Product Sheet

MediaStore HSM

LTO tape-based libraries manager
Application Module

MediaStore HSM

MediaStore HSM is an HSM (*Hierarchical Storage Management*) application to manage the assets (archiving, restoring) in deep archives like LTO tape-based libraries.

MediaStore HSM accesses the library thru the FC/SAS standard protocol and generates the library virtualization.

Each **MediaStore HSM** instance controls one LTO tape-based library and thru this software the library is accessible from both the local operator, who can use it in order to archive and/or restore assets managing these activities from the **MediaStore HSM** graphic user interface, and an external access, using a standard XML–TCP/IP protocol supported also by the others SI Media applications.

MediaStore HSM can handle "n" number of read-and-write drives and no limit on the number of tapes hosted in the library.

At the starting phase, the software gets thru the FC/SAS interface all needed information regarding the tape library configuration (*drives, I/O slots, storage slots*), the complete list of the available tapes and their position (*slot number*). This information is merged together with the saved metadata on the **MediaStore HSM** database and they became available to the operator thru the interface and the XML-TCP/IP protocol mentioned before.

Using these two ways of access to the library, the user can have all needed information related to the library and its content and execute operations such as archiving, restoring, integrity check, compacting and deletion.

With **MediaStore HSM** SI Media supplies an affordable, fast and safe way to manage an LTO library automating the archiving and restoring workflow.

Key Features:

- **Archiving and Restoring procedures**

- **Tape Archives and LTO Libraries management**

- **Full integration with MediaStore**

- **No need of third party virtualization modules**

- **Integrity Check and (*New*) Compacting**

- **Support and control of the most common libraries on the market**
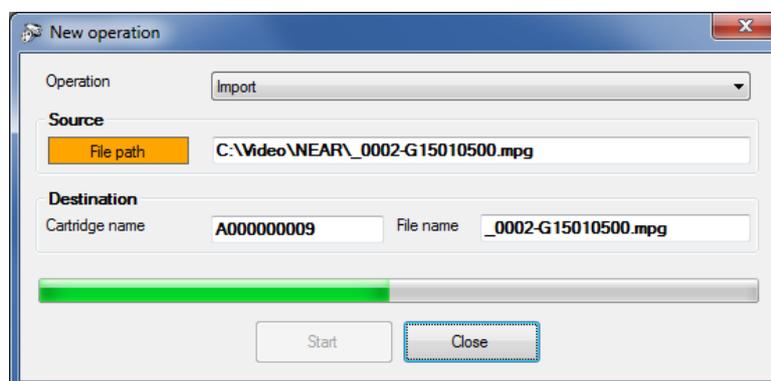
- **Partial Restoring**

Archiving and Restoring procedures

MediaStore HSM allows restoring and archiving features thru the maximization of functionalities provided by the FC/SAS standard protocol.

The integration and remote control of the LTO libraries via FC/SAS protocol is direct: without the use of a third party s/w or h/w.

At the end of each archiving and restoring procedure, the integrity of the asset archived or restored is checked thru a hashing procedure that checks about possible discrepancies.
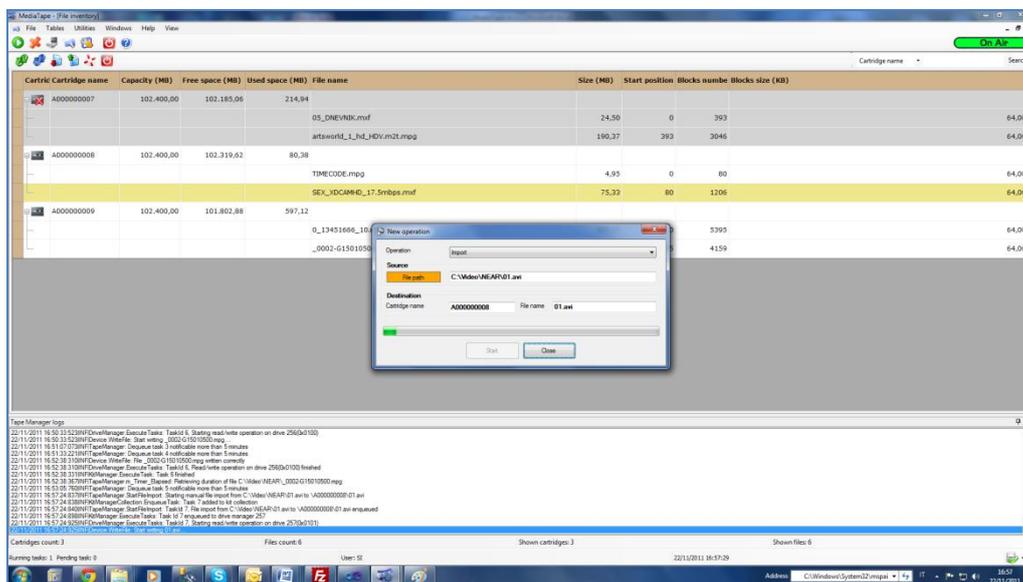

