>
</tr>
</thead>
<tbody>
<tr>
<td>DLTtape S4</td>
<td>DLT S4</td>
<td>800 GB – 1600 GB</td>
<td>60 MB/s – 120 MB/s</td>
</tr>
<tr>
<td><strong>Super DLTtape II</strong></td>
<td><strong>SDLT 600A</strong></td>
<td>300 GB – N/A</td>
<td>36 MB/s – N/A</td>
</tr>
<tr>
<td></td>
<td><strong>SDLT 600</strong></td>
<td>300 GB – 600 GB</td>
<td>36 MB/s – 72 MB/s</td>
</tr>
<tr>
<td><strong>Super DLTtape I</strong></td>
<td><strong>SDLT 320</strong></td>
<td>160 GB – 320 GB</td>
<td>16 MB/s – 32 MB/s</td>
</tr>
<tr>
<td></td>
<td><strong>SDLT 220</strong></td>
<td>110 GB – 220 GB</td>
<td>11 MB/s – 22 MB/s</td>
</tr>
<tr>
<td>DLTtape VS1</td>
<td>DLT V4</td>
<td>160 GB – 320 GB</td>
<td>10 MB/s – 20 MB/s</td>
</tr>
<tr>
<td></td>
<td>DLT VS160</td>
<td>80 GB – 160 GB</td>
<td>8 MB/s – 16 MB/s</td>
</tr>
<tr>
<td><strong>DLTtape IV - TK88</strong></td>
<td><strong>DLT VS80</strong></td>
<td>40 GB – 80 GB</td>
<td>3 MB/s – 6 MB/s</td>
</tr>
<tr>
<td></td>
<td><strong>DLT 1</strong></td>
<td>40 GB – 80 GB</td>
<td>3 MB/s – 6 MB/s</td>
</tr>
<tr>
<td></td>
<td><strong>DLT 8000</strong></td>
<td>40 GB – 80 GB</td>
<td>6 MB/s – 12 MB/s</td>
</tr>
<tr>
<td></td>
<td><strong>DLT 7000</strong></td>
<td>35 GB – 70 GB</td>
<td>5 MB/s – 10 MB/s</td>
</tr>
<tr>
<td></td>
<td><strong>DLT 4000</strong></td>
<td>20 GB – 40 GB</td>
<td>1.50 MB/s – 3.0 MB/s</td>
</tr>
<tr>
<td>DLTtape IIIXT -</td>
<td>DLT 2000 XT</td>
<td>15 GB – 30 GB</td>
<td>1.25 MB/s – 2.5 MB/s</td>
</tr>
<tr>
<td>DLTtape III - TK85</td>
<td><strong>DLT 2000</strong></td>
<td>10 GB – 20 GB</td>
<td>1.25 MB/s – 2.5 MB/s</td>
</tr>
<tr>
<td></td>
<td><strong>DLT 600</strong></td>
<td>6 GB – N/A</td>
<td>0.8 MB/s – N/A</td>
</tr>
<tr>
<td></td>
<td><strong>DLT 260</strong></td>
<td>2.6 GB – N/A</td>
<td>0.8 MB/s – N/A</td>
</tr>
</tbody>
</table>

Blue shade indicates Fujifilm brand data tape media is currently available for these drives.
(1) Drives retired by the manufacturer. (2) Drives retired and no longer supported by the manufacturer.
# DLT/SDLT

<table>
<thead>
<tr>
<th>DATA TAPE MEDIA</th>
<th>TAPE DRIVES</th>
<th>Drive Cleaning Cartridge</th>
<th>Clean Uses</th>
</tr>
</thead>
<tbody>
<tr>
<td>DLTtape S4</td>
<td>DLT S4</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
| Super DLTtape II P/N 26300201 | SDLT 600A  
SDLT 600       | Fujifilm P/N 26300010 | 20          |
| Super DLTtape I P/N 26300001 | SDLT 320  
SDLT 220 (1)     |                          |            |
| DLTtape VS1     | DLT V4  
DLT VS160         | Not Available from Fujifilm | 20         |
| DLTtape IV - TK88 P/N 26112088 | DLT VS80 (1)  
DLT 1 (1) 
DLT 8000 (1) 
DLT 7000 (1) - Tz89 
DLT 4000 (1) - Tz88 | Not Available from Fujifilm | 20         |
| DLTtape IIIXT - | DLT 2000 XT (2) - | Fujifilm P/N 26112090 | 20         |
| DLTtape III - TK85 | DLT 2000 (2) - Tz87  
DLT 600 (2) - Tz86 
DLT 260 (2) - Tz85 |                          |            |

