

NEWSROOM COMPUTER SYSTEM INSTALLATION IN RUPAVAHINI TV, SRI LANKA

ABOUT SLRC

Sri Lanka Rupavahini Corporation (SLRC) was created by an Act of Parliament on 23rd January 1982, established on 14th February 1982 and commissioned transmission on 15th February 1982. SLRC aims to provide the best possible programmes to satisfy the needs of its viewers for informative, educational and family oriented entertainment.

The Sri Lanka Rupavahini Corporation, the National Television Network expanded its studio and transmission facilities in 1986 and rehabilitated most of the original equipment using digital technology in 1998 under three grant aid projects from the Government of Japan. Its studio complex is situated in Colombo the commercial capital of Sri Lanka. The complex comprises of a Master Control Room, four Studios, two Dubbing Studios, Digital Post Production Unit, two Analogue Post Production Units, several editing suites including Non-Linear Editing and four Outside Broadcast vehicles.

THE PROJECT

Since the 1986 upgrade – SLRC has upgraded a number of systems and has been converting from an old tape based manual system to an IT based – digital, automated system.



Keeping in tune with the times – SLRC decided to go for a Newsroom Computer System. The person heading this project was **Mr Kapila Dasanayake**, Deputy Director Engineering, SLRC.

They came up with a tender. Many companies participated in the tender. After a rigorous and detailed selection process involving numerous departments with SLRC – they selected an SI to do the project for them – Whiteways Systems Pte Ltd of Singapore.

WHAT IS A NEWSROOM COMPUTER SYSTEM (NRCS)?

Creating news every day is a complex job – involving planners, schedulers, journalists, cameramen, Non-linear editors, news readers, news producers and a host of live studio staff in the studio control room. There is a news story – which is written by the journalist. There is a cameraman who shoots the video or photographs (if there is a video to be shot), editor who edits the video in time for it to be shown in the upcoming news bulletin. The news producer makes the run-down of the stories to be shown in the next bulletin. Once the run down is ready – the text stories are loaded onto the teleprompter, the related videos are loaded on the video server to be played out, and the related graphics are loaded onto the graphics system ready to be played out.

All these different systems are synced together and controlled by the Newsroom system. In this case – the

newsroom chosen was Octopus Newsroom system. The automation and video server was Vector Box.

HOW DOES A NEWSROOM SYSTEM WORK?

A Newsroom system has many modules. Given below is a summary of the modules:

INCOMING FEEDS

The NRCS can ingest all your incoming source materials, such as news agency wires, RSS feeds, emails with feedback or tips from your audience, SMS messages or even faxes. Such feeds may also contain images, videos or audio files as Octopus 8 can display all media belonging to a feed in one view.

ASSIGNMENT DESK

The assignment desk helps organise and delegate tasks to one or multiple users, based on a modern planning calendar. The assignment desk delivers notifications, allows users to communicate with each other using the built in user-to-user messaging system and share files related to the task.

ADVANCED STORY SCRIPT FEATURES

Apart from the standard scripting features, such as calculation of the duration of spell checker, NRCS also offers additional advanced functionalities to ease the work of each team. Such features include the visual story history and version comparison, possibility to separate the script and the technical part or the instant preview of the CG objects from selected graphics systems.

AUTO ADJUSTED PERSONALISED SPEED SPEECH

The system samples each anchor's reading speed. It then calculates the on-air time accurately.

