Framework:	**Collaborative Delivery Framework**
Supplier:	**BAM Nuttall Ltd**
Company Number:	**00305189**
Geographical Area:	**North East**
Contract Name:	**NE Hub Asset Reconditioning - Construction**
Project Number:	[redacted]
Contract Type:	**Engineering Construction Contract**
Option:	**Option C**
Contract Number:	**C21287**
Stage:	**Construction**

Revision	Status		Originator		Reviewer		Date

ENGINEERING AND CONSTRUCTION CONTRACT under the Collaborative Delivery Framework
CONTRACT DATA

Project Name NE Hub Asset Reconditioning - Construction

Project Number [redacted]

This contract is made on
between the *Client* and the *Contractor*

- This contract is made pursuant to the Framework Agreement (the "Agreement") dated 10th day of April 2019 and Framework Agreement Extension dated and signed 1st April 2023 between the *Client* and the *Contractor* in relation to the Collaborative Delivery Framework. The entire agreement and the following Schedules are incorporated into this Contract by reference

- Schedules 1 to 23 inclusive of the Framework schedules are relied upon within this contract.

- The following documents are incorporated into this contract by reference
Asset Reconditioning NEC4 ECC Scope_final

Part One - Data provided by the *Client*

Statements given in all Contracts

1 General

The *conditions of contract* are the core clauses and the clauses for the following main Option, the Option for resolving and avoiding disputes and the secondary Options of the NEC4 Engineering and Construction Contract June 2017.

Main Option: Option C

Option for resolving and avoiding disputes: W2

Secondary Options

X2: Changes in the law

X7: Delay damages

X9: Transfer of rights

X10: Information modelling

X11: Termination by the *Client*

X15: *Contractor's* design

X18 Limitation of Liability

X20: Key Performance Indicators

Y(UK)2: The Housing Grants, Construction and Regeneration Act 1996

Y(UK)3: The Contracts (Rights of Third Parties) Act 1999

Z: *Additional conditions of contract*

The *works* are

The reconditioning of damaged flood defence assets, including the associated design and site construction activities required for their repair.

The *Client* is — Environment Agency

Address for communications — Horizon House
Deanery Road
Bristol
BS1 5AH

Address for electronic communications — [redacted]

The *Project Manager* is — [redacted]

Address for communications — [redacted]

[redacted]

Address for electronic communications [redacted]

The *Supervisor* is [redacted]

Address for communications [redacted]

Address for electronic communications [redacted]

The Scope is in
Asset Reconditioning NEC4 ECC Scope_final

The Site Information is in
Asset Reconditioning NEC4 ECC Scope_final

The *boundaries of the site* are
Asset Reconditioning NEC4 ECC Scope_final

The *language of the contract* is English

The *law of the contract* is
the law *of England and Wales, subject to the jurisdiction of the courts of England and Wales*

The period for reply is 2 weeks

The following matters will be included in the Early Warning Register

Early warning meetings are to be held at intervals no longer than 2 weeks

2 The *Contractor's* main responsibilities

The *key dates* and *conditions* to be met are

condition to be met	*key date*
'none set'	'none set'
'none set'	'none set'
'none set'	'none set'

The *Contractor* prepares forecasts of the total Defined Cost for the whole of the *works* at intervals no longer than 4 weeks

3 Time

The *starting date* is 06 November 2023

The *access dates* are

part of the Site	date
Fastdraft	06 November 2023
Asite	06 November 2023

The *Contractor* submits revised programmes at intervals no longer than 4 weeks

The *Completion Date* for the whole of the *works* is 24 May 2024

The *Client* is not willing to take over the *works* before the Completion Date

The period after the Contract Date within which the *Contractor* is to submit a first programme for acceptance is 4 weeks

4 Quality management

The period after the Contract Date within which the *Contractor* is to submit a quality plan is 4 weeks

The period between Completion of the whole of the *works* and the *defects date* is 52 weeks

The *defect correction period* is 2 weeks except that
- The *defect correction period* for Safety issue for the public is 24 Hours
- The *defect correction period* for is

5 Payment

The *currency of the contract* is the £ sterling

The *assessment interval* is Monthly

The *Client* set total of the Prices is *£573,319.03*

The *interest rate* is 2 00% per annum (not less than 2) above the Base rate of the Bank of England

The *Contractor's share percentages* and the *share ranges* are

share range	*Contractor's share percentage*
[redacted]	[redacted]

6 Compensation events

The place where weather is to be recorded is The nearest calibrated Met Office Weather Station to the site

The *weather measurements* to be recorder for each calendar month are
- the cumulative rainfall (mm)
- the number of days with rainfall more than 5mm
- the number of days with minimum air temperature less than 0 degrees Celsius
- the number of days with snow lying at 09:00 hours GMT

and these measurements:

1.
2.
3.
4.
5.

The *weather measurements* are supplied by Met Office
The *weather data* are the records of past weather measurement for each calendar month
which were recorded at Closest Met Office weather station to the site
and which are available from Met Office

Assumed values for the ten year weather return *weather data* for each *weather measurement* for each calendar month are

Jan	Jul
Feb	Aug
Mar	Sep
Apr	Oct
May	Nov
Jun	Dec

These are additional compensation events

1. not used'

2. 'not used'

3. 'not used'

4. 'not used'

5. 'not used'

8 Liabilities and insurance

These are additional *Client's* liabilities

1 'not used'

2 'not used'

3 'not used'

The minimum amount of cover for insurance against loss of or damage to property (except the *works*, Plant and Materials and Equipment) and liability for bodily injury to or death of a person (not an employee of the *Contractor)* arising from or in connection with the *Contractor* Providing the Works for any one event is

[redacted]

The minimum amount of cover for insurance against death of or bodily injury to employees of the *Contractor* arising out of and in the course of their employment in connection with the contract for any one event is

[redacted]

The insurance against loss of or damage to the *works,* Plant and Materials is to include cover for Plant and Materials provided by the *Client* for an amount of

[redacted]

Resolving and avoiding disputes

The *tribunal* is litigation in the courts

The *Senior Representatives* of the *Client* are [redacted]

Address for communications [redacted]

Address for electronic communications [redacted]

Name [redacted]

Address for communications [redacted]

Address for electronic communications [redacted]

The *Adjudicator* is 'to be confirmed'

Address for communications 'to be confirmed'

Address for electronic communications 'to be confirmed'

The *Adjudicator nominating body* is The Institution of Civil Engineers

Z Clauses

Z1 Correctness of Site Information and other documents

Z1.1 Site Information about the ground, subsoil, ducts, cables, pipes and structures is provided in good faith by the *Client*, but is not warranted correct. Clause 60.3 does not apply to such Site Information and the *Contractor* is responsible for checking the correctness of any such Site Information they rely on for the purpose of pricing for or providing the *works*.
Z1.2 Information regarding construction methods or processes referred to in pre contract health and safety plans are provided in good faith by the *Client* but are not warranted correct (except for the purpose of promoting high standards of health and safety) and the *Contractor* is responsible for checking the correctness of any such information they rely on for the purpose of pricing for, or providing the *works*.

Z 2A: Risk transfer: Physical conditions within the Site

Clause 60.1 (12) is deleted from this contract.

Z3 Prevention: No change to prices

Delete first sentence of clause 62.2 and replace with:
"Quotations for compensation events except for the compensation event described in 60.1(19) comprise proposed changes to the Prices and any delay to the Completion Date and Key Dates assessed by the *Contractor*. Quotations for the compensation event described in 60.1(19) comprise any delay to the Completion Date and Key Dates assessed by the *Contracto*r.
Delete 'The' At start of clause 63.1 and replace with:
"For the compensation event described in 60.1(19) the Prices are not changed. For other compensation events the..."

Z 4 The Schedule of Cost Components

The Schedule of Cost Components is as detailed in the Framework Schedule 9.

Z 6 Payment for Work
Delete existing clause 11.2 (31) and replace with:
"11.2 (31) The Price for Work Done to Date is the total Defined Cost which the *Project Manager* forecasts will have been paid by the *Contractor* before the next assessment date plus the Fee. In all instances and circumstances the Price for Work Done to Date shall not exceed the forecast for the same as provided under clause 20.4."

Z7 *Contractor's* share
After cl54.2 and before cl54.3, insert the following additional clause:
54.2A If, prior to Completion of the whole of the works, the Price for Work Done to Date exceeds 111% of the total of the Prices, the amount in excess of 111% of the total of the Prices is retained from the Contractor.

Z10 Payments to subcontractors, sub consultants and
Subcontractors
The *Contractor* will use the NEC4 contract on all subcontracts for works unless another alternative and appropriate form is proposed and agreed in accordance with clause 26.3. Payment to subcontractors will be 28 days from the assessment date.
If the *Contractor* does not achieve payments within these timescales then the Client reserves the right to delay payments to the Contractor in respect of subcontracted work, services or goods.
Failure to pay subcontractors and suppliers within contracted times scales will also adversely affect the *Contractor's* opportunities to work on framework contracts.

Z16 Disallowed Costs
Add the following bullets to clause 11.2 (26) Disallowed costs
• was incurred due to a breach of safety requirements, or due to additional work to comply with safety requirements.
• was incurred as a result of the client issuing a Yellow or Red Card to prepare a Performance Improvement Plan.
• was incurred as a result of rectifying a non-compliance with the Framework Agreement and/or any call off contracts following an audit.

Z19 Linked contracts
Delays and additional cost on this contract resulting from the *Contractor's* fault or error on a previous contract on this project or programme will be a Disallowable cost under this contract and not be a Compensation event under this contract.

Z21 Requirement for Invoice
Add the following sentence to the end of clause 51.1:
The Party to which payment is due submits an invoice to the other Party for the amount to be paid within one week of the *Project Manager's* certificate.
Delete existing clause 51.2:
51.2 Each certified payment is made by the later of
• one week after the paying Party receives an invoice from the other Party and
• three weeks after the assessment date, or, if a different period is stated in the Contract Data, within the period stated.
If a certified payment is late, or if a payment is late because the *Project Manager* has not issued a certificate which should be issued, interest is paid on the late payment. Interest is assessed from the date by which the late payment should have been made until the date when the late payment is made, and is included in the first assessment after the late payment is made

Z22 Resolving Disputes
Delete W2.1

Z23 Risks and insurance
Replace clause 84.1 with the following
Insurance certificates are to be submitted to the Client on an annual basis.

Z30 Material Price Volatility
The *Client* recognises the ongoing pricing uncertainty in relation to materials for the period from 1 July 2021 to 30 June 2023 the *Client* will mitigate this additional cost through this clause. Payment is made per assessment based upon a general average material proportion within assessments, calculated at 40%.

Z30.1 Defined terms

a) The Latest Index (L) is the latest index as issued by the *Client*. The L, which is at the discretion of the *Client*, is based upon the issued consumer price index ((CPI) based upon the 12-month rate) before the date of assessment of an amount due.
b) The Price Volatility Provision (PVP) at each date of assessment of an amount due is the total of the Material Factor as defined below multiplied by L for the index linked to it.
c) Material Factor (MF) 40% is used, based on a general average material proportion across our programme. The volatility provision is only associated with material element. No volatility provision is applicable to any other component of costs.

Z30.2 Price Volatility Provision

Through a Compensation Event the *Client* shall pay the PVP. PVP is calculated as:
Assessment x MF x L = PVP

If an index is changed after it has been used in calculating a PVP, the calculation is not changed and remains based upon the rate issued by the *Client*. The PVP calculated at the last assessment before 30 June 2023 is used for calculating the price increase after that date.

Z30.3 Price Increase

Each time the amount due is assessed, an amount for price increase is added to the total of the Prices which is the change in the Price for Work Done to Date for the materials component only (and the corresponding proportion) since the last assessment of the amount due multiplied PVP for the date of the current assessment.

Z30.4 Compensation Events

The *Contractor* shall submit a compensation event for the PVP on a monthly basis (where applicable) capturing Defined Cost only for the PWDD increase in month. Forecasted costs should only be considered for the June 2023 period compensation event.

Assessment Date	Defined Cost?	Forecasted Cost?
31 July 2021	In period costs only	No
31 August 2021	In period costs only	No
30 September 2021	In period costs only	No
31 October 2021	In period costs only	No
30 November 2021	In period costs only	No
31 December 2021	In period costs only	No
31 January 2022	In period costs only	No
28 February 2022	In period costs only	No
31 March 2022	In period costs only	No
30 April 2022	In period costs only	No
31 May 2022	In period costs only	No
30 June 2022	In period costs only	No
31 July 2022	In period costs only	No
31 August 2022	In period costs only	No
30 September 2022	In period costs only	No
31 October 2022	In period costs only	No
30 November 2022	In period costs only	No
31 December 2022	In period costs only	No
31 January 2023	In period costs only	No
28 February 2023	In period costs only	No
31 March 2023	In period costs only	No
30 April 2023	In period costs only	No
31 May 2023	In period costs only	No
30 June 2023	In period costs only	Forecasted costs for remainder of contract

The Defined Cost for compensation events is assessed using
- the Defined Cost at *base date* levels for amounts calculated from rates stated in the Contract Data for People and Equipment and
- the Defined Cost current at the date the compensation event was notified, adjusted to the *base date* by 1+PVP for the last assessment of the amount due before that date, for other amounts.

Z31 ECC – Price Adjustment for Inflation

The *Client* recognises the ongoing pricing uncertainty with regards to inflation. The *Client* will mitigate this uncertainty through this clause.

Z31.1 Defined terms:

a) The index is Office for National Statistics (ONS) CPI (UK, 2015=100).
b) The Base Date Index (B) is the latest available index published by ONS prior to the Contract Date.
c) The Latest Index (L) is the latest available index published by ONS before the date of assessment of an amount due.
d) The Price Adjustment Factor (PAF) at each date of assessment of an amount due is 0.9((L-B)/B).

Z31.2 Application rules.

The provisions of this clause [Z31] shall apply provided that:

a) The Price for Work Done to Date is less than or equal to the total of the Prices
and
b) Inflation remains positive i.e. L is greater than B.

Z31.3 Price Adjustment Factor.

If an index is changed after it has been used in calculating a PAF, the calculation is not changed. The PAF calculated at the last assessment date before the Completion Date for the whole of the *works* is used for calculating an amount for price adjustment after that date.

Z31.4 Price adjustment Options A and B.
NOT USED

Z31.5 Price adjustment Options C and D.

Each time the amount due is assessed, an amount for price adjustment is added to the total of the Prices which is the change in the Price for Work Done to Date since the last assessment of the amount due multiplied by (PAF/(1+PAF)).

Z31.6 Compensation events.
NOT USED

Z111 ECC - Fee adjustment for non compliance with Scope

Delete existing 11.2 (10) and replace with the following clause

The Fee is the amount calculated by applying the *fee percentage* to the Defined Cost excluding the cost of Sub-contractors that have not complied with procurement by best value processes as defined in the Scope. 80% of the *fee percentage* is applied to the amount of the Defined Cost for Sub-contractors that have not complied with procurement by best value processes as defined in the Scope.

Secondary Options

OPTION X2: Changes in the law

The *law of the project* is the law of England and Wales, subject to the jurisd ction of the courts of England and Wales

OPTION X7: Delay damages

X7 only Delay damages for Completion of the whole of the *works* are [redacted] [redacted]

OPTION X10: Information modelling

The period after the Contract Date within wh ch the *Contractor* is to subm t a first Informat on Execution Plan for acceptance is 2 weeks

The minimum amount of insurance cover for claims made against the *Contractor* arising out of its failure to use skill and care normally used by professional providing information similar to the Project Information is, in respect of each claim [redacted]

The period following Completion of the whole of the *works* or earlier termination for wh ch the *Contractor* maintains insurance for claims made against t arising out of its failure to use the skill and care is [redacted]

OPTION X15: The *Contractor's* design

The *period for retention* following Completion of the whole of the *works* or earlier termination is [redacted]

The minimum amount of insurance cover for claims made against the *Contractor* arising out of its failure to use skill and care normally used by professionals designing works similar to the *works* is, in respect of each claim [redacted]

The period following Completion of the whole of the *works* or earlier termination for wh ch the *Contractor* maintains insurance for claims made against t arising out of its failure to use the skill and care is [redacted]

OPTION X18: Limitation of liability

The *Contractor's* liabil ty to the *Client* for indirect or consequential loss is lim ted to [redacted]

For any one event, the *Contractor's* liability to the *Client* for loss or damage to the *Client's* property is lim ted to [redacted]

The *Contractor's* liabil ty for Defects due to its design wh ch are not listed on the Defects Certificate is limited to [redacted]

The *Contractor's* total liabil ty to the *Client* for all matters arising under or in connection with the contract, other than excluded matters, is limited to [redacted]

The *end of liability date is* [redacted] after the Completion of the whole of the *works*

OPTION X20: Key Performance Indicators (not used with Option X12)

The *incentive schedule* for Key Performance Indicators is in Schedule 17.

A report of performance against each Key Performance Indicator is provided at intervals of 3 months.

Y(UK2): The Housing Grants, Construction and Regeneration Act 1996

The period for payment is	14 days	after the date on which payment becomes due	

Y(UK3): The Contracts (Rights of Third Parties Act) 1999

term	*beneficiary*
Any	None

Part Two - Data provided by the *Contractor*

Completion of the data in full, according to the Options chosen, is essential to create a complete contract.

1 General

The *Contractor* is

Name: BAM Nuttall Ltd

Address for communicat ons:
St James House
Knoll Road
Camberley
Surrey
GU15 3XW

Address for electronic communications: [redacted]

The *fee percentage* is: Option C — 9.90%

The *working areas* are

The *key persons* are

Name (1): [redacted]
Job: [redacted]
Responsibilities: [redacted]
Qualifications: [redacted]
Experience: [redacted]

The *key persons* are

Name (2): [redacted]
Job: [redacted]
Responsibilities: [redacted]
Qualifications: [redacted]
Experience: [redacted]

The *key persons* are

Name (3): [redacted]
Job: [redacted]
Responsibilities: [redacted]
Qualifications: [redacted]
Experience: [redacted]

The *key persons* are

Name (4)
Job
Responsibilities
Qualifications
Experience

The following matters will be included in the Early Warning Register

2 The Contractor's main responsibilities

The Scope provided by the *Contractor* for its design is in

3 Time

The programme identified in the Contract Data is

5 Payment

The *activity schedule* is

Resolving and avoiding disputes

The *Senior Representatives* of the *Contractor* are

Name (1) [redacted]
Address for communications
[redacted]

Address for electronic communications
[redacted]

Name (2) [redacted]
Address for communications
[redacted]

Address for electronic communications
[redacted]

X10: Information Modelling

The *information execution plan* identified in the Contract Data is

Contract Execution

***Client* execution**

Signed underhand by [**PRINT NAME**] for and on behalf of the Environment Agency

[redacted]

Signature Date [redacted]e

***Contractor* execution**

Signed underhand by [**PRINT NAME**] for and on behalf of BAM Nuttall Ltd

[redacted]

[redacted]

Si Date

[redacted]

Role

Environment Agency
NEC4 engineering and construction contract (ECC)
Scope

Project / contract information

Project name	NE Hub Asset Reconditioning - Construction
Project SOP reference	[redacted]
Contract reference	C21287
Date	20/10/23
Version number	1.0
Author	[redacted]

Revision history

Revision date	Summary of changes	Version number
11/10//23	Draft for comment	0.2
16/10/23	Amended carbon requirements and other amendments following DGC discussion	0.3
20/10/23	Amended following discussion with Bam	1.0

This Scope should be read in conjunction with the version of the Minimum Technical Requirements and Exchange Information Requirements current at the Contract Date. In the event of conflict, this Scope shall prevail. The *service* is to be compliant with the following version of the Minimum Technical Requirements and Exchange Information Requirements:

Document	Document Title	Version No	Issue date
LIT 13258	Minimum Technical Requirements	V.12	December 2021 [redacted]
LIT 17641	Exchange Information Requirements	3.0	January 2023 [redacted]

Contents List

S 100 Description of the *works*

The *Client's* Project and Contract Management (PCM) team for the Northeast Hub is putting contracts in place to undertake a programme of low value construction and other related work that would typically have been undertaken through the Environment Agency's (EA) former FCRM Operations Framework (FOF). The intention is to award two separate contracts to the *Contractor* through the Collaborative Delivery Framework (CDF) to facilitate this – an NEC4 PSC Option E contract and an NEC4 ECC Option C contract. Both contracts will deliver projects which will be added to the contract by way of compensation events. When a new project is added into the contract, the current completion date of 31st March 2024 will be adjusted accordingly.

S 101 Description of the *works*

- The *works* are the reconditioning of damaged flood defence assets, including the associated design and site construction activities required for their repair. Typical works will include embankment repairs, wall repairs and delivery of access improvements.
- The *works* may involve:
    - construction
    - civil engineering
    - earthworks installations.
- The *Contractor* includes any additional site investigation requirements for the *Contractor's* design.
- The *Contractor* carries out all preparatory and preliminary works to allow the *works* to be carried out at each part of the *site*.
- The *Contractor* designs, provides, maintains for the period required and removes upon completion all temporary work.
- The *Contractor* assumes the role of principal contractor in accordance with the CDM regulations.
- The *Contractor* assumes the role of designer in accordance with the CDM regulations.
- The *Contractor* produces a buildability statement for each part of the *site*.
- The *Contractor* produces a design hazard inventory information (including for any temporary *works*) and provides a design risk assessment identifying residual risks and assumed control measures based upon the design for each part of the *site*.
- The *Contractor* completes a review of the RAG (red, amber, green) list.
- The *Contractor* provides accompanying information describing their design approach.
- The *Contractor* prepares the health and safety file for each part of the *site* using the *Client*'s template.
- The *Contractor* provides the health and safety file for review to the *Client*'s principal designer no later than two weeks after the *works* is completed at each part of the *site*.
- The health and safety file is handed over to the *Client* no later than four weeks after the *works* is completed at each part of the *site*.
- The *works* are completed when:
    - The *Contractor* achieves completion,
    - The *Contractor* provides the *Client* with a photographic survey of the *works* on completion at each part of the *site*,
    - The *Contractor* provides the health and safety file accepted by the Client's principal designer for each part of the site.

S 102 Purpose of the Works/ Outcome required

The *Contractor* shall deliver a programme of asset reconditing works across the North East hub. The programme consists of damaged assets which have been assessed as being below required condition or requiring works for the management of health and safety, or to meet statutory requirements. The programme

comprises an initial list of assets within the Yorkshire area. Future assets will be added to this programme through compensation events.

This contract will be based on a target cost for the initial 12 projects, which are listed in the table below. The *works* required at these sites is shown in the scoping reports included as Appendix 2.

Asset Number	Project Name	Grid Reference
534275	Salton village embankment	SE7151580063
74531	Rawcliffe Barrier Bank Repair- Hazel Bank Farm	SE6757322271
74531	Rawcliffe Barrier Bank Repair - Pets Pad	SE6757322271
26657	Crown and Anchor/Weel Rd flood wall	TA0553341709
384420	Fenton Dam access improvements	SE3192421792
541707	East Ings and Wood Holme embankment works	SE5210924355
27185	Aire_St_Floodwall_Access	SE4096825859
410178	Castleford Flood Walls	SE4257126296
50760	Chapel Haddlesey Flood Wall	SE5824626114
215111	Whitwood Mere Outfall penstock	SE41872609
745881	Old School Lane access track, Catcliffe	SK4272488662
27379	Beech Tree Mobile Pumps	SE6720222683

The following sites are included on the Asset Reconditioning Programme and as such are planned to be added to this contract by way of compensation events. This is not an exhaustive list and may be subject to change during the contract as sites may be added to, or removed from, the wider programme. The scope of works at these sites will be confirmed and these will be added to the scope of this contract through compensation events:

Asset Number	Project Name	Grid Reference
76129	Malton & Norton FAS - Wall	SE79237145
76130	Wallgates Lane Flood Wall	SE79327151
76102	Malton & Norton FAS - Wall	SE79087142
76421	Malton & Norton FAS - Wall	SE78857143
79312	Malton & Norton FAS - Wall	SE78807147
77402	Malton & Norton FAS - Wall	SE79307156
77681	Malton & Norton FAS - Wall	SE79017146
77682	Malton & Norton FAS - Wall	SE79117149
76422	Malton & Norton FAS - Wall	SE78977140
76418	Malton & Norton FAS - Wall	SE78567148
76131	Malton & Norton FAS - Wall Wallgates Lane	SE79357154

Asset Number	Project Name	Grid Reference
68076	Malton & Norton FAS - Wall	SE79857198
520675	Malton & Norton FAS - YW Flapped Outfall	SE79197144
78699	Brawby Embankment	SE7439578306
77405	River Seven Right-Embankment	SE7376580250
27378	Coates Marsh Mobile Pumping Access	SE6429022850
531834	Chapel Haddlesey Hydroplant Bank Repair	SE5801526004
271825	Methley Sluice Vegetation Clearance	
334349, 513015	Crimpsall Weir and Cheswold Weir and Rock Chute	
25955	White Cross Syphon Left bank, embankment repairs and manhole installation	SE5464909178
510930	Wall at Barmby	SE68732888
26091	Monk Dike Slippages and Uneven Surface	TA1062942859
323069	Selby Dam Pumping Station	SE 6147 3259
93815	Weel to Wawne Embankment	TA0553341709
183620	Burstwick Drain Hedon	TA1817028243
543381, 543449, 52848, 149877	Cononley Washlands	
27097	Brotherton Barrier Embankment	SE4980924677
52663	Bank d/s Rusholme Grange	SE7024026616
252826	Kirkham Abbey Sluice	SE7356165678
232713	Wilfholme Pumping station	
540262	Methley Ings Inflow Spillway	SE4142626143
541861	Low level outfall, Killamarsh FSR	SK44438053
29000	Ouse Bridge Cottages defences, Long Drax	SE68142847
51044	Canal Side West floodwall, Newport	SE8564730230
28936	Nun Appleton embankment	
174015	Canal Side East floodwall, Newport	SE8566830242
142324	Normanby to Carr Farm embankment LB	
28463	Glebe Farm embankment LB	
77402	Access ramp over floodwall, Malton	SE79307156
415960	Poolsbrook FSR decommissioning	
50794	Hensall Ings (D/S PStn) Embankment Repair 3	
27111	Hensall Ings (D/S PStn) Embankment Repair 3	
53750	Snaith Ings riverside bank	

Asset Number	Project Name	Grid Reference
52623	Kellington Ings riverside bank	
52903	Allerton Ings (North) Barrier Bank	
541709	Birkin Holme riverside bank	
25351	Bank repairs d/s A630 bridge, Brinsworth	
384449	Dronfield Dam embankment	
543449	Cononley Washlands Comp B, riverside bank	
52848	Cononley Washlands Comp C, riverside bank	
543381	Cononley Washlands Comp A, riverside bank	SD9880149086
213589	Cononley Washlands Comp O, outfall	
154226	Millwood Storage Area, Todmorden	
144288	Sackville Street floodwall, Todmorden	
27785	Floodwall d/s Salford Way, Todmorden	
333800	Hempholme Pumping station	
330106	Malton Norton FAS Flood Gate no9(?) Weighbridge House	
330105	Malton Norton FAS Flood Gate no8 Weighbridge House	
506366	Dronfield Dam Penstock	
598893	Cheswold Boom Replacement	
26338	Crabley Creek	
tbc	North Swaithe Dyke Culvert	
tbc	Foss Barrier Emergency Egress Point	
tbc	Broomfleet Lock, Market Weighton Canal	
50892	Sykehouse Barrier Bank (Went Green to canal).	SE6665718423
51116	Fishlake Barrier Bank (Westfield)	SE6308814244
51227	Walden Stubbs embankment (d/s weir to A19 RB)	SE 5507116294

Further projects may also be added to the contract that are not part of the Asset Reconditioning Programme but would traditionally have been delivered through the EA's FOF in that they are classed as non-complex, low value and low risk projects.

The repairs and improvements required to the initial 12 sites included in the contract are to be completed by 24th May 2024 and must achieve the following objectives in line with the agreed scopes:

- ensure that these assets are able to operate as required during future rainfall events;
- reduce the risk of flooding to people and property by providing the appropriate standard of protection for each asset as designed;
- resolve health and safety risks associated with the assets;
- meet legal requirements associated with the management of these assets and
- manage and reduce the risk of reputational issues within these communities

For the project to be successful, the necessary improvement works need to be designed and constructed to ensure each asset is fit to fulfil its intended purpose as part of a flood risk management provision. Successful delivery will ensure a reduction in both the time and risk associated with ongoing maintenance requirements.

S 200 General constraints on how the *Contractor* provides the *works*

The general constraints listed below cover what is envisaged within this programme of works.

S 201 General constraints

- The *Contractor* is permitted to work between 7.30am and 6.00pm on weekdays (Monday to Friday).
- The *Contractor* does not complete the *works* on any weekend days without the prior written consent of the *Client.*
- The *Contractor* avoids peak traffic times for Plant and Materials and Equipment deliveries to each part of the *site*.
- The *Contractor* complies with any constraints highlighted by the national environmental assessment service (NEAS) and the *Client*'s fisheries, biodiversity and geomorphology (FBG) team.
- The *Contractor* complies with any constraints which may also be identified and agreed by the *Contractor* or the *Client* during the visits at each part of the *site*.
- The *Client* requires two weeks to review and accept the *Contractor's* submitted design proposals.
- The *Client*'s principal designer requires two weeks to review and accept the Construction Phase Plan (CPP) before the site can be established for each part of the *site*.
- The *Contractor* submits accounts and records for any time claimed in support of actual Defined Cost in compensation events. The accounts and records are authentic and direct evidence that the time claimed by the *Contractor* has been included in the account for this contract in the *Contractor*'s account system.

S 202 Confidentiality

The *Contractor* does not disclose information in connection with the works except when necessary to carry out their duties under the contract or their obligations under the contract.

The *Contractor* may publicise the services only with the *Client's* written permission.

S 203 Security and protection on the site

The *Contractor* provides, maintains and adapts for the period required and removes upon completion of the works at each part of the site all security and protection requirements.

Details of the *Client's* security and protection requirements are included in the pre-construction information for each part of the site.

The *Contractor* maintains the security of the boundaries of each part of the site affected by the works.

The *Contractor* complies with the safety, health, environment and wellbeing (SHEW) - code of practice (CoP).

S 204 Security and identification of people

The *Contractor* complies with the safety, health, environment and wellbeing (SHEW) - code of practice (CoP).

S 205 Protection of existing structures and services

The *Contractor* provides, maintains and removes upon completion of the works all protection measures for any existing structures and services that are on each part of the site. The nature and location of existing structures and services are included in the pre-construction information for each part of the site.

The *Contractor* ensures the flood defence level of each asset is maintained throughout the works on each part of site. If this is not practicable then a Flood Risk Activity Permit will be required and the works will be delivered in accordance with this permit.

The *Contractor* complies with the safety, health, environment and wellbeing (SHEW) - code of practice (CoP).

S 206 Protection of the *works*

The *Contractor* provides, maintains and removes upon completion all protection measures for the works. The *Client's* protection requirements are included in the site-specific pack for each part of the site.

S 207 Cleanliness of the roads

The *Contractor* provides, maintains and removes upon completion road cleaning facilities for all public and privately owned roads that are affected by the works. The *Client's* requirements are included in the site-specific pack for each part of the site.

S 208 Traffic Management

The *Contractor* provides a traffic management plan which meets as a minimum the requirements in the safety, health, environment and wellbeing (SHEW) - code of practice (CoP).

The *Contractor* parks vehicles within designated car park areas and only vehicles that are essential for completing the *works* enter the *site*. The *Contractor* produces a traffic management plan for the *site* and includes these details on the construction phase plan. As a minimum the *Contractor's* traffic management plan includes:

a. Vehicular traffic routes around the *site*.
b. Pedestrian walkways around the *site.*
c. Parking areas.
d. Storage areas.
e. Management of interaction with the public and residents.
f. Access to the *site.*

Movement to and from carparks if those areas are used as a site compound.

S 209 Condition survey

The *Contractor* conducts a dilapidation survey with photographs at each part of the site prior to commencing the works there.

The *Client* is in attendance when the dilapidation survey is carried out at each part of the site.

The *Contractor* reinstates each part of the site to its pre-commencement condition before completing the works there and takes photographs of all reinstatement work for the Client's records.

S 2010 Consideration of Others

The *Contractor* liaises with residents at each part of the site to ensure that there is no conflict with local deliveries, plant movement and material deliveries.

S 2011 Control of site personnel

All operatives to report to the site office prior to commencing works on Site. Upon first visit to site, operatives will be inducted and have their competencies checked.

The *Contractor* complies with any additional requirements that are included in the site-specific pack for each part of the site.

S 2012 Site cleanliness

The *Contractor* complies with all of the *Client's* requirements that are included in the site-specific pack for each part of the site.

S 2013 Waste materials

The *Contractor* re-uses all excavated earth materials on site where possible.

The *Contractor's* waste management procedure complies as a minimum with the Safety, Health, Environment and Wellbeing (SHEW) - code of practice (CoP). As a minimum the Contractor organises waste into streams for recycling as far as is reasonably practicable. The Contractor's Construction Phase Plan (or similar document) includes a site waste management plan.

With the exception of excavated materials, the *Contractor* disposes of all waste off site whether it is recycled or not.

S 2014 Deleterious and hazardous materials

Details of deleterious and hazardous materials are included in the site-specific pack for each part of the site.

S 2015 Carbon

A completed project must aim to minimise carbon emissions by:

1. Exploiting the most likely opportunities for further reductions to the agreed forecast during construction.
2. Reporting the outturn of actual

The project should be looking at how to minimise actual carbon throughout the construction stage working with their suppliers on lower carbon products and services that meet the project scope and deliverables. A monthly report must be provided via FastDraft (using the carbon form – see application for payment section) providing:

1. actual emissions to date,
2. (latest) outturn forecast (based on actuals and remaining emissions to outturn) and
3. (Latest) outturn budget

Projects at completion must provide via Asite an 'as built' carbon appendix supported by an carbon assessment reporting outturn actual emissions. The 'as built' carbon appendix and updated assessment must be verified by an EA appointed carbon specialist before completion of the project is approved.

S 300 *Contractor's* design

No design will be undertaken by the *Client*. Design on this programme of works – which will be minor in nature – will be carried out by the *Contractor*. All design liability will sit with the *Contractor* and should be carried out as per the latest MTRs, SHEW COP, CDM guidelines and other policies and procedures deemed necessary. The standard contract will be modified to include for design responsibility for the *Contractor* via clause X15.

S 301 Design responsibility

- The *Contractor* is to design the works.
- The *Contractor* designs all temporary works to complete the works.
- The *Contractor* designs the works according to the *Client's* details provided in the Appendices for each part of the site.
- The *Contractor's* design employees and design subcontractors are identified throughout the duration of the contract and comply with the competence criteria stated in Regulation 4 and Appendix 4 of the CDM Regulations 2015.
- The *Contractor* includes the details of all assumptions that have been made for the design of the works when the Contractor's design proposals are submitted to the Client for acceptance.
- The *Contractor* notifies the *Client* and the *Client's* principal designer of the following:
    - Appointment of subcontractors to complete any part of the Contractor's submitted design for the works including any temporary works. Notification is provided before the *Contractor* appoints the subcontractor.
    - Changes to the *Contractor's* accepted design for the works.
    - Evidential proof that the Contractor has considered and employed safety measures for all design changes and Compensation Events.

S 302 Design submission procedures

- The scope of the *Contractor's* design is confirmed within the site-specific pack for each part of the site.
- The *Contractor* is required to respond to *Client* comments and revise and resubmit deliverables when required.

S 303 Design approval from Others

- The *Client* accepts the *Contractor's* submitted design proposals when:
    - All parties in the *Client's* organisation that have a vested interest in the works have accepted the *Contractor's* submitted design, and
    - All parties that are not part of the *Client's* organisation that have a vested interest in the works have accepted the *Contractor's* submitted design.
    - After the design has been accepted the *Contractor* provides the *Client* with a set of construction drawings.

S 304 *Client's* requirements

- The *Client* for the contract is represented by the Yorkshire Area team, primarily the Client's Senior User.
- The *Client's* organisation has a regulatory function. Communications from the Environment Agency in its capacity as a regulator are not to be confused with communications as the Client.
- The *Client* has a number of advisory departments with whom the Contractor may need to liaise. Examples include: Asset Performance, Partnership & Strategic Overview, NEAS, FBG, MEICA; Estates, etc. Personnel from these departments are not authorised to give instructions under this contract. Any instructions (that are not regulatory requirements) that the Contractor receives from other EA departments/personnel are referred to the Project Manager.
- Regardless of context, the *Contractor* ensures that all communications, both from and to, other Environment Agency departments/personnel are copied to the Project Manager and Client.

- The *Contractor* shall carry out the works in accordance with the version of the Minimum Technical Requirements current at the Contract Date.

S 305 Design co-ordination

N/A

S 306 Requirements of Others

N/A

S 307 Copyright/licence

- The *Client* may wish to use and copy the *Contractor's* design for other schemes as may be appropriate.

S 308 Access to information following Completion

- The *Contractor* shall provide copies (both native and published) of any design produced during the project.
- The *Contractor* shall provide copies (both native and published) of any health & safety documentation produced during the project.

S 309 Site investigations

- The *Contractor* obtains soils information as necessary for the design of the *works.* The *Contractor* specifies, procures, manages and undertakes site investigations to inform the detailed design of the *works* and to manage their risk of unforeseen ground conditions during construction. The *Contractor* undertakes laboratory testing of samples, and longer term monitoring of site conditions as required. This supplements the information provided in the Site Information.
- The *Contractor* liaises with all historic environment stakeholders as required to ensure that the heritage and archaeological risks are identified and appropriately managed. The *Contractor* obtains all necessary consents and approvals.
- The *Contractor* provides the *Project Manager* with the final Factual Report of the investigation in digital format.
- The *Contractor* informs the *Project Manager* of the proposed works a minimum four weeks before the investigation is undertaken and complies with the Access to the Site conditions.

S 400 Completion

S 401 Completion definition

The following are required for each part of the *Site* for completion to be certified, without these items the *Client* is unable to use the *works*:

- Health and Safety File - one electronic version
- Operating and Maintenance Manuals - one electronic version.
- As Built drawings - one electronic version
- Photographic survey of the works on completion
- Transfer to the *Client* databases of BIM data
- Delivery of the Final Carbon Appendix

S 402 Sectional Completion definition

N/A

S 403 Training

N/A

S 404 Final Clean

A final clean, removal of temporary structures, materials, protection and tools will take place where necessary upon completion of the works.

S 405 Security

Details of any additional requirements are included in the site-specific pack for each part of the site.

S 406 Correcting Defects

All Defects are to be notified within 52 weeks of the certification of completion at each part of the *Site*.
Access to the Site to correct Defects with be granted to the *Contractor* by the *Client*.

S 407 Pre-Completion arrangements

Prior to any works being offered for take over or Completion the *Contractor* shall arrange a joint inspection with the *Supervisor, Project Manager, Client* (scheme Project Manager) and Senior User.

S 408 Take over

Details of any additional requirements are included in the site-specific pack for each part of the site.

S 500 Programme

S 501 Programme requirements

The programme complies with the requirements of Clause 31.2 and includes alignment and submission of the BEP and Master Information Delivery Plan (MIDP).

S 502 Programme arrangement

The programme will be reviewed monthly and issued for acceptance.

S 503 Methodology statement

This information is to be provided to the *Client's* CDM co-ordinator in the form of the Project Execution Plan, for approval prior to works commencing.

S 504 Work of the *Client* and Others

The order and timing of the work of the *Client* and Others to be included in the programme and information to be provided.

S 505 Information required

Details of any additional information requirements are included in the site-specific pack for each part of the site.

S 506 Revised programme

The revised programme will be provided on a monthly basis

S 507 Monthly reports

In managing the *service* the *Contractor* shall:

- Contribute monthly to the updates to the project risk register.
- Provide input to project efficiency CERT Form.
- ~~Produce monthly financial updates and forecasts meeting the *Client's* project reporting timetable together with progress reports. Monthly financial updates and forecasts to meet EA deadlines provided by no later than the 10th day of each month, or otherwise agreed at the project start up meeting.~~
- Deliver a monthly progress report in the *Client's* standard template giving progress against programme, deliverables received and expected, financial summary against programme and forecast project carbon [redacted]
- Commission capital forecast profile to be entered on FastDraft monthly & Project forecast outturn project carbon profile to be entered onto FastDraft monthly. The *Contractor* is required to provide a monthly forecast on FastDraft for both carbon and cost in accordance with FHU –
  [redacted]
- Attend project board meetings as required.

- Ensure quarterly input into framework performance assessment/environmental Performance Measures.
- Maintain and show how accurate and up to date information on the whole-life cost and carbon of options is driving optimum solutions at all stages of design development.
- Capture lessons learnt relevant to scheme delivery for the EA PM.

S 600 Quality management

The *Contractor* is to carry out the works in accordance with the *Contractor's* quality management system.

S 601 Samples

N/A

S 602 Quality Statement

The information will be contained within the relevant Health & Safety files and in compliance with the MTRs.

S 603 Quality management system

N/A

S 604 BIM requirements

The BIM Information Manager is the *Client* Project Manager.

S 700 Tests and inspections

S 701 Tests and inspections

- An Inspection and Test Plan (ITP) for each part of the site will be submitted by the *Contractor* to the *Client* which will highlight any proposed testing regime and hold points within the construction period.
- Access to the facilities will be maintained throughout the duration of the works, however EA personnel will need to be escorted by contract personnel during working hours
- Documents to be provided before and after any test, will include specialist information and photographs, where appropriate.

S 702 Management of tests and inspections

The Management of the tests and inspections will be by the BAM commissioning Manager who will develop the plan and program with the relevant sub-contractors. Dates and activities for the tests will be notified within the required timescale.

S 703 Covering up completed work

No operation shall be carried out or covered up without full and complete notice being given to the *Supervisor* by the *Contractor* in time to enable the *Supervisor* to make such arrangements as he deems necessary for inspection and checking.

S 704 *Supervisor's* procedures for inspections and watching tests

The ECC *Project Manager* and the *Supervisor* will be given due notice of any planned tests to be carried out by the Contractor as identified with in the ITP and commissioning program.

S 800 Management of the *works*

S 801 Project team – Others

Further to the *Client*, *Project Manager, Supervisor, Principal Designer* and *Contractor* roles identified previously within the contract.

The *Project Manager* is responsible for managing the contract on behalf of the *Client*, and they deal with time, money, and changes to the contract.

If the *Contractor* is in any doubt as to whether a matter should be raised with the *Project Manager* or the *Supervisor*, he shall ask the *Project Manager to* decide the issue.

The *Client's* project organogram will be provided once available.

S 802 Communications

- For all contractual matters, FastDraft will be used.
- Progress meetings will be held on Teams on a monthly basis on a day to be agreed. Invites will be sent to the *Client* and *Contractor* teams as necessary.
- The meetings will follow the *Contractor's* standard template and include, Safety, Programme, Design, Financial, Risk, Liaison and any other matters arising from the works.
- BAM and EA standard forms will be adopted for communication.
- Where abbreviations are used for the first time, the full wording should be used. A glossary of terms will be included in the handover documentation for clarity.

The *Contractor* shall prepare monthly progress reports shall be prepared in pdf version by the *Contractor* and provided to the *Project Manager* for distribution to the project team a minimum of three working days in advance of each monthly progress meeting which they shall attend. The progress report shall include those details listed in the Minimum Technical Requirements Cl 1.30 and also:

Progress

- Activities started, progressed and completed during the month;
- Activities planned for the forthcoming month;
- Summary of weather conditions experienced; and
- Instructed changes to the Scope.

Programme

- A marked up copy of the current programme showing progress and percentage completion of each activity; and
- A revised programme (if appropriate).

Issues

- Problems encountered or anticipated.

Information/services required from the *Client.*

Information required by the *Contractor*.

Public Relations

- Contacts with the public or other third parties; and
- Complaints or claims.
- Health & safety incidents
- Environmental
- Pollution incidents, etc.; and

- Recycling and waste reports.

Efficiency register

Any other issue/subject requested by the *Project Manager*

S 900 Working with the *Client* and Others

S 901 Sharing the Working Areas with the *Client* and Others

The *Client*'s requirements are included in the site-specific pack for each part of the *site.*

S 902 Co-operation

The *Contractor* to work in a collaborative manner with the *Client* and *Others* throughout the durations of this contract.

S 903 Co-ordination

- The *Contractor* liaises with the *Client's* principal designer and submits all required or requested information.
- Design risks that the *Client* has identified are included in the appendices for each part of the site.
- The *Contractor* consults with the *Client's* estates team and the *Client* to confirm access arrangements, site compounds and other permissions necessary for undertaking the works at each part of the site.

S 904 Authorities and utilities providers

- The *Contractor* shall consult with utility providers to confirm measures required to ensure safe construction of the works, and to duly allow for such provision as is required.
- Information concerning the believed location of apparatus of the Statutory Undertakers, Highway Authority or others is included, where available, in the Site Information or Pre-Construction Information.
- The *Contractor* liaises with all relevant Statutory Undertakers, the Highway Authority and other owners of apparatus before designing (where relevant) or commencing any excavations and satisfies himself as to the exact position of existing apparatus which may affect or be affected by the construction of the works.
- Should any leakages or damage to existing services, highways or apparatus be discovered, the *Contractor* at once notifies the *Project Manager* and the Statutory Undertaker, Highways Authority or owner concerned, as appropriate and the *Contractor* affords every facility for the repair or replacement of the apparatus affected.

S 905 Diversity and working with the *Client,* Others and the public

- The *Contractor* shall engage with *Others* to create a diverse and inclusive environment throughout the duration of the works.
- The *Contractor* shall inform the *Client* of any opportunities to support diverse workforces and engagement throughout the duration of the *works.*

S 1000 Services and other things to be provided

The *Client* will not provide any services or facilities for the *Contractor's* use. As this contract is for work at multiple locations it is assumed that the *Contractor* will provide facilities at each site as needed

S 1001 Services and other things for the use of the *Client, Project Manager* or Others to be provided by the *Contractor*

- Accommodation will **not** be provided for the use of the *Client*.
- No meeting rooms are required on Site.
- Storage facilities limited and by agreement.
- Catering welfare facilities will be provided where food and drinks can be stored or warmed as required.
- Medical facilities and first aid will be provided by the *Contractor.*
- Sanitation on site facilities for washing and toilet will be provided by the *Contractor.* These will be cleaned on a daily or weekly basis.
- Sign boards and other signage will be provided by the *Contractor,* other than scheme boards which will be provided by the *Client* (if required).
- Any additional requirements are included in the site-specific pack for each part of the *site.*

S 1002 Services and other things to be provided by the *Client*

- The *Client* is to provide access to the site and keys for each part of the *site* as required. the *Contractor* is to return the key once the *works* at this part of *site* is completed.
- Other services to be provided is listed in the site-specific pack for each part of the *site.*

S 1100 Health and safety

The *Contractor* is required to comply with the safety, health, environment and wellbeing (SHEW) - Code of Practice (CoP).

S 1101 Health and safety requirements

- The *Contractor* carries out suitable fire risk assessments and arranges their own procedures and fire plan for each part of the site.
- The *Contractor* includes details in the construction phase plan or similar document prior to commencement of the works for each part of the site.
    - Main compound area
    - Satellite compound area
    - Fuel and chemical storage facilities
    - Other areas as assessed by the *Contractor*

S 1102 Method statements

- The *Contractor* submits a risk assessment and method statement for the works to the *Client*. The *Client* reviews these documents as part of the *Client's* construction phase plan assessment.
- The *Contractor* produces an Environmental Action Plan (EAP) for each part of the site before construction activities commence there.
-

S 1103 Legal requirements

- The *Contractor* complies with all legal requirements that are included in, referred to or inferred by any part of the documents that comprise this contract.

S 1104 Inspections

- The *Contractor* complies with 'S700 Tests and Inspections'.

S 1200 Subcontracting

The *Contractor* may subcontract work using an NEC contract as required.

S 1201 Restrictions or requirements for subcontracting

- All subcontractors that the *Contractor* intends to engage in the works will be notified to the *Client*.
- All work undertaken by the subcontractors will be the responsibility of the *Contractor*.

S 1202 Acceptance procedures

N/A

S 1210 Procurement of subcontractors

- Sub-contractors need to be selected using best value processes.
- This requires the *Contractor* to demonstrate that they have made reasonable attempts to obtain three competitive tenders for all work in excess of £25,000.
- The only exception to this is work which has been accepted (in writing) by the hub Commercial Services Manager for strategic suppliers or for emergency work.

S 1300 Title

N/A

S 1301 Marking

N/A

S 1302 Materials from Excavation and demolition

The *Contractor* has title to the Materials from excavation and demolition, excepting those required in the works. Disposal of all materials shall be in accordance with statutory requirements.

S 1400 Acceptance or procurement procedure (Options C and E)

N/A

S 1500 Accounts and records (Options C and E)

N/A

S 1501 Additional Records

The *Project Manager* and the *Supervisor* use the standard contract administration system Fastdraft.

The following additional records are to be kept by the *Contractor:*

- Timesheets and site allocation sheets, which should be submitted with monthly applications. The Project Cost Tool (PCT) will be applicable on this project and both defined costs and forecasts must be consistent with CDF Framework Agreement.
- Equipment records. The PCT will be applicable on this project and both defined costs and forecasts must be consistent with CDF Framework Agreement.
- Forecasts of the total Defined Cost. The PCT will be applicable on this project and both defined costs and forecasts must be consistent with CDF Framework Agreement Schedules. Specific procurement and cost reports. The PCT will be applicable on this project and both defined costs and forecasts must be consistent with CDF Framework Agreement.

S 1502 Application for Payment / Invoice

The *Contractor* is required to provide the backup to their application for payment in the following format:

[redacted]

Submission of an application for payment without this format of backup sheet will **not** be recognised or treated as a compliant submission.

A monthly report must be provided via FastDraft (using the carbon form) providing:

1. actual emissions to date,
2. (latest) outturn forecast (based on actuals and remaining emissions to outturn) and
3. (Latest) outturn budget / target (set to the verified forecast)

The FastDraft carbon form may be supported by details of actual emissions to date against an agreed breakdown of asset/service/product lines taken from the verified carbon assessment.

This will inform the EA of progress in reducing carbon during construction in the form of a variance between a latest outturn forecast (reported on FastDraft) and verified forecast.

S 1600 Parent Company Guarantee (Option X4)

N/A

S 1700 *Client's* work specifications and drawings

S 1701 *Client's* work specification

N/A

S 1702 Drawings

N/A

S 1703 Standards the *Contractor* will comply with

The *Contractor* shall carry out the works in accordance with the version of the Minimum Technical Requirements current at the Contract Date.

Appendix 1 – Information Delivery Plan (IDP)

The *Contractor* shall adhere to the Environment Agency's Exchange Information Requirements (EIR) framework level minimum technical requirements.

All *Client* issued information referenced within the Information Delivery Plan (IDP) requires verifying by the *Contractor* unless it is referenced elsewhere within the Scope.

The *Contractor* shall register for an Asite Account and request access to the project workspace to view the IDP and update to create the MIDP.

Guidance on the IDP can be found here

Create the IDP on Asite and embed a PDF version as Appendix 1.

[redacted]

Appendix 2 – Scoping Documents

Name of Site: Whitwood Mere Penstock	**AIMS/Asset number: 215111**

Date of Site Visit: 16/05/2023

Brief Description of Repair Work Required:

To remove and replace an existing penstock to allow for it to be raised when the reservoir fills during a flood embankment to a
River Calder.

