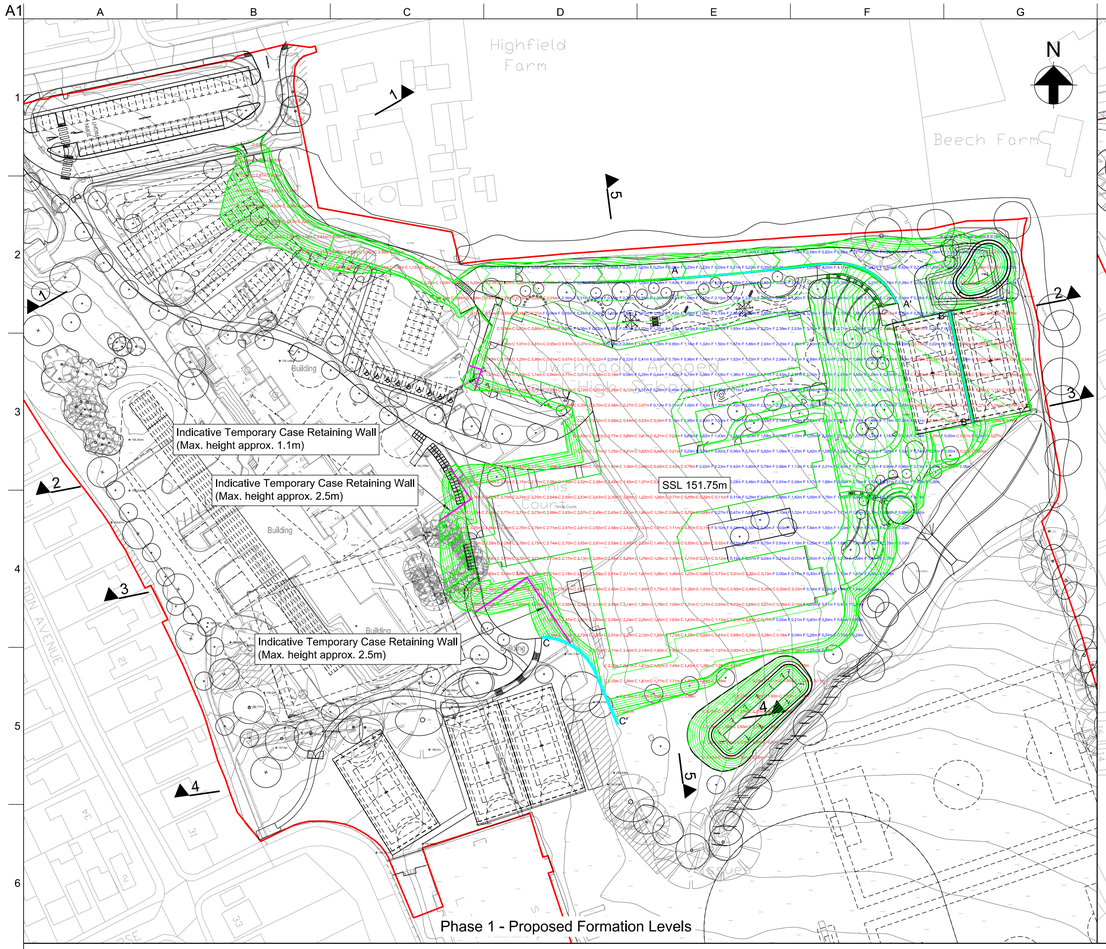
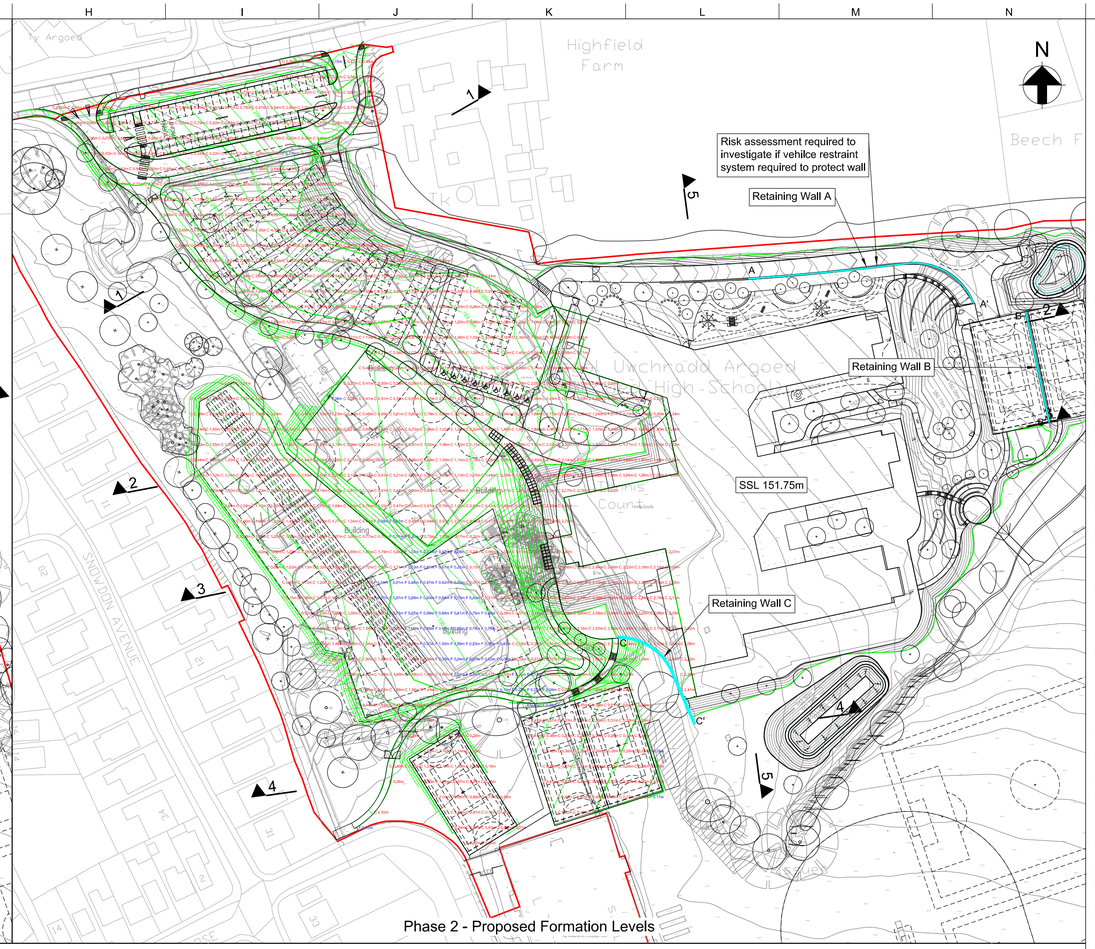
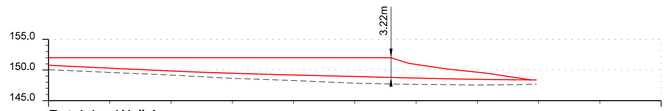