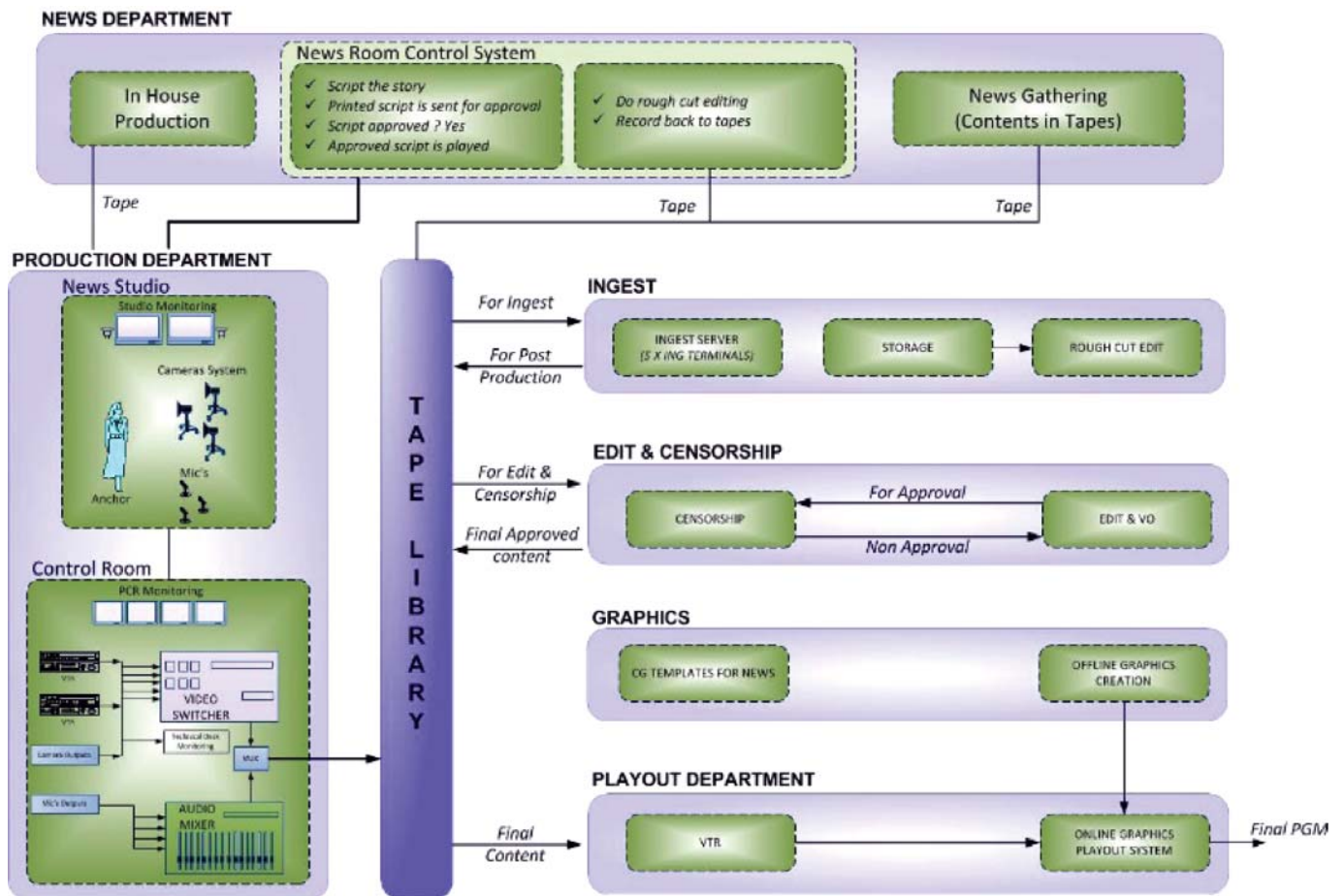


Figure 1 : Newsroom system modules

NEWS PRODUCTION

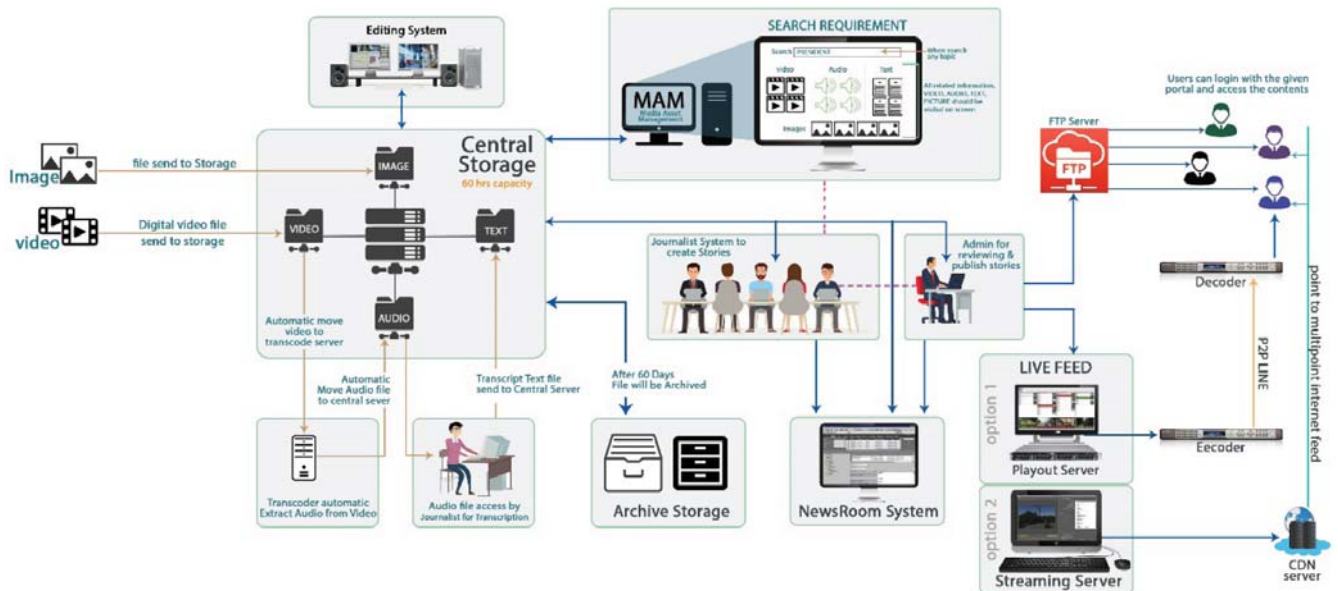


Figure 2 : News production workflow

RUNDOWNS

Rundowns can be created automatically based on a schedule plan and rundown templates; they can also be created manually. Multiple slugs or even entire rundowns can be copied/pasted to another show. In the rundown, all required timing information including planned duration, real duration, and countdown time. Customisable slug colours, status colours and forms are available to all users.

CMS CONNECTIVITY

With audiences increasingly using the internet for their news, media organisations are under immense pressure to publish stories online. NRCS directly interconnects with CMS systems such as Joomla, WordPress and CoreMedia, enabling scripts and articles to be uploaded dynamically to web portals. This new web component allows TV news editors to upload pages directly, saving considerable time and reducing pressure on the web team.

CONTACTS AND GUEST MANAGEMENT

This is an effective contact management solution allowing you to store and manage your contact list in a secure, central location. You can specify the access rights to each individual contact. Contacts can be linked to stories or assignments and used in the inbuilt Guest Management System.

