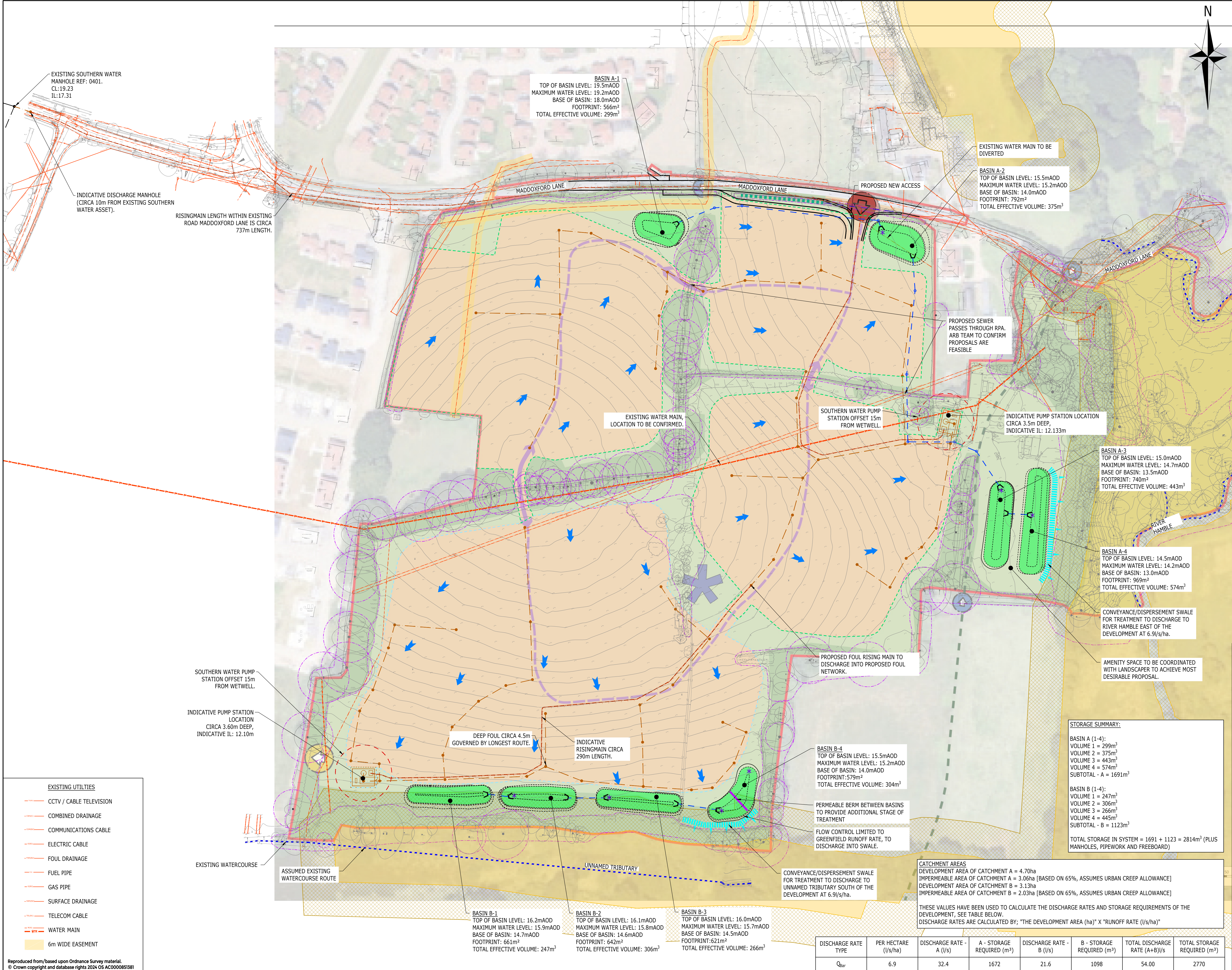




NOTES:

- THIS DRAWING IS TO BE READ IN CONJUNCTION WITH THE RELEVANT SPECIFICATION, INC. RISK ASSESSMENTS (SEE CDM NOTES) AND ALL OTHER RELATED DRAWINGS ISSUED BY THE ENGINEER.
- DO NOT SCALE FROM THIS DRAWING. WORK FROM FIGURED DIMENSIONS ONLY.
- ALL DIMENSIONS SHOWN ON THIS DRAWING ARE IN METRES UNLESS OTHERWISE STATED.
- ALL DIMENSIONS, LEVELS AND SURVEY GRID CO-ORDINATES ARE TO BE CHECKED ON SITE AND THE ENGINEER NOTIFIED IMMEDIATELY OF ANY DISCREPANCIES PRIOR TO THE COMMENCEMENT OF THE WORKS.
- NO DEVIATION FROM THE DETAILS SHOWN ON THIS DRAWING IS PERMITTED WITHOUT PRIOR PERMISSION FROM THE ENGINEER.
- ANY WORKS OUTSIDE RED SITE BOUNDARY ARE FOR INFORMATION PURPOSES ONLY. UNLESS SPECIFICALLY NOTED, ALL WORKS OUTSIDE THE SITE BOUNDARY WILL BE UNDERTAKEN BY OTHERS UNDER A SEPARATE CONTRACT.
- FOR RISING MAINS GREATER THAN 500m, FURTHER CONSIDERATION FOR: SEPTICITY/RETENTION TIME, SURGE EFFECTS (SUBMIT ANALYSIS), AIR RELEASE AT HIGH POINTS AND DURING SNORE, MAINTENANCE ACCESS, AND WASHOUTS AT LOW POINTS.
- AN ADDITIONAL PUMP STATION MAY BE REQUIRED IF THE GOVERNING WATER AUTHORITY ONLY ACCEPT A RISING MAIN LENGTH OF 500m. FURTHER CLARIFICATION TO BE SOUGHT.

KEY

- SITE BOUNDARY
- INDICATIVE HEADWALL
- INDICATIVE CONVEYANCE SWALE
- INDICATIVE SURFACE WATER SEWER
- INDICATIVE SUDS
- INDICATIVE FOUL WATER SEWER
- INDICATIVE RISING MAIN
- NORTH CATCHMENT
- SOUTH CATCHMENT
- SINC AND 20m BUFFER
- EXCEEDANCE/OVERLAND FLOW ROUTES
- ROOT PROTECTION AREA
- EXISTING SOUTHERN WATER FOUL SEWER
- EXISTING MAIN RIVER/WATERCOURSE
- INDICATIVE SEDIMENT FOREBAY

0m 10m 50m
Scale: 1:1000 @ A1

C	PLANNING ISSUE	AW	TR	AW	06.02.2026
B	PLANNING ISSUE	DR	TR	AW	12.12.2025
A	DRAFT ISSUE	DR	TR	AW	08.10.2025
Rev	Description	Drn	Chk	App	Date
Purpose:		Status:			
FOR PLANNING		NOT YET APPROVED			

ARDENT CONSULTING ENGINEERS
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Client:

BLOOR HOMES

Project Title:

LAND SOUTH OF MADDOXFORD LANE

Drawing Title:

DRAINAGE STRATEGY

Drawn by	Checked by	Approved by	Revision
DR	TR	AW	C
A1 Scale	Date		
1:1000	SEPT 2025		
Drawing Number			
2501890_A-ACE-XX-XX-DR-C-0651			

**Appendix H
SuDS Treatment Methods**

Pollution hazard indices for different land use classifications (land use shaded applicable for the development)

Land use	Pollution hazard level	Total suspended solids (TSS)	Metals	Hydrocarbons
Residential roofs	Very low	0.2	0.2	0.05
Other roofs (typically commercial/industrial roofs)	Low	0.3	0.2 (up to 0.8 where there is potential for metals to leach from the roof)	0.05
Individual property driveways, residential car parks, low traffic roads (eg cul de sacs, home zones and general access roads) and non-residential car parking with infrequent change (eg schools, offices) ie < 300 traffic movements/day	Low	0.5	0.4	0.4
Commercial yard and delivery areas, non-residential car parking with frequent change (e.g. hospitals, retail), all roads except low traffic roads and trunk roads/motorways	Medium	0.7	0.6	0.7
Sites with heavy pollution (e.g. haulage yards, lorry parks, highly frequented lorry approaches to industrial estates, waste sites), sites where chemicals and fuels (other than domestic fuel oil) are to be delivered, handled, stored, used or manufactured; industrial sites; trunk roads and motorways	High	0.8	0.8	0.9

**Indicative SuDS mitigation indices for discharges to surface waters
(SuDS components shaded applicable to this development)**

SuDS component	Pollution Hazard Mitigation indices		
	TSS	Metals	Hydrocarbons
Filter strip	0.4	0.4	0.5
Filter drain	0.4	0.4	0.4
Swale	0.5	0.6	0.6
Bio retention system	0.8	0.8	0.8
Permeable pavement	0.7	0.6	0.7
Detention basin	0.5	0.5	0.6
Pond	0.7	0.7	0.5
Wetland	0.8	0.8	0.8
Hydrodynamic Vortex Separator	0.5	0.4	0.5
Proprietary treatment systems	These must demonstrate that they can address each of the contaminant types to acceptable levels for frequent events up to approximately the 1 in 1 year return period event, for inflow concentrations relevant to the contributing drainage area.		

Indicative SuDS mitigation indices for discharges to surface water outfalls

For surface water discharge from all roads except low traffic roads and trunks/motorways			
Source	Required mitigation indices		
	TSS	Metals	Hydrocarbons
Medium	0.70	0.60	0.70
Drainage Network			
Detention Basins (mitigation index ₁)	0.50	0.50	0.60
Detention Basins (mitigation index ₂)	0.25	0.25	0.30
Swale (mitigation index ₃)	0.25	0.30	0.30
Total	1.00	1.05	1.20
Check	+0.30	+0.45	+0.50

Total SuDS mitigation index = mitigation index₁ + (0.5 x mitigation index₂)

For surface water discharge from low traffic roads			
Source	Required mitigation indices		
	TSS	Metals	Hydrocarbons
Medium	0.70	0.60	0.70
Drainage Network			
Detention Basins (mitigation index ₁)	0.50	0.50	0.60
Swales (mitigation index ₂)	0.25	0.30	0.30
Total	0.75	0.80	0.90
Check	+0.05	+0.20	+0.20

Total SuDS mitigation index = mitigation index₁ + (0.5 x mitigation index₂)

Appendix I

Maintenance Plan

Maintenance and Management

The attenuation basins, swales, connecting pipework, chambers, and flow controls would be maintained by a management company set up by the developer. As construction has not yet commenced, the process of finalising the management company contract has not yet commenced. The developer will ensure that the measures as outlined below form part of the management company contract details, for the ongoing maintenance of all SuDS features on site.

The indicative maintenance requirements for each proposed SuDS component is given below. Taken from CIRIA report C753 "The SuDS Manual".

Drainage Pipes

Maintenance schedule	Required action	Typical frequency
Regular Maintenance	Remove sediment and debris from inspection chambers and flow control chambers	Annually
	Cleaning of gutters and any filters on downpipes	Annually
	Remove any root ingress	As required
Occasional Maintenance	CCTV survey of drains to check alignment, cracking and joint displacement	10 year intervals

Attenuation Basins

Maintenance schedule	Maintenance Task	Frequency
Regular Maintenance	Remove litter and debris	Monthly (or as required)
	Cut the grass – for spillways and access routes	Monthly (during growing season), or as required
	Cut grass - meadow grass in and around basin	Half yearly (spring, before nesting season, and autumn)
	Manage other vegetation and remove nuisance plants	Monthly (at start, then as required)
	Inspect inlets, outlets, and overflows for blockages, and clear is required	Monthly
	Inspect banksides, structures, pipework etc. for evidence of physical damage	Monthly
	Inspect inlets and facility surface for silt accumulation. Establish appropriate silt removal frequencies	Monthly (for first year), then annually or as required
	Check any penstocks and other mechanical devices	Annually
	Tidy all dead growth before start of growing season	Annually
	Remove sediment from inlets, outlets and forebays	Annually (or as required)
	Manage wetland plants in outlet pool- where provided	Annually
Occasional Maintenance	Reseed areas of poor vegetation growth	As required

	Prune and trim any trees and remove cuttings	Every 2 years, or as required
	Remove sediment from inlets, outlets, forebay and main basin when required	Every 5 years, or as required (likely to be minimal requirements where effective upstream source control is provided)
Remedial Actions	Repair erosion or other damage by reseeding or returfing	As required
	Realignment of rip-rap	As required
	Repair/rehabilitation of inlets, outlets and overflows	As required
	Relevel uneven levels and reinstate design levels	As required

Swales

Maintenance schedule	Maintenance Task	Frequency
Regular Maintenance	Remove litter and debris	Monthly, or as required
	Cut the grass – to retain grass height within specified design range	Monthly (during growing season) or as required
	Manage other vegetation and remove nuisance plants	Monthly at start, then as required
	Inspect inlets, outlets and overflows for blockages, and clear if required	Monthly
	Inspect infiltration surfaces for ponding, compaction, silt accumulation, record areas where water is ponding for > 48 hours	Monthly, or when required

	Inspect vegetation coverage	Monthly for 6 months, quarterly for 2 years, then half yearly
	Inspect inlets and facility surface for silt accumulation, establish appropriate silt removal frequencies	Half yearly
Occasional Maintenance	Reseed areas of poor vegetation growth; alter plant types to better suit conditions, if required	As required or if bare soil is exposed over > 10% of the filter strip area
Remedial Actions	Repair erosion or other damage by re-turfing or reseed	As required
	Relevel uneven surfaces and reinstate design levels	As required
	Scarify and spike topsoil layer to improve infiltration performance, break up silt deposits and prevent compaction of the soil surface	As required
	Remove build-up of sediment on upstream gravel trench, flow spreader or at top of filter strip	As required
	Remove and dispose of oils or petrol residues using safe standard practices	As required

Appendix J

Pre-development Foul Capacity Check



Thomas Rayment
Ardent Consulting Engineers (London)
The Hallmark Building, 52-56 Leadenhall St
London
EC3M 5JE

Your ref
21682

Our ref
DSA000046029

Date
08 August 2025

Contact
Tel 0330 303 0119

Dear Mr Rayment,

Level 1 Capacity Check Enquiry: Land South of Maddoxford Lane, Southampton, Hampshire, S032 2DB.

We have completed the capacity check for the above development site and the results are as follows:

Foul Water

The enquiry has been reassessed to determine the capacity available for 12.13 l/s (pumped) at manhole reference SU51140401 Grid Reference: 451038 , 114458.

There is currently inadequate capacity within the foul sewerage network to accommodate a foul flow of 12.13 l/s (pumped) for the above development at manhole reference SU51140401. The proposed development would increase flows to the public sewerage system which may increase the risk of flooding to existing properties and land. Additional off-site sewers or improvements to existing sewers will be required to provide sufficient capacity to service the development. Southern Water has a duty to provide Network capacity from the point of practical connection (point of equivalent or larger diameter pipe) funded by the New Infrastructure Charge.

Southern Water aim to provide this within 24 months following the date that planning has been granted for developments not identified as strategic sites in our current business plan. Strategic sites are larger developments and will often take longer than 24 months for a full solution to be provided.

The nearest point where capacity is currently available is at Bishops Waltham WwTW. Rights are not issued for a direct connection to Wastewater Treatment Works (WTW). Please note that connection to the WTW will have to be agreed by Southern Water Services before being carried out.

Please note, the assessment that has been undertaken has used an assumed pump rate of 12.13 l/s. This has been calculated using Southern Water's modelling specifications.

There is no capacity for any additional flows due to existing flooding in the model with DG5 points at the POC and downstream and additional flooding also present as a result of flow into the network.

New Infrastructure Charging

Please note as of 1st April 2018 we have moved to the “New Connections Services Charging Arrangements”. We understand that this may cause uncertainty for customers, particularly where they may have already committed to a development based on previous charging arrangements. We have worked with our stakeholders and Water UK to agree a set of principles by which we will base our charges. Please read through our new charging arrangement documents available at the following link: [Connecting Charging Arrangements - Southern Water](#)

Alternatively, New Appointees and Variations (NAVs), also known as ‘inset’ companies, can provide new connection services or take ownership of the new water and wastewater connection infrastructure provided for a new development. NAVs are appointed by Ofwat and replace the regional water company. It is for the developer to choose whether to use a NAV or the regional water company to supply services for new sites, according to certain legal criteria.

Connecting to our network

It should be noted that this information is only a hydraulic assessment of the existing sewerage network and does not grant approval for a connection to the public sewerage system. A formal Sewer Connection (S106) application is required to be completed and approved by Southern Water Services. To make an application visit: developerservices.southernwater.co.uk

Please note the information provided above does not grant approval for any designs/drawings submitted for the capacity analysis. The results quoted above are only valid for 12 months from the date of issue of this letter. **Any revisions in flow rate or alternative point of connection will require a new Pre-Planning Application to be submitted.**

Please get in touch via the Get Connected customer dashboard if you have any queries.

Should it be necessary to contact us please quote our above reference number in all communications relating to this application by email at southernwaterplanning@southernwater.co.uk

Yours sincerely,

Future Growth Planning Team
Developer Services

southernwater.co.uk/developing-building/planning-your-development