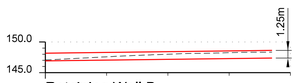
Phase 1 - Proposed Formation Levels



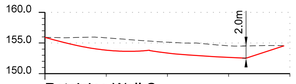
Phase 2 - Proposed Formation Levels



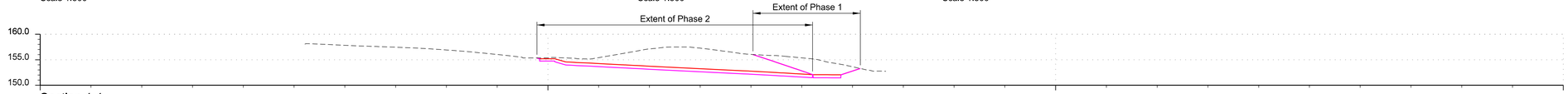
Retaining Wall A
Scale 1:500



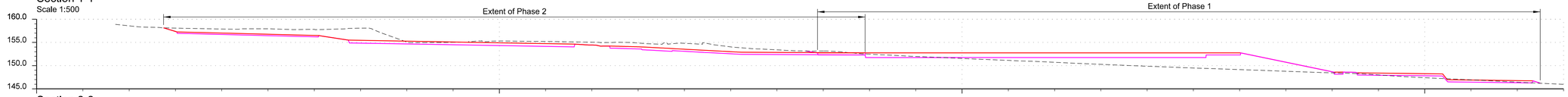
Retaining Wall B
Scale 1:500



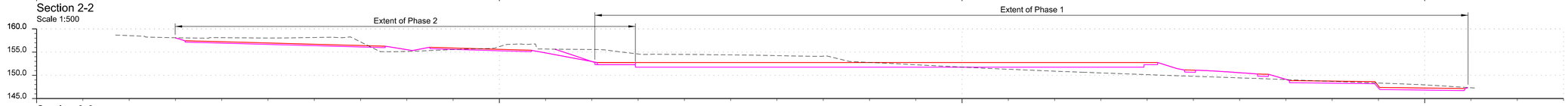
Retaining Wall C
Scale 1:500



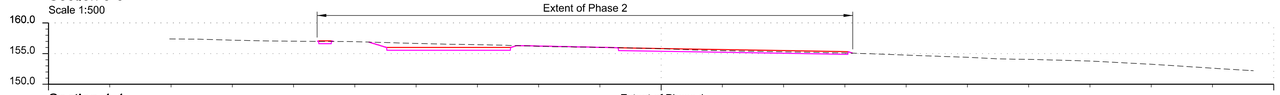
Section 1-1
Scale 1:500



Section 2-2
Scale 1:500



Section 3-3
Scale 1:500



Section 4-4
Scale 1:500

Section 5-5
Scale 1:500

Legend - Plan

- Site Boundary
- Phase 1 and 2 Formation Levels Contours (148.0m)
- C 0.60m — Proposed depth of Cut
- F 0.71m — Proposed depth of Fill
- Permanent Retaining Wall
- Indicative Temporary Case Retaining Wall

Legend - Cross Sections

- Proposed Finished Level
- Proposed Formation Level

Volume Calculations

Phase 1		Phase 2	
Cut:	13966 cu m	Cut:	29884 cu m
Fill:	12688 cu m	Fill:	890 cu m
Net:	1278 cu m	Net:	28994 cu m

Basin
Cut: 1025 cu m
Fill: 0 cu m
Net: 1025 cu m

Note - Cut and Fill balance assumes all excavated material suitable for re-use. Volumes shown on this drawing are based on cut and fill from existing level to proposed formation level. Topsoil thickness not known, to be determined within ground investigation. Proposed levels may need to be amended to achieve Earthworks balance once topsoil thicknesses have been established.

Notes

1. Do not scale from this drawing.

2. The details shown on this drawing are based on a RIBA Stage 3 produced for MIMWEP Stage 2. The details will need to be reviewed and revised during subsequent design stages.

3. Topographic survey based on: Argoed School, Bryn Road, Mold Site Survey May 2020, related to Ordnance Survey G.P.S. Datum HSP Consulting.

4. All levels are shown above ordnance datum (m AOD).

5. The details shown on this drawing are subject to change in subsequent design stages and following any potential comments received from statutory authorities.

6. All imported material to be Granular Class 1A / 1B general fill and be placed and compacted in layers, in accordance with earthworks specification.

7. The earthworks strategy is to achieve a cut/fill balance for the two phases to minimise amount of imported material and to mitigate the need for temporary stockpiling during construction. A balance has been found for the first phase. The finished levels of the second phase will need to be raised to reduce the current net material - to be undertaken at future design phases.

8. Assumed construction build-ups:-
Phase 1 - 500mm
Phase 2 - 450mm
Build-up depth to be confirmed at future design phases and likely to be revised in due course.
Note the construction build-up refers to the depth between the formation and finished levels.

9. Layouts are based on conceptual layouts received from Ares on 11-06-2021 and are subject to ongoing coordination and further design development during subsequent stages.

Issue	Date	By	Chkd	Appd
P02	07/07/21	DS	AR	JS
	Issued for Information			
P01	23/06/21	DS	AR	
	Issued for Information			

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Client
Flintshire County Council - WEPco

Project Title
Campus Mynydd Isa
Flintshire

Drawing Title
Proposed Earthworks

Scale at A1 1:1000 | Role Infrastructure

Suitability
A2 - Authorized and Accepted as 'Planning Application Submission'

Job No 280340 | Rev P02

Drawing No
FL0101-ARP-01-00-DR-C-21001

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Do not scale

Legend

- Site Boundary
- Surface Water Drainage
- Foul Water Drainage
- Rising Main (Assumed location, to be confirmed following further investigation)
- Easement
- Electric
- Telecoms
- Telecoms - Overhead
- Gas
- Water
- CCTV
- Heating and Cooling Main
- Drainage Channel
- Unknown

Notes

1. Do not scale from this drawing.

2. The details shown on this drawing are based on a RIBA Stage 3 produced for MIMWEP Stage 2. The details will need to be reviewed and revised during subsequent design stages.

