Notes:-
This schematic is to be displayed in the site managers office to aid communication of silt related pollution risk to all relevant site staff.

The schematic is a visual summary of identified sources of silt generation, receptors sensitive to silt pollution, pathways by which the silt pollutant may move and the specific required interventions to mitigate the identified silt pollution risks.

Topography and Ground Conditions Pertinent to Sources of Silt Pollution Risk

•Areas of site strip
•Implementation of proposed earthworks strategy to achieve development platforms and install drainage infrastructure
•Dewatering of excavations (locations will vary during development)
•Soil stockpile (locations TBC)
•Site plant trafficking on surfaced roads (connected to installed surface water system)

Potential site silt pollution pathways

• Anticipated direction of surface water run-off based on topography (generally toward the east)
• Surface water drainage
•Unidentified land drainage

Receptors Identified at Risk from Silt Pollution

On-site:
• Whitnash Brook (forming site's eastern boundary
• Existing 'Greenfield Road' Public right of way forming the sites northern boundary
Surface water drainage
• Detention Basin 1

Off-site:
• Whitnash Brook Local Nature Reserve (adjoining the NE site boundary)
•Existing residential housing to the north of the site boundary
•Existing agricultural field (but potential future housing development)

Specific Silt Mitigation Interventions to be Implemented

•Separate Construction Surface Water Management Plan for the 'earthworks phase' and the 'plot development phase' of the development activities
•Early construction of the surface water infrastructure - including Detention Basin 1 and all associated headwalls and drainage runs (to enable their use in surface water management)
•Provision of a 'site strip plan' to minimise wholesale stripping of surface vegetation and associated topsoil
•Gain local water company trade effluent consent (for temporary discharge of dewatering waters to foul sewer)
•Gain EA bespoke Environmental permit for a water discharge activity to surface water during the construction phase of the development (to gain the relevant permit and allow provision of use of gel flocculant techniques if deemed necessary during the construction period)
• Buffer zone and control of site strip (to mitigate run-off eastward toward the Whitnash Brook and minimise areas of silt generation from exposed soils)
• Install silt fencing upgradient of the Detention basin works and upgradient of buffer zone (to mitigate run-off eastward toward the Whitnash Brook)
• Reduced dig step down in level (to mitigate run-off northward toward the PROW and southward to existing agricultural land)
•Provision of gully and chamber silt ingress protection measures (to mitigate ingression of silt into the constructed surface water system).
• Silt fence check dam (to slow down water flow and retain silt at headwall apron)
• Rock filter check dam (to slow down water flow and retain silt at headwall apron)
• Sediment basin baffle (to slow down water flow through the basin to promote silt settlement within the basin)

Good practice silt mitigation interventions to be implemented

In addition to the specific interventions above, general good practices during the construction activities of site set up, plant and machinery operation, stockpiling, road and sewer maintenance, dewatering, and reinstatement should be implemented to mitigate silt pollution risks.

Monitoring and maintenance

Primary Monitoring location:
M1: Southern extent of construction area
M2: Construction area entrance and southern temporary basin / silt capture channel outfall
M3: Site compound / chemical storage and temporary swale
M4: Eastern boundary
M5: Entrance to DWH parcel and culverted section of swale
M6: Temporary basin and stockpile area
M7: Stockpile area

