

MEDIA DATA SPECIFICATIONS

Europe	DVD/CD/Blu-ray	EDS001	Issue4	Feb 2011
--------	----------------	--------	--------	----------

DVD/CD Input Media Data Specification

Technicolor currently accepts data on the media listed below. However, we are constantly expanding our support for other formats and are always available for advice on any data transfer enquiries.

Please note each individual media submitted must be accompanied with a DVD Pre-Mastered Input Media Form (ref. EDS019.)

Media	Type	Format
*DLT (Digital Linear Tape)	Tape - Series III, IV Drive _DLT4000, 7000 & 8000 only may be used	DLT tape must contain a DDP or CMF file set.
DVD Recordables	DVD-R (A) [Authoring] or DVD-R (G) [General] are acceptable. DVD+R or DVD-R (DL) [Dual Layer] are acceptable. NB. Multi-session recordable DVD discs are not acceptable.	<ol style="list-style-type: none"> 1. "Finalised" (playable) Recordables - no copy protection (except Macrovision ACP) to be applied. 2. DDP Fileset Recordables - one disc per layer with each file set in that disc's root directory. 3. Dual Layer DVD-R's are not preferred format. If there is a strict need to supply a dual layer master, please clearly mark this information on IMF.
DVD/CD Production Discs (Silver discs)	DVD-5, DVD-9 & CD are acceptable. No copy protection to be present. Exception: Macrovision ACP	
CD Recordables	CD-R audio masters should be recorded in a single session (Disc-At-Once) and meet Red Book specifications. Multisession discs must be closed and finalized. Masters containing CD-TEXT must be clearly identified. Note: Refer to EDS023 for more details concerning CD-ROM and CD Audio data submission	<p>Finalised" (playable) Recordables - no copy protection to be applied.</p> <p>Total capacity of Audio and Data is 77:00. Absolute maximum capacity is 79:40.</p>
WAM!NET	High speed Electronic transmission.	DDP or CMF file set are recommended and preferred (.iso images are accepted)
Hard drive	USB 2.0 (HDD must be formatted in Windows NTFS system)	DDP or CMF file set.

*see <http://www.dlittape.com> for general information on DLT tapes.

Copy protection systems: CD and DVD Formats

Technicolor can replicate optical media using various copy protection formats. You should contact the owner of the copy management system for specific details regarding how you should create your replication master. The following list is constantly changing. Make sure that the master is clearly identified with the copy protection used.

Format	Copy protection	Requirements
CD-ROM, DVD-ROM	SafeDisc	<ol style="list-style-type: none"> 1. The master has to be marked "SafeDisc protected" 2. DDP or CMF file set on master should be compressed to zip or rar file. Please contact **Macrovision for more specific Mastering instructions
CD-ROM, DVD-ROM	SecuROM	<ol style="list-style-type: none"> 1. The master has to be marked "SecuROM protected" 2. We need to know which exe file(s) has been protected, e.g. "aplgame.exe" 3. In case when exe file (s) is not in root directory (hidden files, archive files) send us CD-R with executable file, which should be used for encryption 4. Backup copy of above at the client discretion
DVD-Video	CSS	It must be identified in the image file set at the authoring stage
	RipGuard	Please contact Macrovision for Mastering instructions
	Macrovision	
DVD-Video	Patronus	Protection added on Premastering stage
CD-ROM	SmarteCD	Please contact Smarte Solution Inc. for Mastering instructions

**see <http://www.macrovision.com> and check out their brochures



BD Input Media Data Specification

Media	Type	Format
***LTO (Linear Tape Open)	Tape - Series 1 (read only), 2,3 Drive - Series 2,3	LTO tape must contain a BDCMF file set. Use Windows Backup Utility to copy the BDCMF file set to an LTO cassette. Make sure "Verify After Copy" is turned on in Windows Backup.
Hard drive	USB 2.0/Firewire (HDD must be formatted in Windows NTFS system)	BDCMF file set are required
WAM!Net	High speed Electronic transmission.	

*see <http://www.lto-technology.com> for general information on LTO tapes.

Copy protection systems: BD Format

Format	Copy protection	Requirements
BD Video	****AACS encryption (Advanced Access Content System) - Encrypted Content	Please contact AACS LA for Mastering instructions
	MKB (Media Key Block)	
	Encrypted Title Keys	

**** see <http://www.aacsla.com> for general information on AACS products