3. Topographic survey based on: Argoed School, Bryn Road, Mold Site Survey May 2020, related to Ordnance Survey G.P.S. Datum HSP Consulting.

4. All levels are shown above ordnance datum (m AOD).

5. The details shown on this drawing are subject to change in subsequent design stages and following any potential comments received from statutory authorities.

6. Easements of public utilities to be confirmed with Statutory and will be shown on future design stage.

7. The positions of the existing services on this drawing have been interpreted from information and HSP Consulting's survey drawing received from the statutory local authorities. No responsibility can be taken for the accuracy of utilities Information provided.

8. Contractor to investigate and identify all known and unknown services prior to commencement of works.

9. Contractor to consult with appropriate statutory authorities prior to commencement of works on their assets.

10. Refer to MEP drawings for the utility strategy and how the services are to be removed and at what stage of the project.

11. The existing drainage of the school site will need to be accommodated during construction. Details to be confirmed at future design stages.

Issue	Date	By	Chkd	Appd
P02	07/07/21	DS	AR	JS
	Issued for Information			
P01	23/06/21	DS	AR	
	Issued for Information			

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Client
Flintshire County Council - WEPco

Project Title
Campus Mynydd Isa
Flintshire

Drawing Title
Existing Drainage and Utilities

Scale at A1	Role
1:1000	Infrastructure

Suitability
A2 - Authorized and Accepted as 'Planning Application Submission'

Job No	Rev
280340	P02

Drawing No
FL0101-ARP-01-00-DR-C-25001

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Legend

- Site Boundary
- Proposed Surface Water Drainage
- Proposed Foul Water Drainage
- Proposed Rising Main
- Proposed Bio-remediation Drainage Channel
- Easement
- Proposed Water
- Proposed Gas
- Proposed HV Electric
- Proposed LV Electric

Notes

1. Do not scale from this drawing.

2. The details shown on this drawing are based on a RIBA Stage 3 produced for MIMWEP Stage 2. The details will need to be reviewed and revised during subsequent design stages.

3. Topographic survey based on: Argoed School, Bryn Road, Mold Site Survey May 2020, related to Ordnance Survey G.P.S. Datum HSP Consulting.

4. All levels are shown above ordnance datum (m AOD).

5. The details shown on this drawing are subject to change in subsequent design stages and following any potential comments received from statutory authorities.

6. Existing services to the existing school building to be removed not shown on this drawing for clarity.

7. Contractor to identify any unknown services prior to commencement of works.

8. Contractor to investigate and identify all known and unknown services prior to commencement of works.

9. Refer to MEP drawings for the utility strategy and how the services are to be removed and at what stage of the project.

10. The existing drainage of the school site will need to be accommodated during construction.

Issue	Date	By	Chkd	Appd
P02	07/07/21	DS	AR	JS
	Issued for Information			
P01	23/06/21	DS	AR	
	Issued for Information			

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Client
Flintshire County Council - WEPco

Project Title
Campus Mynydd Isa
Flintshire

Drawing Title
Proposed Drainage and Utilities

Scale at A1: 1:1000
Role: Infrastructure

Suitability
A2 - Authorized and Accepted as 'Planning Application Submission'

