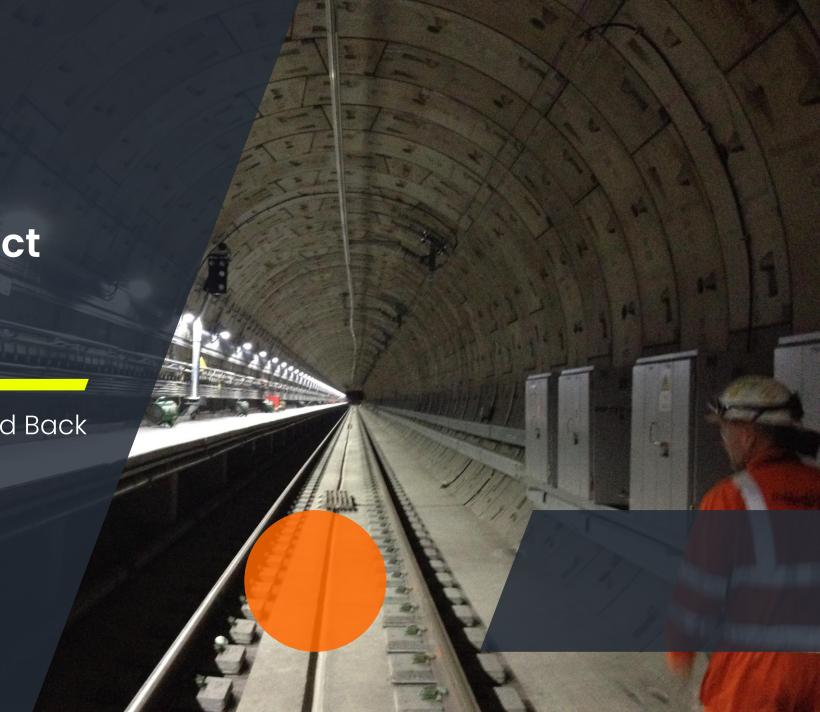


N430 Thameslink Residual Works Project - Case Study

Network Rail I Assurance for Hand Back

01 November 2021





DSE Project Engagement

Key Deliverables

DSE engaged with Network Rail (The client) and Bam Nuttall (Principle Contractor) to develop a hand back strategy to be implemented into N430 Thameslink Residual Project to achieve project handover acceptance by Network Rail.

Desktop exercise to determine gaps in the assurance and hand back processes

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Develop an assurance process flow chart from design to completion to determine the level of assurance required per DOWL or work package



Agree list of hand back deliverables/ requirements with NR, RAM, MDU and PC



Develop data base registers for tracking, manage and reporting deliverables



Prepare a Hand Back strategy and liaise with the stakeholders to achieve formal agreement

Provide an assurance team embedded in the project to implement the hand back strategy and lead the interface between the client and the PC, providing a weekly progress report including planned vs actual, 4 weeks look ahead and readiness for hand back.

DSE

Hand Back Strategy

Project Findings

Key findings gathered from the desktop exercise carried out by DSE as part of the strategy:

- Discrepancies between WBS provided by Network Rail and scope of works (DOWLs) formally instructed to the PC.
- Level of engagement between the project, stakeholders and other interfaces, i.e. NRG team, required improvement.
- Scope clarification required from Network Rail for paused, on hold, and not required DOWLs.
- Lack of clarity of assurance and hand back requirements needed to be provided by the PC.
- A unique source of information required. Different trackers in place, managed by different stakeholders and storing different data.
- Assurance documents templates to be agreed, i.e. assurance files, health and safety files, etc



Key Deliverables

1. High Level N430 Assurance Flow Chart for Hand Back

It provides Network Rail and Principal Contractor teams with a visual tool to determine if:

- N421 DOWLs have been raised under AMP016 post AMP015 signed off, otherwise an AMP018 form shall be raised,
- N421 DOWLs have been formally instructed to the PC through a PMI or different format (verbal agreements). Otherwise, Network Rail team shall provide further instruction,
- Design requirements have been jointly reviewed hence the level of design required per DOWL or work package,
- Based on the design requirements, the PC has provided enough evidence to assure the work,
- Health and Safety File complies with Network Rail and NRG standards for acceptance,
- AMP017 form can be signed off by the RAM for hand back acceptance.

2. N430 DOWL RoadMap

It was developed to consolidate all information about DOWLs in a unique source of data; which helped the project to identify scope and track the status of each DOWL. Also, it helped to determine the level of work require to close each DOWL.

For N421 and N430 there were three main sources of information containing DOWLs as:

- N430.01 Schedule of Services v4.0
- 2. GRIP 5-8 Cost Plan 0.5 (WBS)
- 3. AMP016 Forms (N421 Digital and paper copies)

DOWL Type listed in RoadMap	How to Close it?
DOWLs raised through the AMP016 "Defect & Snag Identification and Completion Certificate" post AMP015 sign off, as part of the AMP process for N421 project.	DOWLS can be closed by updating the AMP016 form to include the completion date and MDU signature once the DOWLs have been accepted as complete by NR.
DOWLs which were picked up during the liability period or outside the AMP process through site walkouts, etc.	DOWLs shall be packed up on AMP018 forms "Defect Arising during Defect Liability Period" per work package/discipline/location; and can be closed by MDU signing off following the site inspection or validation of the photographic evidence report.
DOWLs raised post AMP015/AMP016 sign off where the relevant AMP016 cannot be found.	DOWLs to be reviewed by the NR team to check if these can be linked to previous AMP processes raised for N421; by associating DOWLs to previous AMP processes their acceptance can be covered under one AMP017 "Final Certificate", once all hand back requirements i.e. H&S files, As builts, Assurance Files, etc, have been accepted as compliant.
All residual works not instructed or put on hold by the project, including DOWLs that couldn't be found or do not have enough information.	DOWLs shall be marked as on hold on the DOWL RoadMap and transferred to the project Hazard Log to facilitate AMP sign off, as guided in NR/L2/HAM/02201 Standard.

