

Erith Western Gateway Development Framework

*Adopted
January 2012*

Erith Western Gateway Development Framework

Supplementary Planning Document

*Adopted
January 2012*

	<i>Page</i>
1 Introduction	5
2 Background to Erith Western Gateway	6
3 The vision	7
4 Urban design principles	8
5 Understanding the development framework	10
Urban blocks	10
Levels	10
Active facades and uses	10
Connections	12
Public transport	12
Vehicular movement and parking	12
6 Public realm framework	14
Erith High Street	14
Primary streets	14
Secondary streets	15
Mews	15
Station square	15
Riverside Gardens	15
Play square	15
Town centre	15
7 Proposed uses and quantum of development	16
Overview	16
Indicative quantum of development	16
Residential	17
Commercial and retail	17
Education and community uses	18
Landscape and amenity	19
Building height and density	20
8 Study areas within the development framework	21
Riverside Gardens	21
Bexley College	21
Carnegie Library building	21
Orbit towers	22
9 Housing forms	22
Housing design	22
Sample house types	23
10 Phasing of development	23
11 Transport and movement	26
Street network	26
Streetscape	27
Public transport	27
Parking and servicing	27

Contents

12 Sustainability	28
Flooding	29
Surface water management strategy	30
<hr/>	
13 Other relevant matters	31
Designing out crime	31
Water supply and waste management	32
Noise and air quality	32
Contamination	32
Conservation and archaeology	32
Site management	33
Affordable housing	33
Planning obligations	33
Planning applications	34
<hr/>	
Appendix 1 Sample House Types	35
Terraced houses	35
Apartment buildings	36

1 Introduction

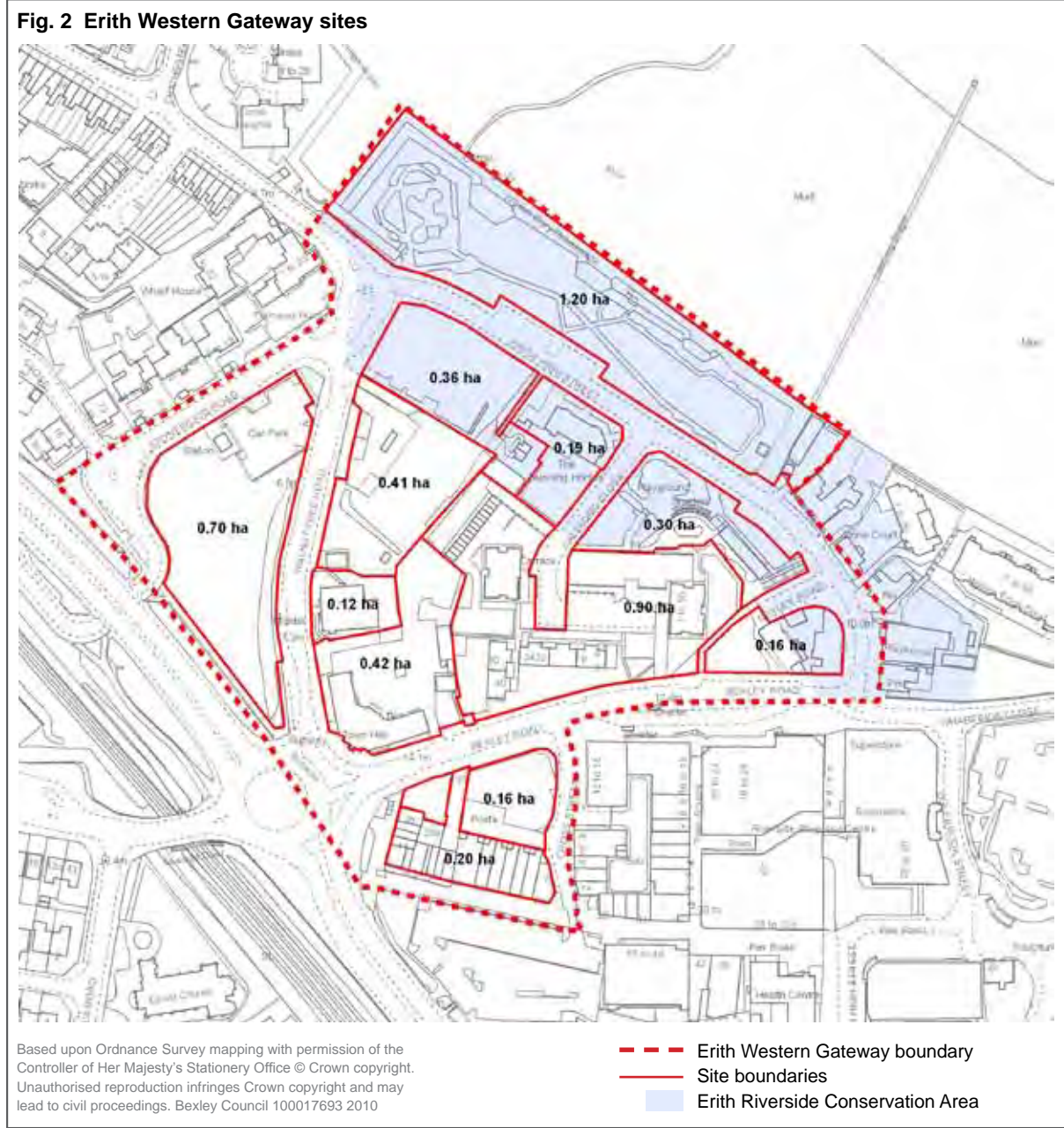
1.1 Erith is one of the borough's major district centres (London Plan District Centre) and is the main retail and service centre for the north of the borough. It serves a diverse area which includes some of the most deprived communities within Bexley. The town and its catchment is situated within both the Thames Gateway national regeneration area and the London Plan Opportunity Area of Bexley Riverside and is a focus for renewal.



Fig. 1 Location

- 1.2 The Council's vision for Erith is to encourage housing and employment growth, allied with the provision of additional services, facilities and infrastructure, including an enhanced educational and leisure offer, to ensure the creation of a sustainable and healthier community. Key elements of this approach are the encouragement of mixed use developments within the town centre of high design quality which respect the areas built and natural heritage, improve accessibility, enhance environmental quality and maximise the recreational, ecological and flood management potential of the River Thames.
- 1.3 Erith Western Gateway is a collection of sites in the north of the town centre and adjacent to the River Thames totalling some 7.65 hectares (see Figure 2). The area incorporates a mixture of land uses in a number of ownerships. It is characterised by buildings of varying ages and designs interspersed between areas of open space, hard standing and vacant land. The area displays a unique topography resulting from the development and quarrying of the land as it slopes down towards the river. The importance of elements of this area in the historic development of the town is recognised through the designation of the riverside, along the line of the High Street, as a conservation area.
- 1.4 This Supplementary Planning Document (SPD) has been produced to guide prospective partners on acceptable uses and design expectations, as well as the phasing of development across the area, through the creation of a development framework. It supplements relevant policies within Bexley's current Development Plan, which comprises the London Plan (2011), the Bexley Core Strategy (2012) and saved policies within the Bexley Unitary Development Plan (2004).

Background



2 Background to Erith Western Gateway

2.1 The Erith Western Gateway area has emerged as a significant development opportunity over the last decade as the potential to amalgamate individual sites to enable a comprehensive intervention has become apparent. This opportunity was initially set out in the Erith Western Gateway Renaissance Strategy and Planning Brief which was adopted as Supplementary Planning Guidance in January 2004. Although much of the detail of these documents has now been superseded, the objectives of regeneration, high quality design, an improved community and leisure offer and improved sustainability as set out in the Renaissance Strategy are still central to the Erith Western Gateway project today.

- 2.2 The original development area as set out in these documents was restricted to a group of seven sites along the riverside section of the High Street and Walnut Tree Road. However, failure to attract any significant development proposals and an enhanced interest from English Partnerships (now the Homes and Communities Agency) with regard to the regeneration possibilities of the area, prompted a re-evaluation of the scale of the development opportunity. The original area was extended to incorporate adjacent sites including the Orbit South site.
- 2.3 The Homes and Communities Agency (HCA) then provided initial funding for the production of a regeneration framework which developed and expanded the original guidance and informed a site marketing and development competition held in 2008. However, volatile market conditions and the severe problems in the financial markets led to the withdrawal of the resulting preferred development partner in early 2009. Nevertheless, due to the importance of this site, the London Borough of Bexley, the HCA and Orbit South commissioned the design team of Maccreanor Lavington architects and Pollard Thomas Edwards architects (PTEa) to help revise the existing regeneration framework, in the light of the marketing exercise and the submissions received. They were also asked to consider how early phases of the development of the Erith Western Gateway might be brought forward. The resulting development framework forms the basis of this SPD.

3 The vision

- 3.1 Erith Western Gateway regeneration will create a new, coherent, riverside community, exploiting Erith's unique setting and integrating well within the existing town, residential areas and facilities. It will provide a mix of housing, new and improved business premises, leisure and educational uses set within a framework of new residential streets with an improved public realm. Central to the vision is the rejuvenated Riverside Gardens that will transform Erith's riverfront into a compelling destination and resource for local people and visitors alike. The gardens will be redesigned, transforming them into a truly civic/green space to support the enhanced residential neighbourhood and Erith Town Centre as well as reinvigorating the garden's relationship with the Thames and its foreshore. This will, ideally, be combined with fully integrated flood defences, upgraded as necessary, to ensure that they will not dominate the new open space. The reworking of the gardens will reflect the history and character of the area. The re-definition of Erith High Street by new urban buildings will result in the creation of unique waterfront residential opportunities which will form an active edge to the new Riverside Gardens.
- 3.2 A network of new residential streets will be delivered, providing direct, safe and enjoyable pedestrian links between the station, Erith Town Centre and riverfront. Simple, uncluttered, robust and attractive spaces will be created providing a memorable setting for good buildings, and establishing a distinctive identity. Subtly distinctive residential and mixed-use characters will be created within the area, avoiding 'difference for its own sake' and excessive contrasts between adjoining buildings and areas. The material palette will reflect this approach with appropriate attention to detailing. A medium rise neighbourhood will result (see paragraphs 7.9 and 7.10), consisting predominately of houses and apartment buildings, which will achieve higher densities without the reliance on high buildings, producing a consistent townscape, designed to achieve 'harmonious diversity' and allow for the integration

Urban design principles

of pre-existing elements. A series of flexible urban blocks will be created capable of adapting to a variety of possible uses as the area matures and society evolves.

4 Urban design principles

4.1 A series of urban principles have been developed for the area in order to guide future development and ensure the delivery of the vision. These are set out below. Central to these is a clear understanding of the character of the site, the process that has formed it, and consequently the value associated with it.

4.2 The **urban structure**, form and massing of developments should:

- ensure that Erith Western Gateway is part of an integrated town centre;
- deliver a network of routes across the site that enable a highly permeable, legible and inclusive environment that prioritises pedestrians with connections between the site, town centre, the river Thames and station;
- create and improve pedestrian and cycle links to regional and borough wide open space networks and local employment opportunities, to improve recreational and economic accessibility and environmental quality;
- utilise a block structure which provides a legible hierarchy in ownership and access;
- position buildings and routes in such a way as to create new vistas, utilising buildings and trees to create 'frames' to maximise river views and reinforce the street hierarchy;
- incorporate variation in heights and massing without creating abrupt differences;
- provide low to medium rise block heights with taller elements considered at corner locations where there is a positive impact on the townscape and architectural consistency and amenity are maintained;
- provide visible entry points, which do not detract from the clarity of the overall block or the streetscape, achieved through the use of subtle, simple and high quality, design;
- utilise the existing road network as the principal vehicular distribution network for the site, modified to improve pedestrian movements and enhance cycle facilities in response to local needs and strategic cycle networks;
- locate new buildings and programme development in such away as to re-establish Erith High Street as a well defined linear route;
- deliver significant improvements to the setting of Bronze-age Way and Bexley Road by establishing a built and active edge;
- complement and not compete with the existing commercial offer in Erith; and
- respect and complement the area's existing heritage assets.

4.3 The **density and land uses** within developments should:

- have an urban density appropriate to public transport accessibility levels and local context, utilising a variety of residential forms but with an emphasis on family housing, avoiding extremes of low or high density;

Urban design principles

- integrate the existing buildings of architectural/ special interest by tying these fragments together with new development into defined urban blocks; and
- utilise the existing topography to create secure and concealed parking.

4.4 The **public realm** within developments should:

- be focused around a hierarchy of streets and other public spaces that activate key routes;
- deliver a range of public realm forms which enhance the setting of buildings and are easy to maintain, with a clear hierarchy and variety of uses;
- fully integrate and deliver significant improvements to the existing public spaces, with the Riverside Gardens defined by an improved physical and visual relationship with the River Thames;
- assign, programme, and locate elements in the public realm in response to a clear understanding of how that space will be used;
- ensure that each block provides edges characterised by residential or other active uses to the various thoroughfares within the site, without blank walls;
- deliver visually connected green spaces that form part of a green connection between the River Thames, Erith Quarry and beyond and linking with the existing strategic walks network;
- respond to the existing topography by terracing down to the waterfront where appropriate;
- provide clear defensible zones around residential ground floors - the detailed design should have a positive impact on the public and private spaces it helps define; and
- deliver the highest standards of accessibility and inclusion for all.

4.5 In terms of **environment and sustainability** developments should:

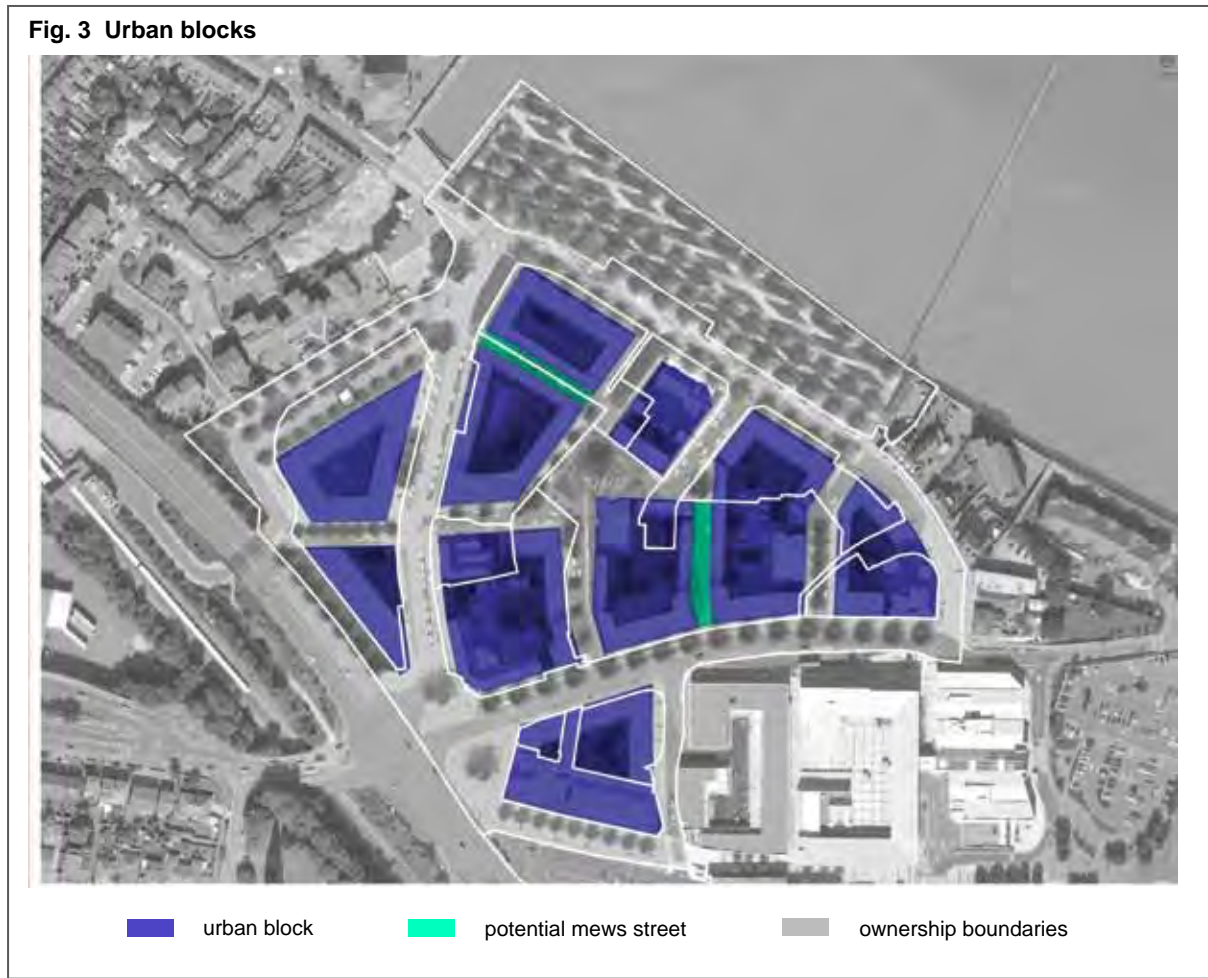
- safeguard the existing mature trees and plant new trees, living roofs and walls wherever appropriate and possible, using them to form part of the future character of the new neighbourhood;
- incorporate a range of measures to minimize resource consumption, encourage green lifestyles and improve environmental quality, including the reuse and retrofitting of existing building stock;
- integrate flood defences, sustainable urban drainage systems (SUDS) and water saving measures to reduce the overall flood risk;
- ensure that wildlife habitats and biodiversity are protected, enhanced and promoted through integration with the new development; and
- seek to deliver improved public transport infrastructure which will allow for reduced car use and potentially reduced parking provision.

The development framework

5 Understanding the development framework

Urban blocks

5.1 Figure 3 shows the proposed spatial structure resulting from this development framework, including public realm and development plots. This shows clearly legible urban blocks integrating the retained buildings, with clear public private interfaces. It should however be noted that the building blocks shown are indicative only and may be subject to alteration at detailed design stage.