Blue shade indicates Fujifilm brand Data and/or Cleaning media currently available for these drives.

(1) Drives retired by the manufacturer.  (2) Drives retired and no longer supported by the manufacturer.
<table>
<thead>
<tr>
<th>DRIVES</th>
<th>HEAD CHNL</th>
<th>DATA TRKS</th>
<th>SERVO TRKS</th>
<th>FTPI bits / inch</th>
<th>R/W IPS</th>
<th>MEDIA</th>
<th>MEDIA LENGTH</th>
<th>CAPACITY NATIVE – COMPRESSED</th>
<th>Data Rate NATIVE – COMPRESSED</th>
</tr>
</thead>
<tbody>
<tr>
<td>DLT-S4</td>
<td>16</td>
<td>1280</td>
<td>Yes (1)</td>
<td>256 K</td>
<td>150</td>
<td>DLTtape S4</td>
<td>2100'</td>
<td>800 – 1600 GB</td>
<td>60 – 120 MB/s</td>
</tr>
<tr>
<td>SDLT-600A</td>
<td>16</td>
<td>640</td>
<td>Yes (1)</td>
<td>233 K</td>
<td>108</td>
<td>SDLTtape II</td>
<td>1957''</td>
<td>300 GB - N/A</td>
<td>36 MB/s - N/A</td>
</tr>
<tr>
<td>SDLT-600</td>
<td>16</td>
<td>640</td>
<td>Yes (1)</td>
<td>233 K</td>
<td>108</td>
<td>SDLTtape I</td>
<td>1833'</td>
<td>160 – 320 GB</td>
<td>16 – 32 MB/s</td>
</tr>
<tr>
<td>SDLT-320</td>
<td>8</td>
<td>448</td>
<td>Yes (1)</td>
<td>193 K</td>
<td>122</td>
<td>SDLTtape I</td>
<td>1833'</td>
<td>110 – 220 GB</td>
<td>11 – 22 MB/s</td>
</tr>
<tr>
<td>SDLT-220</td>
<td>8</td>
<td>448</td>
<td>Yes (1)</td>
<td>133 K</td>
<td>116</td>
<td>SDLTtape I</td>
<td>1833'</td>
<td>160 – 320 GB</td>
<td>10 – 20 MB/s</td>
</tr>
<tr>
<td>DLT V4</td>
<td>4</td>
<td>352</td>
<td>No</td>
<td>219 K</td>
<td>118</td>
<td>SDLTtape VS1</td>
<td>1847''</td>
<td>80 – 160 GB</td>
<td>8 – 16 MB/s</td>
</tr>
<tr>
<td>DLT VS160</td>
<td>4</td>
<td>240</td>
<td>No</td>
<td>175 K</td>
<td>122</td>
<td>SDLTtape VS1</td>
<td>1847''</td>
<td>40 – 80 GB</td>
<td>3 – 6 MB/s</td>
</tr>
<tr>
<td>DLT VS80</td>
<td>2</td>
<td>168</td>
<td>No</td>
<td>123 K</td>
<td>130</td>
<td>DLTtape IV</td>
<td>1828''</td>
<td>40 – 80 GB</td>
<td>6 – 12 MB/s</td>
</tr>
<tr>
<td>DLT 1</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>DLTtape IV</td>
<td>1828''</td>
<td>35 – 70 GB</td>
<td>5 – 10 MB/s</td>
</tr>
<tr>
<td>DLT-8000</td>
<td>4</td>
<td>208</td>
<td>No</td>
<td>98 K</td>
<td>168</td>
<td>DLTtape IV</td>
<td>1828''</td>
<td>20 – 40 GB</td>
<td>1.5 – 3.0 MB/s</td>
</tr>
<tr>
<td>DLT-7000</td>
<td>4</td>
<td>208</td>
<td>No</td>
<td>86 K</td>
<td>160</td>
<td>DLTtape IV</td>
<td>1828''</td>
<td>15 – 30 GB</td>
<td>1.25 – 2.5 MB/s</td>
</tr>
<tr>
<td>DLT-4000</td>
<td>2</td>
<td>128</td>
<td>No</td>
<td>81.6 K</td>
<td>110</td>
<td>DLTtape IV</td>
<td>1828''</td>
<td>10 – 20 GB</td>
<td>1.25 – 2.5 MB/s</td>
</tr>
<tr>
<td>DLT-2000XT</td>
<td>2</td>
<td>128</td>
<td>No</td>
<td>62.5K</td>
<td>110</td>
<td>DLTtape III XT</td>
<td>1828''</td>
<td>6 GB - N/A</td>
<td>0.8 MB/s - N/A</td>
</tr>
<tr>
<td>DLT-2000</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>DLTtape III</td>
<td>1200'</td>
<td>2.6 GB - N/A</td>
<td>0.8 MB/s - N/A</td>
</tr>
<tr>
<td>DLT-600</td>
<td>2</td>
<td>112</td>
<td>No</td>
<td>42.5 K</td>
<td>100</td>
<td>DLTtape I</td>
<td>1200'</td>
<td>6 GB - N/A</td>
<td>0.8 MB/s - N/A</td>
</tr>
<tr>
<td>DLT-260</td>
<td>2</td>
<td>48</td>
<td>No</td>
<td>42.5 K</td>
<td>100</td>
<td>DLTtape I</td>
<td>1200'</td>
<td>2.6 GB - N/A</td>
<td>0.8 MB/s - N/A</td>
</tr>
</tbody>
</table>