Job No: 280340
Rev: P02

Drawing No
FL0101-ARP-01-00-DR-C-25011

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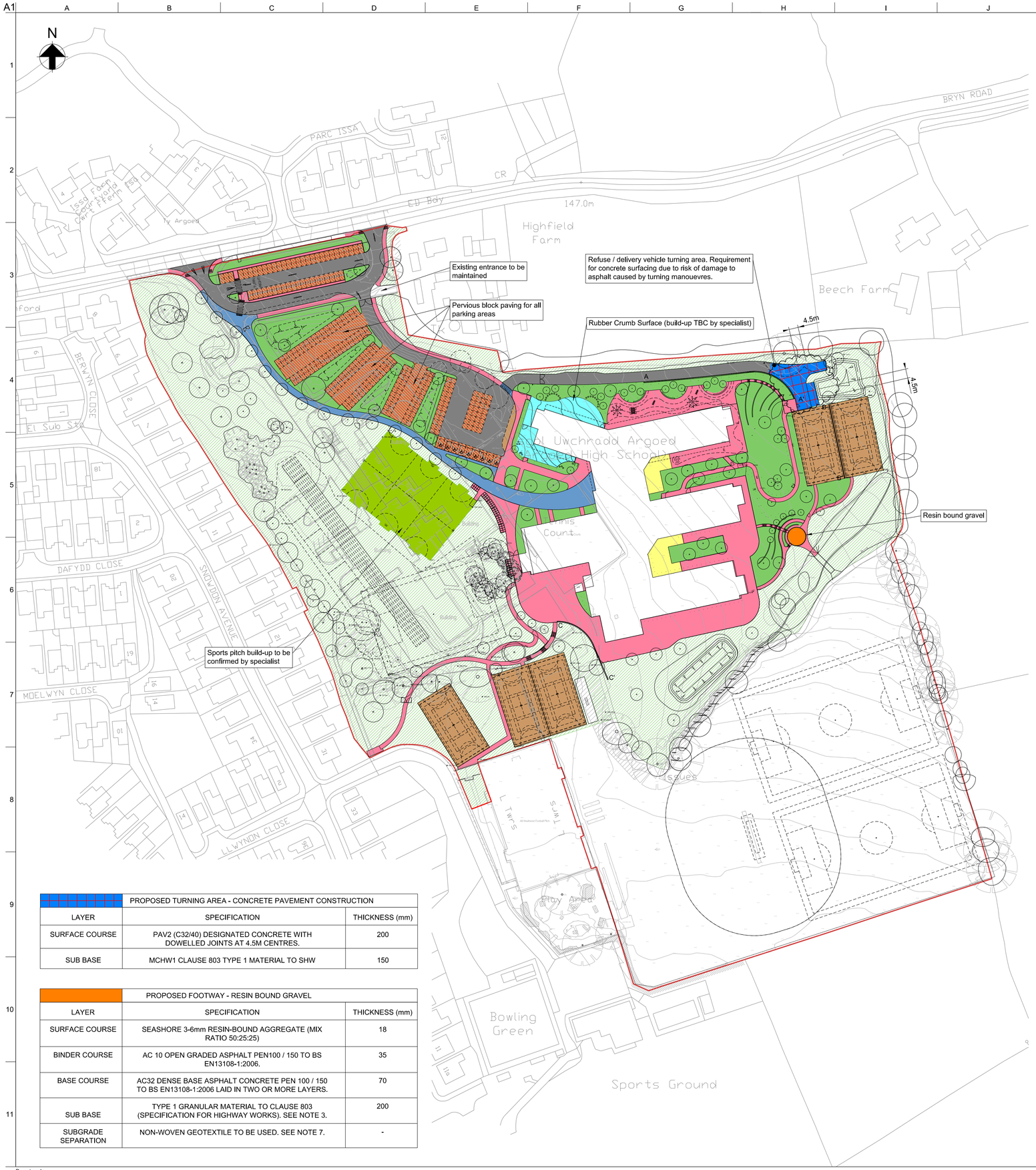
Do not scale



	PROPOSED TURNING AREA - CONCRETE PAVEMENT CONSTRUCTION	
LAYER	SPECIFICATION	THICKNESS (mm)
SURFACE COURSE	PAV2 (C32/40) DESIGNATED CONCRETE WITH DOWELLED JOINTS AT 4.5M CENTRES.	200
SUB BASE	MCHW1 CLAUSE 803 TYPE 1 MATERIAL TO SHW	150