Levels

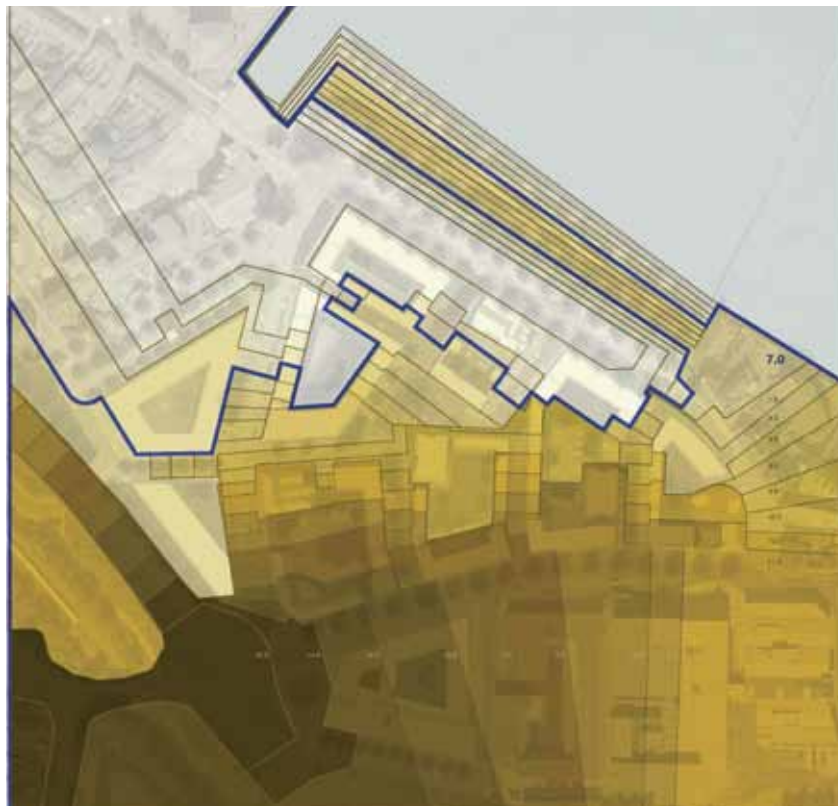
5.2 Figure 4 illustrates the broad approach to the proposed development framework levels. A key principle is the integration of the remodelling of the Riverside Gardens into a design led strategy for improving flood mitigation.

Active facades and uses

5.3 The purpose of making facades active at the ground floor is to increase activity and 'passive surveillance' thereby increasing safety and interest in the public realm for the pedestrian. Figure 5 shows the various types of active facades proposed in this development framework.

The development framework

Fig. 4 Levels



Ground elevations illustrating the 7m safe escape contour

Levels from 7-15m (light to dark) - the darkest being the dry escape level

Fig. 5 Active facades and uses



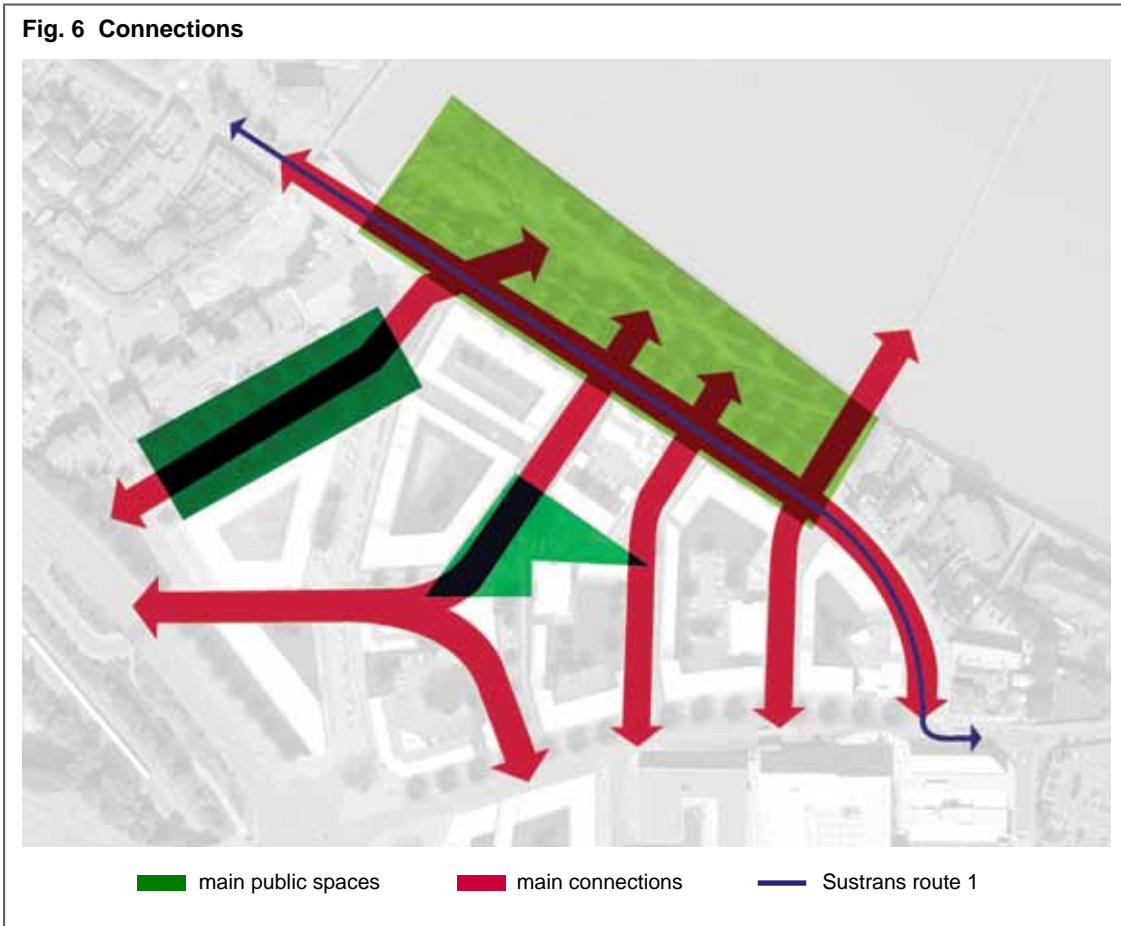
Key

- residential
- commercial
- mixed use (residential led)
- mixed use (commercial led)
- other

The development framework

Connections

- 5.4 Figure 6 shows how the high level urban principles have been applied to the development framework in order to improve the various types of connectivity within the plan.



Public transport

- 5.5 Figure 7 shows how the proposed permeable pedestrian network relates to the existing bus routes within the site. The introduction of two-way streets in key locations may afford the rationalisation and improvement of some of the bus-routes.

Vehicular movement and parking

- 5.6 Figure 8 illustrates the suggested road network. The development framework structure is based on a traditional network of two-way permeable streets. A degree of on street parking contributes positively towards activity in the public realm.