(1) Optical Servo Tracking employed; this allows SDLT/DLT-S tapes to be degaussed and reused. Other Tape technology with Magnetic Servo Tracks (e.g. LTO) cannot be reused if degaussed.
SDLT Questions?

Security Seal
<table>
<thead>
<tr>
<th>Data Cartridge</th>
<th>Tape Drive</th>
<th>Native Capacity</th>
<th>Native Data Rate</th>
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<tr>
<td>DLTtape IV</td>
<td>DLT 4000</td>
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<td>1.5 MB/sec</td>
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<td>5 MB/sec</td>
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<td>DLT 8000</td>
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<td>6 MB/sec</td>
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<td>DLT 1</td>
<td>40 GB</td>
<td>3 MB/sec</td>
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<td>3 MB/sec</td>
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<td>SDLT 320</td>
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<td>SDLT 600</td>
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<td>DLTtape S4</td>
<td>DLT-S4</td>
<td>800 GB</td>
<td>60 MB/sec</td>
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</table>

* Data Capacity and Data Transfer Rate are drive dependent.

One Gigabyte equals one billion bytes (1 GB = 1,000,000,000 bytes).
One Megabyte equals one million bytes (1 MB = 1,000,000 bytes).
Think Fujifilm Media, for Today’s & Tomorrow’s Most Popular Drives!

Questions About DLT or SDLT?

Advanced super Thin-layer and high-Output Metal Media
Fujifilm Value Added Services
Barcode Labeling

- EDP Tri-Optic In-house Label Printer *(Fujifilm Exclusive!)*
  - Quick order process time since labels are printed in-house
  - Clean room environment
  - Technical support
  - Drop-ship direct to end-user
  - Now Available: Custom Logo Barcode Labeling
Barcode Labeling

EDP/Tri-Optic Label Benefits

• #1 barcode label printing system with an 80% market share
• Over 750 million EDP/Tri-Optic labels in use worldwide
• Guaranteed 100% readability by tape libraries and compatible with 15 different media types
• Highest quality materials ensure longevity – long archival life
Barcode Labeling

EDP/Tri-Optic Benefits

• Tri-Optic® labels are manufactured, not just printed. Fujifilm’s Tri-Optic labels are manufactured at our Bedford, MA factory under license from Tri-Optic.