	PROPOSED FOOTWAY - RESIN BOUND GRAVEL	
LAYER	SPECIFICATION	THICKNESS (mm)
SURFACE COURSE	SEASHORE 3-6mm RESIN-BOUND AGGREGATE (MIX RATIO 50:25:25)	18
BINDER COURSE	AC 10 OPEN GRADED ASPHALT PEN100 / 150 TO BS EN13108-1:2006.	35
BASE COURSE	AC32 DENSE BASE ASPHALT CONCRETE PEN 100 / 150 TO BS EN13108-1:2006 LAID IN TWO OR MORE LAYERS.	70
SUB BASE	TYPE 1 GRANULAR MATERIAL TO CLAUSE 803 (SPECIFICATION FOR HIGHWAY WORKS). SEE NOTE 3.	200
SUBGRADE SEPARATION	NON-WOVEN GEOTEXTILE TO BE USED. SEE NOTE 7.	-

	PROPOSED HIGHWAY - ASPHALT	
LAYER	SPECIFICATION	THICKNESS (mm)
SURFACE COURSE	AC10 CLOSE SURF, PSV 65 MIN, AAV 12 MAX TO BE EN 13108-4 AND BS 594987:2015	40
BINDER COURSE	AC20 DENSE BIN 40/60 REC. TO BS594987:2015 AND CLAUSE 906 OF THE SHW	60
BASE COURSE	AC32 DENSE BASE 40/60 REC. TO BS594987:2015 AND CLAUSE 906 OF THE SHW	150
SUB BASE	TYPE 1 GRANULAR MATERIAL TO CLAUSE 803 (SPECIFICATION FOR HIGHWAY WORKS). SEE NOTE 9.	230
CAPPING LAYER	CAPPING TO CLAUSE 613 (SPECIFICATION FOR HIGHWAY WORKS). SEE NOTE 9.	380

	PERVIOUS ASPHALT	
LAYER	SPECIFICATION	THICKNESS (mm)
SURFACE COURSE	10mm 'SUPER DRAIN ASPHALT' THIN SURFACE COURSE SYSTEM, BIN 20mm OR SIMILAR APPROVED MATERIAL	30
BINDER COURSE	14mm 'SUPER DRAIN ASPHALT' BINDER COURSE SYSTEM WITH >18% VOID CONTENT OR SIMILAR APPROVED MATERIAL	50
BASE COURSE	32mm 'SUPER DRAIN ASPHALT' BASE COURSE SYSTEM WITH >18% VOID CONTENT OR SIMILAR APPROVED MATERIAL	70
SUB BASE	TYPE 3 GRANULAR MATERIAL TO CLAUSE 805 (SPECIFICATION FOR HIGHWAY WORKS) WITH PERFORATED CARRIER DRAINS AT REGULAR INTERVALS. SEE NOTE 9.	230
CAPPING LAYER	CAPPING TO CLAUSE 613 (SPECIFICATION FOR HIGHWAY WORKS). SEE NOTE 9.	380
SUBGRADE SEPARATION	GEOMEMBRANE WRAPPED IN NON-WOVEN GEOTEXTILE. SEE NOTE 10.	-

	PROPOSED FOOTWAY - CONCRETE BLOCK PAVING #1	
LAYER	SPECIFICATION	THICKNESS (mm)
SURFACE COURSE	200MM x 300MM CONCRETE BLOCK PAVING SLAB	50
BINDER COURSE	MORTAR BED CONFORMING TO BS 7533-4:2006, CLAUSE 5.4.5.2, TABLE 3 JOITING TO CONFORM TO BEDDING DETAILS),JOINT WIDTH 8-100mm)	30
ROAD BASE	GRADE 32 / 40 CONCRETE SLAB WITH DOWELLED JOINTS AT 4.5m CENTRES	150
SUB BASE	TYPE 1 GRANULAR MATERIAL TO CLAUSE 803 (SPECIFICATION FOR HIGHWAY WORKS). SEE NOTE 9.	300

	PROPOSED FOOTWAY - CONCRETE BLOCK PAVING #2	
LAYER	SPECIFICATION	THICKNESS (mm)
CONCRETE SLAB	100MM x 200MM CONCRETE BLOCK PAVING SLAB	50
SAND-LAYING COURSE	SAND LAYING COURSE WITH SAND FILLED NARROW JOINTS IN ACCORDANCE WITH BS7533-4	50
SUB BASE	TYPE 1 GRANULAR MATERIAL TO CLAUSE 803 (SPECIFICATION FOR HIGHWAY WORKS). SEE NOTE 9.	350

