



INSPECTION DEPARTMENT
Viaduct Internal N & S Report No 414
DATE. 2014.01.07

(E2.1 Bridge)
REPORT No.414
VIADUCT INTERNALS N & S

DATE: 07.01.14 to 08.01.14

The North & South viaduct box girder internals were inspected in their entirety between on above date, general findings were as follows:

Structurally: Generally the viaduct box girder internals are in a satisfactory condition with some evidence of corrosion evident throughout all box girders where previous areas of water pooling / water ingress has been recorded under past inspection structural report program individual numbers . Following completion of structural strengthening of internal steelwork it was found that a bolt had failed to have been replaced on the west face of section box 3x between outrigger beams 13/14x. This will be replaced by bridge inspectors from the centre gantry.

Paintwork. : In general the viaduct box girder internal paintwork both north & south remain in a satisfactory condition. There are locations which have been recorded in previous were remedial works require to be carried out.

Pier S5: In the SW box girder at beam location 151/152 at the time of the last inspection there had been evidence of stagnant water gathering at this location. Upon further investigation it was discovered that during the bearing replacement program of works (where new rainwater downpipes were fitted to the external of the piers) contractors on carrying out these works had left a water retaining plug in place to prevent the flow of water from the viaduct carriageway drainage system. On completion of the works the contractors did not remove the plug and completed the connection. Because of this action, water flow to the downpipe was stemmed causing the water to back up in the section of downpipe which travels through the box girder, this water was then forced out of the pipe collar connection and into the box girder internal floor sections. The offending obstruction was removed and all retained road detritus was cleared from the drain by bridge staff.

North Box Girder: Both East and West boxes remain satisfactory. There is currently an electrical programme of works being undertaken and remains to be completed.

South Box Girder: At time of last inspection there were sections of cable tray being supported by rope fixings, these have now been reinstated and secured. There is currently an electrical programme of works being undertaken in the south box girders.

Fans: All fans working and in a satisfactory condition.

Lighting: A number of lights were found to be faulty at time of inspection and were as follows:

S/W = 3, S/E = 10, N/W = 7, N/E = 5 - this being a total of 25

Housekeeping: Following completion of bearing replacement contract, debris was found and reported to Project Manager with no further action being taken. Bridge Inspectors then requested and implemented through bridge operations a program of works to clean the South Box Girders; the West side has been completed with the East side currently in progress.

Bridge Inspectors: