

Malvern Vale Site New 1 Form Entry Primary School Level 2 Feasibility Study

15th May 2015

Project BW10100L / 30102519



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Document control sheet

**BPP 04 F8
version 15; Mar 2013**

Project: Malvern Vale Site New 1FE Primary School
Client: Worcestershire County Council **Project No:** BW10100L
Document title: Feasibility Report
Ref. No: Client Ref. 30102519

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Introduction

Jacobs have been commissioned by Worcestershire County Council Property Services to carry out a level 2 feasibility study examining the option of developing a 1FE Primary School on a new site at Swinyard Road Malvern. The site forms part of a community use development and is the subject of a 106 Agreement between Worcestershire County Council, the developer of the surrounding housing (Persimmon Homes) and Malvern Hills District Council (MHDC).

The Site

The site is situated on the suburban fringe of the greater Malvern settlement to the north and west of the Leigh Sinton Road. The site forms part of a larger brownfield development in an area formerly dominated by a military establishment and associated staff housing. The development plan for this area is predominately housing together with some light industrial. The area has also been provided with a site set aside for community facilities of which the proposed school site forms part. This area has been developed with community sports pitches and the Malvern Vale Community Centre.

The Malvern Vale Centre and Pitches

The centre is owned by Malvern Hills District Council. The running of the centre has transferred, (initially for three years) to Worcestershire YMCA on a leasehold nil cost basis. The community centre features two multi-function halls, changing rooms for sport, a bar/café area, kitchen and a 50 Space car park. For a detailed layout of the community centre the reader is directed to indicative plans appended to this report.

The site is surrounded on 3 sides by recently developed residential properties and is bounded to the west by agricultural land leading westwards to Mill Coppice. The site generally slopes down towards the northeast. In addition to the area set aside for the school and the existing community centre building, there are two levelled grass pitches 1no 100m x 63m and 1no 50m x 78m (including runoffs).

The existing Malvern Vale Centre features a 50 space carpark, which includes 3no minibus and 3no disabled accessible spaces (refer appendix for RPS Landscape Plan).

Proposed School Site

The site area as a whole, including the area of junior pitch dedicated for school use is 1.028 ha including approximately 0.10 ha of un-levelled ground at the western end of the junior pitch, designated as 'habitat' on the proposed plan. The gross site area is positioned in the middle of the 0.9-1.1 Ha range suggested in Building Bulletin 103 for a 210 pupil capacity school.

The unusual shape generated by the presence of the Vale Centre, essentially dividing the site into two distinct areas, creates a challenge in the detailed landscape design in relating the new building to the field. A public footpath runs along the western site boundary.

The proposed soft PE area (represented by the dedicated junior pitch) at 0.39 ha is slightly below the bulletin standard of 0.42 ha. The terms of the 106 agreement require the client to enter into a joint use agreement with MHDC as a condition of transfer of the junior pitch to WCC. If a degree of access to the neighbouring senior pitch could be included in any joint use agreement, this would greatly enhance the play potential of the site, particularly for KS2.

The site area available for the building, hardplay and hard/soft social spaces is 0.38 ha (3840 m²). The working assumption is for the finished floor level in the new school to be set at the existing level within the community centre. The whole site area will require levelling (refer indicative levels on the accompanying plans). The attached plans indicate a notional single storey building footprint together with outlines of the other principal areas called for in the schedule. Whilst the hard PE and social areas are nominal; the area of soft informal and social space struggles to achieve 85% of the minimum area in the bulletin.

Options for mitigating the lack of external space are limited. A two storey arrangement with KS2 on the first floor would relax the site layout marginally but would seem disproportionate given the benefit created.

The existing service track and turning head occupy space, and by narrowing the site tend to drive the overall layout. The kitchen servicing for the proposal is most likely to be from the northeast and maintenance access onto the playground can be achieved in less obtrusive ways. Emergency access to the junior pitch might well be feasible from the joint use carpark. Given the foregoing and subject to the agreement with MHDC it may be possible to remove this altogether and free up space for the school external areas. (this option has not been explored within the attached costs.)

Site Investigation

This report and proposals is prepared using Ordnance Survey and BGS data only.

Given the limited space available for development a limited topographical survey has been undertaken to help underpin the assumptions about space and levels. (see appendix)

Visual inspection of the site has revealed boggy ground within the likely footprint of the building which may indicate either a spring/issue or a leak from an un-marked service (possibly related to previous uses). There is also evidence of service trenches having been dug through the current grassed surface.

Ordnance survey information pre-dating the existing development suggests that the site itself did not form part of the base buildings themselves, however other features from that era may be unrecorded. It is known that the whole of the site was in use for some time by the housing developer as compound/storage and soft landscaped upon completion. The surveyed levels indicate that in addition to the natural falls, the centre of site has been elevated slightly by filling. The proposed levels will require removal of this material and a degree of cut and fill within the original formation. At the southwest corner of the site, the depth of cut may expose the underlying mudstone and this will need verification with a trail pit/borehole.

It is recommended that given the previous uses onsite a detailed site investigation is undertaken to highlight any issues with imported fill or contamination from the storage or transit of materials.

The Brief and Accommodation Schedule

Accommodation Schedule for New 1.0 Form Entry Primary

A schedule for the proposed accommodation is appended. This schedule has been prepared using the generic template provided within the Schedule of Accommodation tool vers 6.2 referred to in DFE Bulletin 103, it is not intended that it reflect a detailed user brief. There is no nursery provision included in the schedule

Building features include

- single storey building 1241m² gross floor area
- Included within the above: Hall of 180m²
- Reception Classroom of 62m²
- 6no Classrooms of 55m² including light practical (excluding storage)
- Full kitchen facilities

The Site

- Level changes will necessitate significant lengths of retaining structures and these are indicated on the attached drawings
- 30m x 22m hardplay (715m²)
- 410m² further hard paved social space (includes 125m² reception play area)
- 845m² soft informal social space
- Access and parking is deemed to be included within the neighbouring MHDC site.

Fire Risk / Asbestos

The detailed design of the link/relationship with the community building will need to take account of the arrangements within the fire risk assessment for the existing building.

The existing buildings on the site were constructed post 2000 and no asbestos survey work is anticipated.

(however attention is directed to the site investigation section above regarding previous uses for the site)

Drainage

Newly constructed gravity foul and storm sewers are available in the spine road and their status is confirmed on the Severn Trent sewer record. (see appendix)

Stormwater; A site investigation including infiltration tests will be required to establish an approach to site drainage. The characteristic geology of the area is superficial deposits of mixed silts clays sands and gravels over Sidmouth Mudstones. SUDS measures will be required to attenuate run-off. Given the restricted space it is most

likely that these will be buried. It is therefore proposed that the main hardplay area is constructed in conventional macadam over a plastics sub-base replacement system. It is estimated that a volume of 107m³ will be required to attenuate down to 5l/s.

Services

Gas Water electric and Telecoms; all services are available in the nearby roadway.

Highways

The terms of the 106 agreement allocate 21 ordinary spaces 1 disabled space and 1-2 minibus spaces depending upon the detailed arrangement of the motorcycle parking within the existing MHDC carpark.

There is also a working assumption that there will be a requirement for cycle storage provision on the school site itself.

It is noted on drawings showing the road infrastructure of the estate that traffic calming measures are included in the scheme for the roads and that some of these have already been implemented.

Planning Consent

A consultation to Sport England will form part of the planning approval process.

The conditions for transfer of the junior pitch from MHDV to WCC are set out in the 106 agreement. It is important that any conditions applied over the site at planning stage are coordinated with and reflect the conditions in the agreement.

The developers' landscape drawing (see appendix) indicates tree planting on the road verge together with site fencing. These elements do not appear on the survey photographs and will need to be checked /confirmed.

Appendices Documents included with this report

- 1.0 Location Plan with neighbouring schools highlighted
- 2.0 Proposals 1.0 FE primary School Site Plan
- 3.0 Proposed Accommodation Schedule
- 4.0 Design Drawing Malvern Vale Centre
- 5.0 Landscape Drawing Malvern Vale Centre (RPS)
- 6.0 Topographical Survey Proposed School Site
- 7.0 Level 1 Feasibility Site Plan
- 8.0 Utilities

Costings



Worcestershire County Council
Property Services - Finance & Project Management Group

Estimate Summary

Site: **Malvern Vale Site**
Description: **New 1 FE Primary**
Project No: **30102519**
Site Ref:

Issued: **11 May 2015**
Lead Officer: **D Bicknell**
Estimating Officer: **Russ State-Davey**
Est Index:

Estimate Information:

Estimate Base Date:	May 15	New build area:	1,241 m²
Anticipated Start Date:	May 15	Alterations:	0 m²
Anticipated Completion Date:	Jun 16	Costs up-lifted to:	2Q15

Summary

Estimated Total Costs: (Including Preliminaries & Contingencies)

		Total Costs £
Construction Costs:	<i>Building work</i>	2,985,436
	<i>Mechanical work</i>	405,099
	<i>Electrical work (Includes ICT Infrastructure)</i>	217,750
	Building Work sub-total:	3,608,285
Direct Payments:	<i>Asbestos:</i>	-
	<i>Other (please specify)</i>	-
Sum to Balance:		115
	Building Work sub-total (including Direct Payments):	3,608,400
Fees & Statutory Charges:	<i>Professional fees</i> (Fee Category: 2)	460,844
	<i>Building Regs.</i>	7,211
	<i>Planning</i>	6,545
Total Project Cost (excluding VAT)		4,083,000
VAT (see notes on preparation/costs of estimate on next page)		Excluded
Total Project Cost (including VAT)		4,083,000

Information supplied by Feasibility Team

The estimate is based on the information provided on the following drawings:

Malvern Vale Site, New 1 Form Entry Primary School, Level 2 Feasibility Study. 24th March 2015

No specification information was provided for this scheme. Levels of specification have been assumed.

No structural information was provided.

No mechanical/electrical services information was provided so allowances have been made

Additional work associated with the development of a detailed brief and room data sheets have been excluded.

Estimate Methodology

The estimated costs are exclusive of VAT.

Cost associated with the purchase of any land or cost of any leases has been excluded

Site Abnormals

Costs in connection with unknown abnormals are excluded.

No allowance has been included for unknown ground conditions.

Costs in connection with pollution, and/or contamination of site are excluded.

Services and Infrastructure

Indicative allowances for Statutory connection charges are included, individual quotations will be needed for this development

Logistics and Health & Safety

The method of construction and logistical operation of the site were not outlined so these have been assumed

No costs have been included arising from such method statements i.e. disruption of third parties, road closures

The estimate is based on the builder having an onsite compound and unrestricted access to site.

Planning, Building Regulation and Environmental Issues

Costs of conditions imposed by the Planning Authority e.g. s.106 Agreements, Archaeology Survey etc have been excluded

The cost of consequential improvement works to the existing building required by the Building Regulations which are not directly referred to either on the feasibility drawing or specification have been excluded.

Costs imposed by the local Environmental Agency have been excluded.

It is recommended that a Ecologist is contacted to prepare an Ecology Survey

No costs have been included arising from any such Ecology Survey

Risk Management Issues

Furniture and Equipment

No schedules for fixed / loose F&E were available during the preparation of this estimate, these costs have been assumed

Inflation

BCIS All-in Tender Price Index used for calculation of inflation.

Fees

The fees involved in this estimate are limited to construction professionals only

Property Services - Finance & Project Management Group

Budget / Estimate Report

Project No:	30102519	Site Ref No:		Estimate Index:		
Site:	Malvern Vale Site					
Description:	New 1 FE Primary					
Lead Officer:	D Bicknell	Estimating Officer:	Russ State-Davey			
Anticipated Programme:		Base Date:	May 2015			
Start on Site:	May 2015	Contract Period:	56	Weeks	Completion:	Jun 2016

Percentage Additions:	Inflation Index:	BCIS	Level of Information:		Is VAT applicable?
Preliminaries	12.00	from Base Date:	262	Lvl 1 - no information	If Yes <input type="checkbox"/>
Contingencies	5.00	to Start on Site:	262	Lvl 1 - information provided	No <input type="checkbox"/>
		no increase	-	Lvl 2 - information provided	

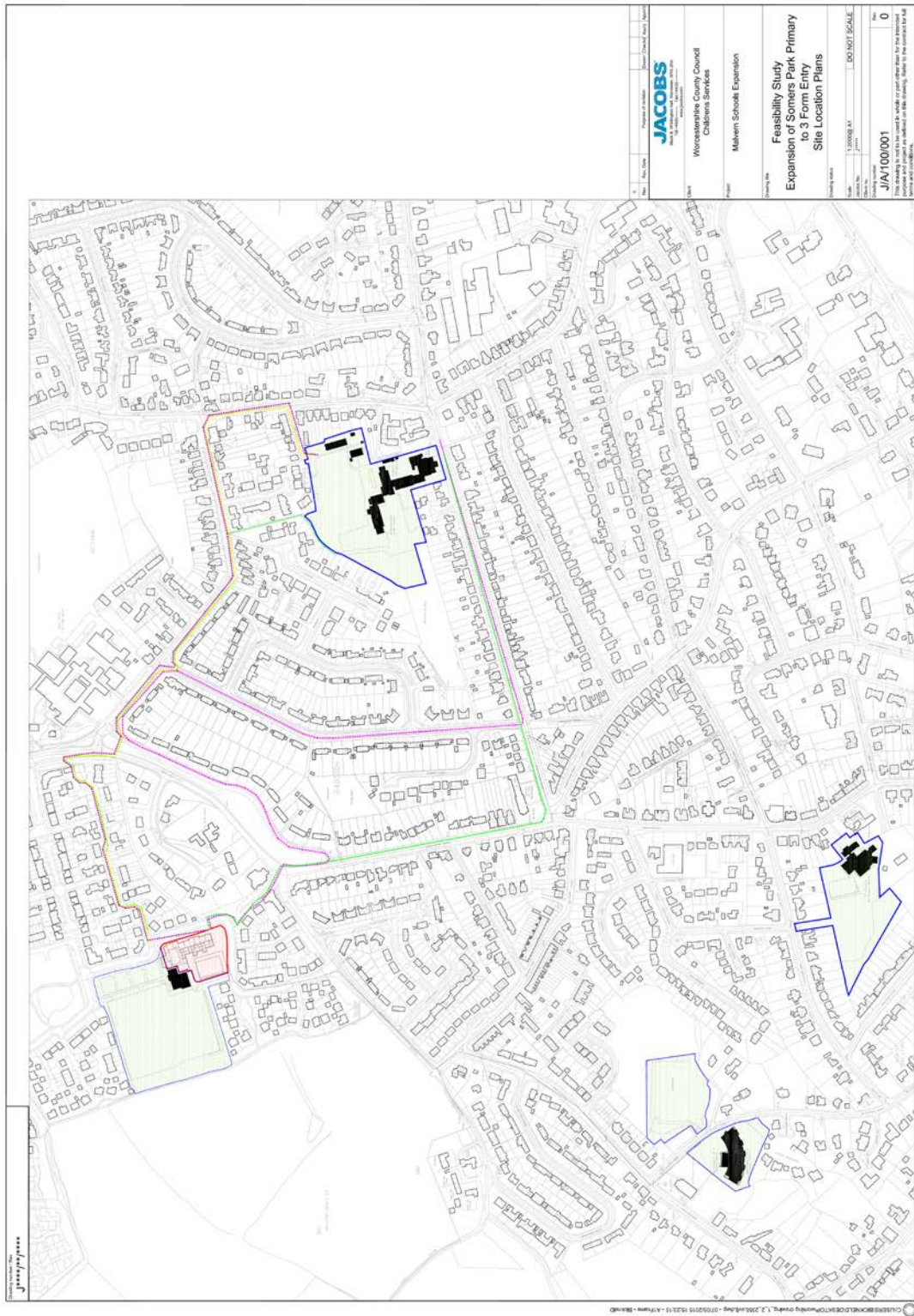
	Area calculations	m ²	£/m ²	New Build (£)	Alterations (£)
New Build / Extensions					
New 1 FE Primary		1,241	1,697	2,105,977	
				-	
<i>Area rates obtained from BCIS 11/05/2015 with location factor 99 for Malvern Hills</i>					
Total floor area		1,241			
Circulation allowance					
		1,241		2,105,977	

Calculated from New Build Cost Plan inc Preliminaries & Contingencies - -

New Build Total (N.B. Cost/m² includes Preliminaries/Contingencies) 1,241 m² **2,105,977**

Building Abnormals	New build			Alterations			
	nr/m/m ²	£		nr/m/m ²	£		
Generally	5%	2,105,977	105,299	5%	-	-	
Ground conditions	1,241	50	62,050		50	-	
			167,349			-	
<i>Preliminaries at 12%</i>			20,082			-	
Building Abnormals Total			187,431			-	187,431

1.0 Site Location Plan with neighbouring schools highlighted



4.0 Design Drawing Malvern Vale Centre



- 3.0 Accommodation schedule continued




Pupils	Number of Classes	FE	1FE areas extrapolated from BB103		Malvern Vale Site (whole school)		
210 at 1FE	7	1	210 Pupils				
Accommodation	Max Group Size	Number of Rooms Required	Av Area (m2)	Total Area (m2)	No. of rooms	Total area	Comments
Non Net Area							
Full Kitchen		1	47	47	1	47	
Servery		1	0	0	0	0	
Reception class toilets		3	4	12	3	12	
Other pupil toilet suites		3	9	27	3	27	
Accessible/ staff Toilet		2	4	8	2	8	
Staff Toilets		2	4	8	2	8	
BMA (Hygiene room)		1	12	12	1	12	
Changing Rooms		0	15	0	0	0	no allowance
Officials Changing		0	5	0	0	0	no allowance
Community Toilets		0	8	0	0	0	no allowance
Circulation - Net @X%				192	1	192	22.3%
Server Room		1	4	4	1	4	
Service Cupboards		2	2	4	2	4	
Plant - Net @X%				24		24	2.8%
Partitions - Net @ X%				44		44	5.1%
TOTAL NON NET AREA				382	382		
TOTAL GROSS AREA - SCHOOL				1241	1241		
				Gross area	1211		
				range	1345		

3.0 Accommodation Schedule



Accommodation Schedule							
Date	Apr-15		Schedule Version Number		1		
School	Malvern Vale Primary School						
Project Number	BW10100L						
Project Description	1 FE Primary School on Vale Site						
Pupils	Number of Classes	FE	1FE areas extrapolated from BB103		Malvern Vale Site (whole school)		
210 at 1FE	7	1	210 Pupils				
Accommodation	Max Group Size	Number of Rooms Required	Av Area (m2)	Total Area (m2)	No of rooms	Total area	Comments
Basic Teaching Area							
Reception Class	30	1	62	62	1	62	
KS1 Classbase	30	2	62	124	2	124	
KS2 Classbase	30	4	55	220	4	220	
Food/Science/D&T	15	1	34	34	1	34	
Large Food / Sci/ DT	30	0	62	0	0	0	
ICT Suite (no. of pc's)	30	0	0	0	0	0	not in BB103
Learning Resource/ Library	15-30	1	20	20	1	20	
SEN Resource Base	5	1	12	12	1	12	
SEN Therapy / MI	5	1	12	12	1	12	
Small Group Rooms	6	1	9	9	1	9	
Large Group Rooms	10	0			0	0	no allowance
TOTAL BASIC TEACHING AREA				493		493	
	Basic Teaching		Target min	420			
	Basic Teaching		Target max	492			
Main Hall (used for dining)	30	1	180	180	1	180	
Small Hall	30	0	80	0	0	0	
Studio	30	0	55	0	0	0	
TOTAL TEACHING AREA				673		673	
Staff & Admin							
Head's Office/Meeting room		1	16	16	1	16	
Senior Management Office		1	9	9	1	9	
Staffroom (prep and social)		1	34	34	1	34	
Staff work room		1	5	5	1	5	5 staff
General Office		1	13	13	1	13	3 staff
Sick Room/ bay		1	4	4	1	4	
Nurture Room		1			0	0	no allowance
Secure Entrance Lobby		1	5	5	1	5	
Copier/Repro Area		1	5	5	1	5	
Interview/Social Services		1	6	6	1	6	
Class Storage (Reception)		1	3	3	1	3	
Class Storage (KS1&2)		6	1.5	9	6	9	
Specialist Stores		1	5	5	1	5	
PE Store (Internal)		1	15	15	1	15	
PE Store (External)		1	4	4	1	4	
Central Stock		2	6	12	2	12	
Cloaks/Lunchbox Storage		7	2.5	17.5	7	17.5	
Chair Store / Dining Tables		1	7	7	1	7	
Wheelchair/ appliance bays		2	1.5	3	2	3	
Stage Store		1	4	4	1	4	
Community Store		1	3	3	1	3	
Caretakers Store		1	4	4	1	4	
Cleaners Store(s)		2	1.5	3	2	3	
TOTAL NET AREA				187		187	
				Net area target min	849		
				Net area target max	926		

8.0 Utilities Electricity



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Contact Us
 Mapping Enquiries: 0121 623 9789
 All other: 0845 724 0240
 Midlands: 0845 601 3341
 South Wales: 0845 601 2889
 South West

Date Requested: 05/05/2015
Job Reference: 6782067
Site Location: 377190 248360
Requested by: Mr Stephen Kay
Your Scheme/Reference: Malvern Vale Community Centre (MPL14.1)
 1:1250 Area or Circle dig site
 1:500 Line dig site

IMPORTANT NOTICES

- These plans are provided as a general guide only. Services or recent additions to the network may not be shown.
- Cables, overhead lines & substations owned by other electricity network owners or private companies may be present but will not be shown.
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- When working within 10m of any overhead electric line you should follow the requirements of HSE Guidance Note 035.
- For further advice on working near our electricity cables or lines, call our Contact Centre on 0800 096 3080.

Report Damage Immediately – KEEP EVERYONE AWAY FROM THE AREA
0800 6733 105

Overhead Line

- PL
- 11kV
- LV
- HT (11kV)
- HT (20kV)
- HT (33kV)
- HT (66kV)
- HT (132kV)

Underground Cable

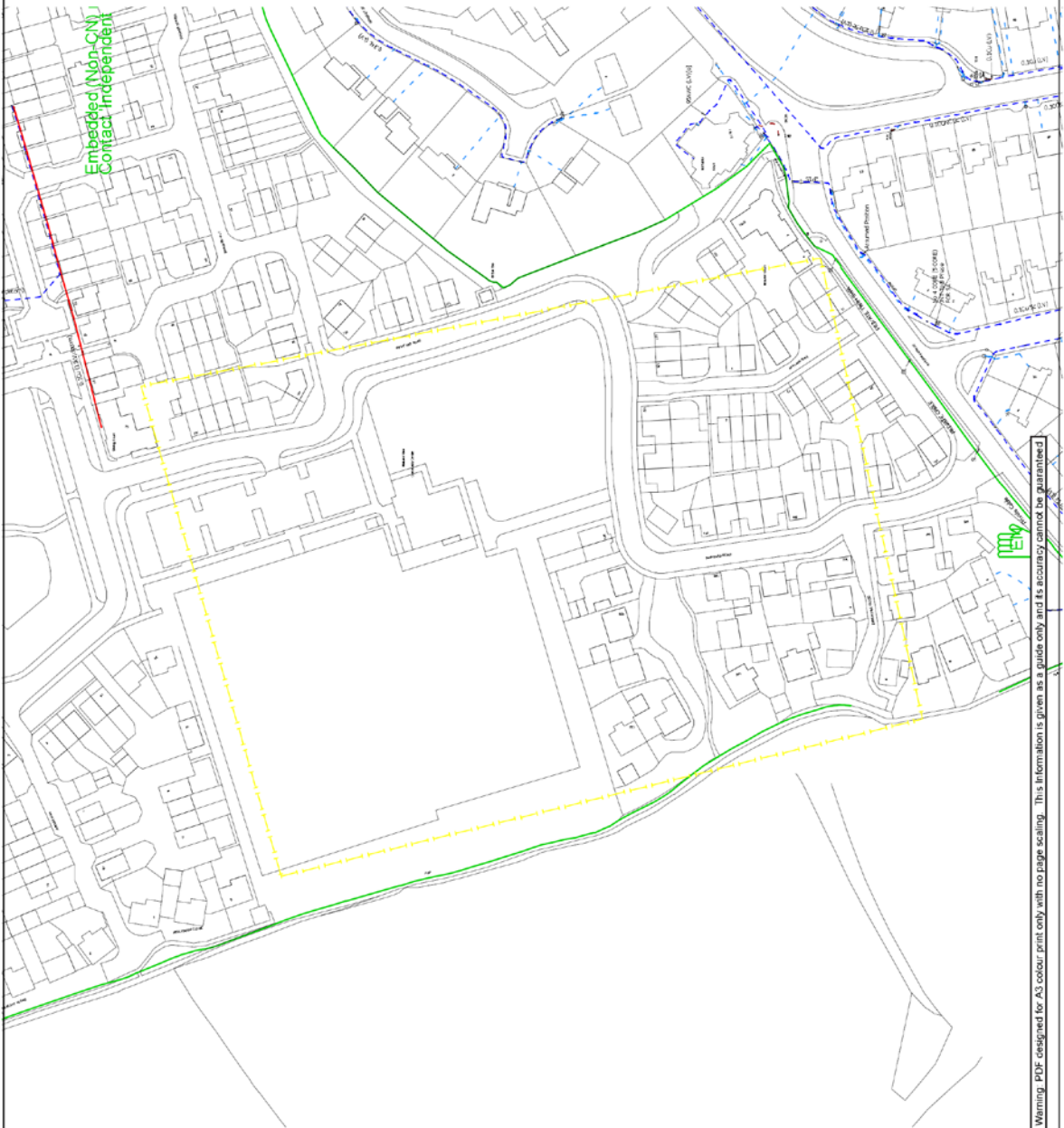
- 11kV
- LV
- HT (11kV)
- HT (20kV)
- HT (33kV)
- HT (66kV)
- HT (132kV)

Other Symbols:

- SWIFT Telecables
- Link Box
- PME Earth
- Sub-Mounted Transformer
- Link Location
- Underground Earth
- Ground Mounted Transformer

***Advice should be sought from the Western Power Distribution Contact Centre for any work that is to take place in proximity to 132kV underground cables and 132kV overhead lines – 0800 096 3080**

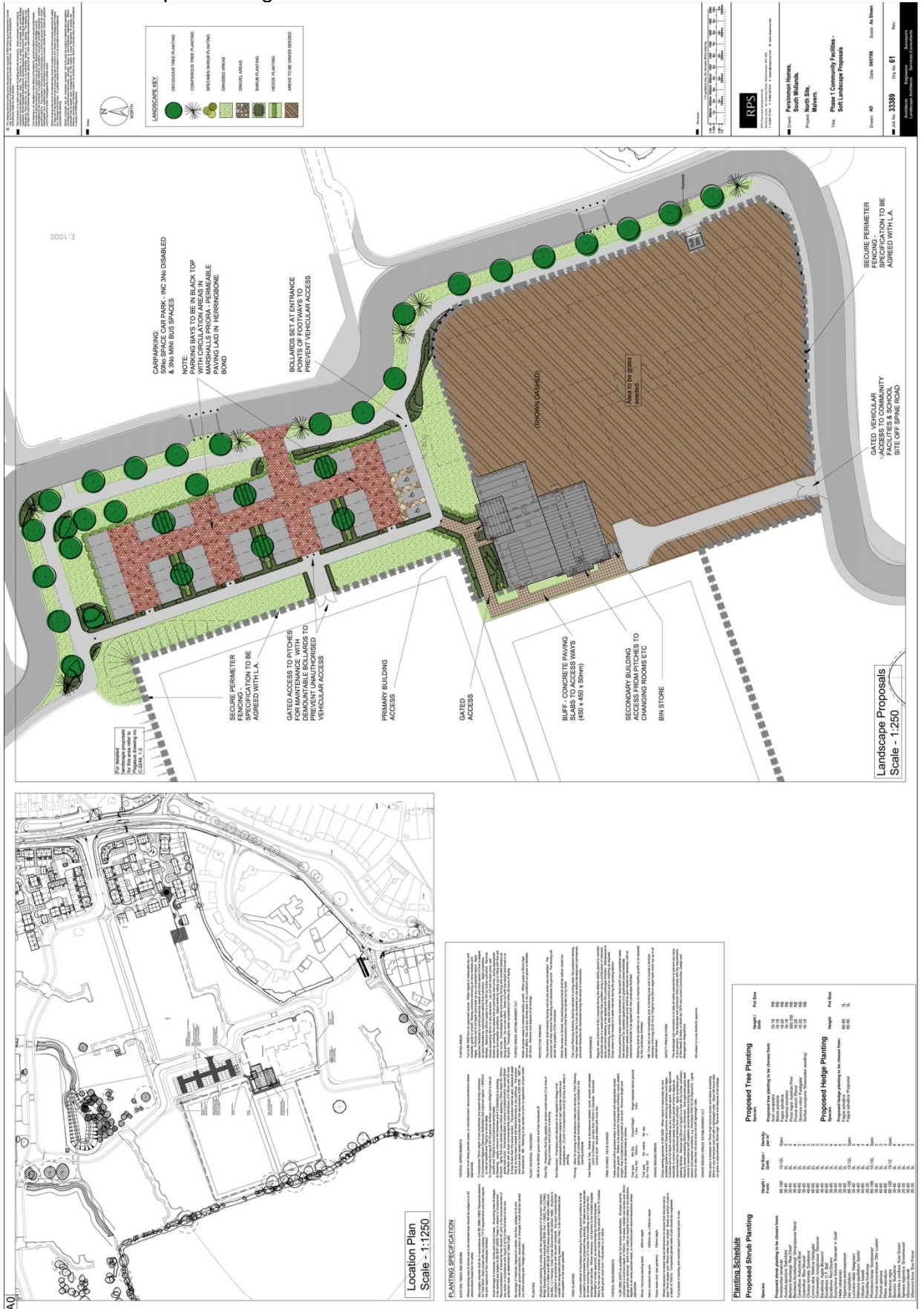
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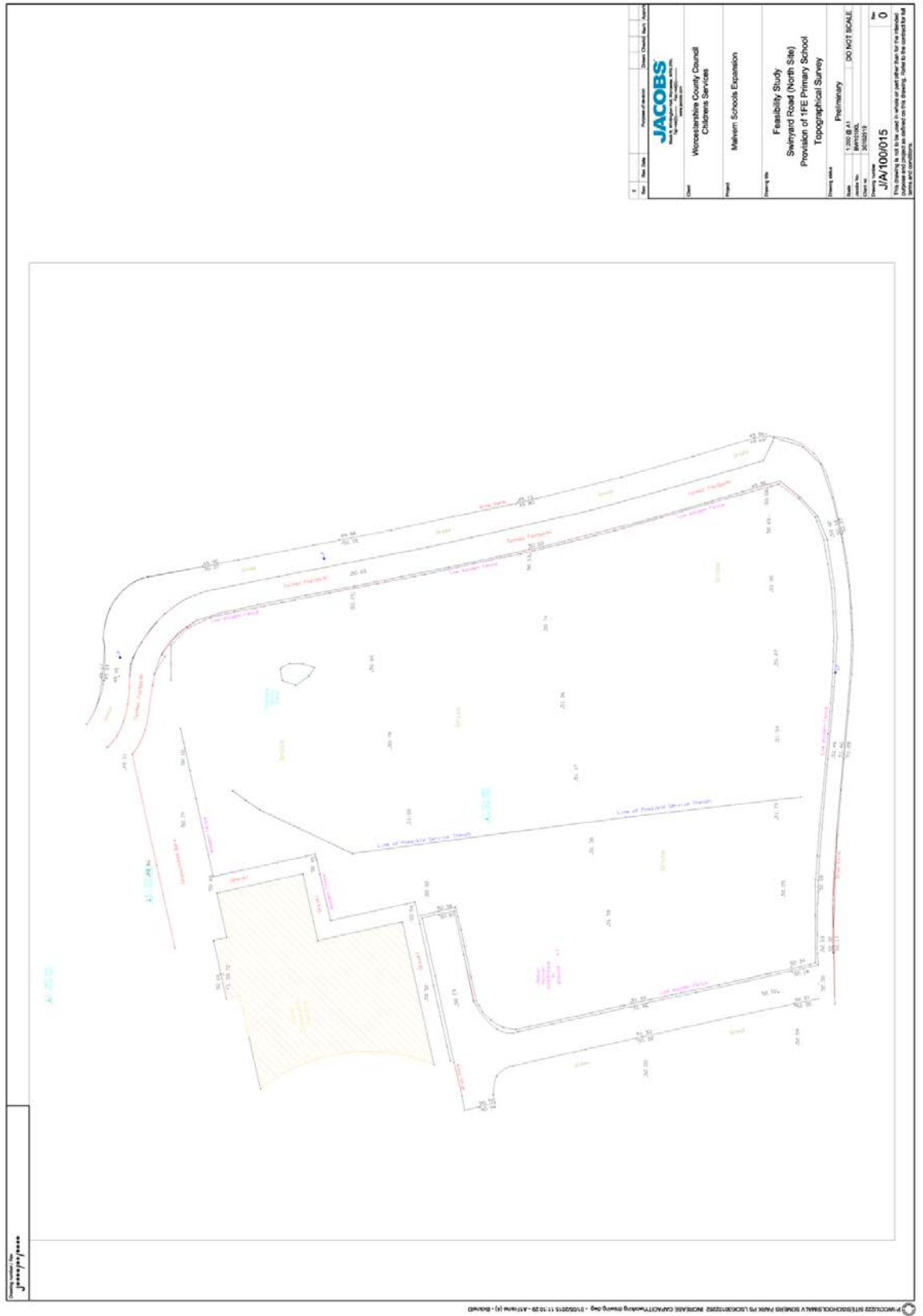
Plans generated by DigSAFE Pro (tm) software provided by PelicanCorp

Warning: PDF designed for A3 colour print only with no page scaling. This information is given as a guide only and its accuracy cannot be guaranteed

5.0 Landscape Drawing for Malvern Vale Centre and Car Park



6.0 Topographical Survey of Proposed School Site



8.0 Utilities Water



Severn Trent Water Limited
 Engineering Management
 PO Box 5344
 Coventry
 CV3 9FF
 Telephone: 0645 601 6616

SEVERN
TRENT
WATER

Water Mains Record
 O/S Map scale: Approx. 1:1250
 Date of issue: 05/05/2015

- Water main
- Fire main
- Fire hydrant
- Non-return
- High voltage cable
- Duct
- Appurtenant
- Water valve
- Washout hydrant
- Arcock
- Low voltage cable
- Unbonded air valve
- Roll meter
- Discharge
- Instrumentation

This map is centered upon OS Grid Ref: **x-377206, y-248095.0**

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