The development framework

Fig. 7 Bus routes

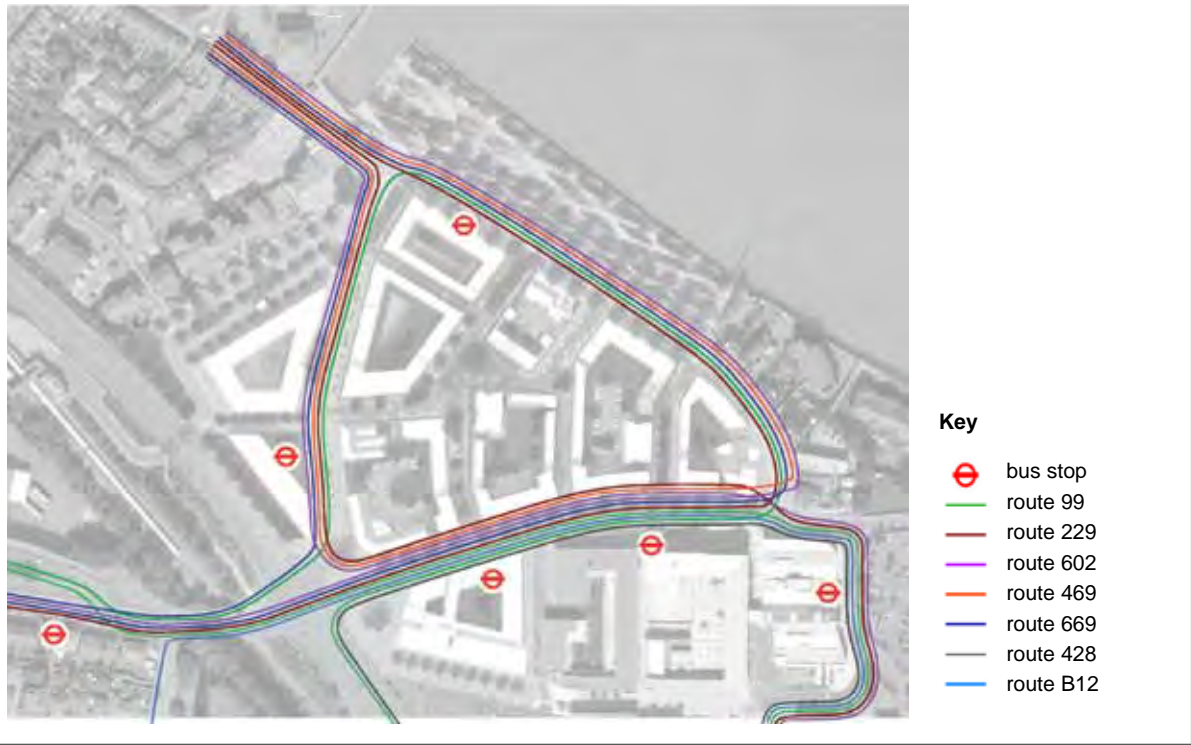
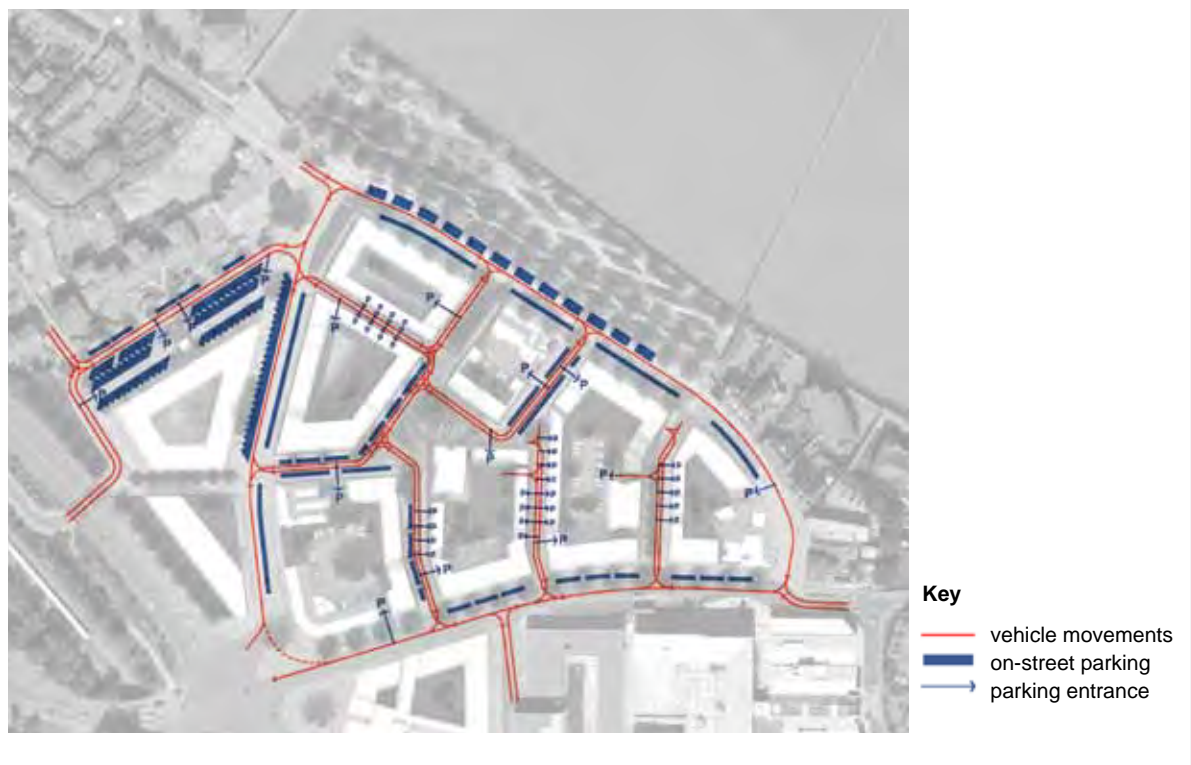


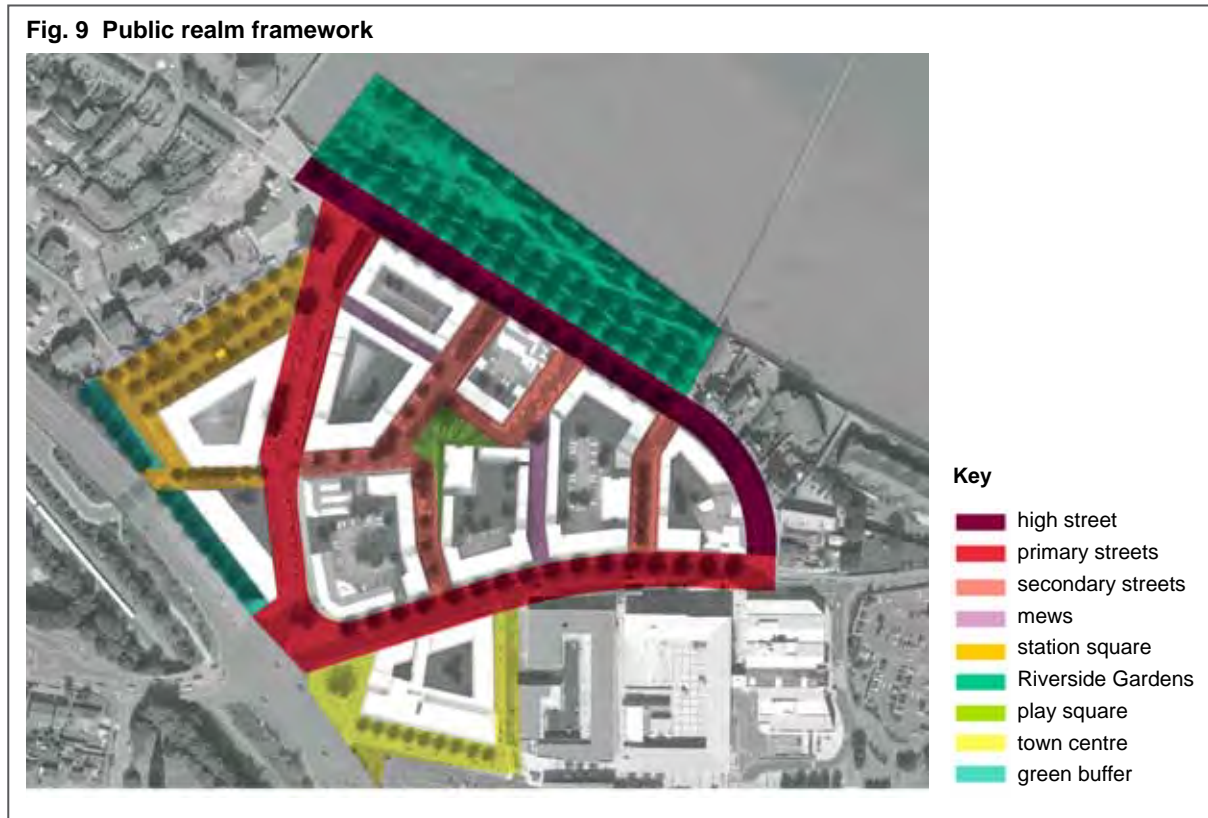
Fig. 8 Vehicular movement and parking



Public realm

6 Public realm framework

6.1 The development framework proposes to create a hierarchy of traditional public space types in order to improve the quality, connectivity and legibility of the public realm. Figure 9 identifies and colour codes the different types of public space proposed in this development framework. The subsequent section describes each type of space in more detail, establishing the principles that should be adhered to in order to realise the proposed character. Further detail on heights and massings is provided in paragraphs 7.9 - 7.11.



Erith High Street

6.2 Erith High Street should become an attractive backdrop to life. Buildings of up to five storeys should provide definition with active, predominantly residential, frontage at ground floor encouraged to utilise the street. Parking should occur within the public realm without dominating the street scene. Trees and street lighting should add character, not clutter.

Primary streets

6.3 Primary streets should be formal and urban in character and be defined by buildings of up to five storeys. Parking occurs within the public realm creating street life and animation without dominating the street scene. Building plinths should be activated with a mix of commercial, residential and other frontages. Trees, lighting and other elements help reinforce the urban character.

Secondary streets

- 6.4 The secondary streets should also be urban in character and contribute to an integrated pedestrian priority network. Buildings of up to four storeys define streets with activity achieved by residential ground floors. The scale and width of the street, use of trees, lighting and level of delineation between vehicles and pedestrians reflects a different scale to the primary streets.

Mews

- 6.5 The Mews are hard landscaped shared surfaces defined by buildings of two storeys. Subtle changes in texture, material and patterns should help guide people in how to use the spaces. The design of any shared surface must be carefully considered to ensure it does not compromise the ability of disabled people to use the space.

Station square

- 6.6 Station square should be a high quality hard landscaped parking square with a dense tree canopy. Subtle changes in texture, material and patterns should help guide people and vehicles in how to use the space. (See also paragraph 7.7(3))

Riverside Gardens

- 6.7 Erith Riverside Gardens, which forms part of the Erith Riverside Conservation Area, will be one of the most important public spaces within the development area, playing a civic role and capable of accommodating events and festivals. Paragraphs 7.7 and 8.1 provide full details of the proposed approach to Riverside Gardens.

Play square

- 6.8 Play Square should become an informal type play area with formal play provision for both children and young people, which utilises the topography in its design. (See also paragraph 7.7)

Town centre

- 6.9 The town centre should be a high quality hard landscaped area that extends the urban feel of the centre to the edge of Bronze Age Way / Queens Road and helps integrate it into the street scene. Trees and public art should mitigate the environmental impact of heavy vehicular traffic.

Proposed uses

7 Proposed uses and quantum of development

Overview

7.1 The Erith Western Gateway area has been broken down into four main areas (see Figure 10)

- The 'Core Site' contained by Bexley Road, the High Street and Walnut Tree Road is proposed as a mainly residential area, with scope for commercial frontages at street level, particularly on Bexley Road, and a commercial or community use in the Carnegie Building (a Statutory Listed Grade II building).
- Riverside Gardens should be transformed as a landscaped public park. Any proposals for development on the Riverside Gardens will be considered on the basis of adopted planning policy, e.g. regarding areas of Urban Open Space, and the vision and principles of this SPD.
- Walnut Tree Depot is proposed for a combination of education and commercial/ office uses with, potentially, a public car park.
- Pier Road West, the site fronting Bexley Road, is proposed for commercial development, potentially a combination of retail, office and hotel uses.

Indicative quantum of development

7.2 The potential capacity of the Erith Western Gateway area has been estimated on the basis of the development strategy. It is considered that the development framework could accommodate the following approximate amounts of development.

- Over 300 new homes, of which 20 are re-provision, in addition to the existing 108 homes in the Orbit towers. This is based on an area wide net density of approximately 530 habitable rooms per hectare (hr/ha) which is within the acceptable range of between 200 and 700 hr/ha set out in the Council's residential design guidance SPD 'Design for Living'.
- Over 6,500 sqm of floor space for Bexley College (or an alternative commercial use).
- Up to 15,000 sqm of new commercial floor space (retail, hotel or office).
- 900 sqm of converted office space in the Carnegie Building (or an alternative community or education use).

7.3 This SPD provides some flexibility, and there is scope to vary the amounts of different uses. For example, if the demand for commercial space does not justify the stated amount then certain blocks could be re configured for additional homes. There may also be some scope to increase building heights in corner locations, provided that the overall massing strategy is respected (see paragraphs 7.9 and 7.10) the townscape is improved and amenity is not adversely affected. Given the relatively high densities proposed, it will be important to demonstrate exemplar standards in terms of residential design, open space and family sized affordable housing. Any increase in accommodation will also have an effect on the parking strategy and may trigger more costly underground parking solutions.

Fig. 10 The four development areas and proposed residential blocks

Residential

- 7.4 This development framework would accommodate approximately 300 new homes on the core site. At present no residential development is proposed on Walnut Tree Depot or Pier Road West. The Walnut Tree Depot site is proposed as a college, however, this could also be a residential site. In terms of the Orbit towers, demolition of the 20 low-rise flats is currently assumed together with the retention of the 108 existing flats (see paragraphs 8.6 to 8.8 for more detail). The new homes should be a mix of family houses and flats reflective of the need within the area. The development framework has the flexibility to accommodate varying proportions of accommodation types as required. Refer to paragraphs 9.1 to 9.4 for more information on housing forms.

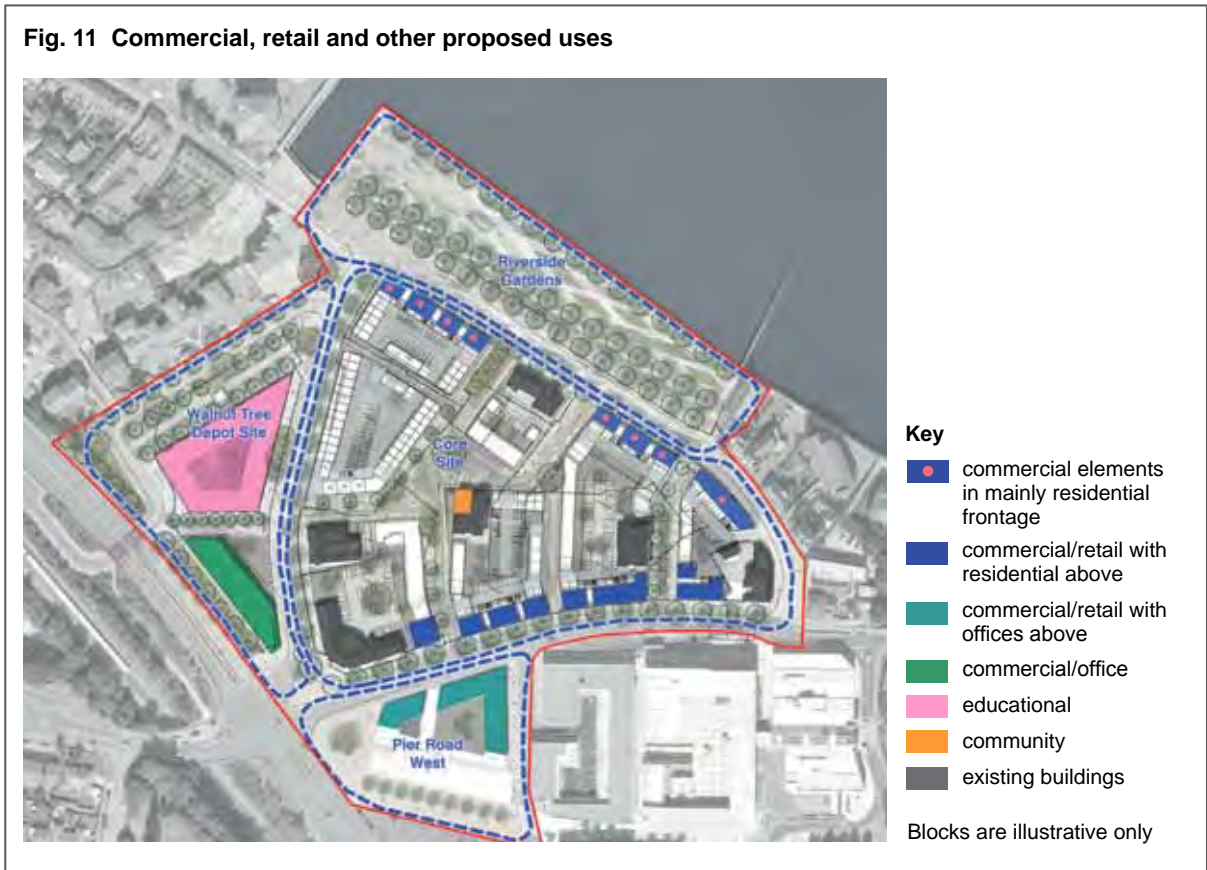
Commercial and retail

- 7.5 The development framework suggests the following space allocated to flexible commercial uses up to 16,000 sqm of floor space (see Figure 11).
- Core Site (new build): ground level small retail or B1 workspace units contributing active frontages, particularly to Bexley Road. These units could also suit community uses. Preliminary discussions have suggested some commercial interest in this area, including, potentially, a new Orbit South office. However, if there is insufficient demand then some or all of the High Street units could be reconfigured for residential use.
 - Core Site (conversion): the Carnegie Building is shown converted into office/educational (see paragraph 8.4)

Proposed uses

- Core Site (existing uses): the Running Horses public house, the post office site and the Council offices (former town hall) on the corner of Bexley Road and Walnut Tree Road are excluded from the development framework schedule and will continue in their present use. However, proposals include development on the car parking areas of the pub and Council offices.
- Walnut Tree Depot: commercial uses including offices or hotel. Part of this could be occupied by a new district energy centre, subject to negotiations with EDF Energy. This commercial building is adjacent to the proposed Bexley College building – see figure 11. If the College does not relocate to Erith then an additional or alternative office, hotel or residential block would be available.
- Pier Road West: the site fronting Bexley Road is shown with ground level retail space and office space above. This could also provide an alternative hotel site. The southern part of Pier Road, which currently provides a major shoppers’ car park, has been excluded from this development framework.

