

## Platform to Train Video Communications

### Why Digital Video RF Link using Wood & Douglas Ltd dVMO equipment

- True “wire-less” rugged video link
- Over-air Coded Orthogonal Frequency Division Multiplex optimised to minimise the effects of multi-path RF signals in difficult environments like stations etc
- Full SD Frame rate and 50ms video latency enable “real-time” viewing
- High levels of Forward Error Correction (FEC) ensure high picture quality maintained
- Maximum Ratio Combining (MRC) receiver system using 2 antennas providing spatial diversity enabling greater range to be achieved down the tunnel
- Multiple video capability over single RF channel allowing single transmitter per station (up to 4 videos). The control system will tell the receiver which video to decode when approaching station. This eliminates any platform-to-platform RF problems and reduces the number of frequencies required in more complex station environments.
- Proven to work with Ovation video multiplex equipment
- Encrypted link for security
- Frequency agile Transmitter and Receivers enabling frequency re-use
- Only 8MHz occupied bandwidth allowing multiple channels to be used across the band
- Sophisticated RF distribution system with multiple transmit antennas ensuring seamless coverage down tunnels and on platform. Power control available enabling low power operation when no trains present.
- Control system allowing for adjacent platform working, end-of-line station handling etc to ensure full coverage of all platforms
- Proposed equipment used by Law Enforcement, military and Unmanned Aerial Vehicles so proven rugged technology
- Upgrade paths for additional videos and other services (audio, serial data and IP) across the same link
- HD video upgrade path for future-proofing of the equipment
- No degradation of RF link performance in dirty environment

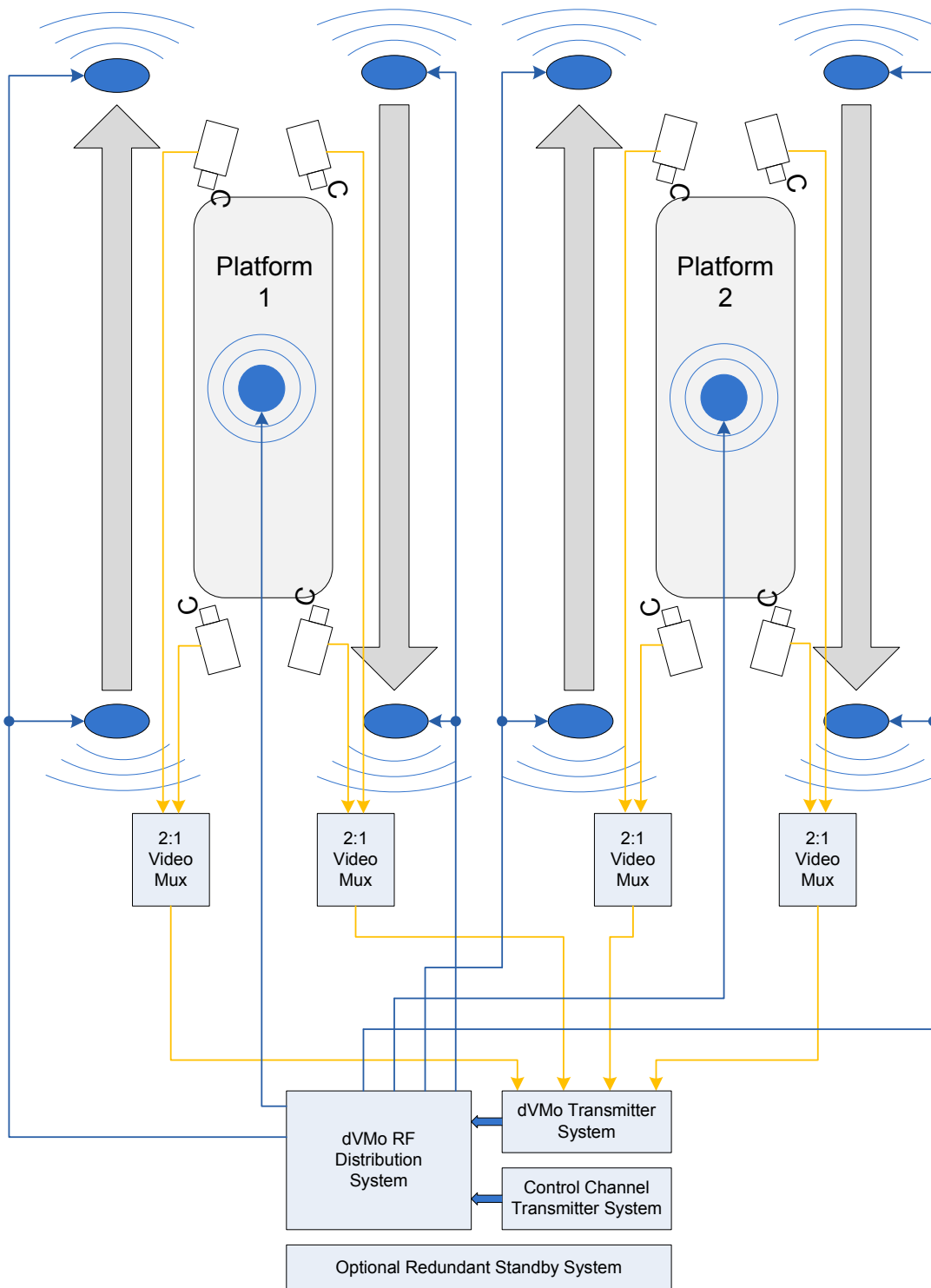
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<b>Client</b>		<b>Project</b>	LUL Track-to-Train Video									
<b>Detail</b>	Block Diagram of 4 off Platform System											
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