• A special design laminate overlay protects the label from environmental factors, but even more important the overlay helps to optimally scatter light, which is beneficial to most readers.

• Label of choice for major library OEMs – Highest quality materials ensure longevity.
Barcode Labeling

Custom Barcode Labels

- EDP Tri-Optic labels
- Same benefits as our Custom Pad Print!
- Available now!

Custom print area
Custom Pad Printing

Customize DLT, SDLT & LTO Tape Cartridges: end-user company name, logo, etc.

- Increase Security
- Data Management
- Quick Recognition
- Data Protection
- Brand Identity
Bulk Library Packs

DLT, SDLT and LTO Cartridges are also available in bulk library packs. Fujifilm exclusive: Thermo-formed Plastic 20-packs for safe shipment.

Bulk Library Packs are **without** Individual Protective Cases (P-cases) or U-cards for Easy Loading into Library Magazines.

Library Packs can also be ordered **with** Protective Cases shipped on-the-side.
### Fujifilm DLTtape Product Codes

<table>
<thead>
<tr>
<th>Product</th>
<th>Standard in Protective Case</th>
<th>Labeled in Protective Case</th>
<th>Library Pk Standard w/o P-case</th>
<th>Library Pk Labeled w/o P-cases</th>
<th>Library Pk Standard plus cases*</th>
<th>Library Pk Labeled plus cases*</th>
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<td>DLTtape S4</td>
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<td>26320024</td>
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<td>26300074</td>
<td>–</td>
<td>–</td>
<td>–</td>
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</tr>
</tbody>
</table>

*Not all configurations are shown.* For other configurations, contact your Dealer sales representative or call Fujifilm’s Recording Media Division – Customer Service Department at 800-488-3854. *Cases shipped separately, on-the-side.* Library Packs enable quick and easy unpacking and introduction into the Tape Library, while the Individual Protective Cases (P-cases) are on hand for use later when storing cartridges outside the Library and for transporting and archiving cartridges.
It’s What’s Inside that Counts. Think Fujifilm Media, for Today’s & Tomorrow’s Most Popular Drives!

Questions About DLT or SDLT?

Advanced super Thin-layer and high-Output Metal Media
Tape Media Care & Handling
Tape systems are unique – Tape requires four elements (software, hardware, media & people) to function properly.

- Tape cartridges must be managed, handled and stored properly.

- Good care and handling will maximize tape media longevity.

- The real value of tape media is in the data - proper care safeguards your data
• Today’s data tape *drives* require no preventive maintenance beyond use of cleaning cartridges.

• Data tape cartridge media requires...
  - proper operating environments
  - proper storage environments
  - proper operator handling
  - proper shipping
Proper tape drive operating environments...

- Do not allow *airborne dust* or other airborne contaminants while drives are operating. Any airborne contaminates will get wound into the tape-pack and damage media.

- Do not allow *excessive heat* while drives are operating. Insufficient cooling ventilation for the drive, due to a lapse in room cooling, can quickly cause excessive heat inside the drive at the tape head interface and damage media.
Proper tape media environments...

- "Maximum Wet Bulb Temperature" values are in hardware and media specifications!

  Simply stated, it is not permissible to have both Temperature & Humidity in the high end of their respective allowable ranges.

- Always operate your equipment and store your tape media under the best conditions, not the extremes at either end of allowable environmental ranges.

Proper environmental conditions for operation and storage will maximize media longevity.
Cartridge System Tape
Care & Handling

Proper tape media environments...

- Avoid harsh environments whenever possible; however, when extreme environments are unavoidable, plan for acclimation time.

- Cartridges that have been outside the drive’s operating environment, should be acclimated to the drive-operating environment before use.