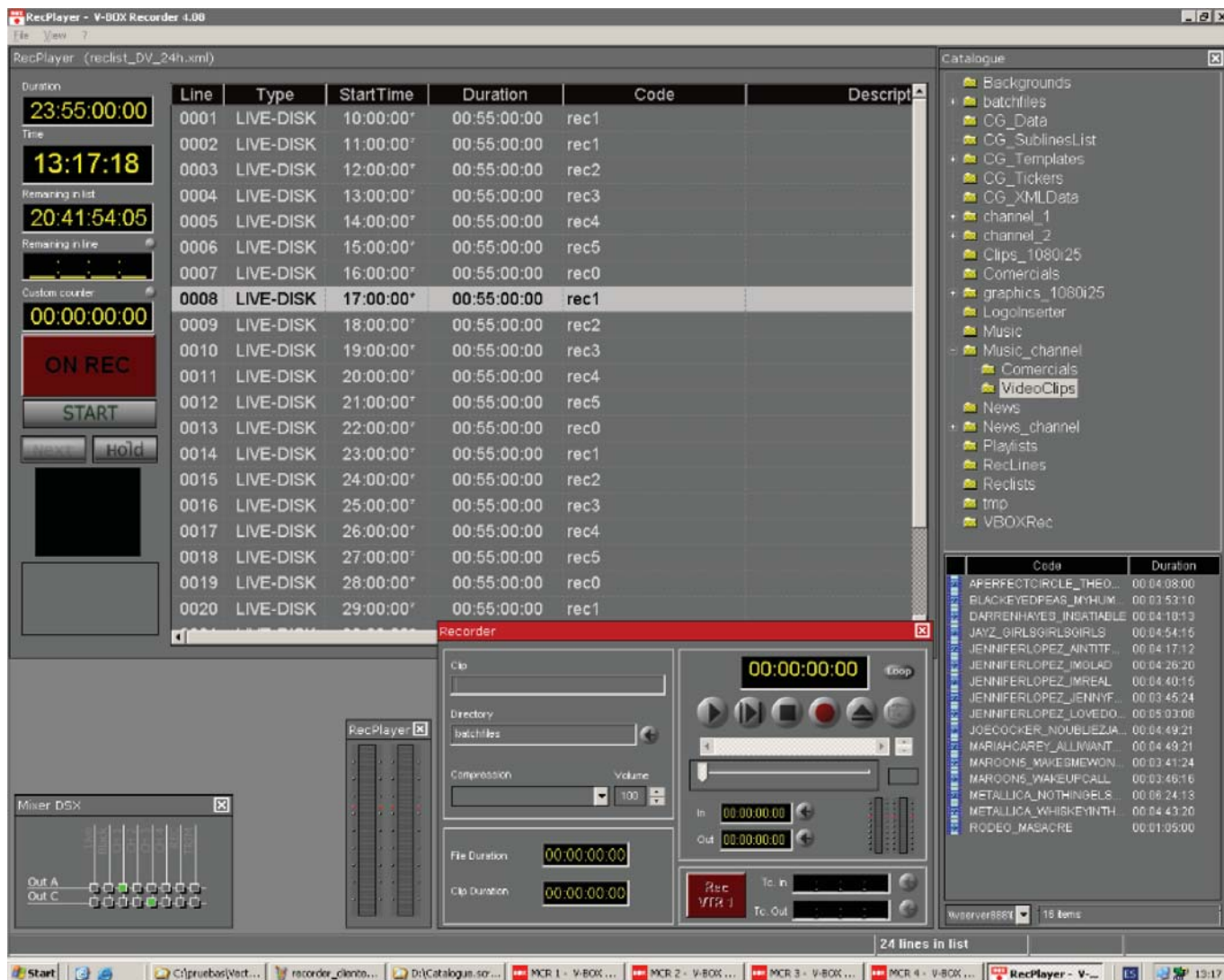
SOCIAL MEDIA INTEGRATION

The NRCS has modules which can easily upload stories and videos to social media platforms like YouTube, Facebook, Twitter and so on. This saves a lot of time and effort for the social media team. On one hand it allows users to search and browse content being posted in

accounts such as YouTube and Twitter, follow particular hashtags or channels and have the streamlined view organized in the newsroom.

Apart from the NRCS – the other main components are the automation, video server and the graphics. The automation controls the video server. The tasks of the automation and video server are very important. They are:

- Ingest all the incoming videos into the video server storage.
- Clip information and media files are created, including metadata.
- Ingest sources can be previewed.
- Ingest in segment option is available.



Ingest can be of 2 types :

- **Scheduled ingest** (when we know that a feed will come at a particular date / time via satellite link, IP or some other way. This ingest can be fully automated – so it happens automatically.
- **Manual ingest** (when the camera man comes and ingests his video manually into the video server).

Scheduled ingest of videos can be a LIVE Event, VTR Source, Feed Capture. Automation can control respective devices. Automatic creation of metadata information.

Manual ingest can be done at any time. The

automation allows Record, Play, Stop options. You can Choose source and destination. You can also Capture incoming feeds from satellite or IP source.

PLAYOUT

The automation system has a number of useful features for Video Playout:

- User friendly Graphics User Interface.
- Catalogue window along with the playlist.
- Time calculation.
- On air, playlist and Device status indication.
- Thumbnail Preview of the clips.
- Supports all the standard protocols used in broadcast.
- Can control most of the renowned switcher, router etc.

- The automation Looks into Hot Folder and automatically executes all the commands.
- Able to transcode the clip automatically to the house format.
- Cataloguing the clip.
- Creates Metadata automatically.
- Compatible with many of the Archive systems.
- Supports file movement which has to be built into the workflow – so that clips don't have to manually moved from one folder to another.

Server	Status
Server1	[PLAY]
Server2	[STOP]
Betacam	[FF]
GFB0	[STOP]
GFB1	[STOP]
Mixer	[STOP]
Recorder0	STOP

Server	Status
DVCPRO	STOP
DVCAM	STOP
Switcher	[STOP]
Mixer 1	[STOP]
RecServer 1	[PREPARED]

The screenshot displays the Vector3 Channel* software interface. The main window shows a live broadcast schedule with columns for Line, Type, MS, StartTime, Duration, Code, Channel ID, and Desc. The schedule includes various programs like 'Atitudes Barna', 'Ausonia Excel', 'Ausonia', 'Balay Playa', 'Balay Rocas', 'Canal Prepago', 'Canal Torero', 'Carrefour 1', 'Castings', 'Cine español 2', 'VTR', 'Cine Español Taxi', 'Cine Español', 'INFORMATIVOS', 'Cuerpo Sano', 'Digital Familia', 'Anuncio de Canal Satel', 'Dodot Babykini', 'Dodot Jardin', 'Downy Boy', 'Downy', and 'Egar Casa'. The interface also features a 'Catalogue' panel on the right with a tree view of media assets, a 'Warning list' panel, a 'Mixer' panel with faders, and a 'Status' panel at the bottom right showing the status of various servers and components.

