NRK Audio desk specification Vancouver 2010

General

NRK's transmissions during the Olympics will now for the first time be provided with full 5.1 surround audio. The requirements regarding audio desk specifications will due to this be more challenging than usual on these events.
There will be a need for two large desks, one in IBC-Vancouver and one on the CC/Biathlon arena. One smaller desk, but full 5.1 capable will be needed in MBC.
NRK's plan is to distribute audio-pgm (5.1 and stereo) as 8 discrete channels embedded in the HDSDI stream. By this we hope to avoid any use of Dolby E equipment.
We presume that all embedders/deembedders are interfaces by AES/EBU.

As we see, actual models could be Studer Vista 5 or Lawo MC56. For MBC we will consider a cheaper solution like the Yamaha DM 2000. NRK staff is experienced on Studer and Yamaha desks.

Audio desk - IBC Vancouver

Control surface:
Minimum 40 assignable faders. Channels to be selected individual (dual layer) and globally in banks.
Monitor selector where sources can be configured in software by user.
PFL bus with separate speaker

DSP:

- 96 - mono fully equipped input channels, including delay and direct out. Possibilities to also configure stereo and 5.1 channels will be appreciated.
- 12 - mono + 4 stereo auxiliary outputs
- 2 - stereo and 2 x 5.1 bus groups
- 2 - stereo and 1 x 5.1 master outputs for pgm
- 16 – VCA style groups
- Capabilities to configure internal stereo>mono and 5.1>stereo down mix DSP blocks is appreciated.
- The router architecture must be flexible. Any input must be possible to route to one or more outputs (multiporting)

Physical inputs:
16 microphone preamps
16 line level balanced analog inputs
48 AES/EBU input pairs

Physical outputs:
24 line level balanced analog outputs
Outputs for control room monitors, pfl speaker and monitor speakers in production area.
24 – AES output pairs

Audio desk – CC/Biathlon

Control surface:
Minimum 40 assignable faders. Channels to be selected individual (dual layer) and globally in banks.
Monitor selector where sources can be configured in software by user.
PFL bus with separate speaker

DSP:

- 96 - mono fully equipped input channels, including delay and direct out. Possibilities to also configure stereo and 5.1 channels will be appreciated.
- 12 - mono + 4 stereo auxiliary outputs
- 2 - stereo and 2 x 5.1 bus groups
- 2 - stereo and 1 x 5.1 master outputs for pgm
- 16 – VCA style groups
- Capabilities to configure internal stereo>mono and 5.1>stereo down mix DSP blocks is appreciated.
- The router architecture must be flexible. Any input must be possible to route to one or more outputs (multiporting)

Physical inputs:
24 microphone preamps
24 line level balanced analog inputs
24 AES/EBU input pairs

Physical outputs:
24 line level balanced analog outputs
Outputs for control room monitors, pfl speaker and monitor speakers in production area.
24 – AES output pairs

Audio desk – MBC

Control surface:
Minimum 24 assignable faders. Channels to be selected individual (dual layer) and globally in banks.
Monitor selector where sources can be configured in software by user.
PFL bus with separate speaker.

DSP:

- 48 - mono fully equipped input channels, including delay and direct out. Possibilities to also configure stereo and 5.1 channels will be appreciated.
- 6 - mono + 2 stereo auxiliary outputs
- 2 - stereo and 1 x 5.1 master outputs for pgm
- 8 – VCA style groups
- The router architecture must be flexible. Any input must be possible to route to one or more outputs (multiporting)

Physical inputs:
12 microphone preamps

24 line level balanced analog inputs
16 AES/EBU input pairs

Physical outputs:
24 line level balanced analog outputs
Outputs for control room monitors, pfl speaker and monitor speakers in production area.
16 – AES output pairs