Allow acclimation time, at least equal to any time the cartridge was exposed to uncontrolled environments, up to 24 hours.
Proper tape media **storage** environments...

- Do not allow uncontrolled temperature or humidity conditions. Keep tape cartridges within a reasonable environment for both intermediate and long-term storage.

- A good environment for tape storage is within a temperature range of 64°F to 78°F and RH of 35 to 55 percent. Ideal storage conditions are non-fluctuating 65°F and 40% RH.
Proper operator handling ...

- Avoid dropping tape cartridges...

  However, when the unavoidable happens – and it will – perform a thorough inspection for any damage.

- A good policy is to retire any “scratch” tape that has received strong physical shock due to being dropped.

- Think similar handling for HDD and Tape
  - *if you wouldn't do it to a hard disk drive*...
Cartridge System Tape
Care & Handling

Proper shipping ...

- Cartridges should be packed snugly in a rigid shipping box with adequate impact protection,
  - surrounded by adequate shock-absorbent material for protection and...
  - adequately supported to prevent any movement within the box.

Or, use one of the professional accessories designed to meet the appropriate packaging requirements for the shipping circumstances:
Data Tape Courier – 1 Pack

One-time use solution

- Meets Best Practices
- Mid-Range/Enterprise Tape
Data Tape Courier - Professional

- Reusable Vault/Shipping Container
- Tray system fits Mid-Range tapes
- Holds 16 DLT or 18 LTO or 20 Enterprise cartridges
- Reliable compression clips, lockable
- Meets Best Practices
Data Tape Courier – Pro Case OverPack

• Data Tape Courier Pro Overpack
• Recommended way to ship the Pro cases
• Includes special shock absorbing end caps
Data Tape Courier – Pro Double

- Fits 32 – 36 Tapes
- Uses the same inserts
Data Tape Courier – Pro LTO Bare

- Pro LTO Bare
- 14 LTO tapes without their plastic protective cases
- Made of super shock absorbent “Croc” material
Protect your organization's most sensitive and valuable data assets while in transit with a Fujifilm Tape Tracker.
Data Tape Carousel

- **DLT and LTO Tape Storage Rack**
- Compact carousel unit rotates 360 degrees and with full-swivel casters beneath its base it’s easily relocated.
- Dimensions- 76”H x 28”W x 28” D
- Cartridge Capacity:
  - 672 DLT per unit (168 DLT per side)
  - 768 LTO per unit (192 LTO per side)
  - 720 DLT and LTO combined per unit (two sides DLT + two sides LTO).
Media Destruction

- Integrated Media Destroyer and Degausser in one COMBO unit.
- Can destroy Hard Disk Drives and Tapes; custom media spacers to safely destroy Mid-Range and Enterprise tapes (this is a Fujifilm exclusive).
- Similar in size to a large tower computer; weight is 178 lbs.
- 2.5 minute degauss & destruction time per tape cartridge or hard disk drive.
- Meets Best Practices
- MSRP: $25,250

- Demo video at www.youtube.com/FujifilmRMD
Care and Handling Questions?
Think Fujifilm Media, for Today’s & Tomorrow’s Most Popular Drives!

Thank You!

Advanced super Thin-layer and high-Output Metal Media
Fujifilm’s Coating Technology Creates Breakthrough Products

Fujifilm began coating motion picture and photographic film in the mid 1930’s using die coating technology. Simultaneous multi-coating technology was developed in 1960. Also in 1960, Fujifilm produced its first magnetic tape products. In 1965, Fujifilm began manufacturing computer tape. Fujifilm’s floppy disks (8-inch) were introduced in 1977. Fujifilm began manufacturing dual-coated magnetic media in 1989 and Advanced super Thin-layer and high-Output Metal Media (ATOMM) dual-coated media in 1992. For ATOMM, Fujifilm’s special die coating head simultaneously applies two separate and unique layers, one magnetic and one non-magnetic. It’s a dual coating system Fujifilm invented that has allowed us to continually develop the industry’s “next generation” storage products and develop nanocubic™ Technology for data storage products with even greater capacities.