	PROPOSED PEDESTRIAN AREA - ASPHALT	
LAYER	SPECIFICATION	THICKNESS (mm)
SURFACE COURSE	AC6 DENSE 100/150 (EXCLUDING LIMESTONE) TO BS EN 13108-1 AND BS 594987:2015	20
BINDER COURSE	AC 20 DENSE BIN 100/150 REC. TO BS594987:2015 AND CLAUSE 906 OF THE SHW	50
SUB BASE	TYPE 1 GRANULAR MATERIAL TO CLAUSE 803 (SPECIFICATION FOR HIGHWAY WORKS). SEE NOTE 9.	225

	PROPOSED PARKING BAYS - PERMEABLE BLOCK PAVING	
LAYER	SPECIFICATION	THICKNESS (mm)
SURFACE COURSE	200MM x 100MM PERMEABLE CONCRETE BLOCK PAVING SLAB - TYPE B SYSTEM	80
LAYING COURSE	LAYING AND JOINTING AGGREGATES TO BE CONFIRMED AT A LATER STAGE ONCE BLOCK PAVING MANUFACTURER IS SELECTED	50
GEOMEMBRANE	PERMEABLE GEOTEXTILE TO ALLOW PERCOLATION THROUGH TO BASE LAYER	-
BASE COURSE	DENSE BITUMEN MACADAM BASE WITH 75MM HOLES PUNCHED ON AN ORTHOGONAL GRID OF 750MM	130
SUB BASE	CRUSHED TYPE 4/20 COURSE AGGREGATE (COMPLIANT WITH BS EN 13242) WITH PERFORATED CARRIER DRAINS AT REGULAR INTERVALS. SEE NOTE 9.	275

	PROPOSED SOFT LANDSCAPING - TO BE CONFIRMED BY LANDSACPE ARCHITECT	
LAYER	SPECIFICATION	THICKNESS (mm)
TOP SOIL	CLEAN TOPSOIL	TBC
SUB SOIL	CLEAN SUB-SOIL	TBC

Legend

- Site Boundary
- Proposed Highway - Asphalt
- Proposed Footway - Concrete Block Paving
- Pervious Asphalt
- Proposed Sports Pitch - Specialist buildup
- Proposed Pedestrain Area - Asphalt
- Existing soft landscaping to be reinstated
- Proposed Turning Area - Concrete
- Dowelled concrete joints

Notes

1. Do not scale from this drawing.

2. The details shown on this drawing are based on a RIBA Stage 3 produced for MIMWEP Stage 2. The details will need to be reviewed and revised during subsequent design stages.

3. Topographic survey based on: Argoed School, Bryn Road, Mold Site Survey May 2020, related to Ordnance Survey G.P.S. Datum HSP Consulting.

4. All levels are shown above ordnance datum (m AOD).

5. The details shown on this drawing are subject to change in subsequent design stages and following any potential comments received from statutory authorities.

6. Drawing does not show proposed soft landscaping details to be incorporated for the SuDS design.

7. Soft landscaping soil details to be advised by Landscape Architect.

8. Kerbing not shown, but kerbs and transitions to be included between changes of surfacing.

9. A design CBR value of 3% has been taken across the site based on initial geotechnical information. CBR to be confirmed and build-up designs reviewed and refined at a later stage.

10. Wrapped geomembrane used for car park areas to stop infiltration due to the potential for water seepage through the construction layer.

11. The construction finishes are to be confirmed by the Landscape Architect and the construction build-up to be updated. Material types and depths are based on limited information.

12. Layouts are based on conceptual layouts received from Ares on 11-06-2021 and are subject to ongoing coordination and further design development during subsequent stages.

13. Hard Landscaping Finishes based on Ares drawing FL0101-ALA-00-XX-DR-L-0003 S2 Rev. P02 dated 18-06-2021.

14. Jointing layout is indicative and shown only to denote joint spacing.

Issue	Date	By	Chkd	Appd
P02	07/07/21	DS	AR	JS
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Project Title
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Flintshire

Drawing Title
Construction Finishes

Scale at A1 1:1000 | Role Infrastructure

Suitability
A2 - Authorized and Accepted as 'Planning Application Submission'

Job No **280340** | Rev **P02**

Drawing No
FL0101-ARP-01-00-DR-C-22011

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