STORY IS CREATED IN OCTOPUS

The story script is entered in the Octopus Newsroom System. With the content received through wires and local stories received by the reporter. CG content can also be entered on the newsroom system if the CG needs to be triggered automatically during the playout. The stories are at this point waiting for the relevant footage to be available for inclusion into the story for playout at the appropriate time.

Octopus has a very strong Assignment desk – which enables the producer to assign stories to journalists based on calendar, pre-planned events or incoming wire feeds. Once the journalist is assigned to a job, he will get to know once he logs into the system.

The other key component to run this system is the automation and playout system. Vectorbox – the Spanish playout and automation video server was chosen.

INGEST ON VECTOR BOX VIDEO SERVER

Video from the P2cards, backpack-based feeds and the satellite feeds are ingested into the ingest server. It will automatically be transferred to the central storage for editing and finishing. This ingest server can automatically ingest based on schedules and generates a unique ID for the ingested clips which ensures avoidance of clip ID duplication.

VIDEO EDITED ON ADOBE PREMIER NON-LINEAR SYSTEM

The video is retrieved from the central storage and edited using Adobe Non-Linear Editors (NLEs). After editing, it is saved back to the central storage along with a unique ID and a low-resolution file or thumbnail, generated by the Vector Box Automation Server. The reporter can then access the low-resolution files of the clips within the Octopus platform itself. They use the provided ID to attach the clips to their stories at the relevant points in the script using the Octopus Newsroom Software.



Workflow set for SLRC using the Octopus and Vector Box automation system

Once completed, the reporter commits the story to the appropriate rundown within Octopus. The final rundown, including all the story scripts, is sent from Octopus to the Integrated Teleprompter system and the rundown is also sent to the Vector Box.

Once this action is executed automation gets the information from the newsroom and copies the video file from the central storage to the playout server. Once there the video can be played out manually or automatically

at the specified time and after playout the video can be archived and deleted from the playout server if desired automatically also.

VECTOR BOX WILL DISPLAY MAIN RUNDOWN IN PCR

The Vector Box automation system client will show the main schedule containing all the stories of the rundown, and the elements of the story (graphical elements, video routing, etc).

After the installation, commissioning and testing a rigorous training schedule began. Dozens of journalists, news producers and operators took part in the training. Once they were trained – the hand holding sessions started. Journalists were told to go through the entire process of producing a story – start to finish.

With this system in place – SLRC can save a lot of time and effort. They can produce more news stories. They can produce news which is new and fresh – happening now. They can quickly introduce breaking news into the run down – thus making it fresh and exciting. They can come up with interesting graphics and insert them into the

news. The reporters can spend more time researching the stories and going into the finer details. The planning and assignment desk can make plans months in advance, so they don't miss out on any important event.

"We are very happy with this system. We feel that the NRCS will really help us in our daily news production" said Mr Kapila Dasanayake, Chief Engineer of SLRC. The Chairman of SLRC, Mr Reginald Cooray met the system integration team and toured the new facility. He was satisfied with the installation and commended the SI team for their good work. Mr Cooray has since retired and now Dr Prasad Samarasinghe is the Chairman.

ABOUT AUTHOR



Aale Raza

Founder and Managing Director,
Whiteways Systems Pte Ltd

Mr Raza is a thought leader and visionary. His company - Whiteways is a leading systems integration company focused on providing solutions to broadcast houses. Prior to founding Whiteways, Aale was Head – South Asia and Emerging markets for Kit Digital Inc (NASDAQ – kitd). Kit Digital was the world leader in OTT and video over IP. Under his stewardship, Whiteways has become one of the fastest growing companies in the industry. Whiteways has customers in numerous countries of Asia and the Pacific – from Pakistan to Fiji. In 2016, Whiteways was

awarded the TOP 10 Special Achievement award by Singapore Promising SME 500. In 2018, Whiteways was awarded the Singapore Golden Bull Award.

ABOUT WHITEWAYS

Whiteways is an award-winning system integration company. Whiteways is focused on providing products and services to Broadcasters (TV and Radio stations), professional audio / video production / post production houses and anyone who needs a full system. Whiteways is headquartered in Singapore. Whiteways was established in 2011. Whiteways has a long list of implementing large successful projects. Whiteways has over the years become one of the leading system integration companies in the South and South East Asian region. Whiteways has won several awards in Singapore. Whiteways is a member of various national and international bodies. ■

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