This work is required as MEICA have outlined this as a failing asset and they believe by doing nothing will be more costly than

National Grid Reference of Site:	**Post Code:**	**w3w:**
SE41872609	Mickleton - Castleford WF10 1DT	blast.sting.hi

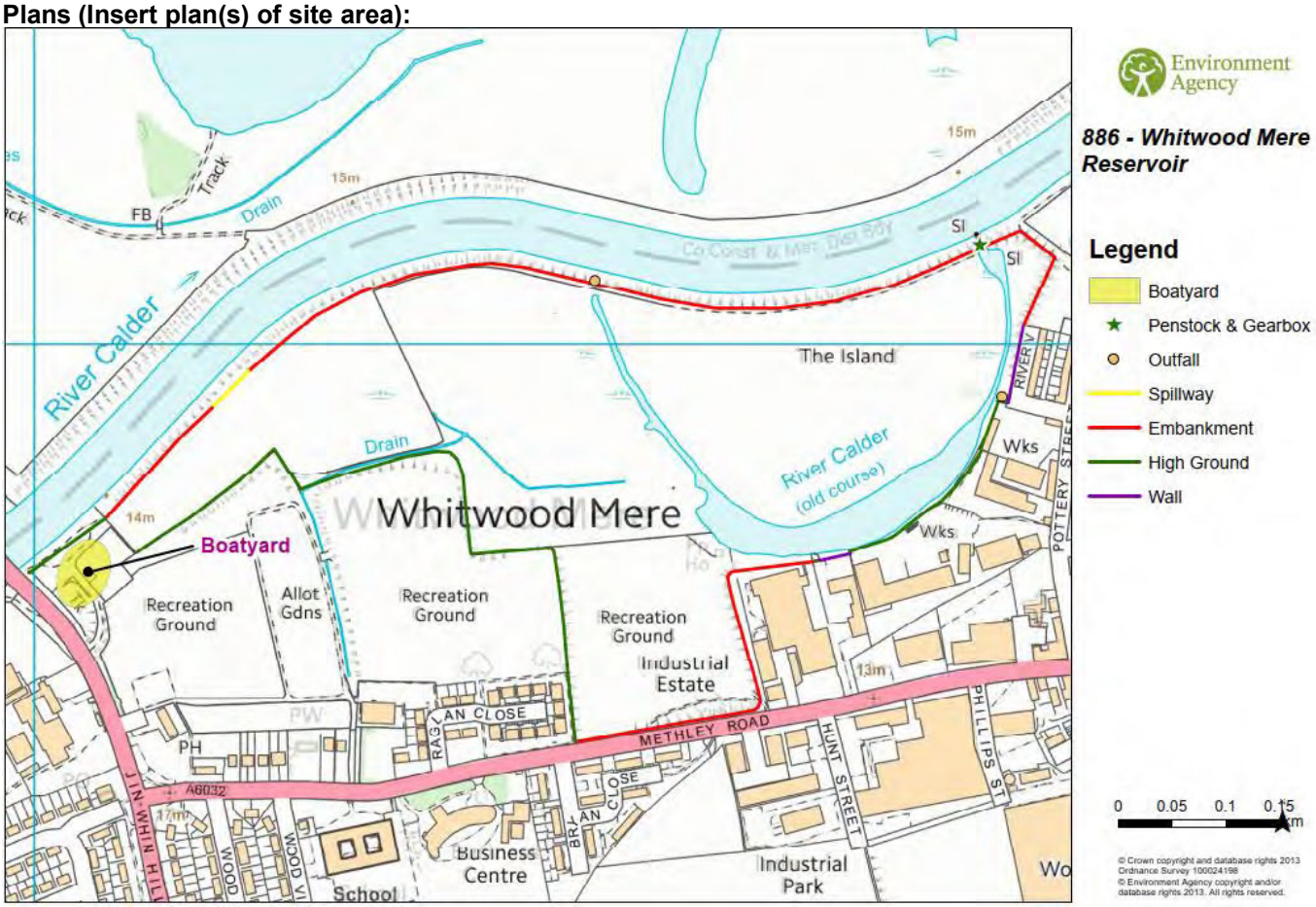
Estimated Duration for Works:

1 week

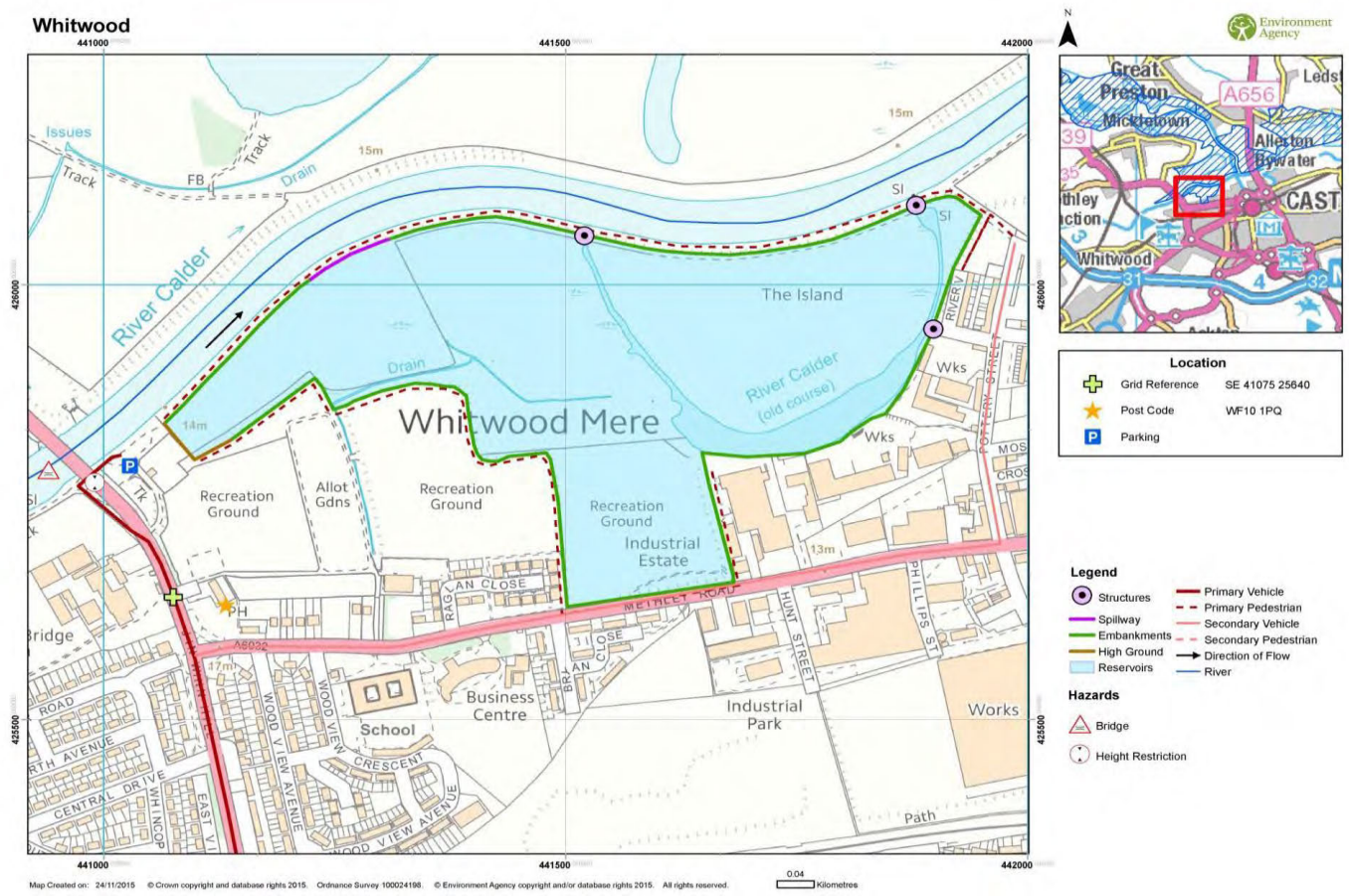
High-Level Cost Estimate (for EA budgeting purposes):

Circa £30k

Plans (Insert plan(s) of site area):



Red outline showing the proposed extent of the works area and access routes.



Plan showing the PROWs (in purple) within the vicinity of the working area.

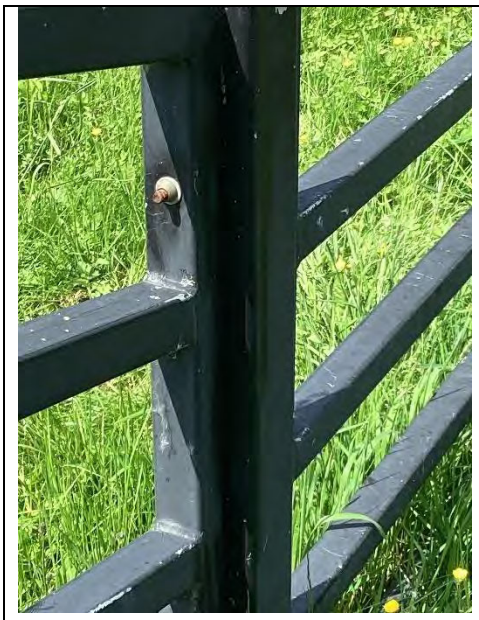
Plan showing proposed location of compound area.

Photographs (include photos of defects /constraints):

P1 – Pedestrian footpath

P2 – Pedestrian footpath

P3 – Antivar
be diverted



P4 – Antivandal bolts on fencing, where public will be diverted

P5 – Unofficial footpath west of the penstock, not shown on PROW

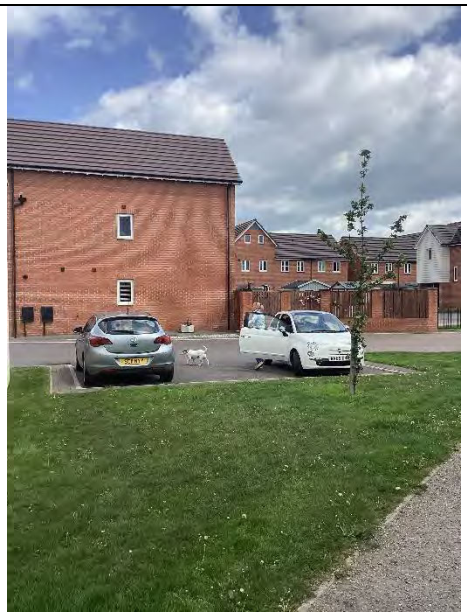
P6 – Existing

P7 – Stagnant water on the dry side of the penstock, back pumping required. Strong odour suggesting it is contaminated.

P8 – Pedestrian footpath looking from the penstock towards the residential estate.

P9 – Pedestr

P10 – Pedestrian footpath, to be used to get plant to lift penstock



P11 – Parking bays in residential estate, could be utilised for welfare van

P12 – Grass
the residenti
penstock in

P11 – Boatyard access track

P12 – Barrier at boatyard access

P13 – Gate
west of the s

Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

The existing penstock and gearbox (NGR: SE4187926093) are in poor cosmetic and mechanical state and have been identifi

Proposed Solution(s):

1. Survey the penstock and fixings, currently in EA depot
2. Place sandbags across the width of the ditch (approx. 9m) to exclude stagnant water.
3. Back pump standing water over the sandbags.
4. Install hardstanding for working platform (stone or track matting if ground isn't too soft).
5. Remove gearbox and penstock with lifting equipment.
6. Drill and fix resin anchors.
7. Install new penstock.
8. Torque all fixings.

9. Remove sandbags and demobilise.

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental

- New penstock already purchased and currently stored in EA depot. Survey required to confirm all fixings are with the
- Asbestos Management Survey for outfall structure.
- PAS128 Type D Report.

Access to works area (including restrictions):

- Access to site is from the east end of the reservoir through the residential estate. Residents to be notified prior to worl

Landowner/Stakeholder/Third Party Consultation Required:

- Access to site is through a residential estate constructed by developer Greenhaven Homes. Residents to be notified p
- The working area is owned by Wakefield City Council so consultation with them will be required to notify them of the v

Consents/Permits Required (including planning permission):

TBC, permit team to be consulted prior to pricing. Possible permits to be considered:

- FRAP

Temporary Works Required:

There are no temporary works requirements.

Environmental Constraints:

Prior to commencing works on site, an ECoW will be required to highlight any possible environmental constraints.

Following the site visit the following environmental constraints may be present:

- Reptiles/ Amphibians
- Badgers

Health & Safety Hazards:

- Proximity of water course. Depending on time of the year the works is carried out, the reservoir may start to fill followi
- Contaminated water/land – Stagnant water appeared to be contaminated on site visit.
- Proximity of overhead service – GS6 survey required to determine safe working clearance. BT overhead lines presen
- Asbestos – Asbestos Management Survey required prior to removal of penstock.

Public access (PROWs, etc.):

The working area form part of a public footpath as shown in the plan section of this document. A footpath diversion onto the w
rather than applying for a footpath closure.

Programme Constraints:

No programme constraints identified.

Carbon Saving Ideas/Opportunities:

None currently identified.

Any Other Comments:

- If it is determined that the penstock is required to guarantee a specified design life, then Bam will have to source a ne
  penstock currently stored in EA depot.

Review (For EA use only):

Present at Site Visit:		
Organisation:	**Name:**	**Contact details:** email, phone
Bam	Peter Wilcox	Peter.wilcox@bam.com 07805397988
Bam	Craig Parish	Craig.parish@bam.com 07824835960
Bam	Joe Moss	Joe.moss@bam.com 07721318995
EA	Tom Blackburn	Tom.Blackburn@environment-agency.gov.uk

Report Acceptance:

EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved:

Name of Site: Fenton Dam Inlet Clearance	**AIMS/Asset number: 384420**

Date of Site Visit: 16/05/2023

Brief Description of Repair Work Required:

Clear channel inlet of any overgrown vegetation and create a channel through silt from the balancing pond to the inlet structure. Clear vegetation / saplings from gabions at outlet side up until the bridge structure, creating a clear path for flow. Remove any vegetation that may be encroaching the outlet channel.

National Grid Reference of Site:	**Postcode:**	**w3w:**
SE3192421792	Tingley - Wakefield WF2 0SB	fake.caged.verifying

Estimated Duration for Works:

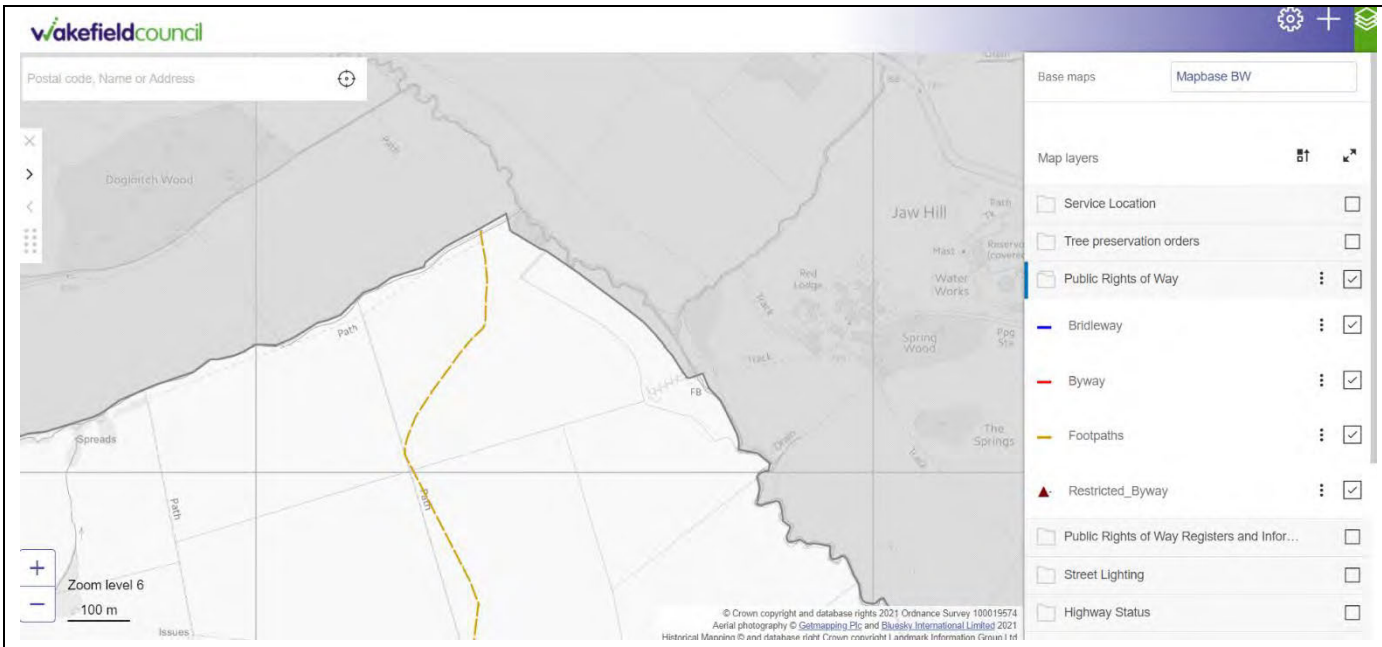
2 weeks

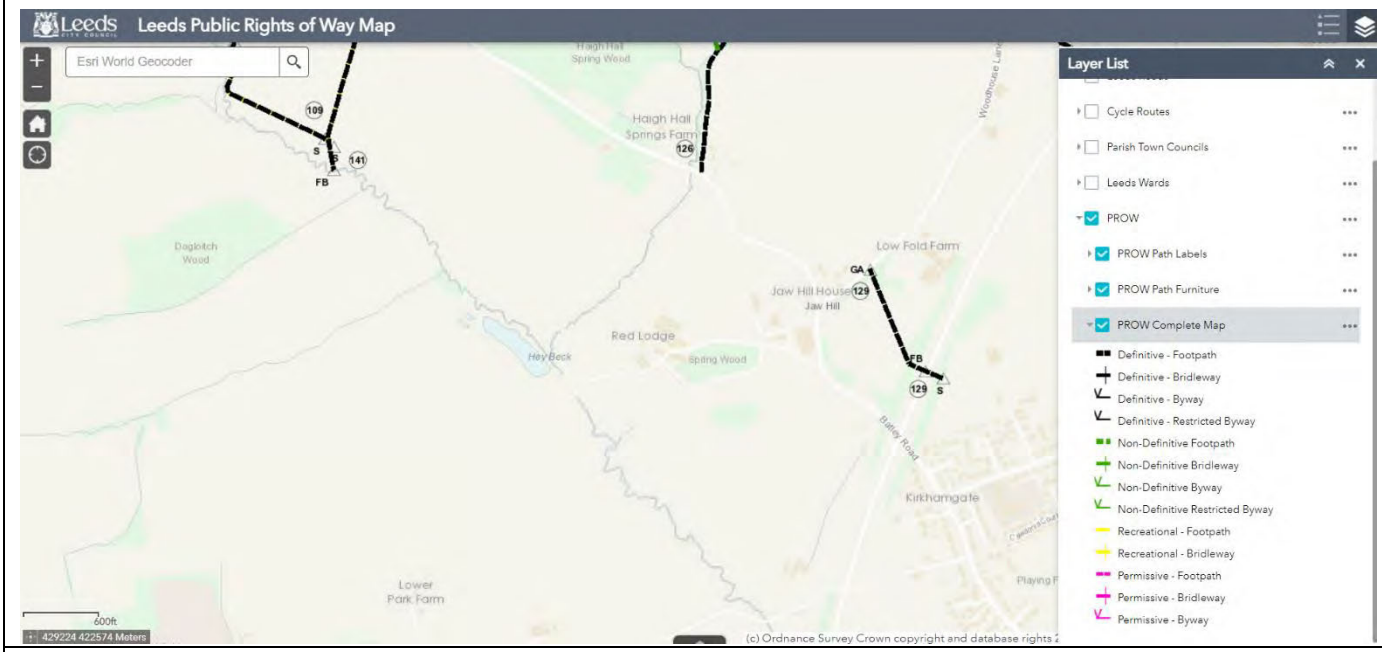
High-Level Cost Estimate (for EA budgeting purposes):

Circa £30k

Plans (Insert plan(s) of site area):

Red outline showing the proposed extent of the works area and access routes.





Plan showing the PROWs within the vicinity of the working area.

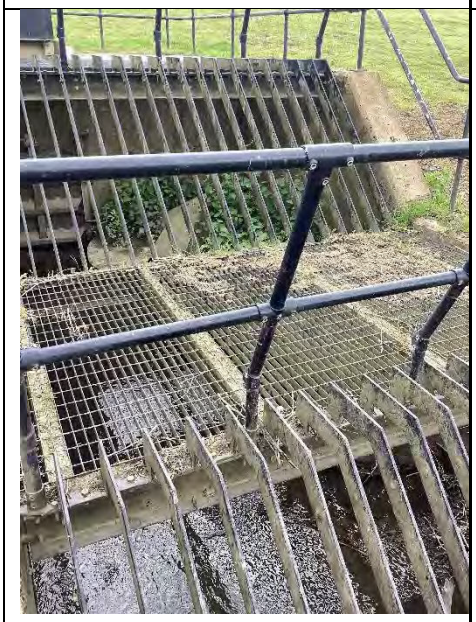
Plan showing proposed location of compound area.

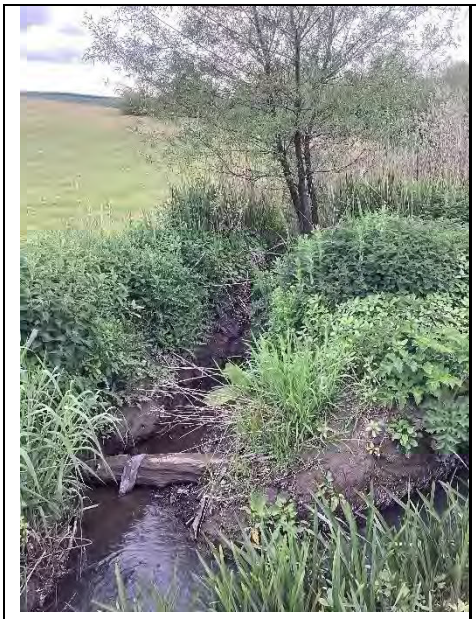
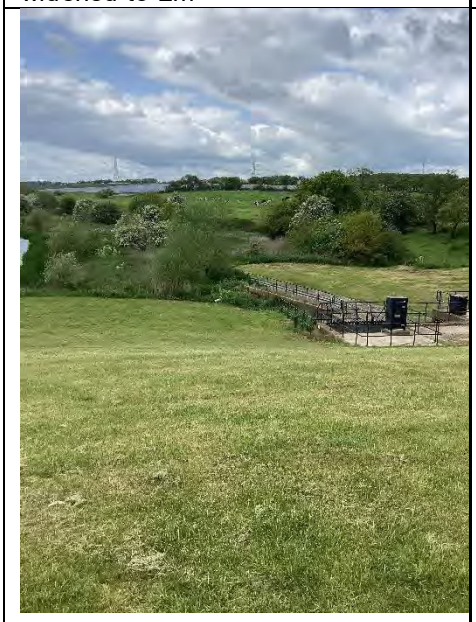
Photographs (include photos of defects /constraints):

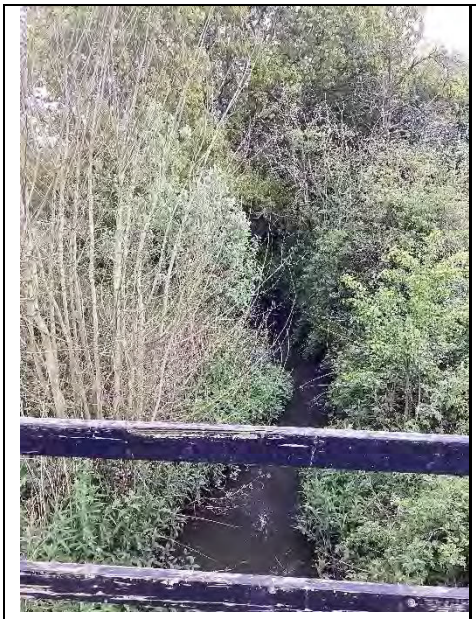
P1 – Access track

P2 – Access Track

P3 – Access Track

		
P4 – Car park at start of access track	P5 – Silt build and vegetation growth to be removed, including inside structure	P6 - Silt build and vegetation growth to be removed up to the end of the legato blocks
		
P7 – Vegetation growth inside the trash screen	P8 – Existing ground adjacent to the inlet	P9 – Silt build up and vegetation growth looking back towards the inlet

		
P10 – Channel to the pond to be widened to 2m	P11 – Channel to the pond to be widened to 2m	P12 – Himalayan Balsam observed around structure
		
P13 – Inlet	P14 – Outlet	P15 – Vegetation in the channel to be removed and trees on the edge to be cut down to the mature tree line past the bridge

		
P16 – Additional trees in the channel past the bridge to be cleared		

Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

There is no damage to this asset. The purpose of this scheme is to clear any growing vegetation and remove silt build up to prevent any blockages occurring.

Proposed Solution(s):

Inlet

1. Clear vegetation and silt from inlet structure to end of legato wall (Approx. 25m).
2. Excavate channel to 2m wide to the pond (Approx. 20m).
3. Install silt traps in 2m wide channel to reduce future silt build up.
4. Testing and disposal of excavated material.

Outlet

5. Clear vegetation from outlet to dense tree line, inclusive trees and brash on gabion baskets.
6. Inject roots growing through gabion baskets to prevent future growth.
7. Clear silt in the channel of the outlet.
8. Testing and disposal of excavated material.

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental):

- Environmental survey to determine full extents of Himalayan Balsam at the inlet

Access to works area (including restrictions):

- Access to site is off Batley Road and along a private owned access track through Red Lodge Farm.

Landowner/Stakeholder/Third Party Consultation Required:

- The primary landowner of the reservoir is the Environment Agency, so no consultation is required.
- Access off Batley Road is along the private access so consultation will be required with the landowner.

Consents/Permits Required (including planning permission):
TBC, permit team to be consulted prior to pricing.

Temporary Works Required:
There are no temporary works requirements.

Environmental Constraints:

Prior to commencing works on site, an ECoW will be required to highlight any possible environmental constraints.

Following the site visit the following environmental constraints may be present:

- Reptiles/ Amphibians
- Badgers
- Great Crested Newts
- Invasive non-native species (Himalayan Balsam present on site visit)

Magic Map Excerpt

Health & Safety Hazards:

- Proximity of water course. Depending on time of the year the works is carried out, the reservoir may start to fill following heavy rainfall.

Public access (PROWs, etc.):
The working area does not form part of a public footpath as shown in the plan section of this document.

Programme Constraints:

Himalayan Balsam present, if in seed works will be delayed.

Carbon Saving Ideas/Opportunities:
None currently identified.

Any Other Comments:

- Silt likely to be contaminated. WAC Testing and WM3 testing to be carried out prior to disposal.

Review (For EA use only):

Present at Site Visit:

Organisation:	**Name:**	**Contact details:** email, phone
Bam	Peter Wilcox	Peter.wilcox@bam.com 07805397988
Bam	Craig Parish	Craig.parish@bam.com 07824835960
Bam	Joe Moss	Joe.moss@bam.com 07721318995
EA	Tom Blackburn	Tom.Blackburn@environment-agency.gov.uk

Report Acceptance:

EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	**Issue Date:**	**Issue Purpose:**	**Author: (checker)**	**Checked:**	**Approved:**

Name of Site: East Ings Low Spots (001 to 005) and Woodholme Embankment Works (006)	**AIMS/Asset number: 541707/170711**

Date of Site Visit: 22/05/2023

Brief Description of Repair Work Required:

Repair bare patches by placing a reasonable depth of new topsoil and grass seeding at locations shown on plan below (001/002/003 541707 **NGR:** SE5165724504 / SE5179824471 / SE5192624434).

Topographical survey due to potential low spot close to boundary fence along the embankment shown on Plan 1. If low top up to the appropriate level whilst maintaining embankment geometry (004/541707 **NGR:** SE5210924355).

Replace poorly constructed fence with appropriate fence/gate to allow for maintenance (005/541707 **NGR:** SE5220724414)

Replace section of fencing to allow for easy maintenance. Install hard standing to make embankment crest resilient to damage from animal encroachment (006/170711 **NGR:** SE5268825262).

Works are required to repair and maintain crucial assets that provide flood defence to nearby residents and stop assets falling into condition grade 5.

National Grid Reference of Site:	**Postcode:**	**w3w:**
SE5210924355/ SE5268825262 (see plan for location of repairs)	Knottingley, WF118DL Beal, DN140ST	chitchat.flasks.classic hypocrite.elephant.thigh

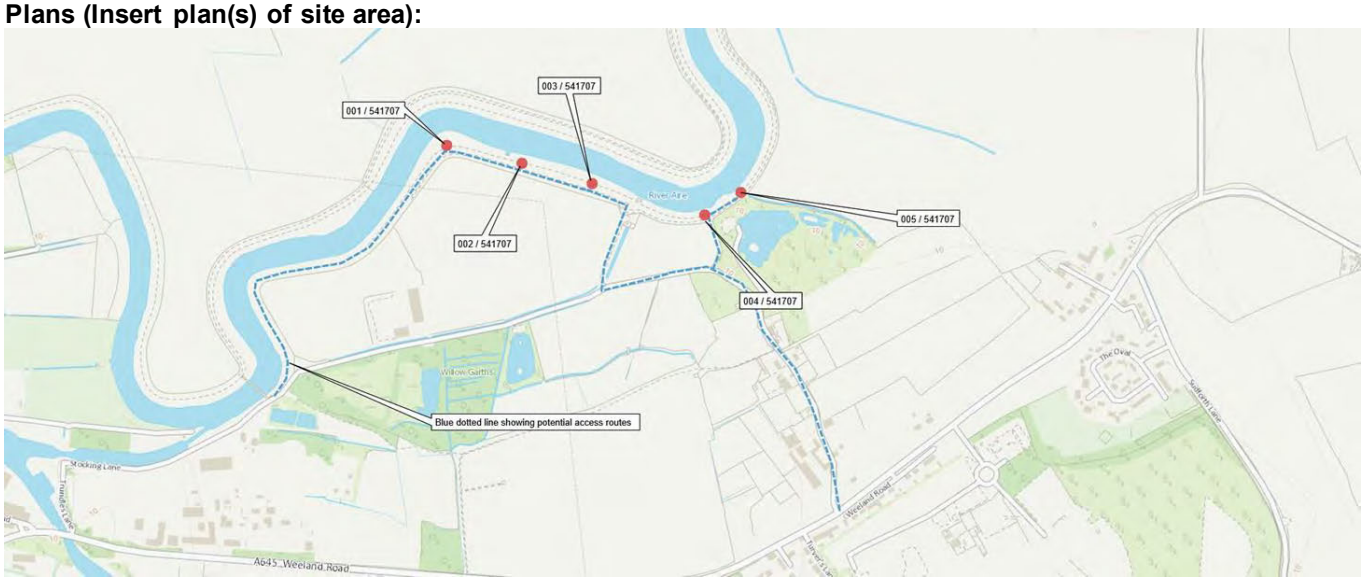
Estimated Duration for Works:

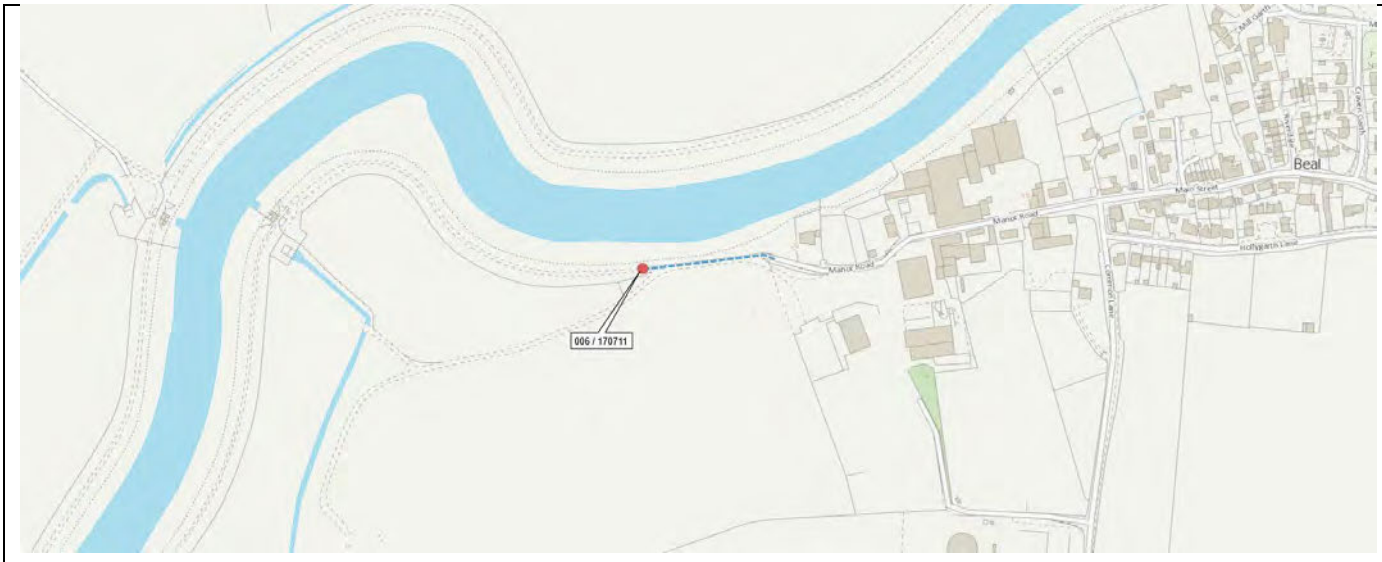
2 weeks

High-Level Cost Estimate (for EA budgeting purposes):

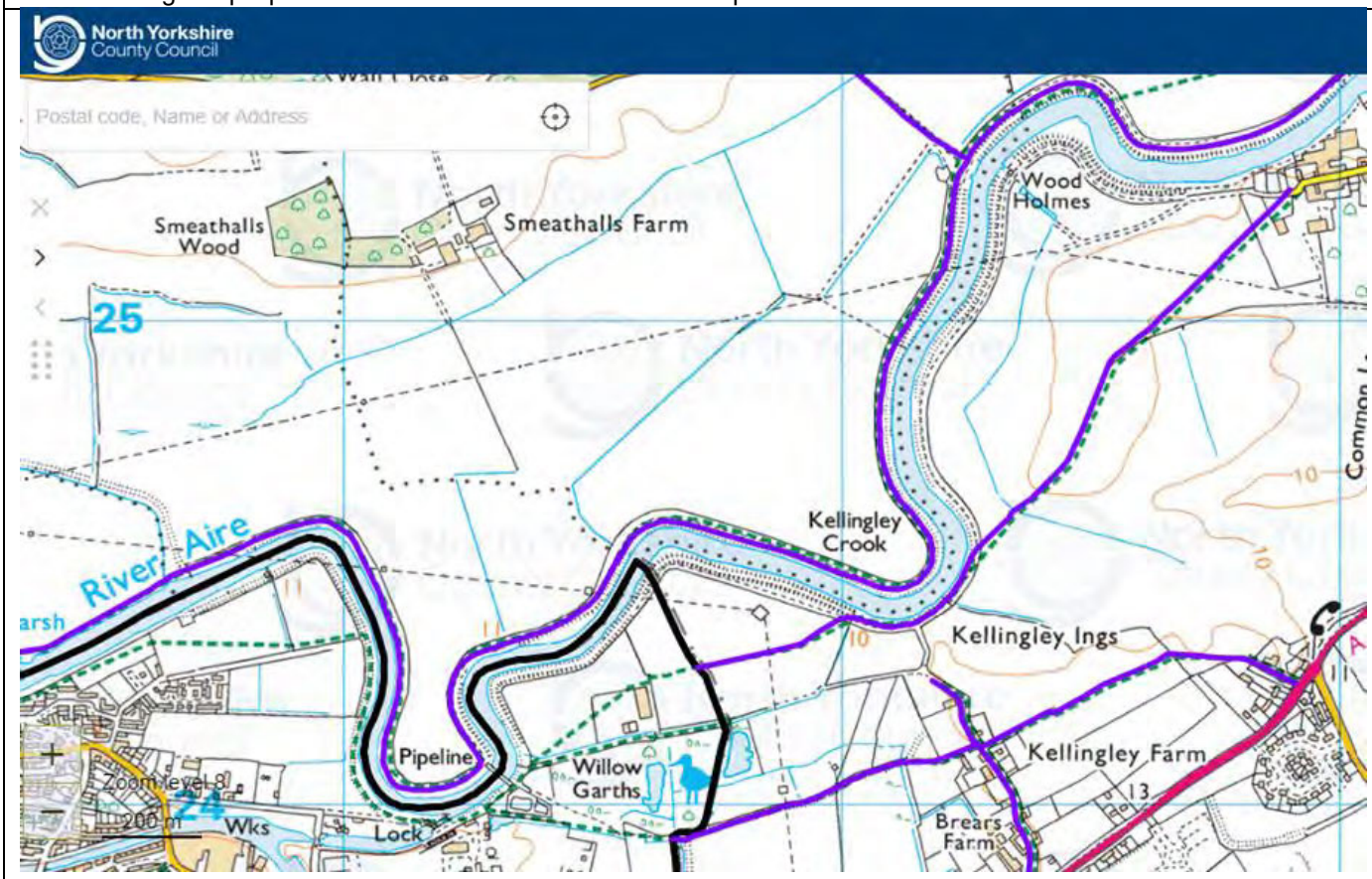
Circa £35k

Plans (Insert plan(s) of site area):





Plan showing the proposed locations of the work areas and possible access routes shown in blue.



Plan showing the PROWs (in purple) within the vicinity of the working area.

Proposed position of welfare facilities for repairs 001 to 005.

Proposed position of welfare facilities for repairs 006.

Plan showing proposed location of compound area.

Photographs (include photos of defects /constraints):

		
P1 – Typical low spot (001/004)	P2 – Typical low spot (001/004)	P3 – Typical low spot (001/004)
		
P4 – Poor condition of fencing (005)	P5 – Poor condition of fencing (005)	P6 – Poor condition of fencing and damage to embankment crest (006)

Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

001, 002 & 003 – Bare patches along embankment crest. Topsoil to be placed and seeded. Full extents unknown due to being unable to access the work area as it was heavy vegetated on the site visit.

004 – Topographical survey to determine if this section of embankment is low and low spot top up repair to be carried out if deemed to be below flood defence level.

005 – Existing fencing damaged and blocked off with concrete block preventing access for maintenance team. Remove and replace with new robust fence and gate with pedestrian stile.

006 – Damage to embankment crest either side of existing fencing due to livestock. Remove and replace existing fencing for easier maintenance. Remove existing bodpave and install hardstanding.

The existing embankment is made up of shale and capped off with topsoil.

Proposed Solution(s):

Low Spot Top Up – 001, 002, 003, 004

1. Strimming of grass along the crest of the flood embankment unless carried out by EA field team prior to works commencing.
2. Topographical survey to determine full extents of the repair.
3. For topping up less than 100mm, place topsoil on top of existing, allowing for 50mm of settlement and re-seed.
4. For topping up greater than 100mm:
    a. Remove existing topsoil.
    b. Place and compact 2C in layers as per the Specification for Highway Works.
    c. Place topsoil on top of 2C fill, allowing for 50mm of settlement.
    d. Rake and seed topsoil.

Fencing/Gate Replacement – 005/006

1. Strimming of grass up and over the embankment either side of the existing fence line unless carried out by EA field team prior to works commencing.
2. Clear debris and remove existing fencing.
3. Installation of new robust fencing with vehicle access gate along the crest and pedestrian stile. *Note:* Pedestrian stile only required for site 005.

Construction of hardstanding – 006

1. Remove existing bop paving.
2. Excavate 300mm of topsoil/embankment fill.
3. Place geotextile on formation.
4. Place and compact 300mm of type 1 stone as per Specification for Highway Works.
5. Install 75x75mm timber posts at 1.5m centres around the perimeter and postcrete.
6. Fix lengths of 4x2 timber to the timber posts using flat connecting jointing plate
7. Install bodpave and fill using 10mm stone.

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental):

- Topographical Survey to determine full extents of low spot top up
- PAS 128 type A, B and D report

Access to works area (including restrictions):
Access via Stocking Lane, off A645 Weeland Road, WF11 8DL (for 001 to 005). Alternative access to 006 via Manor Road, off Common Lane, DN140ST

Landowner/Stakeholder/Third Party Consultation Required:

- Consolation with landowners to permit access.

Consents/Permits Required (including planning permission):
TBC, permit team to be consulted prior to pricing.

Temporary Works Required:
There are no temporary works requirements.

Environmental Constraints:

Prior to commencing works on site, an ECoW will be required to highlight any possible environmental constraints.

Following the site visit the following environmental constraints may be present:

- Reptiles/amphibians
- Otters
- Badgers
- Invasive non-native species
- Great Crested Newts

Magic Map Excerpt

Health & Safety Hazards:

- Working adjacent to a watercourse. Depending on time of the year the works is carried out, the reservoir may start to fill following heavy rainfall.
- Buried services.
- Livestock – embankment grazed by cattle and sheep.
- Public Interface - Western side of embankment is within Hostile Site 1042 (General location of Hostile Site SE5133824132). The area has a history of firearms and policeable activity.

Public access (PROWs, etc.): The access along the embankment form part of a PROW and Bridleway as shown in the plan section of this document, therefore a PROW closure will be required. Existing fence is blocking PROW/Bridleway.
Programme Constraints: No programme constraints identified.
Carbon Saving Ideas/Opportunities: None currently identified.
Any Other Comments: • If it is determined that the embankment and fence repairs is required to guarantee a specified design life, then this needs to be included in the scope.
Review (For EA use only):

Present at Site Visit:		
Organisation:	**Name:**	**Contact details:** email, phone
Bam	Peter Wilcox	Peter.wilcox@bam.com 07805397988
Bam	Craig Parish	Craig.parish@bam.com 07824835960
Bam	Joe Moss	Joe.moss@bam.com 07721318995
EA	Andy Casson	Andy.Casson@environment-agency.gov.uk 07775010885
EA	Connor Wiseman	Connor.Wiseman@environment-agency.gov.uk

Report Acceptance:

EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved:

Name of Site: Aire Street Flood Wall Access	**AIMS/Asset number: 27185**
Date of Site Visit: 22/05/2023	
Brief Description of Repair Work Required: Aire Street flood wall access provision. The access point is for equipment to ride on to the wet side of the embankment (to the river Aire) to mow the grass. Anticipated maintenance equipment for use is either a 2.4m wide flail mower or a 1.5m wide robot mower.	

National Grid Reference of Site:	**Postcode:**	**w3w:**
SE 50326 24181	Knottingley, WF119AY	supreme.rotations.tastings

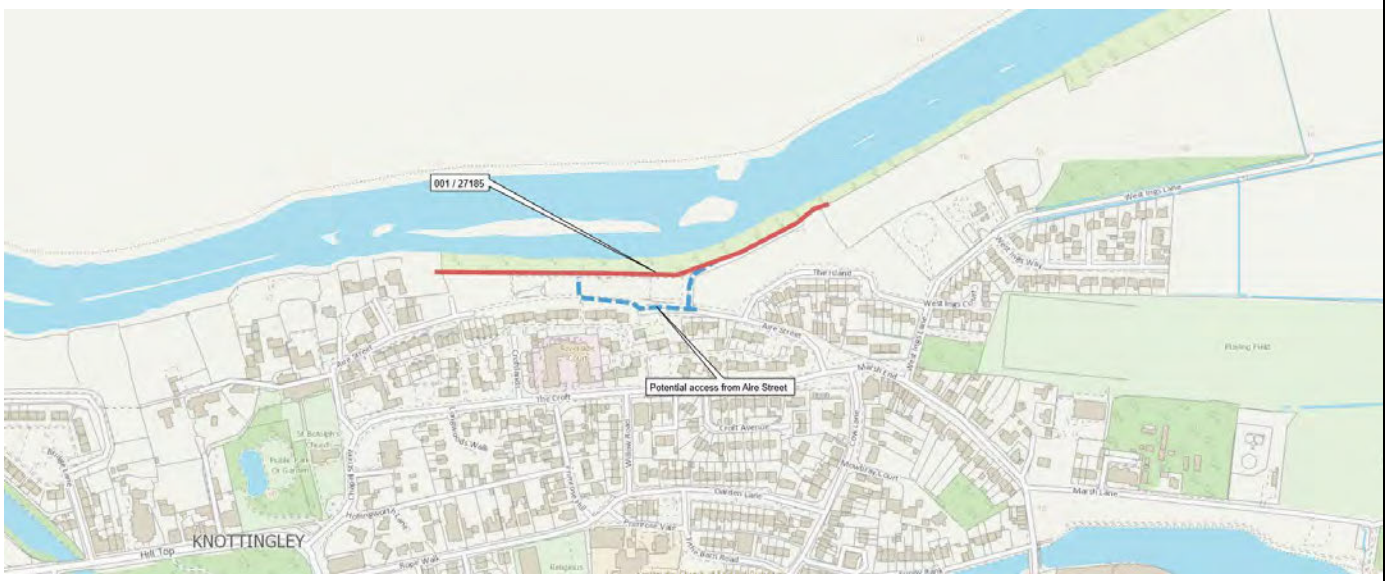
Estimated Duration for Works:

1 week

High-Level Cost Estimate (for EA budgeting purposes):

Circa £35k

Plans (Insert plan(s) of site area):

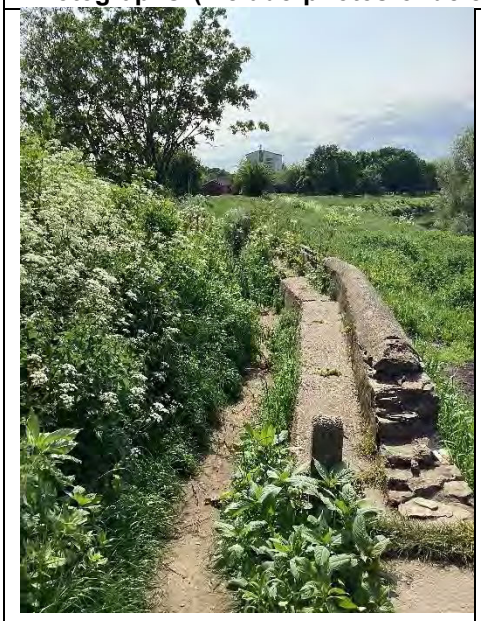


Plan showing the proposed locations of the work areas and possible access routes shown in blue.

Plan showing the PROWs (in purple) within the vicinity of the working area.

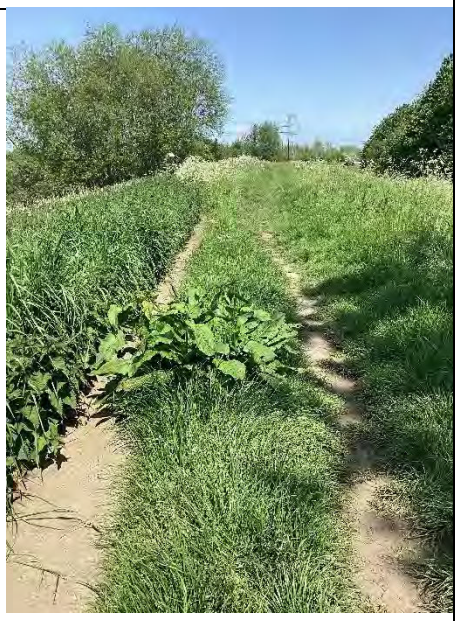
Plan showing proposed location of compound area.

Photographs (include photos of defects /constraints):



P1 – Existing access track (Looking west)

P2 – Signage in vegetation on left side of access track



P3 – Access track (looking east), existing flood wall covered by vegetation on left-hand side of the picture

		
P4 – Wet side of flood wall with proposed access point highlighted		

Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

There is no damage to this asset. The purpose of this scheme is to construct a ramp to allow for maintenance equipment to access the wet side of the existing flood wall.

Proposed Solution(s):

1. Clear vegetation adjacent to the existing access track, approx. 30m. Stumping grinding required.
2. Place and compact type 1 stone in layers on the dry side access track to the same level of the flood wall (300mm depth).
3. Strip topsoil on wet side of flood wall.
4. Place and compact type one in layers to smooth existing profile to allow for maintenance equipment to access.
5. Install post and rail fencing adjacent to access track where de-vegetation has been carried out.

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental):

- PAS 128 type A, B and D report

Access to works area (including restrictions):
Access via Aire Street, Knottingley, WF119AY, through a locked EA gate.

Landowner/Stakeholder/Third Party Consultation Required:

- Consolation with landowners in the local area to make them aware of the works being carried out.
- Consultation with landowner, possibly owned by the local council – EA to confirm.

Consents/Permits Required (including planning permission):
TBC, permit team to be consulted prior to pricing.

Temporary Works Required:
There are no temporary works requirements.

Environmental Constraints:

Prior to commencing works on site, an ECoW will be required to highlight any possible environmental constraints.

Following the site visit the following environmental constraints may be present:

- Reptiles/amphibians
- Otters
- Badgers
- Invasive non-native species
- Nesting Birds
- Bats

Health & Safety Hazards: • Working adjacent to a watercourse. • Buried services • Public Interface
Public access (PROWs, etc.): The working area and access don't form part of a PROW.
Programme Constraints: No programme constraints identified.
Carbon Saving Ideas/Opportunities: None currently identified.
Any Other Comments: • If it is determined that the access ramp is required to guarantee a specified design life, then this needs to be included in the scope.
Review (For EA use only):

Present at Site Visit:		
Organisation:	**Name:**	**Contact details:** email, phone
Bam	Peter Wilcox	Peter.wilcox@bam.com 07805397988
Bam	Craig Parish	Craig.parish@bam.com 07824835960
Bam	Joe Moss	Joe.moss@bam.com 07721318995
EA	Andy Casson	Andy.Casson@environment-agency.gov.uk 07775010885
EA	Connor Wiseman	Connor.Wiseman@environment-agency.gov.uk

Report Acceptance:

EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved:

Name of Site: Castleford Floodwall, Barnsdale Lock	**AIMS/Asset number: 001 & 002/410178**

Date of Site Visit: 22/05/2023

Brief Description of Repair Work Required:

The works required are to the undertake vegetation clearance, repair spawling masonry and repair damaged mortar where required.

Works are required to repair and maintain crucial assets that provide flood defence to nearby residents and stop assets falling into condition grade 5.

National Grid Reference of Site:	**Postcode:**	**w3w:**
SE4257126296 (001) SE4261526319 (002)	Castleford, WF10 2LN	salon.honey.race (001) range.dine.crest (002)

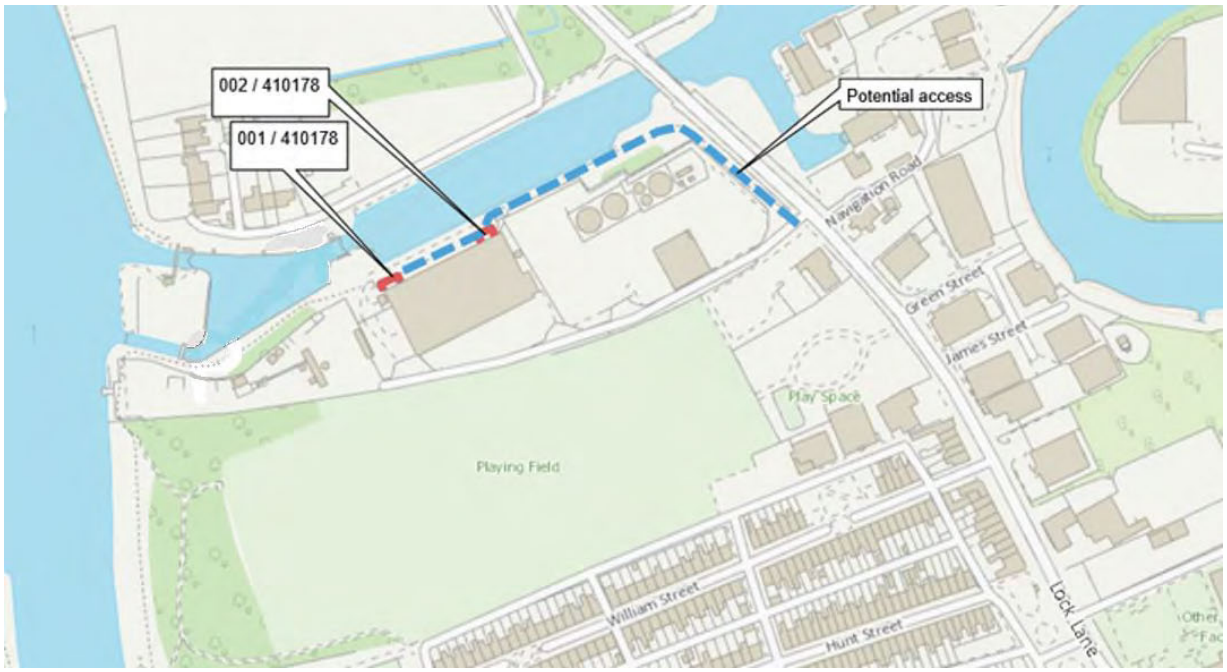
Estimated Duration for Works:

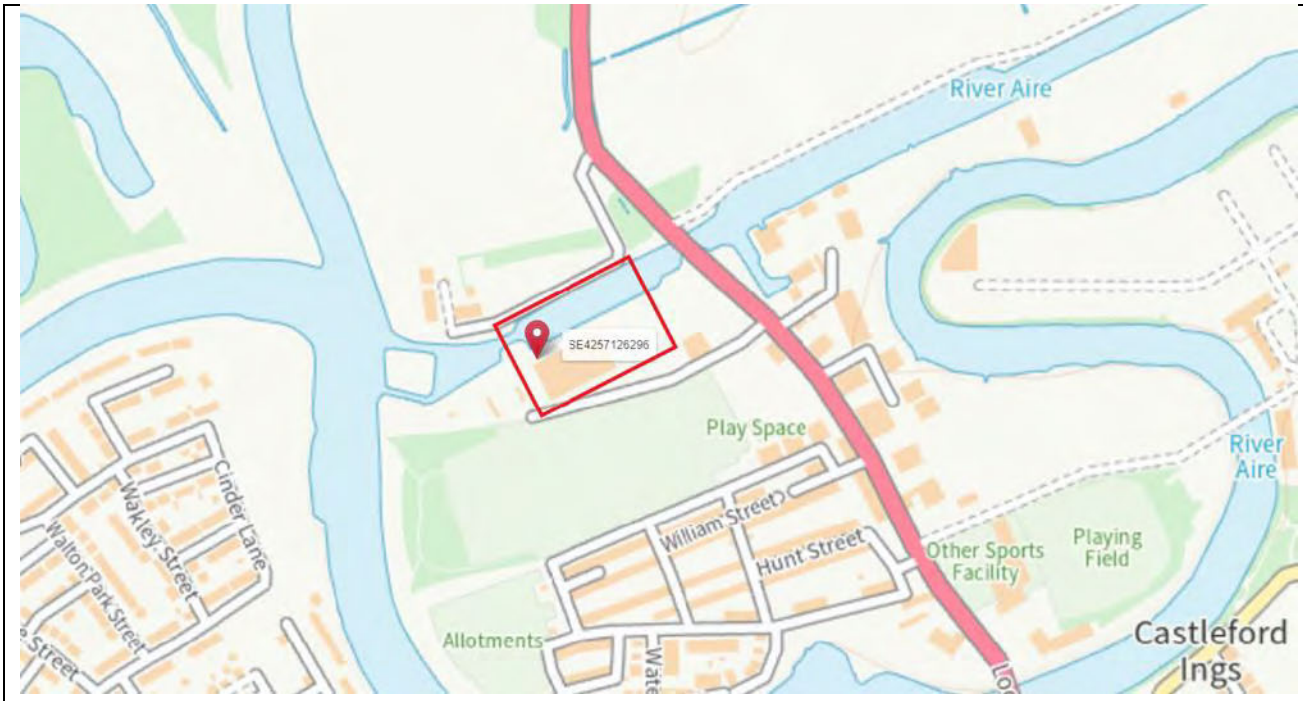
3 weeks

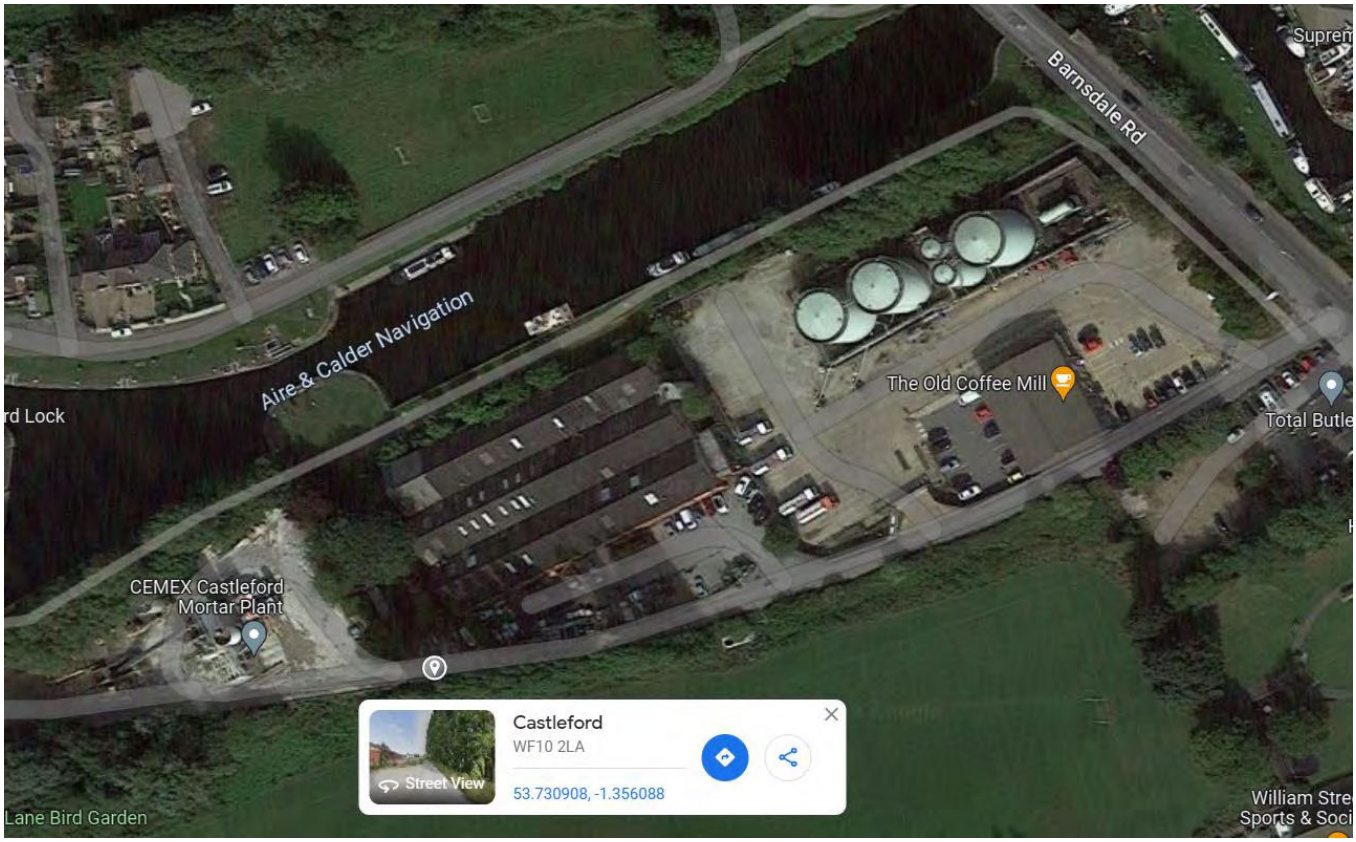
High-Level Cost Estimate (for EA budgeting purposes):

Circa £70k

Plans (Insert plan(s) of site area):





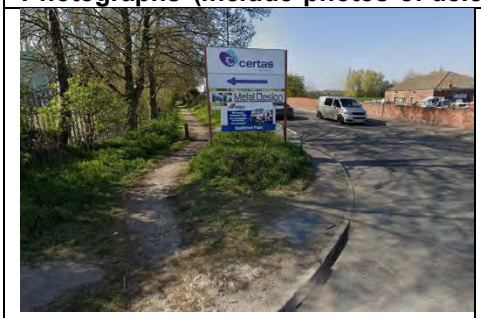


Plan showing the proposed location of the work area with possible access route shown in blue, secondary access for vehicles via access track off Barnsdale Road.

Plan showing the PROWs (in purple) within the vicinity of the working area.

Plan showing proposed location of compound area.

Photographs (include photos of defects /constraints):



P1 – Limited width access track off Barnsdale Road

P2 – Flood Wall (001)

P3 – Flood Wall (001)

P4 – Cracking up building behind the existing flood wall

P5 – Section of wall to be left in situ (Ramp/embankment crest acts as flood defence)

P6 – Tarmac crest acting as flood defence tying into the flood wall and embankment

P7 – Example of spalling bricks and failed movement joints

P8 – Spalled brick work

P9 – Spalled bricks and dislodged coping

P10 – Flood Wall (002)	P11 – Missing coping, with flap valve visible	P12 – Inside of flood wall where flap valve is visible
		
P13 – Condition of new flood wall	**P14 – Vehicle access route**	**P15 – Vehicle access route**
		
P16 – Working area owned by Canal & River Trust		

Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

The brickwork walls are typically 400mm – 600m in height, above ground level, approximately 300mm in thickness and a combined length of 24m. The wall is topped with copings.

Damage to coping stones, and poor condition of bricks along the wall in various places, spalled bricks and dislodging. Some coping stones missing.

Failed movement joints along the wall.

East Wall (002) flap valve present which is no longer functional

Vegetation ingress: trees and weeds growing up against and behind the wall.

Proposed Solution(s):

1. Clear vegetation around walls and trim back trees to create working space.
2. Place sandbags in front of doorways to act as temporary flood defence.
3. Demolish existing walls and construct new to the same footprint and height of the existing wall using a smooth faced engineering brick and cap off with a coping stone.
4. Movement joints to be placed at the same intervals as the existing wall using compressible filled board and sealant (such as Sika Pro 3).
5. Flap valve to be installed in East Wall (002). Flap valve may be required to be installed on West Wall as it was heavily vegetated during site inspection so possibly present and not seen.
6. Fix existing handrail to steps.

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental):

None to note.

Access to works area (including restrictions):
Access via Barnsdale Lock off Barnsdale Road/Lock Lane, WF102LN (pedestrian access only)

Vehicle access may be possible through the industrial yard providing access is agreed with landowner (Lock Lane, WF10 2LA). MG Metal Design may be the landowners of this area.

Landowner/Stakeholder/Third Party Consultation Required:

- Consolation with Canal & River Trust to permit access for the works.
- Consultation with adjoining industrial building (MG Metal Design, Lock Lane, WF10 2LA)
- Liaise with Barnsdale Lock to grant permission for the works.

Consents/Permits Required (including planning permission):
TBC, permit team to be consulted prior to pricing.

Temporary Works Required:
There are no temporary works requirements.

Environmental Constraints:

Prior to commencing works on site, an ECoW will be required to highlight any possible environmental constraints.

Following the site visit the following environmental constraints may be present:

- Reptiles/amphibians
- Otters
- Badgers
- Nesting Birds
- Bats

Magic Map Excerpt

Health & Safety Hazards:

- Working adjacent to a watercourse
- Public Interface
- Hazardous materials (COSHH)
- Manual Handling

Public access (PROWs, etc.): Access required for users of the Aire & Calder Navigation. Fencing to be installed around working areas to prevent closure of this access.
Programme Constraints: No programme constraints identified.
Carbon Saving Ideas/Opportunities: None currently identified.
Any Other Comments: • If it is determined that the new flood wall is required to guarantee a specified design life, then this needs to be included in the scope.
Review (For EA use only):

Present at Site Visit:		
Organisation:	**Name:**	**Contact details:** email, phone
Bam	Peter Wilcox	Peter.wilcox@bam.com 07805397988
Bam	Craig Parish	Craig.parish@bam.com 07824835960
Bam	Joe Moss	Joe.moss@bam.com 07721318995
EA	Andy Casson	Andy.Casson@environment-agency.gov.uk 07775010885
EA	Connor Wiseman	Connor.Wiseman@environment-agency.gov.uk

Report Acceptance:

EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved:

Name of Site: Chapel Haddlesey Flood Walls	**AIMS/Asset number: 50760**

Date of Site Visit: 22/05/2023

Brief Description of Repair Work Required:

Defects have been identified along the flood wall at Chapel Haddlesey including movement, fracturing along the mortar and damage to the expansion joints. It is suspected that this damage is being caused due to the presence of vegetation along the wall.

Replacement of all defective joints within floodwall. Remove existing failed filler board, sealant and clear out any vegetation established within joints and replace.
Clear debris at eastern end of wall to check wall tie-in point with embankment. Carry out repairs to embankment if required.
Carry out general brick replacements where required and reseat courses where lifting and movement has occurred.

National Grid Reference of Site:	**Postcode:**	**w3w:**
SE 57676 26278	Chapel Haddlesey - Eggborough YO8 8QF	shallower.kinds.airbrush

Estimated Duration for Works:

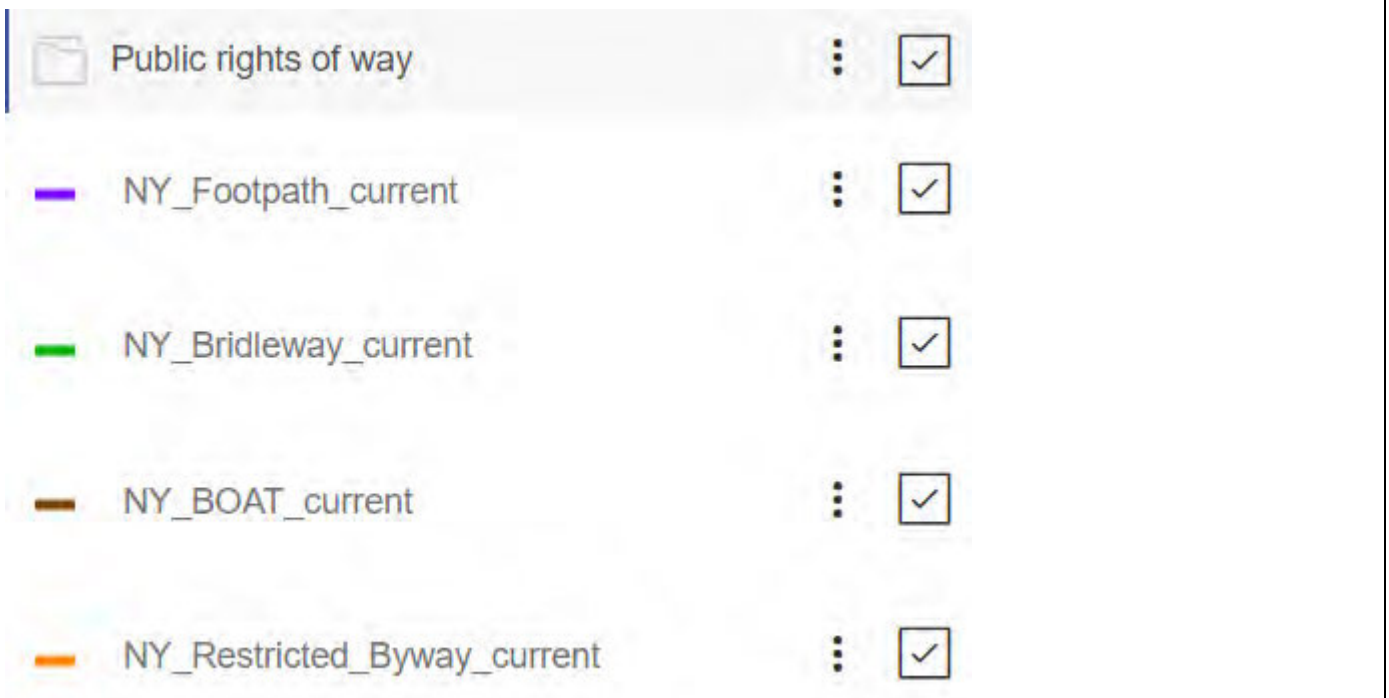
1 week

High-Level Cost Estimate (for EA budgeting purposes):

Circa £35k

Plans (Insert plan(s) of site area):

Red outline showing the proposed extent of the works area and access routes.

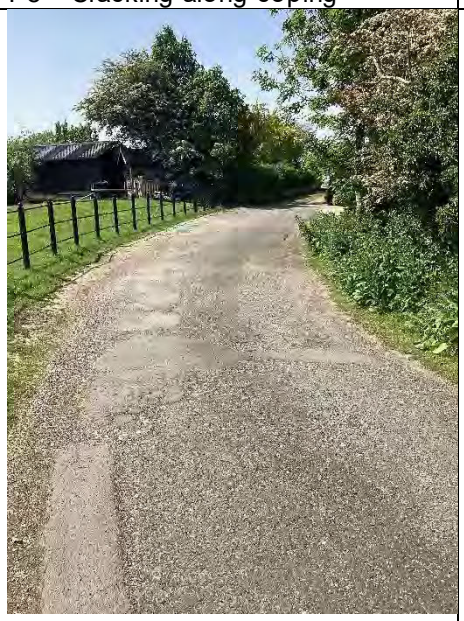


Plan showing the PROWs (in purple) within the vicinity of the working area.

Plan showing proposed location of compound area.

Photographs (include photos of defects /constraints):

		
P1 – Vegetation covering face of wall at eastern end	P2 – Debris covering wall where it ties into the embankment	P3 – Condition of movement joints
		
P4 – Condition of movement joints	P5 – Condition of movement joints	P6 – Cracking along coping

		
P7 – Cracking along coping	P8 – Cracking along coping	P9 – Cracking along coping
		
P10 – Access Road	P11 – Access Road	

Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

Movement joints along the wall have started to fail.

Cracking along the coping joint visible for approx. 30m in total.

Unknown wall condition of the top and wet side of the wall due to the vegetation and at the eastern end due to debris being placed in front of the wall inside the privately owned land.

Proposed Solution(s):

1. Remove vegetation along full length of the wall to allow for a more detailed inspection.
2. Clear debris at the tie in point between the wall and embankment at the easter end.
3. Grind out failed mortar and repoint for 30m of coping.
4. Rake out existing filler board and sealant on movement joints and replace.

5. Undertake general brick repair – reseating of courses and replacing any badly spalled bricks.
6. Install timber fencing along length of flood wall (55m) to replace existing hedgerow (to be agreed with residents).

Or visual survey by competent persons. The landowner is unlikely to allow the above solution

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental):

- Inspection of the wall falling vegetation clearance and removal of debris to assess the full extents of the damage.

Access to works area (including restrictions):
Access to the working area along Millfield Road of the A19 as outlined in the plans section of this report.

Landowner/Stakeholder/Third Party Consultation Required:

- Consolation with landowners to permit access to the wet side of the flood wall and at the eastern end where the wall ties into the flood embankment as it is situated on private property.
- Consultation with landowners to agree to the removal of the hedge and replace with timber fencing.

Consents/Permits Required (including planning permission):
TBC, permit team to be consulted prior to pricing.

- FRAP exemption likely to be obtained

Temporary Works Required:
There are no temporary works requirements.

Environmental Constraints:

Prior to commencing works on site, an ECoW will be required to highlight any possible environmental constraints.

Following the site visit the following environmental constraints may be present:

- Nesting Birds

Health & Safety Hazards:

- Hazardous materials (COSHH)
- Public Interface

Public access (PROWs, etc.):
Access for the residents of properties along the unnamed access track required.

Programme Constraints:
No programme constraints identified.

Carbon Saving Ideas/Opportunities:
None currently identified.

Any Other Comments:

- If it is determined that the existing flood wall is required to guarantee a specified design life, then this needs to be included in the scope.

Review (For EA use only):

Present at Site Visit:

Organisation:	Name:	Contact details: email, phone
Bam	Peter Wilcox	Peter.wilcox@bam.com 07805397988
Bam	Craig Parish	Craig.parish@bam.com 07824835960
Bam	Joe Moss	Joe.moss@bam.com 07721318995
EA	Andy Casson	Andy.Casson@environment-agency.gov.uk 07775010885
EA	Connor Wiseman	Connor.Wiseman@environment-agency.gov.uk

Report Acceptance:

EA Senior User:	Signature:	Date:

EA Project Manager	Signature:	Date:

Revision:

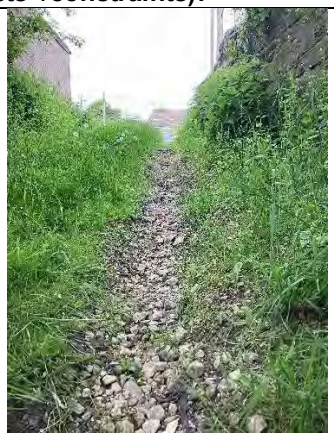
Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved:

Name of Site: Old School Lane – Access Track	**AIMS/Asset number:** 745881	
Date of Site Visit: 19/05/2023		
Brief Description of Repair Work Required: Current access track has began to wash away after heavy rain fall, requires hard standing access track to be installed to allow less maintenance.		
National Grid Reference of Site: SK 42724 88665	**Postcode:** S60 5SP	**w3w:** glove.mops.toast
Estimated Duration for Works: 2 weeks		
High-Level Cost Estimate (for EA budgeting purposes): **Circa £45k**		
Plans (Insert plan(s) of site area):		

Red outline showing the proposed extent of the works area and in purple PROWs (Based on OS plan)

Plan showing the proposed works

Photographs (include photos of defects /constraints):



Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

The current access track is built up of tarmac for 4m then a granular material access track. During times of heavy rainwater comes down the hill and down the access track where it filters into the river. Due to the steepness of the hill this washes away the granular road creating channels in the track.

Proposed Solution(s):

To prevent the access washing away in future flood events a hard standing ramp down to the access track is required, the hard standing material proposed is tarmac to support 32t road wagons

- Excavate 29m x 3.5 x 400mm
- 200mm Subbase
- 200mm tarmac

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental):

- PAS 128 type A, B and D report

Access to works area (including restrictions):

All working area is EA land

Landowner/Stakeholder/Third Party Consultation Required:

- EA field team

Consents/Permits Required (including planning permission):

N/A

Temporary Works Required:

N/A

Environmental Constraints:

- Trees at bottom of access track

Health & Safety Hazards:

- Overhead and buried services
- Working around plant and machinery
- Public highway

Public access (PROWs, etc.):

- EA internal Access
- Third party permission for proposed compound location. Or alternative location to be provided within EA land

Programme Constraints:

- Contract Award

Carbon Saving Ideas/Opportunities:

- Grasscrete although this would be unlikely to be capable of withstanding the required loading

Any Other Comments:

- A later request was received for safety barrier; however this was discounted as unnecessary and a defined edge is already present, but overgrown.
- If it is deemed that a carriageway design is required to guarantee design life, then this needs to be included in the scope

Review (For EA use only):

Present at Site Visit:

Organisation:	**Name:**	**Contact details:** email, phone
BAM	Peter Wilcox	Peter.Wilcox@bam.com
BAM	Craig Parish	Craig.Parish@bam.com
BAM	Isaac Wilson	Isaac.Wilson@bam.com
EA	Ian Mccall	Ian.Mcall@environment-agency-gov-uk
EA	Connor Wiseman	Connor.Wiseman@environment-agency-gov-uk
EA	Shuja Hassan	shuja.hassan@environment-agency.gov.uk

Report Acceptance:

EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved:

Name of Site: Beech Tree Mobile Pumps	**AIMS/Asset number: 27379**

Date of Site Visit: 16/05/2023

Brief Description of Repair Work Required:
To provide a suitable substrate to enable plant to access, install and remove 8 x 12" mobile pumps plus site ancillary equipment (generator, security cabin) to drawdown Snaith Ings Flood Storage Area from the North-East corner and into the river Aire. The access route from the A614 will require surface improvement and involve introduction of a turning area. Installation of stake for electrical earthing of the generator may be considered.

This work is required to enable a recommendation in the Snaith Ings OAP3 Exceedance Plan to help reduce reservoir levels when there is a reasonable risk of exceedance. The current access track and embankment area will not support 12" pumps and the plant required to install them.

The proposed works are to:
1. Repair and fill potholes in the existing 750m farm access track from the A614 to the temporary pumping location. This will include the ramp to the embankment crest where a turning circle will be formed.
2. Remove approx. 25-30m of trees adjacent to where the platform will be installed.
3. Installation of a 20x4m hardstanding platform to allow for the off-loading and placing the pumps, including space for generators and site security cabin, as well as any electrical earthing which may be required.
4. Installation of a turning area for the safe manoeuvre of Hiab wagon to be able to turn round before on completion of off-loading to allow for safe travel back down the access track.
5. Clear vegetation and installation of a splash pad to take the discharge from the 8no. 300mm mobile pumps.
6. Installation of stock fencing along removed tree line and re-alignment of stock gate.
7. Disposal of spoil, unless agreed with EA to leave on site.

National Grid Reference of Site:	**Postcode:**	**w3w:**
SE6720222683	Carlton - Selby DN14 9NH	reflected.dumps.phantom

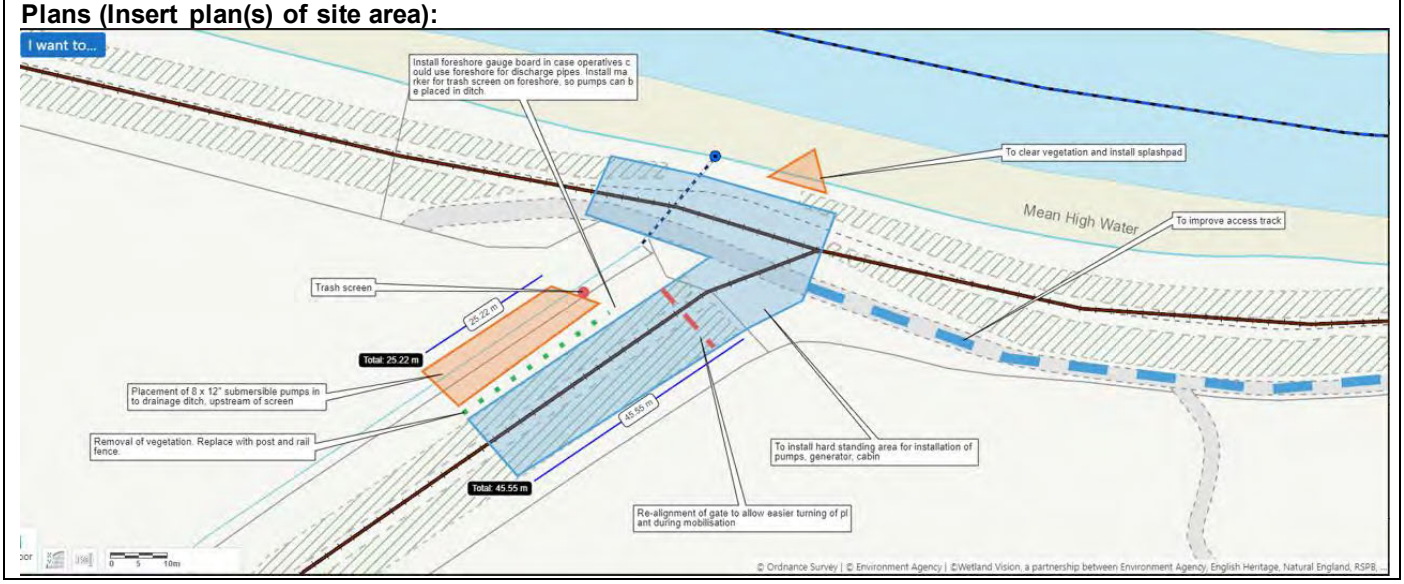
Estimated Duration for Works:

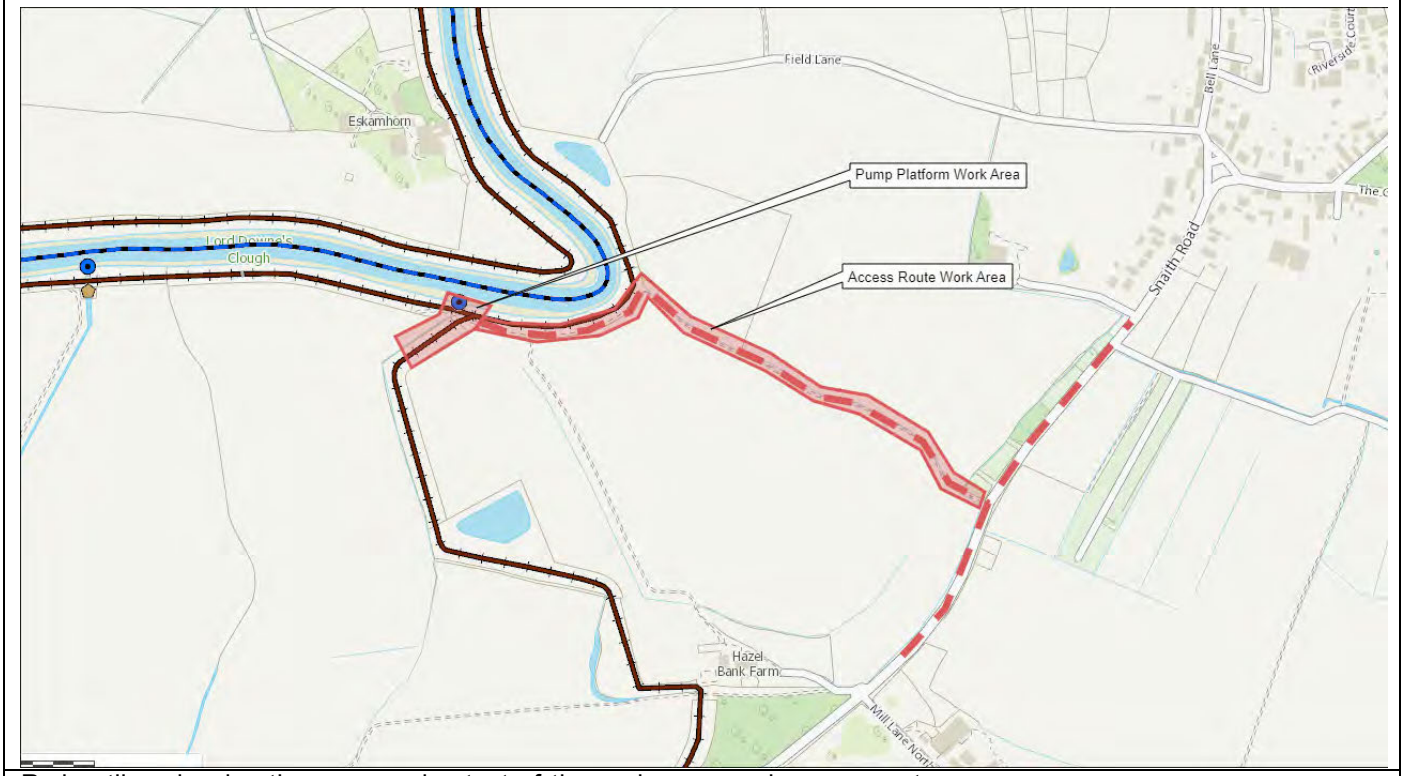
4 weeks

High-Level Cost Estimate (for EA budgeting purposes):

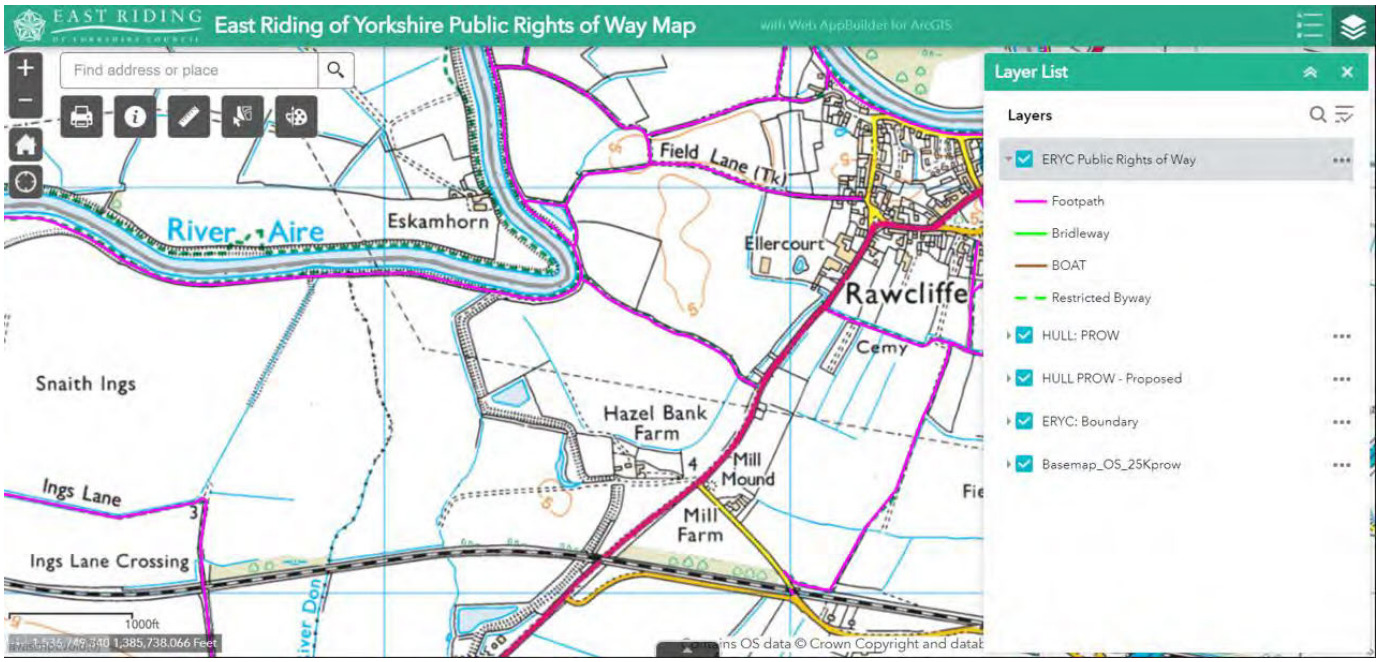
circa £110k

Plans (Insert plan(s) of site area):





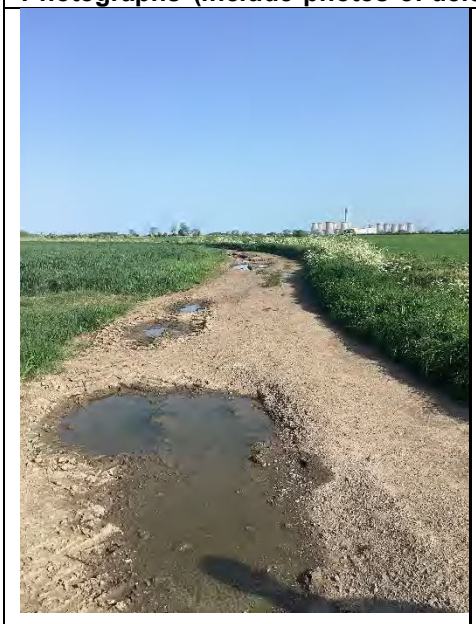
Red outline showing the proposed extent of the works area and access routes.



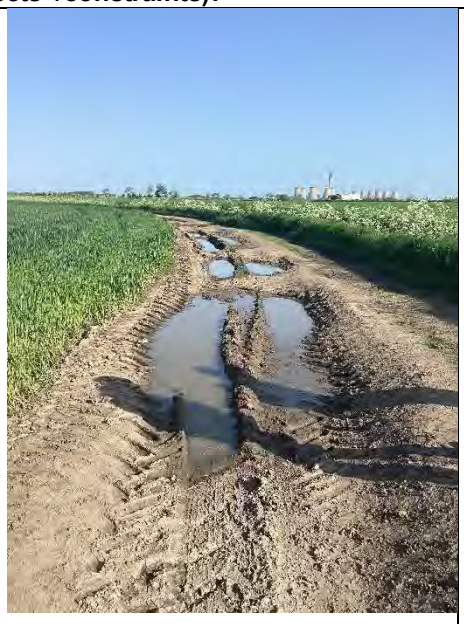
Plan showing the PROWs (in purple) within the vicinity of the working area.

Plan showing proposed location of compound area.

Photographs (include photos of defects /constraints):

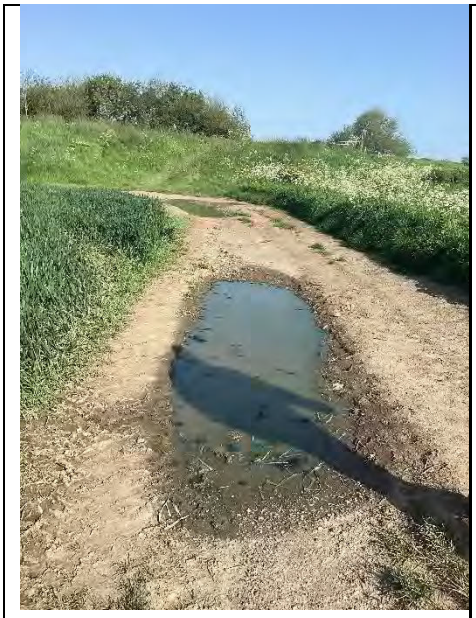
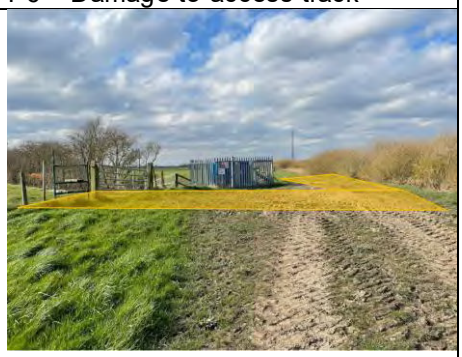


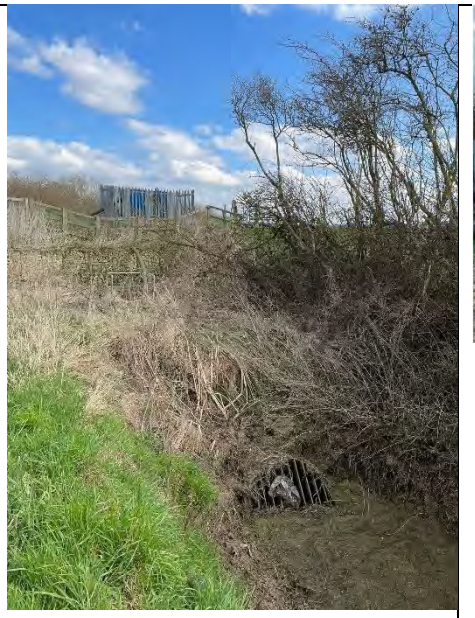
P1 – Damage to access track



P2 – Damage to access track

P3 – Damage to access track

		
P4 – Damage to access track	P5 – Damage to access track	P6 – Damage to access track
		
P7 – Tree line on right hand side of photo to be removed, approx. 30m. Stock gate also to be re-alignment to allow for easier manoeuvre of plant.	P8 – Section of the embankment where the platform is to be installed.	P9 – Section of the embankment where the turning platform is to be installed.

		
P10 – Ditch where pumps are to be placed.	P11 – Blocked gravity drain.	P12 – Proposed location of splash pad opposite the ditch, de-vegetation of the tree line at the rear of the splash pad also required.

Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

There is no damaged to this asset apart from to the existing access track. The purpose of this scheme is to install a stone hardstanding to allow for pumping equipment to be installed.

Proposed Solution(s):

Access Track:

1. Pump out water from ruts within the access track.
2. Excavate the access track to form a level base, any soft spots where major rutting has occurred to be removed and filled with dry site won material.
3. Place geotextile on formation prior to placing stone. I.e., Terram 1000.
4. Place and compact stone in 2no. 100mm layers with geogrid between the layers as per the Specification for Highways Works. (Type 1 or a combination of 40mm and 20mm limestone).
5. Disposal of excavated material, unless EA confirm it can be left on site (WAC Test and WM3 testing required for disposal).

Pump Infrastructure:

1. Remove existing stock gate and store for later re-use.
2. De-vegetation of 25-30m of tree line and strimming of working area, unless carried out by EA prior to works commencing on site.
3. Strip topsoil down to embankment fill material (2C) for hardstanding, including turning circle.
4. Place geotextile on formation.
5. Place and compact stone as per Specification for Highway Works. Note: If crest is to be widened, stone to tie into existing ground level on a 45-degree angle.
6. Construct concrete splash pad for over pumping.
7. Install stock fencing along de-vegetated fence line.
8. Re-installation of stock gate.

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental):

- Topographical Survey
- PAS 128 type A, B and D report

Access to works area (including restrictions):
Directly off the A614 and along the access track.

Landowner/Stakeholder/Third Party Consultation Required:

- The local famer has been identified as Mr Wood who it is understood has not yet been contacted about the proposed works. He is noted as being somewhat sensitive to dealings with the EA.
- It is understood that the Yorkshire and Humber Drainage Board are responsible for the ditch, so will need to be consulted.
- Reservoir/Catchment Engineer if the volume of the reservoir is going to be reduced by construction of the platform.

Consents/Permits Required (including planning permission):
TBC, permit team to be consulted prior to pricing. Possible permits to be considered:

- Reservoir Act
- FRAP
- Temporary closure of the PRoW

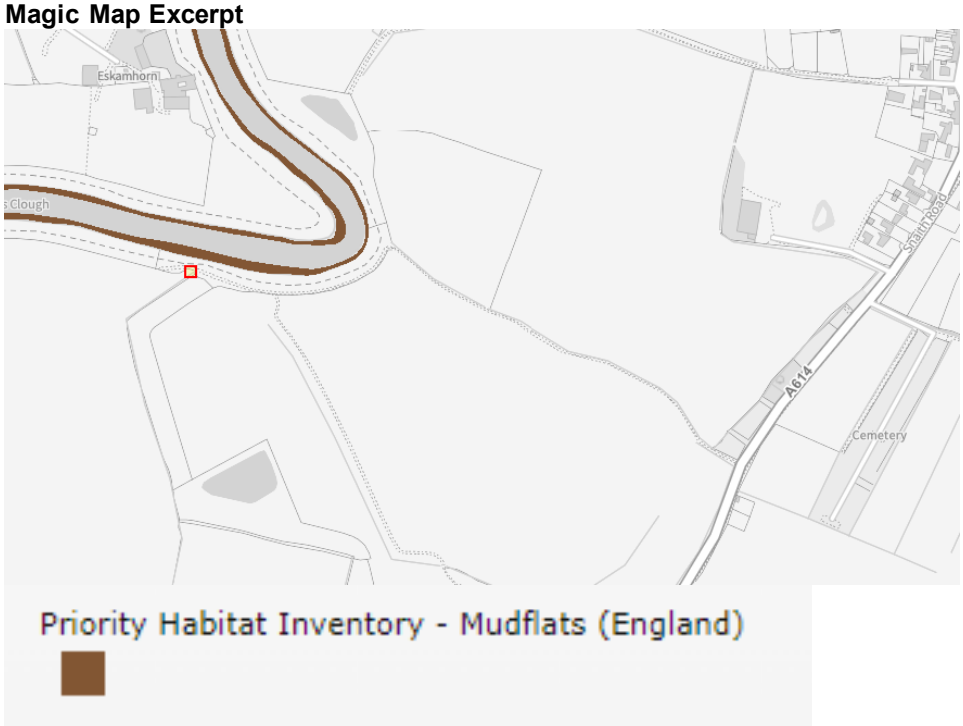
Temporary Works Required:
There are no temporary works requirements.

Environmental Constraints:
Prior to commencing works on site, an ECoW will be required to highlight any possible environmental constraints.

Following the site visit the following environmental constraints may be present:

- Nesting Birds
- Great Crested Newts (Pond approx. 300m from working area)
- Reptiles/ Amphibians
- Bats
- Badgers

Magic Map Excerpt



Health & Safety Hazards:

- Access to the site is off the A614, which will need to be considered when accessing/leaving site. Traffic management may be required for wagons reversing into site.

• Proximity of water course. Depending on time of the year the works is carried out, the reservoir may start to fill following heavy rainfall.
Public access (PROWs, etc.): The access track and working area form part of a public footpath as shown in the plan section of this document, therefore a PROW closure will be required.
Programme Constraints: A section of trees are to be cut down adjacent to the hardstanding platform (approx. 30m) and a section opposite the ditch where the splash pad is to be installed so the bird nesting season must be considered.
Carbon Saving Ideas/Opportunities: No carbon saving ideas/opportunities currently identified.
Any Other Comments: • Construction of the hardstanding on the wet side will reduce the reservoir capacity by a minimal amount, however, will leave it prone to damage following a flood event. Hardstanding should ideally be constructed on the dry side/ crest. This needs to be reviewed to see if pumps can be lifted into position. • If it is determined that the access track and hardstanding is required to guarantee a specified design life, then this needs to be included in the scope.
Review (For EA use only):

Present at Site Visit:		
Organisation:	**Name:**	**Contact details:** email, phone
Bam	Peter Wilcox	Peter.wilcox@bam.com 07805397988
Bam	Craig Parish	Craig.parish@bam.com 07824835960
Bam	Joe Moss	Joe.moss@bam.com 07721318995
EA	Andy Casson	Andy.Casson@environment-agency.gov.uk 07775010885
EA	Connor Wiseman	Connor.Wiseman@environment-agency.gov.uk

Report Acceptance:

EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved:

Name of Site: Rawcliffe Barrier Bank Hazel Bank Farm	**AIMS/Asset number: 74531**

Date of Site Visit: 16/05/2023

Brief Description of Repair Work Required:
To repair and level out the embankment crest to create a consistent profile from the north side past the gate, to the south side of the access track fence. Approx 50m.

If the crest profile is left in its current condition, then the low section may lead to a concentrated overtopping flow route when the reservoir is full. This may increase the risk of a breach of the embankment and flooding of nearby properties.

National Grid Reference of Site:	**Postcode:**	**w3w:**
SE6757322271	Rawcliffe DN14 9EU	boast.spirits.shapeless

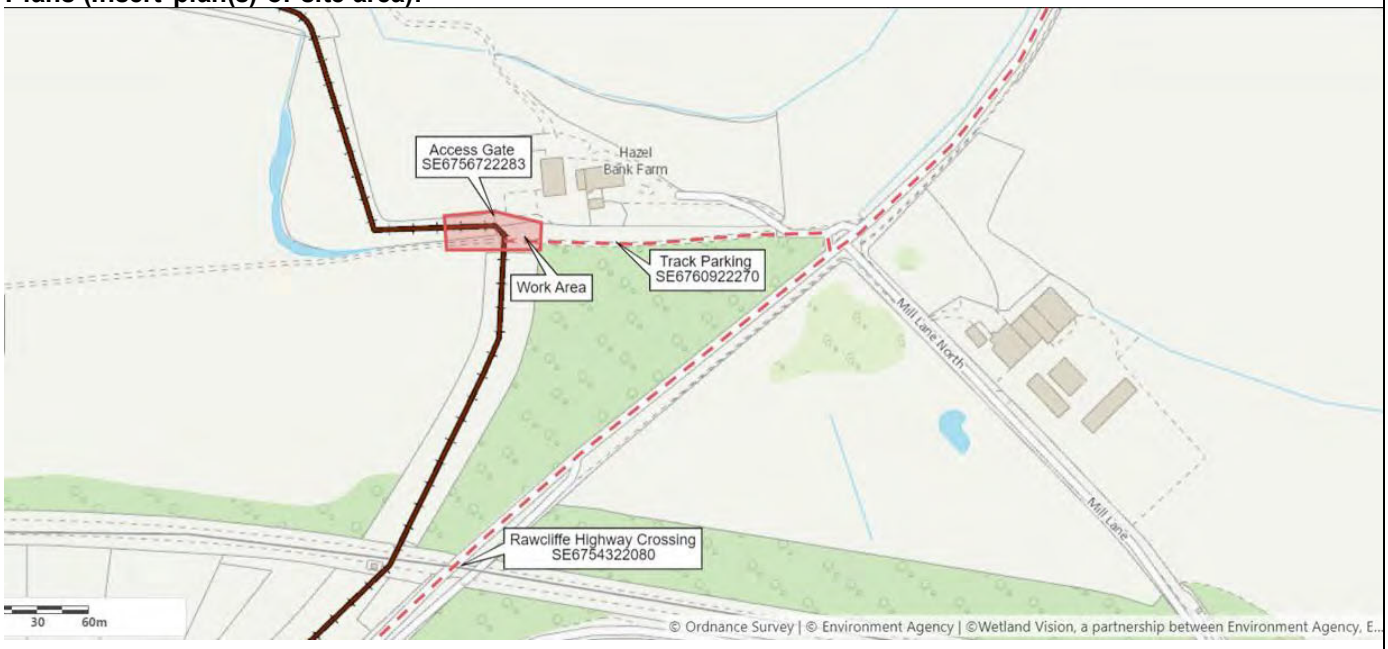
Estimated Duration for Works:

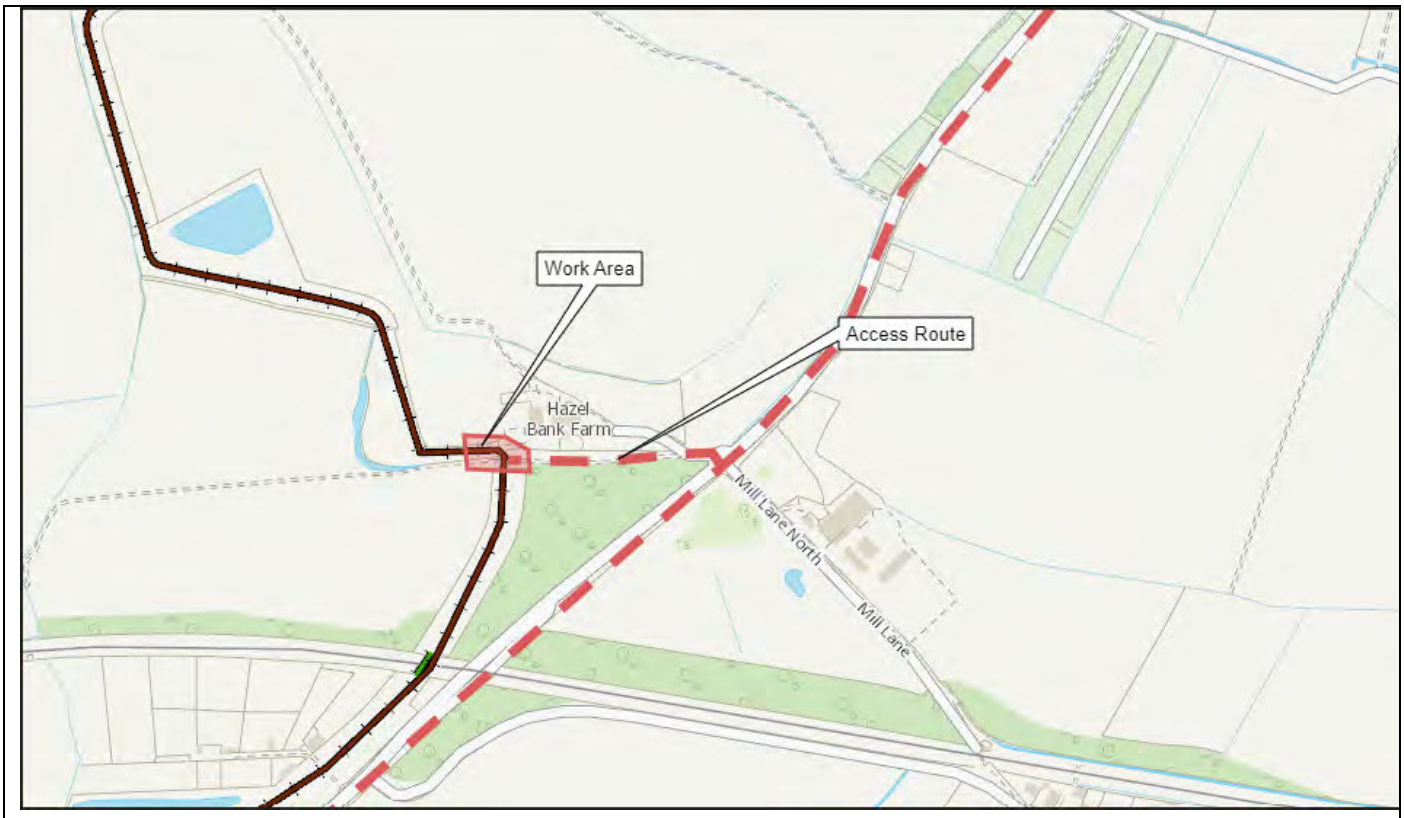
2 weeks

High-Level Cost Estimate (for EA budgeting purposes):

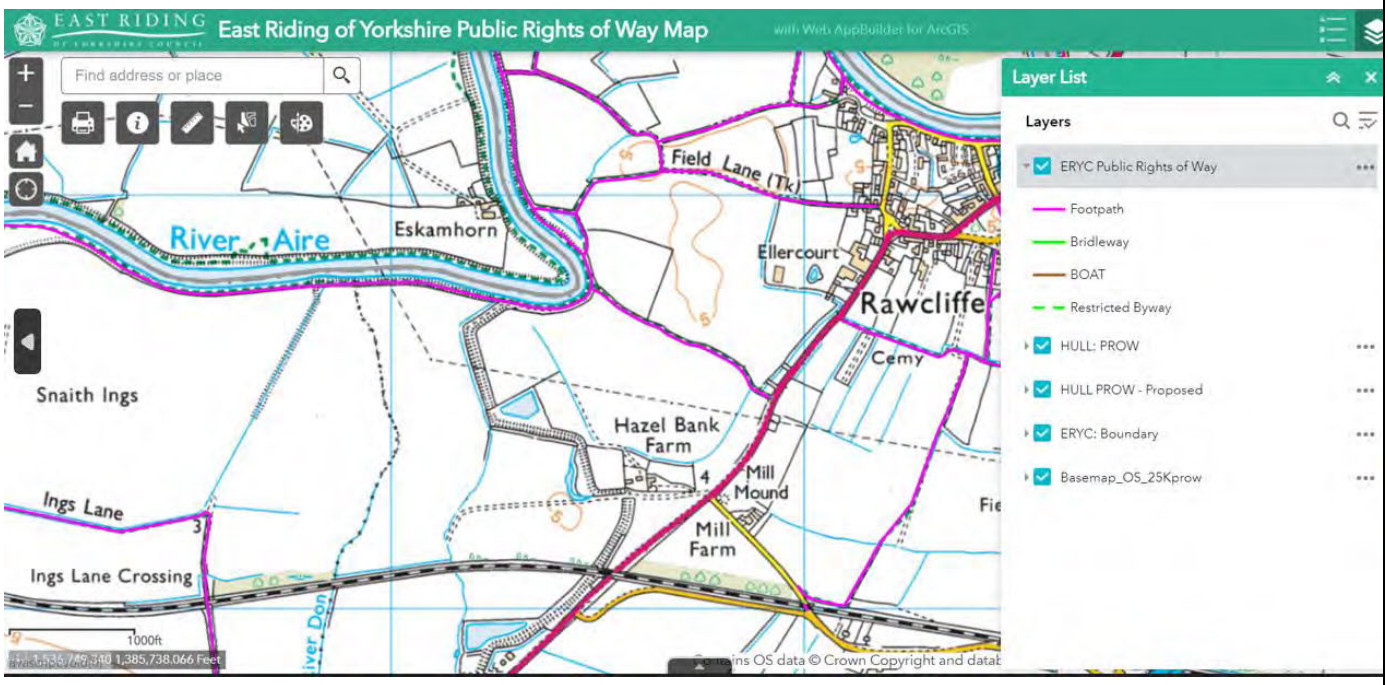
Circa £60k

Plans (Insert plan(s) of site area):

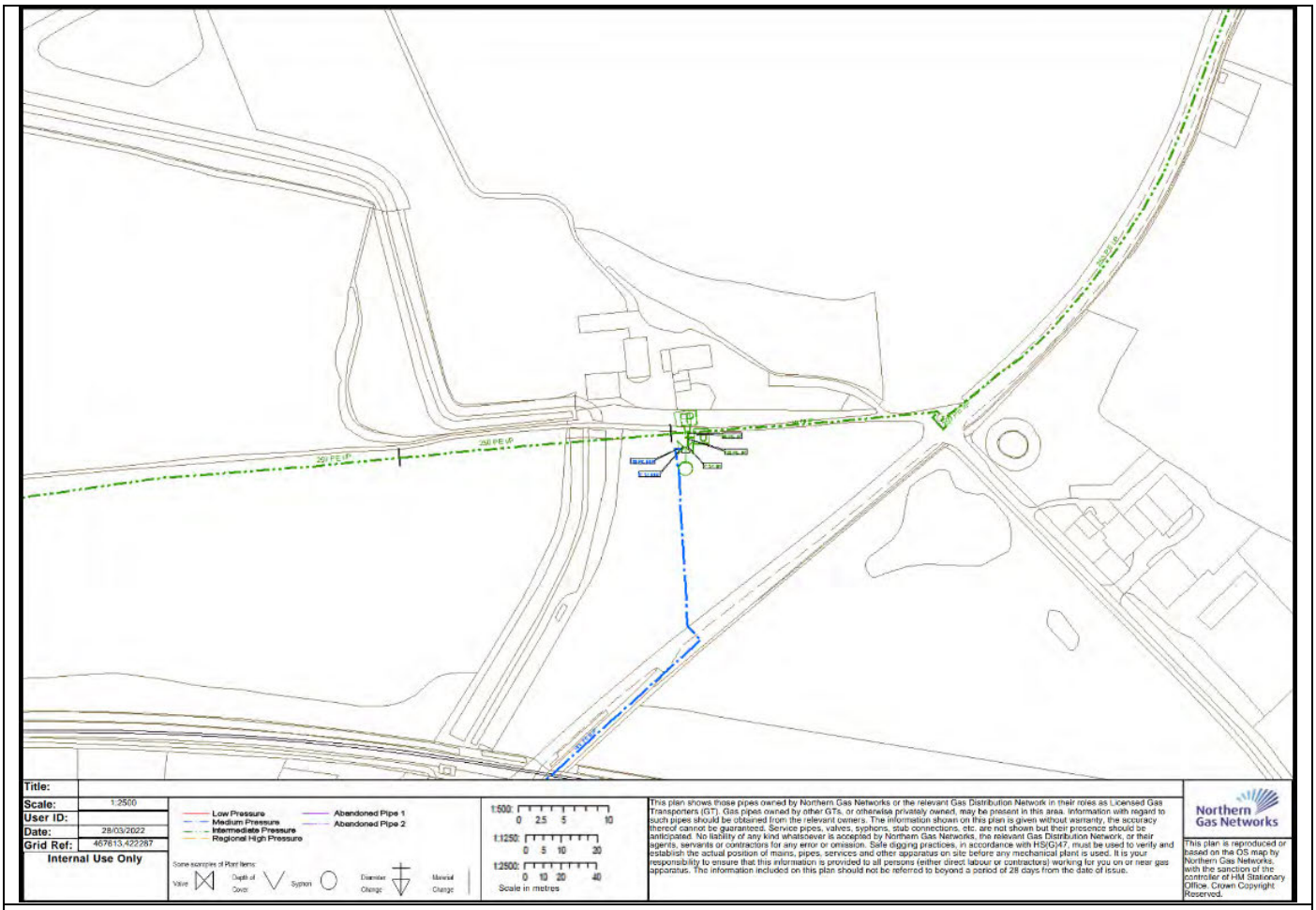




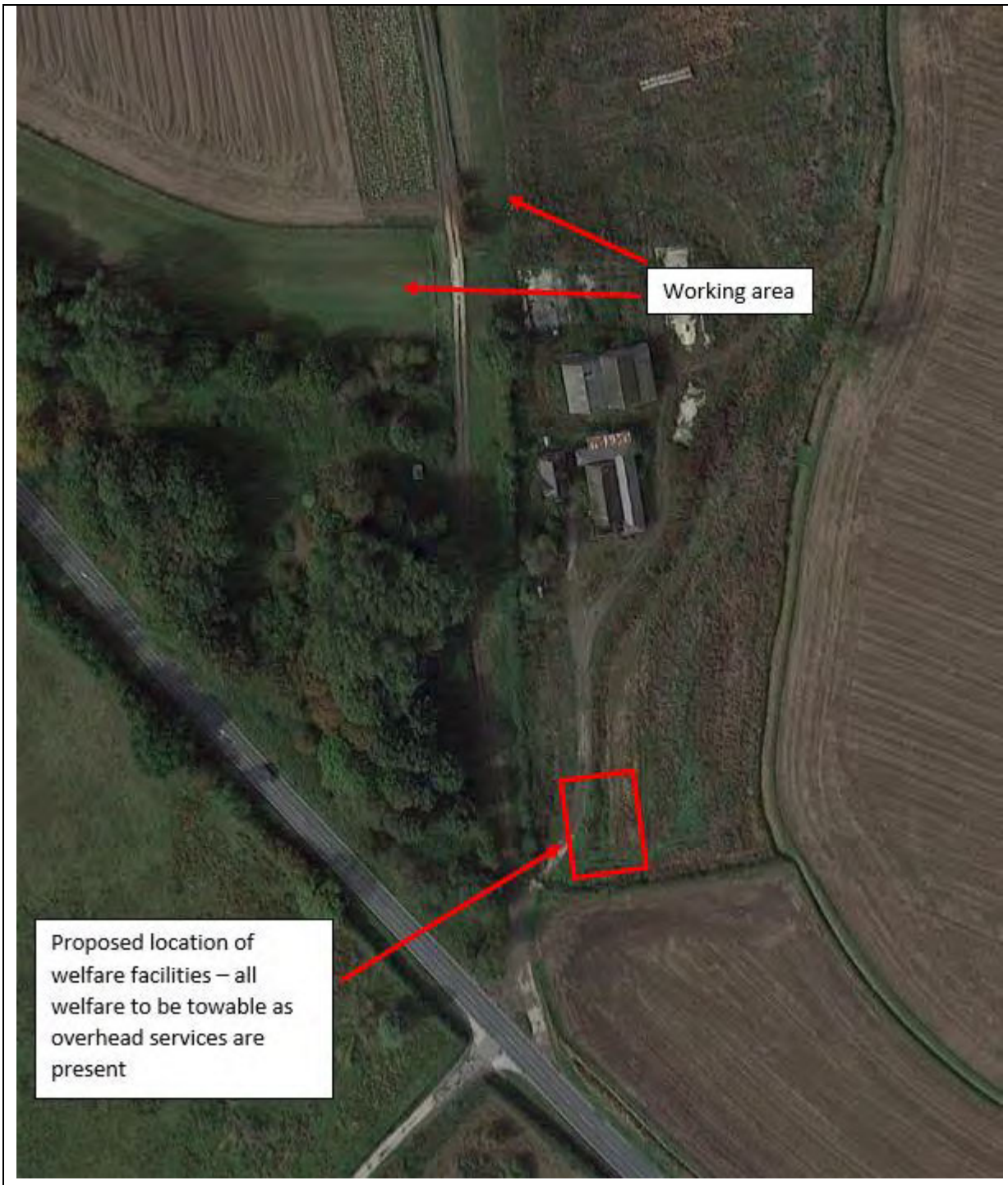
Red outline showing the proposed extent of the works area and access routes.



Plan showing the PROWs (in purple) within the vicinity of the working area.

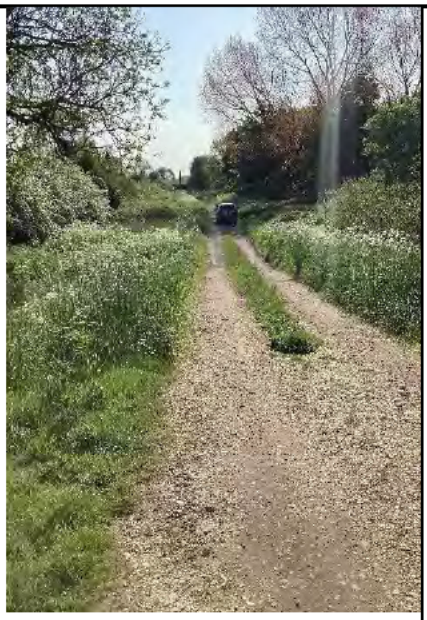
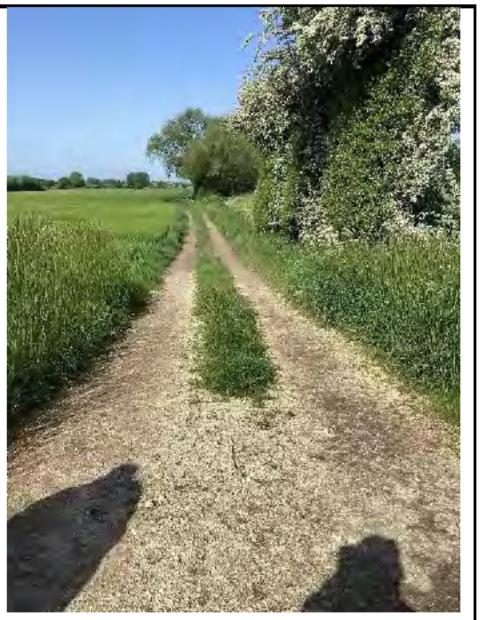
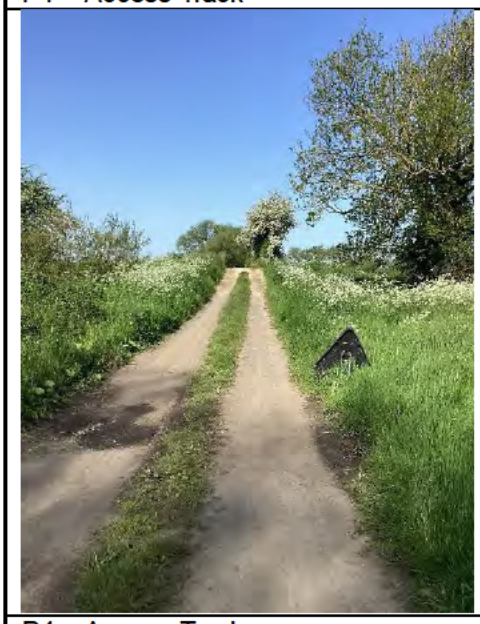


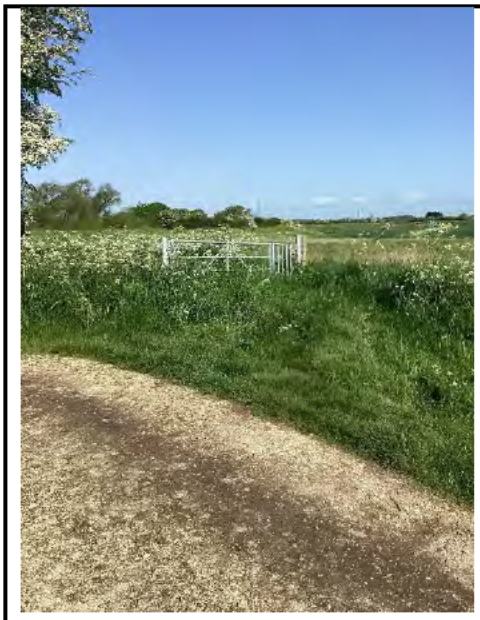
Plan showing the intermediate gas main running through the access track and embankment.



Plan showing proposed location of compound area.

Photographs (include photos of defects /constraints):

		
P1 – Access Track	P2 – Access Track	P3 – Access Track
		
P4 – Access Track	P5 – Access Track	P6 – Access Track

		
P7 – Stock gate	P8 – Stock fencing. Dip in embankment is the approx. location of the gas main (see P11)	P9 – Western repair section
		
P10 – Southern repair section		

Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

There is an approx. 50m section of embankment, which is currently below flood defence level and required to be topped up to match the current level either of this section as in a flood event this may be prone to overtopping and flooding the local community.

The extents of the topping up is estimated to be 30m west section and 20m to the south of the stoned access track.

Proposed Solution(s):

1. Strimming of the grass beyond the extents of the top up, unless carried out by the EA field team prior to commencing on site.
2. Remove stock gate on the western section, and stock fencing on the southern section to enable access. Gate/fencing to be stored safely for reinstallation on completion of the works.
3. Excavate topsoil to expose embankment fill (2C), topsoil to be stockpiled on visqueen.
4. Place and compact a 2C fill as per the Specification for Highway Works using a Rammax, ensuring the crest width is maintained.
5. Place site won topsoil to 50mm above final level (to allow for settlement) and seed. Note: CoirMesh 900 or similar may be required depending on works are carried out. If required, anchor trench will need to be excavated into the shoulder of the embankment.
6. Install stock fencing to allow grass re-growth.
7. Reinstall gate on the western section and the stock fencing on southern section.

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental):

- Topographical Survey
- PAS 128 type A, B and D report
- Trial holes to determine depth and condition of the gas main running through the flood embankment.

Access to works area (including restrictions):

- Directly off the A614 and along the access track through Hazel Bank Farm.
- Service drawings show an intermediate gas main running under the access track, which requires further investigation.

Landowner/Stakeholder/Third Party Consultation Required:

- Landowners of Hazel Bank Farm and the privately owned / public right of way, access track to be consulted prior to works commencing.
- Northern Gas to be consulted regarding the intermediate gas main along the access track to address depth of gas main and any control measures required.

Consents/Permits Required (including planning permission):

TBC, permit team to be consulted prior to pricing. Possible permits to be considered:

- Reservoir Act
- FRAP

Temporary Works Required:

There are no temporary works requirements.

Environmental Constraints:

Prior to commencing works on site, an ECoW will be required to highlight any possible environmental constraints.

Following the site visit the following environmental constraints may be present:

- Nesting Birds
- Great Crested Newts (Pond approx. 220m from working area)
- Reptiles/ Amphibians
- Bats
- Badgers

Magic Map Excerpt

Health & Safety Hazards:

- Access to the site is off the A614, which will need to be considered when accessing/leaving site.
- Intermediate gas main

• Proximity of water course. Depending on time of the year the works is carried out, the reservoir may start to fill following heavy rainfall.
Public access (PROWs, etc.): Although not identified as a Public Right of Way, dog walkers seen on the site visit.
Programme Constraints: No programme constraints identified.
Carbon Saving Ideas/Opportunities: Re-use of site won topsoil instead of disposal and importing new to minimise deliveries. Therefore, reducing amount of waste going to landfill and reducing fuel usage.
Any Other Comments: • If it is determined that the low spot top up is required to guarantee a specified design life, then this needs to be included in the scope.
Review (For EA use only):

Present at Site Visit:		
Organisation:	**Name:**	**Contact details:** email, phone
Bam	Peter Wilcox	Peter.wilcox@bam.com 07805397988
Bam	Craig Parish	Craig.parish@bam.com 07824835960
Bam	Joe Moss	Joe.moss@bam.com 07721318995
EA	Andy Casson	Andy.Casson@environment-agency.gov.uk 07775010885
EA	Connor Wiseman	Connor.Wiseman@environment-agency.gov.uk

Report Acceptance:

EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved:

Name of Site: Rawcliffe Barrier Pets Pad	**AIMS/Asset number: 74531**

Date of Site Visit: 16/05/2023

Brief Description of Repair Work Required:
To assess the full stretch of proposed work area and appropriately fill trench and align profile to dry side toe of bank where necessary.

Works are required to assess and repair damage along the toe of the embankment. The defect caused by the excavated trench may compromise the condition and performance of the asset and restrict routine maintenance.

National Grid Reference of Site:	**Postcode:**	**w3w:**
SE6724421889	Rawcliffe DN14 9EU	spud.costumed.flames

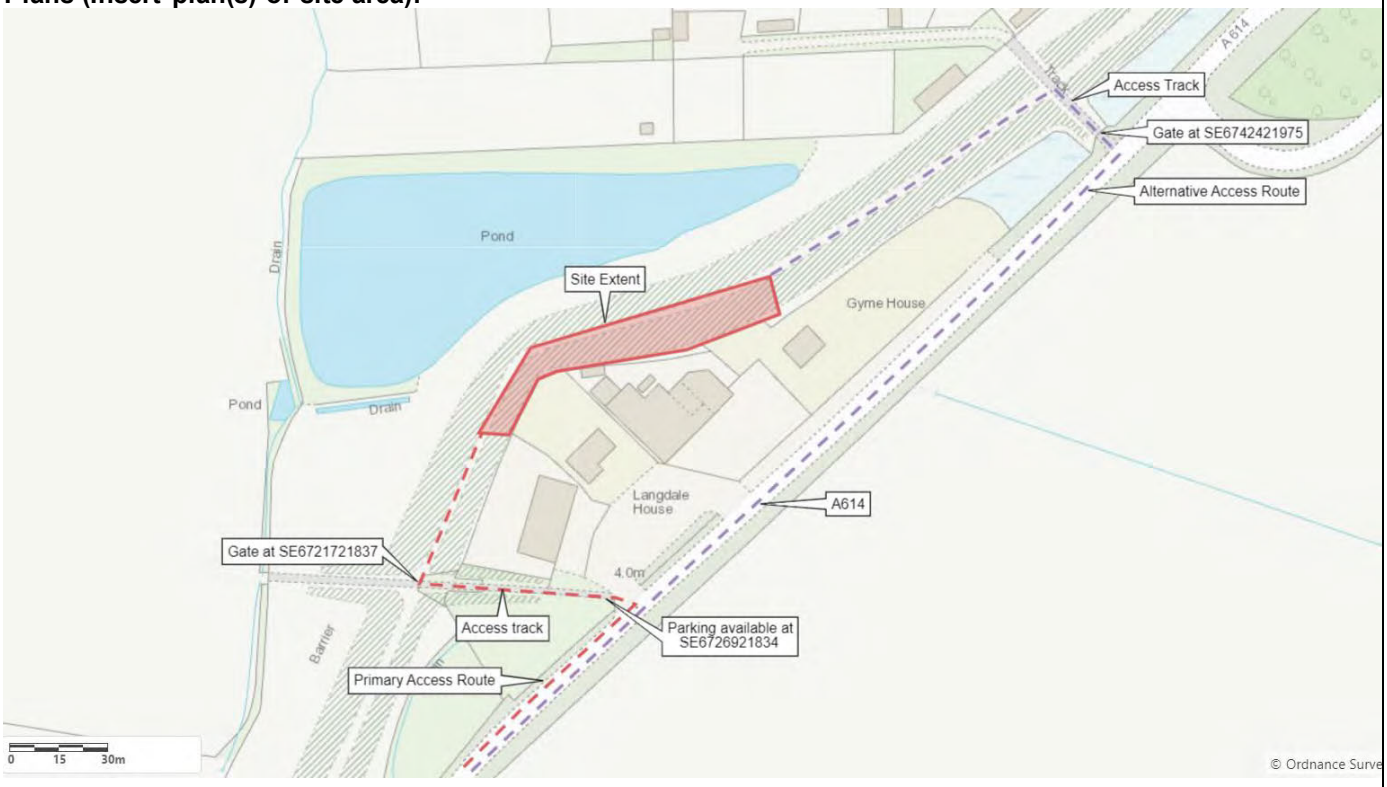
Estimated Duration for Works:

2 weeks

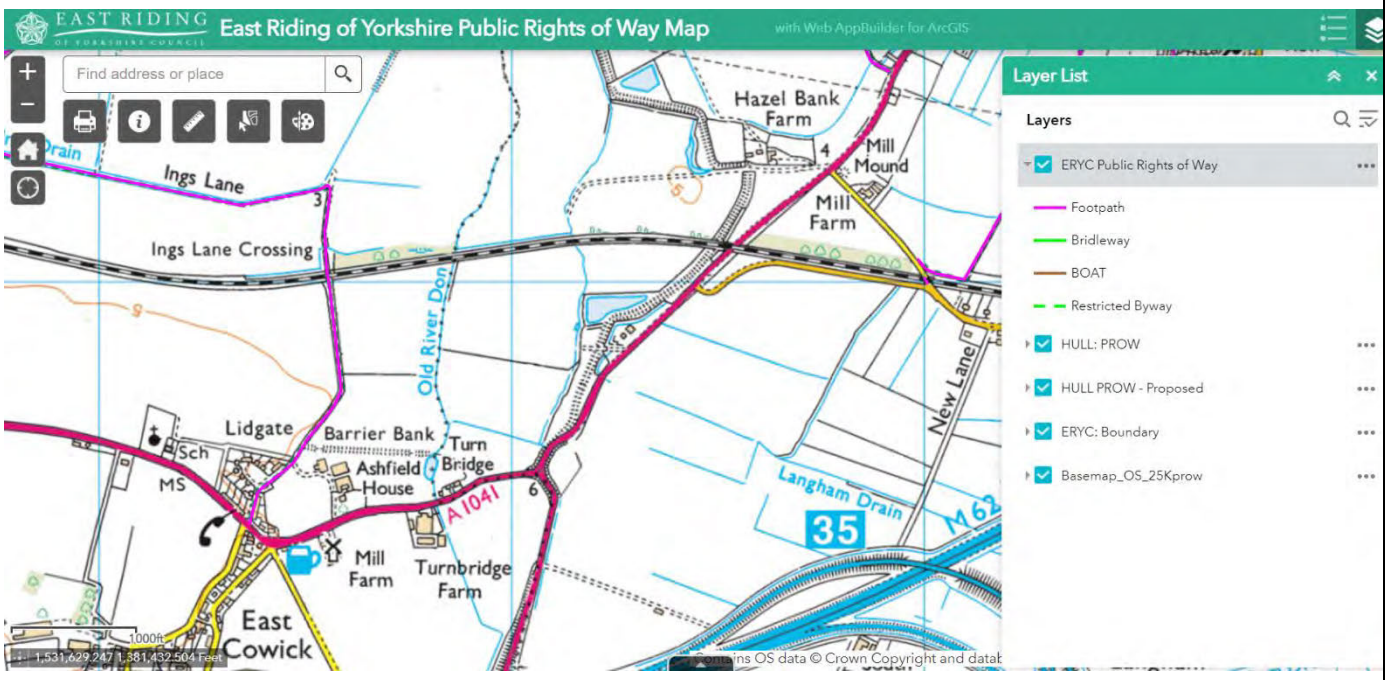
High-Level Cost Estimate (for EA budgeting purposes):

Circa £50k

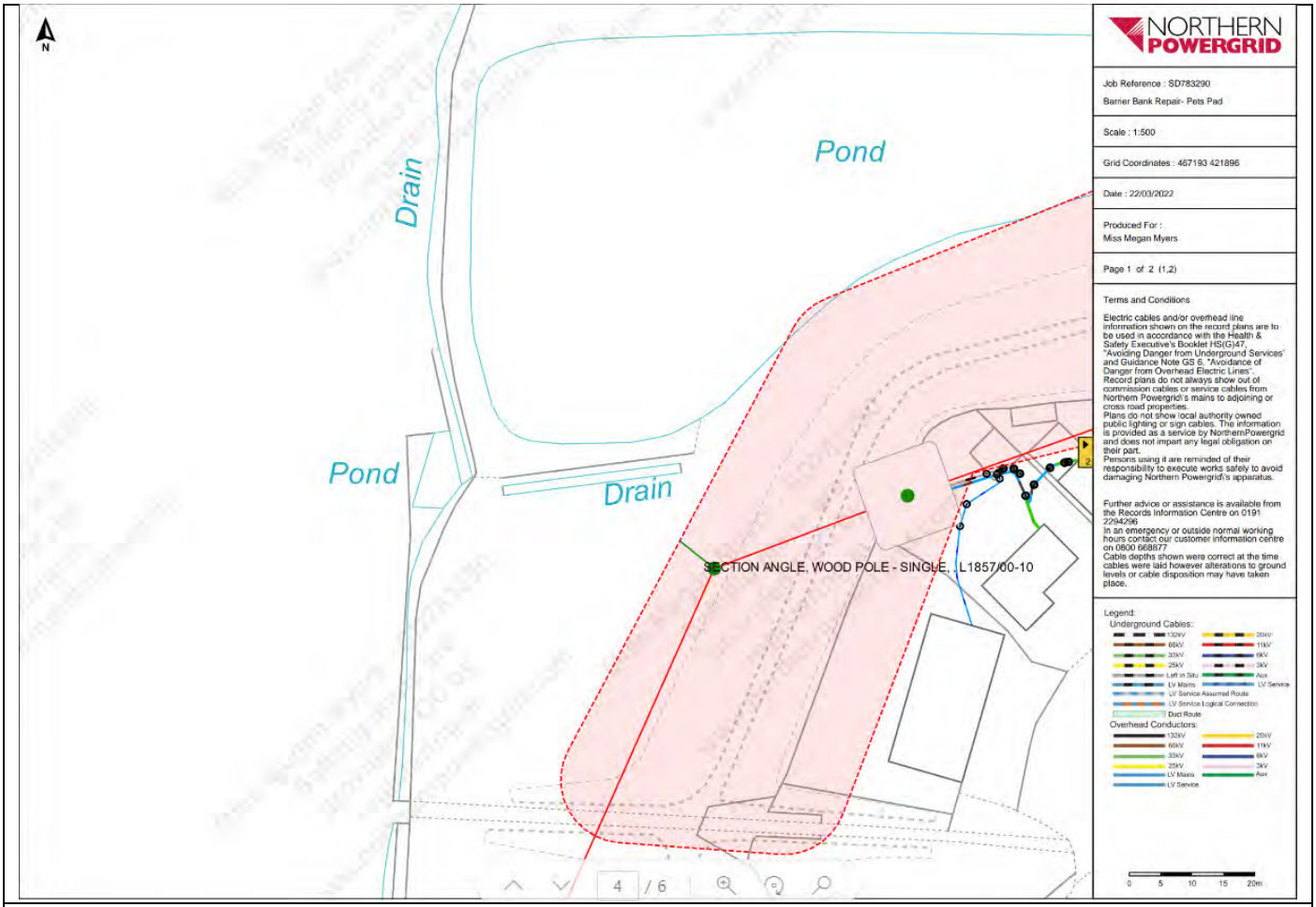
Plans (Insert plan(s) of site area):



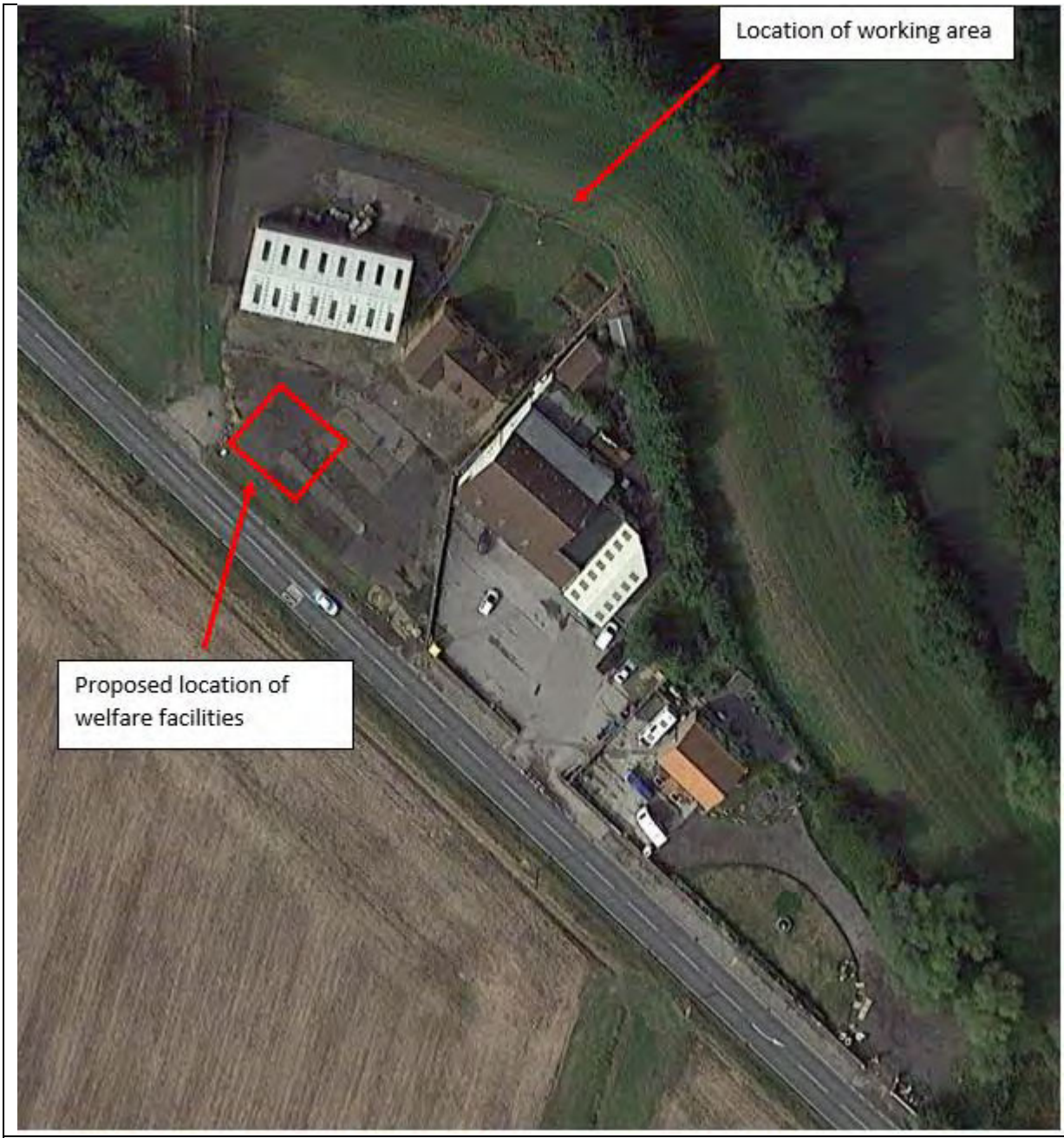
Red outline showing the proposed extent of the works area and access routes.



Plan showing the PROWs (in purple) within the vicinity of the working area.

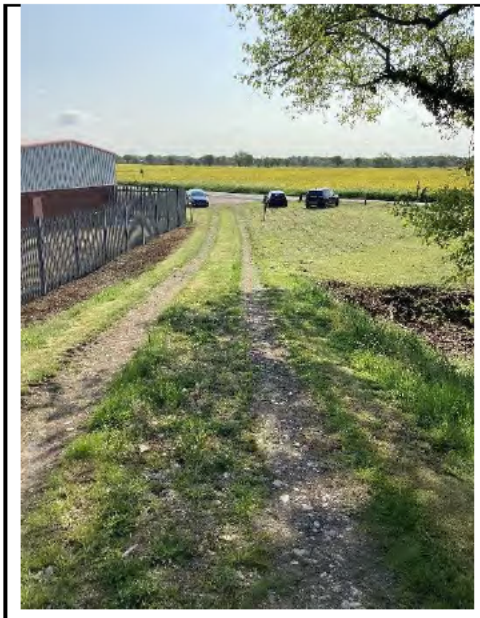


Plan showing location of telegraph pole and overhead power lines.



Plan showing proposed location of compound area.

Photographs (include photos of defects /constraints):

		
P1 – Primary Access Track	P2 – Gate on access track (206 lock)	P3 – Telegraph pole in the garden of the first property
		
P4 – Step in toe of embankment where excavation of the trench has been carried out	P5 – Collapsed wall between the 2 properties	P6 – Further sections of repair identified on previous site visit

		
P7 – Further sections of repair identified on previous site visit	P8 – Further sections of repair identified on previous site visit	P9 – Alternative access track
		
P10 – Adjacent Pond near alternative access track	P11 – Adjacent farmhouse near alternative access track	

Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

There is a hand dug trench on the dry-side toe of the flood embankment where a resident had installed and later removed a cable from the electric pole. Although unable to see on the site visit due to long grass, the trench is believed to be approx. 0.3m wide x 0.2m deep and spans for 25m towards the neighbouring properties.

There are also additional sections which require repairing running parallel with the boundary fence line of the neighbouring properties. These sections require further investigation once the grass has been cut to determine the full extents of the repair. Possible repairs up to 60-70m long as well as the 25m repair in front of the first property which was visible.

Proposed Solution(s):

1. Strimming of grass along the dry side of the flood embankment unless carried out by EA field team prior to works commencing.
2. Topographical survey to determine full extents of the repair.
3. 2C is required where the repair is deeper than the existing topsoil.
4. Excavate topsoil and cut benches into the existing embankment, no greater than 300mm.
5. Place and compact 2C in 150mm layers as per Specification for Highway Works.
6. Place topsoil on top of 2C and profile to follow the existing gradient of the embankment.
7. Rake and seed topsoil. Note: CoirMesh 900 or similar may be required depending on works are carried out. If required, anchor trench will need to be excavated into the shoulder of the embankment.

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental):

- Topographical Survey
- PAS 128 type A, B and D report

Access to works area (including restrictions):

- Directly off the A614 and along the existing stoned access track.
- Crest width narrow to the main repair section, EA dispensation likely as tracking along crest with not comply with EA SHEW COP.

Landowner/Stakeholder/Third Party Consultation Required:

- Access track from the road is believed to be privately owned so will require consultation with landowner to permit access.
- Working area is EA owned, however landowners should be consulted to make them aware of the works being carried out at the rear of their properties.
- Norther Powergrid to be consulted for GS6 survey to determine safe working clearance underneath power lines.

Consents/Permits Required (including planning permission):
TBC, permit team to be consulted prior to pricing. FRAP exemption likely to be given.

Temporary Works Required:
There are no temporary works requirements.

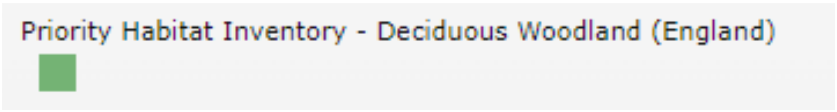
Environmental Constraints:

Prior to commencing works on site, an ECoW will be required to highlight any possible environmental constraints.

Following the site visit the following environmental constraints may be present:

- Nesting Birds
- Great Crested Newts (Pond approx. 35m from working area)
- Reptiles/ Amphibians
- Bats
- Badgers

Magic Map Excerpt



Health & Safety Hazards:

- Proximity of 11kv overhead service – GS6 survey required to determine safe working clearance.
- Buried services – GPR survey to determine if cable has been fully removed from the trench.

Public access (PROWs, etc.):
No Public Right of Way at the site.

Programme Constraints:
No programme constraints identified.

Carbon Saving Ideas/Opportunities:
None currently identified.

Any Other Comments:

- If it is determined that the embankment toe repair is required to guarantee a specified design life, then this needs to be included in the scope.

Review (For EA use only):

Present at Site Visit:		
Organisation:	**Name:**	**Contact details:** email, phone
Bam	Peter Wilcox	Peter.wilcox@bam.com 07805397988
Bam	Craig Parish	Craig.parish@bam.com 07824835960
Bam	Joe Moss	Joe.moss@bam.com 07721318995
EA	Andy Casson	Andy.Casson@environment-agency.gov.uk 07775010885
EA	Connor Wiseman	Connor.Wiseman@environment-agency.gov.uk

Report Acceptance:

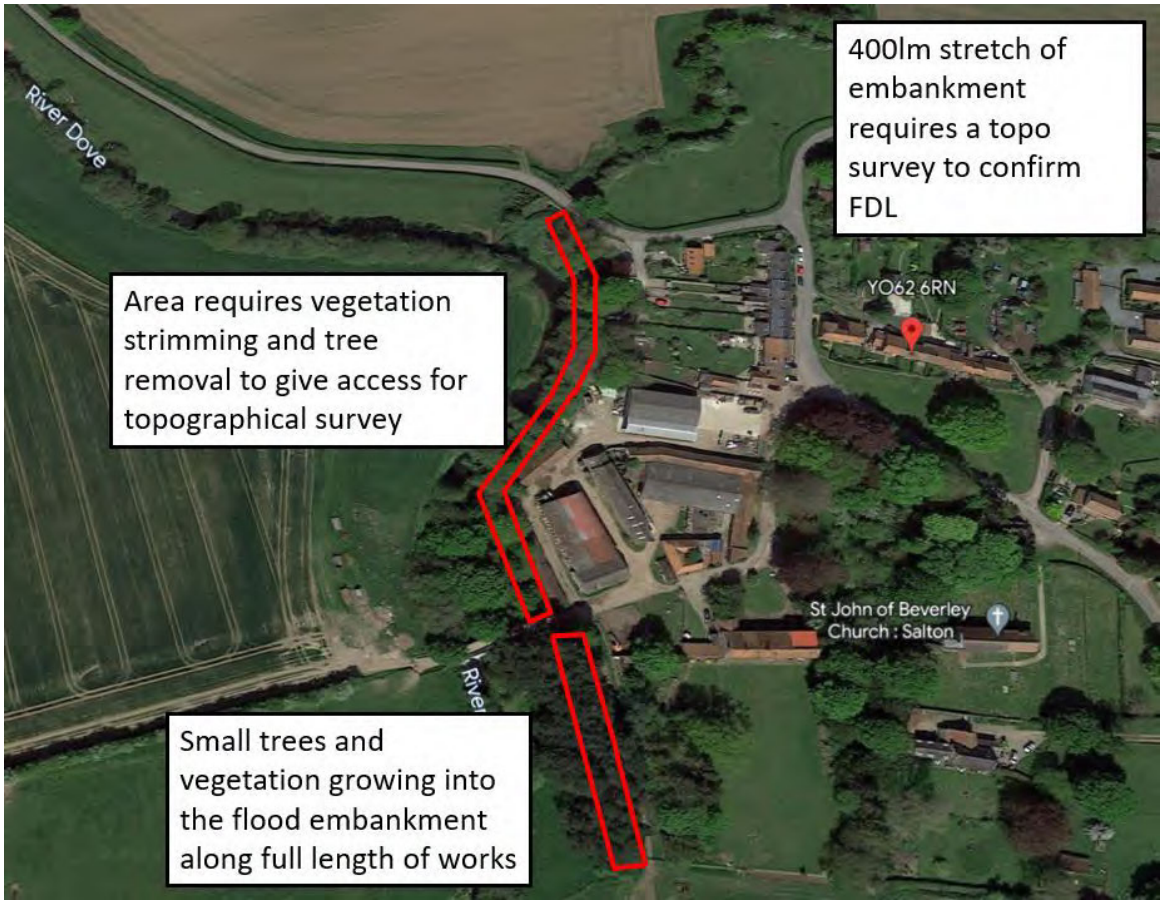
EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved:

Name of Site: Salton Village Embankment	**AIMS/Asset number:** 534275
Date of Site Visit: 23/05/2023	
Brief Description of Repair Work Required: Vegetation and tree removal to allow a topographical survey required to determine the extent of the damage to the embankment and design best engineering solution for the embankment.	

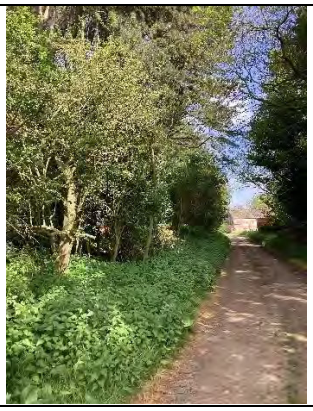
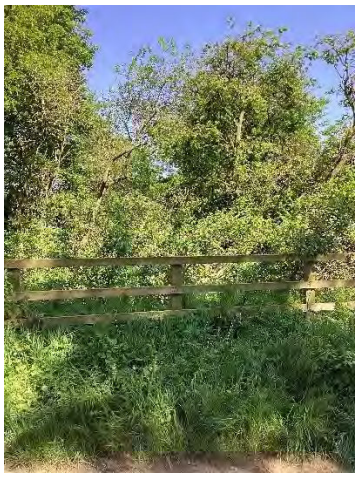
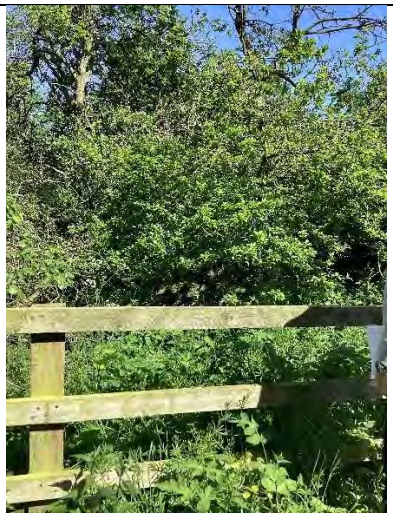
National Grid Reference of Site: SE71489 80016	**Postcode:** YO62 6RN	**w3w:** grunt.crawled.sling
Estimated Duration for Works: 3 weeks		
High-Level Cost Estimate (for EA budgeting purposes): **Circa £75k**		
Plans (Insert plan(s) of site area):		
Red outline showing the proposed extent of the works area and in purple PROWs (Based on OS plan)		

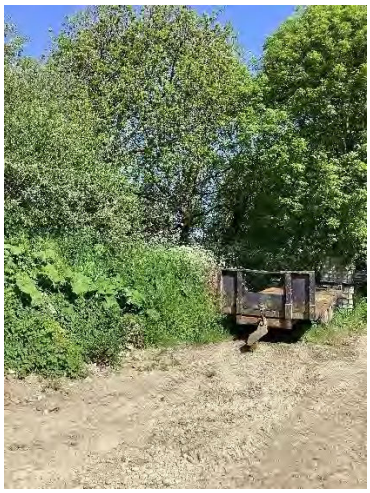


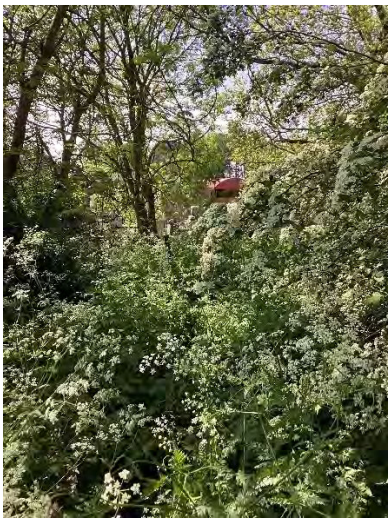
Plan showing the proposed works

Photographs (include photos of defects /constraints):







Description of Damage to Asset: (include dimensions and any temporary repair work already carried out) The current flood embankment is allowing water seepage when loaded and there is a significant number of trees and vegetation growing along the flood embankment. Approximate 400lm section of embankment to be cleared surveyed.		
Proposed Solution(s): The small trees and vegetation can be removed from the embankment to allow a topographical survey to be completed on the embankment to understand the extents of the damage, depths and area of damage.		
Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental): Nesting bird checks if in season ECoW (unless clearance complete by EA)		
Access to works area (including restrictions): Access adjacent and along the embankment		
Landowner/Stakeholder/Third Party Consultation Required: Landowner (farmer) notified before works commence EA field team		
Consents/Permits Required (including planning permission):		
Temporary Works Required: N/A		
Environmental Constraints: Nesting bird checks		
Health & Safety Hazards: Felling trees and cutting equipment Slips trips and falls		
Public access (PROWs, etc.): Embankment is along farmers land no PROW		
Programme Constraints: Weather for strimming the embankment prior to site visit		
Carbon Saving Ideas/Opportunities:		

Any Other Comments: •
Review (For EA use only):

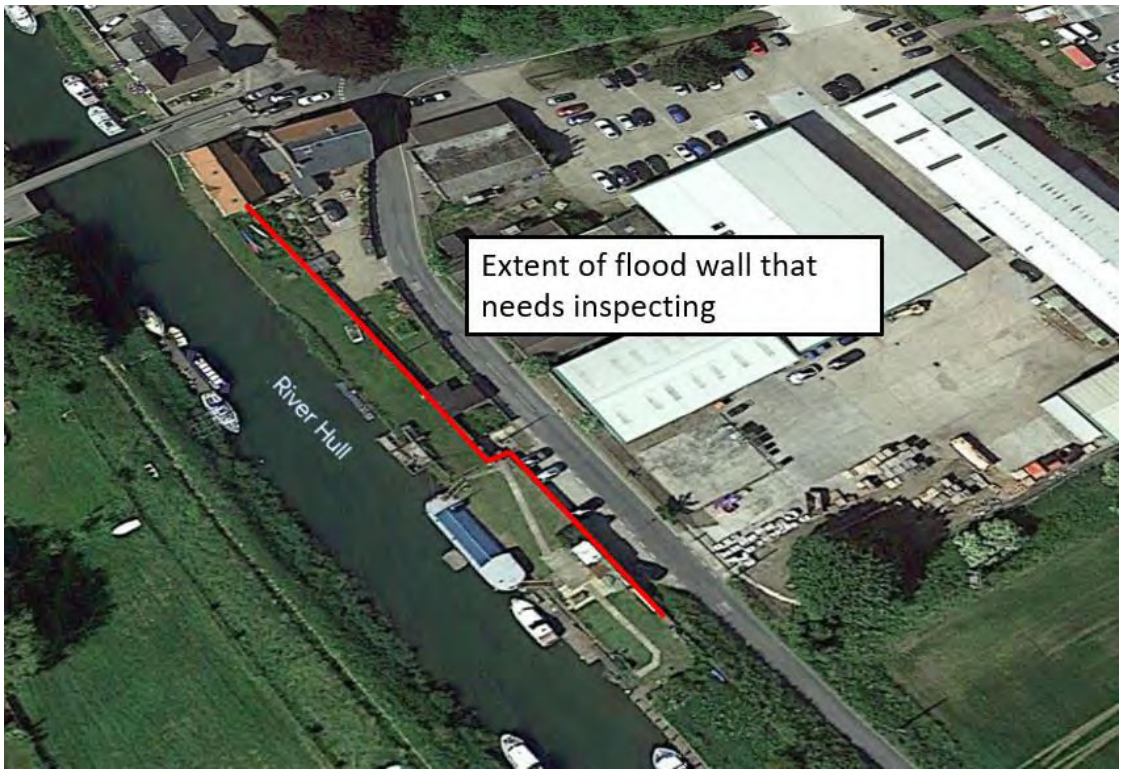
Present at Site Visit:		
Organisation:	**Name:**	**Contact details:** email, phone
BAM	Craig Parish	Craig.Parish@bam.com
BAM	Peter Wilcox	Peter.Wilcox@bam.com
BAM	Isaac Wilson	Isaac.Wilson@bam.com
EA	Ian Cooke	Connor.wiseman@environment-agency.gov.uk
EA	Connor Wiseman	Ian.cooke@environment-agency.gov.uk

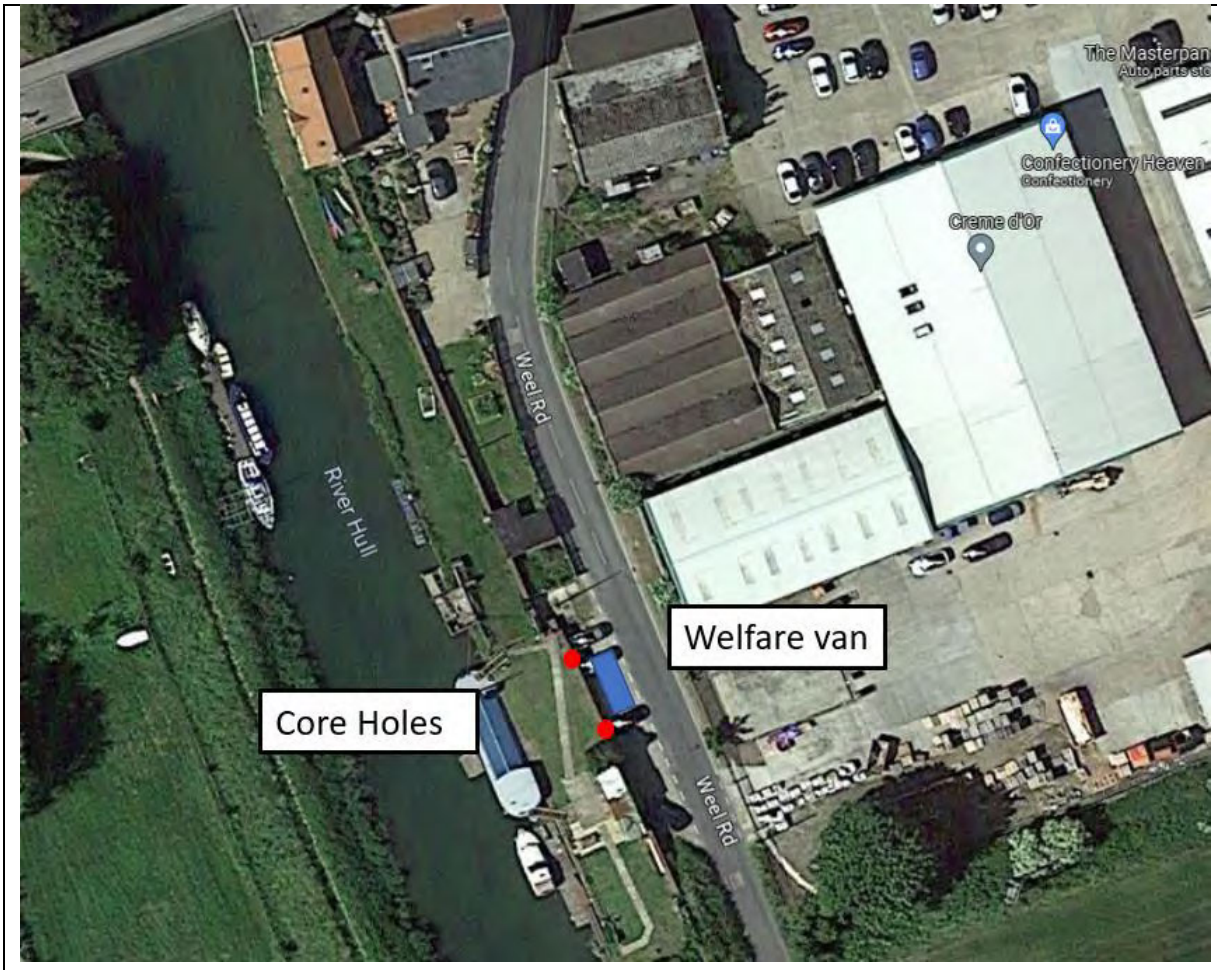
Report Acceptance:

EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved:

Name of Site: Tickton Weel Road Wall		**AIMS/Asset number:** **26657**
Date of Site Visit: 23/05/2023		
Brief Description of Repair Work Required: Investigation works need to be undertaken to understand the build up of the floodwall and the cause of the leaking		
National Grid Reference of Site: TA 05574 41627	**Postcode:** HU17 9RY	**w3w:** **///nails.differ.sanded**
Estimated Duration for Works: 1 week		
High-Level Cost Estimate (for EA budgeting purposes): **Circa £25k**		
Plans (Insert plan(s) of site area):  		
Red outline showing the proposed extent of the works area and in purple PROWs (Based on OS plan)		



Plan showing the proposed works

Photographs (include photos of defects /constraints):

Description of Damage to Asset: (include dimensions and any temporary repair work already carried out)

The current flood wall is leaking when the river level rises above the level of the bank. There are no signs of structural failure.

Proposed Solution(s):

- Top course of bricks to be taken off the flood wall to expose the core of the wall (suspected concrete) in two locations
- 100mm Cores, 300mm deep to be taken through the top of the wall to show wall build up
- Wall re bricked up to existing condition

Additional Surveys Required prior to pricing (ground investigation, topographical, drone, cloud point, environmental):

None

Access to works area (including restrictions):

No restrictions, notify the boat club to inform them of works

Landowner/Stakeholder/Third Party Consultation Required:

Boating club

Consents/Permits Required (including planning permission):

N/a

Temporary Works Required:
N/a

Environmental Constraints:

Ensure no water from coring enters the water course

Health & Safety Hazards:

Drilling works

Public access (PROWs, etc.):

Private land, no PROW only access to the boat club

Programme Constraints:

Sub-contractor availability

Carbon Saving Ideas/Opportunities:

Any Other Comments:

Review (For EA use only):

Present at Site Visit:		
Organisation:	**Name:**	**Contact details:** email, phone
BAM	Craig Parish	Craig.Parish@bam.com
BAM	Peter Wilcox	Peter.Wilcox@bam.com
BAM	Isaac Wilson	Isaac.Wilson@bam.com
EA	Ian Cooke	Connor.wiseman@environment-agency.gov.uk
EA	Emily Armitage	Emily.Armitage@environment-agency.gov.uk
EA	Wayne England	wayne.england@environment-agency.gov.uk

Report Acceptance:

EA Senior User:	Signature:	Date:
EA Project Manager	Signature:	Date:

Revision:

Rev:	Issue Date:	Issue Purpose:	Author: (checker)	Checked:	Approved: