

## UDO Professional Archive Media



Today's data archives demand increased flexibility to comply with growing regulations for record retention and disposition, control operational risks, minimize legal liability and fully exploit information assets. Alliance Storage Technologies meets this need for flexibility with Ultra Density Optical (UDO) Write Once and Rewritable media formats specifically designed for diverse archive requirements.

Thousands of organizations worldwide have chosen UDO for the archival storage of valuable records because it meets their technical and financial requirements. UDO provides unmatched media longevity and unquestioned record authenticity at a very low total cost of ownership. With compelling benefits over magnetic disk and tape-based archives, UDO offers the added advantage of two media formats to meet the evolving demands of professional archives.

UDO is the core of many of ASTI's data archiving solutions and is available in 30GB UDO1 and 60GB UDO2 capacities. The Archive Appliance, G-Series libraries, and UDO desktop drives support the different media formats.

### UDO Media Features & Benefits

- Write-Once-Read-Many (WORM) & Rewritable formats
- UDO1 30GB & UDO2 60GB capacities
- Preserves data unaltered for >50 years
- Unquestioned record authenticity
- Withstands chain of evidence scrutiny in court proceedings
- Does not require special handling
  - Offsite storage without the need for special environmental conditions
- Supported, viable technology with continued availability & support
- ISO Standardized
- Enables random access to data
- Removable media enables cost-effective disaster recovery strategy
  - Easily transported to offsite locations
- Optional barcode labels provide automated identification and tracking of individual pieces of media.

### Write-Once UDO Media



True Write Once optical media has a very long and successful history with a wide-range of applications across many industries including Healthcare, Finance, Government, Insurance, Legal, and more.

UDO uses a phase change recording process that permanently alters the physical state of the WORM recording layer. The immutable media offers the highest possible record authenticity, unmatched by other technologies (such as magnetic disk or tape) that implement Write-Once-Read-Many emulation.

Although particularly useful for applications with requirements for long-term or indefinite data retention periods, Write-Once media can be used in any data archiving circumstance where there is a requirement for preserving data unaltered.

### Rewritable Media



UDO Rewritable media uses a similar phase change recording surface that allows data to be erased and rewritten. Rewritable media is ideal for an archive application where the stability and longevity of optical media is important, but the archive records are subject to periodic change.

This type of media is particularly useful in archiving applications where there are no specific requirements for record authenticity and/or there are short-term or informally managed record retention periods.

Primarily used in the G Series or Desktop Drives, the rewritable function is software application dependent. The Archive Appliance utilizes the media to store system backup files only.



### Worry-free Media

*Not susceptible to:*

Magnetic interference • Heat • Humidity • Water  
 EMP or solar flares • Hardware failures • Pollution  
 Deletion • Power surges • Warping • Hackers

# UDO Archive Media

## About Ultra Density Optical (UDO) Technology

ISO certified UDO is the culmination of six generations of technological advancements in optical technology designed specifically for professional data archiving. Write Once media provides data authenticity for regulatory compliance, or other applications, where archived data must remain unchanged and authentic.

Write Once media is capable of storing data unalterable for greater than 50 years. Additionally, the data remains randomly accessible which facilitates rapid retrieval and response.

- **Blue Laser Technology**
  - 0.85NA lens (60GB UDO)
  - 300 Degree laser forms Crystals
- **Phase Change Recording Surface**
  - Write Once - Amorphous to Crystalline
  - Rewritable - Crystalline to Amorphous
- **Dynamic Write and Read Operation**
  - 100% verify after write
- **Phase Change Advantages**
  - Non-contact, non-magnetic
  - Degrades very slowly (decades)
  - Extremely stable data life
  - Very tolerant of environmental conditions

### Certifications:

UDO media has been certified by ISO, IEC and Ecma International.

- The ECMA- 350 UDO media standard was published in December 2003 and adopted by ISO/IEC in July 2004 as International Standard ISO/IEC 17345.
- ECMA-350 can be downloaded free of charge on the Ecma International website.

### Manufacturer Direct Benefits:

- 50 year media life
- Factory-backed warranty
- Highest Quality

## UDO Media Specification Summary

Media Capacity UDO2	60GB (Double sided)
Media Capacity UDO1	30GB (Double sided)
Sector Size	8KB
Cartridge Size	5.25 inch
Recording Layer	Phase Change
Media Life	50+ years
Rewrite Cycles	10,000 (Re-writable media)
Certifications	ISO/IEC 17345, ECMA-350

## UDO Media Codes

	UDO1	UDO2
Write Once	UDO30WO	UDO60WO
Write Once Barcoded	UDO30WOBAR	UDO60WOBAR
Rewritable	UDO30RW	UDO60RW
Rewritable Barcoded	UDO30RWBAR	UDO60RWBAR

## Optional Barcoded Media

UDO media can be ordered with barcode labels for the automated identification and tracking of individual pieces of media. Barcoded UDO media is mandatory for all UDO Archive Appliance configurations. Barcoded media can be used in G-Series libraries that have an optional barcode reader installed.



UDO and the UDO logo are registered trademark of ASTI - Manufactured under ISO9001 registered quality system