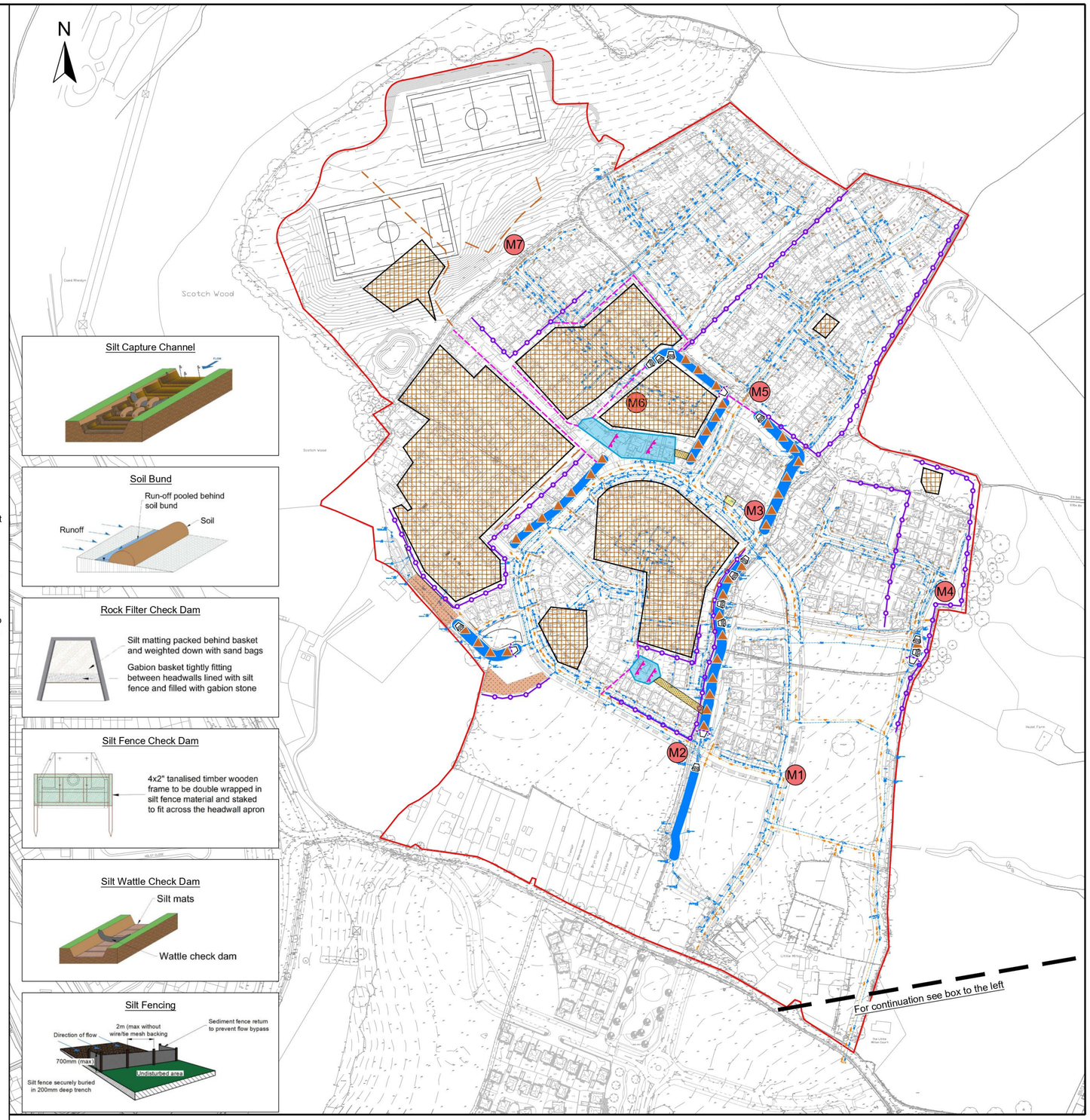
•Maintenance of the installed silt mitigation measures should be undertaken as appropriate prompted by the regular monitoring regime being undertaken by the site team.

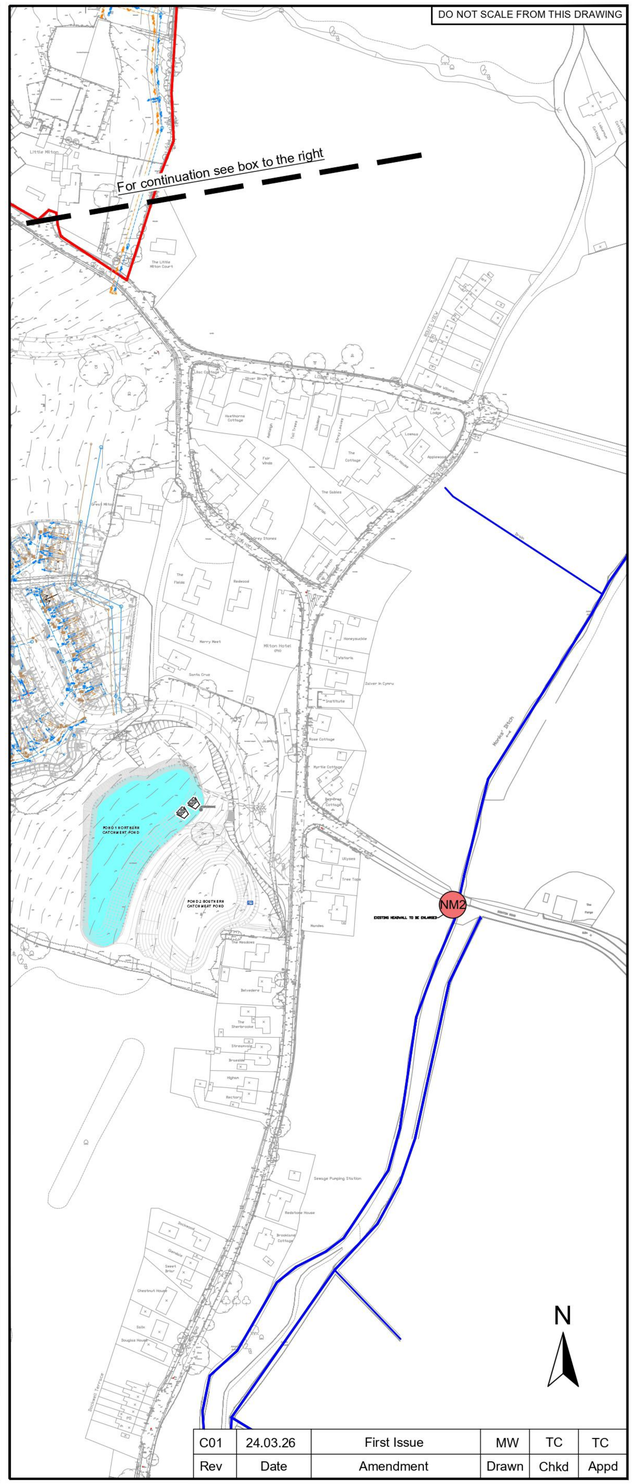
•Monitoring of all other implemented specific silt pollution interventions shall be conducted to assess their effectiveness and prompt maintenance if required.

•Road and gully condition: Monitor the road surface condition (for track out) and the condition and effectiveness of road gully and chamber protection measures within the active construction areas. Implement maintenance to retain effectiveness.

•Stockpiles: Monitor each stockpile to asses if uncontrolled run-off is occurring. Assess the requirement for placement of silt fencing at the base of the stockpile to control run-off.

•Excavations: Monitor all excavations to ascertain if run-off may / is flooding the excavation, and therefore if there is a need to install a bund or silt fence up-gradient of the excavation to control run-off flow direction.





Rev	Date	Amendment	Drawn	Chkd	Appd
C01	24.03.26	First Issue	MW	TC	TC

LEGEND
- Site boundary
- Surface water drainage
- Foul water drainage
- Stockpile area
- Swales to be lined/seeded
- Recommended line of soil bund
- Rock filter check dam
- Silt fence check dam
- Silt capture channel
- Cut off ditches
- Recommended line of silt fencing
- M1 Primary monitoring location
- Silt wattle check dam
- Surface watercourse (pre-existing)
- Surface watercourse (constructed as part of development)
- Recommended area of revegetation or hydroseed
- Temporary basin with compartmentalisation
- Wheel wash

Notes:
The schematic drawing is not meant to be an accurate engineering drawing but is used to present the general relative locations of features on, and surrounding, the site. Features annotated on this schematic are not drawn to scale but are centered over the approximate location. Such features should not be used for setting out, nor should it be considered a schedule and should be considered indicative only.
Details (such as height, width or depth) of mitigation features such as bunds, grips or ditches shall be designed by the temporary works designer, accepted by the principal designer and recorded on the temporary works register in accordance with BS5975.
RSK shall not be liable for the use of this drawing, or the information contained within, for any purpose other than that which it was provided.

Base plan provided by client
Drawing Ref.:
1) 10227-x-MPLAN ROADS rev R
2) 10227-x-OS Plan
3) 10227-x-Topogrpahic Survey
4) 10227-x-WER2-X18-17.09.20
5) 10275 - x - Cedars 3 Engineering V8
6) 10275 - x - Engineering V10
7) 10275 - x - Infrastructure Drainage V21
8) 10275 - x - Infrastructure V12a
9) 10275 - x - P21-3058_01AJ Site Layout
10) 10275 - x - P21-3285_01AH Site Layout
11) 10275 - x - P22-0085_01X Site Layout
12) 10277-x-Phase 3 Engineering V7
13) 10448 - 100T2 - 101T2 - 102T3 - 128T3 - Infrastructure
14) 10448 - Xref - P24-3114_DE_01AC Site Layout

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Dimensions	Scale	Size
m	NTS	A1

Client: Barratt Redrow
Project Name: Great Milton Park, llanwern
Description: Surface Water Management Plan
File Name: 315591-BL-276-XX-D-G-27605-C01

Project ID	Drawing no.	Revision
315591	27605	C01