(MediaStore HSM, GUI for the importing of an asset into the library)

Tape Archives and LTO Libraries Management

MediaStore HSM provides, thru its graphic GUI, the possibility to visualize and manage the entire tape archive: for each tape it is possible to know the available free space and the occupied space. Another feature is to visualize the list of the stored assets, the metadata like the duration, the size, the number of occupied blocks and the starting point on the tape.

The operator can interact with the archive performing tasks like archiving, restoring, integrity check, compacting and deletion.

(MediaStore HSM, GUI for the management and the monitoring of the tapes)

Full Integration with MediaStore

MediaStore HSM is fully integrated into the **MediaStore (MAM)** platform.
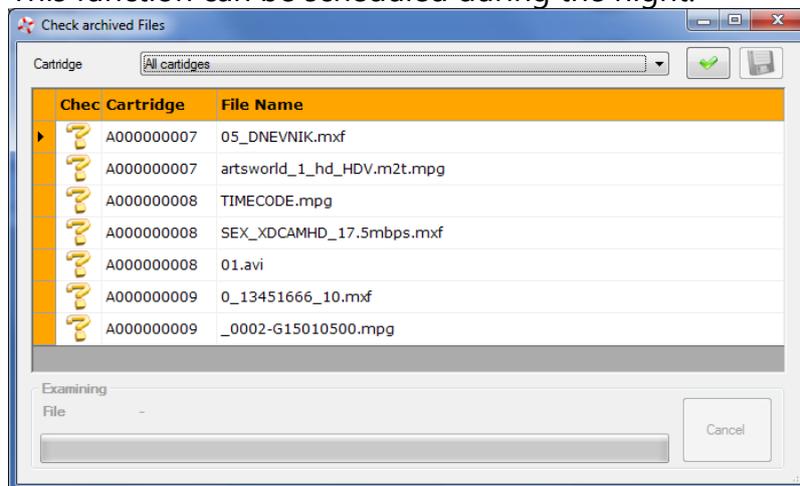
This software module allows to integrate the controlled LTO library into the broadcaster's workflow managed by **MediaStore**, fully automating the administration, the monitoring and the usage. As a matter of fact, thanks to such strong and deep integration, the MAM is able to minimize the number of swaps of the tapes and dramatically cut the delays normally introduced by the libraries into the procedures of writing and reading.

Integrity Check and (*New*) Compacting

MediaStore HSM includes an automatic function that verifies the integrity of the content of each single tape.

One of the advantages of the LTO libraries is that the tapes can be removed from the device and stored in a separate archive (tape shelf). When the tape is inserted again into the library, such automated procedure checks the integrity of the content of the tape, looking for corrupted sectors which could prevent the restore of the damaged assets.

MediaStore HSM includes also a function that compacts (*consolidates*) the content of each single tape. This function can be scheduled during the night.

(MediaStore HSM, procedure of checking of the tapes)

No need of third party virtualization modules

MediaStore Tape, unlike other similar software modules of the same category, doesn't need an additional software for the virtualization of the library. This thanks to the FC/SAS control protocol used to manage the library, which assures the maximum efficiency and a consistent cut of the costs.

Support and control of the most common libraries on the market

SI Media is worldwide famous in the broadcasting market for the consistent number of hardware and software integrated in its solutions. **MediaStore HSM** software module confirms this reputation since it's used by a relevant number of customers with many different type of brands and models of TLO libraries.

(LTO library IBM TS3310)

Partial Restoring

MediaStore HSM allows also to manage a partial timecode-based restore from any digitized asset encoded in any format. With this function it is possible to restore video portions of a clip in order to transfer them to any editing system without additional transcoding, but, on the contrary with smart-cut techniques.