/ork Package	Total DOWLs
430.01.001	33
430.01.002	4
430.01.003	47
430.01.004	62
430.01.005	24
430.01.006	29
430.01.007	52
430.01.008	98
430.01.009	15
430.01.010	46
430.01.011	16
430.01.012	145
430.01.013	446
430.01.014	187
430.01.015	254
430.01.016	178
430.01.017	1826
430.01.018	188
MP016 Paper forms (inc in WPs)	172
otals	3650

No of DOWLs per Work Package found after our first reconciliation exercise.

3. N430 Hand Back Readiness Tracker

Whilst the DOWL RoadMap tracks progress DOWL per DOWL, the hand back readiness tracker monitors GRIP deliverables per Work Package. It specifies the documentation to be provided by Network Rail prior to works commence, and the assurance deliverables to be provided by the PC at each GRIP stage.

The DSE assurance team verified and tracked that the "assurance evidence packs" contained the relevant documentation and transferred them into an AMP Assurance Completion Pack.

Upon completion of works throughout possessions and mid-week isolations, there were two ways to present evidence to assure works have been completed:

- Provision of a photographic report showing a before / after photos
 to confirm works are complete; evidence that should be reviewed
 by NR for acceptance with further inspection carried out if needed.
 BAM should submit weekly a set of IRFs to Network Rail that
 contains the photographic records and the location/installation
 that are ready for inspections. Also, a set of redline drawings (if
 agreed with Network Rail) shall be provided by the PC as part of
 the assurance pack.
- 2. Supplying a full assurance file compiling the design evidence in the form of the approved ITPs, test and certification listed in the ITP, Form 03 design approval, Form 05/Form E works completion certificate and set of redline drawings. This file to be reviewed for acceptance by NR team followed by a site inspection to confirm standard of works.

DSE

Hand Back Strategy

4. AMP Completion Packs

All assurance documentation provided by the PC was then transformed into an AMP Pack as per network Rail standards in order to be submitted to the RAM. This should detail the full scope to the DPE and discipline maintainer, explaining what assurance has been provided to NR for acceptance, for example:

- Associated AMP Certificates,
- Associated Design Approval,
- Assurance files related to the AMP transfer area,
- O&M's which relate to the AMP transfer area,
- Red Lines / As-Builts related to the AMP transfer area,
- Asset register which will identify PPM data related to the AMP transfer area,
- Inspection report,
- Form E as well a Form 05, completion certificate where applicable.

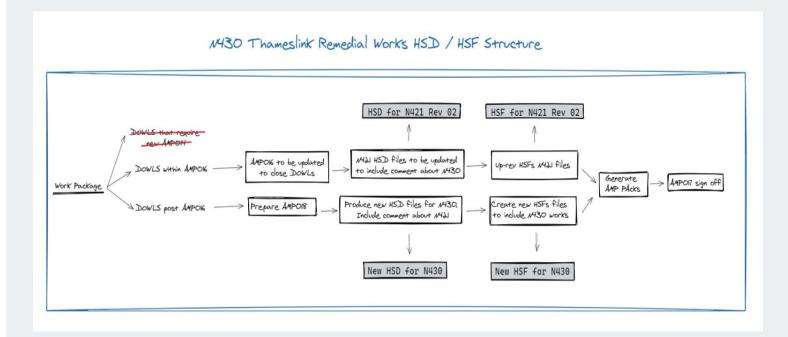
DSE

Hand Back Strategy

5. Health & Safety File

DSE liaised with The National Records Group (NRG) to agree the structure of the Health and Safety (H&S) files and documents, as well as the plan of submissions to allow NRG team review/acceptance.

As most of the information about N430 DOWLs was recorded in the existing H&S files and H&S Documents provided by BB under N421 project, the structure of the new submissions had to be linked to existing files.



Structure agreed with NRG and implement by DSE assurance team

6. Progress Reporting

DSE assurance team prepared and distributed weekly the Readiness for Hand Back dashboard as shown below:



7. Asset Hand Back

Once the AMP Pack was complete per work package (or location, determined based on the DOWLs), this was submitted to the Asset Owner for acceptance including the AMP018 to be signed off as confirmation that all DOWLs within the AMP pack are closed.

On acceptance of the AMP submission for a given work package and where applicable the inspection, the Project would normally issue a "Taking over certificate" AMP015, together with the "Defect identification and completion certificate" AMP016, however, as these forms did already exist for N421 project following the final inspection to confirm all DOWLs have been closed, the project would submit the "Final certificate" NR/L2/MTC/089/AMP017 for authorisation by the Maintenance Manager and Asset Owner. Following this the Project Manager can confirm closure of the AMP project.

At the time this case study was produced the Project has agreed acceptance of 45 AMP Packs.

Thank You



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