Fig. 11 Commercial, retail and other proposed uses



Education and community uses

7.6 Bexley College has confirmed Erith Western Gateway as its preferred option for relocation of its existing main campus. The development framework consequently makes provision for a new college building on the northern part of the Walnut Tree Depot site. For more details see paragraphs 8.2 and 8.3. The site could alternatively suit a residential, office or hotel use. No other new, specific and funded education or

community uses have as yet been identified. However, any of the new commercial spaces described in paragraph 7.5 could be suitable, as could the Carnegie Building. It is assumed that the existing community room at the base of Carrack House will continue to operate.

Landscape and amenity

7.7 This SPD seeks to deliver a range of connected public spaces, including the following major public open spaces (see Figure 12):

1. Riverside Gardens should be completely remodelled to reclaim currently inaccessible areas of hard and soft landscaping and maximise the usable space, thereby creating a new public park. Five guiding principles should influence any design:

- the promotion of ecology and biodiversity;
- high quality design;
- the provision of a clear visual link between the waterfront and the wider area;
- the provision of recreational amenity for the community (see paragraph 8.1); and
- the maintenance and, where possible, improvement of flood protection measures.

2. Play square, a new landscaped square of approximately 0.10 hectares should be created at the centre of the residential neighbourhood to be developed on the Core Site and should be designed, together with the remodelled park, to help mitigate the loss of open space elsewhere in the development. In considering the effectiveness of mitigation the council would seek equivalent provision in terms of usefulness, attractiveness and quality. Play space and equipment throughout the area should meet the required standards, as set out by the Mayor of London and the Council, while the use of planting, materials, water features and public art should help to stimulate safe and imaginative play.

Fig. 12 Major open spaces

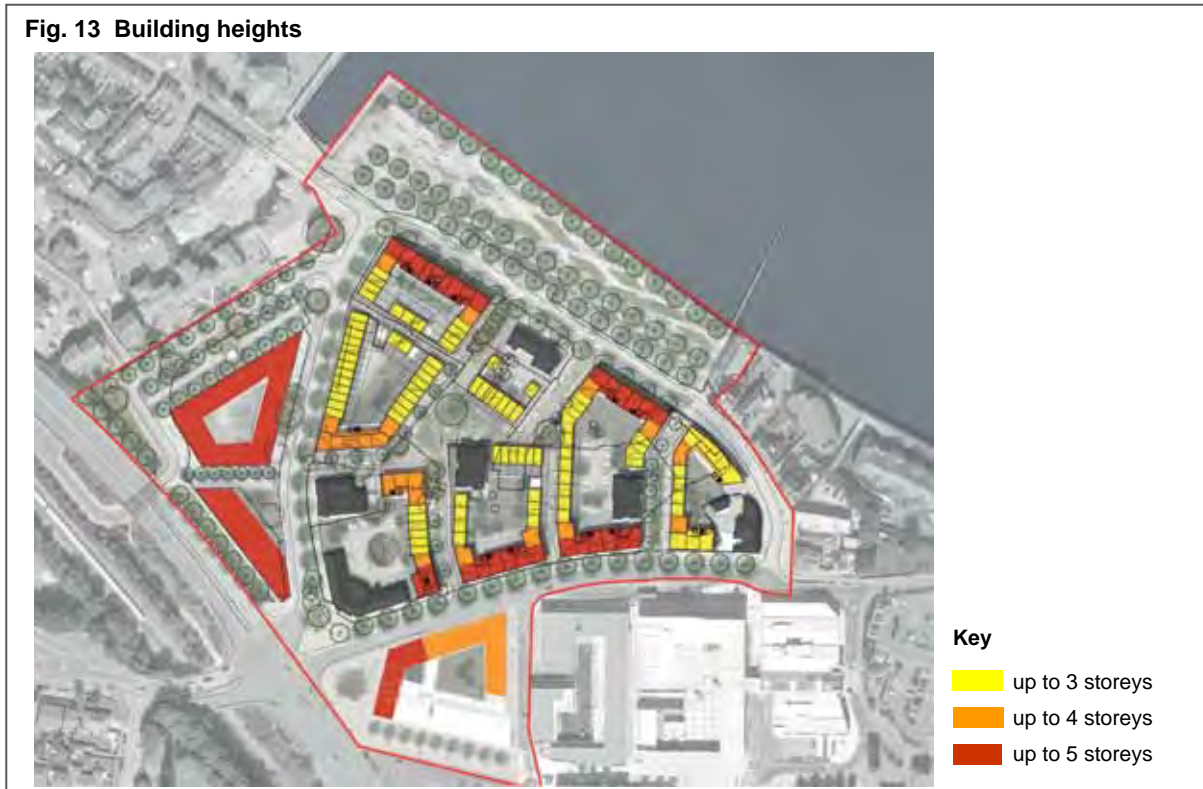


3. Station square, measuring approximately 0.36 hectares, could be created on Stonewood Road and extend into the Walnut Tree Depot site. This area will provide parking, but could also provide a tree-lined public space when empty or partially empty of cars which could have the potential to carry out other functions such as a street market or festival. In this context, the square could be designed so as to allow flexible use and incorporate permeable surfaces to provide effective drainage.

7.8 There will also be a network of landscaped streets - pedestrian, vehicle or shared-surface, as well as private and commercial spaces, including balconies, gardens, terraces and courtyards.

Proposed uses

Fig. 13 Building heights



Building height and density

- 7.9 This SPD proposes a medium-rise, human-scaled neighbourhood, without reliance on any new tall buildings. It adopts the following general approach to building heights (see Figure 13).
- Blocks fronting Bexley Road and the High Street could rise to five storeys including any street level non residential uses.
 - Apartment blocks within the Core Site could rise to four storeys.
 - Houses within the Core Site could consist of three storey townhouses and two-storey mews houses.
 - Commercial buildings on the Walnut Tree Depot and Pier Road West sites could rise to five storeys. The Bexley College building is proposed to rise to three storeys including a lower ground level taking advantage of the site contours.
- 7.10 The building heights set out in paragraph 7.9 and shown on Figure 13 may only be exceeded where proposals can demonstrate an appropriate and consistent design solution, which has a positive impact on the townscape and safeguards amenity.
- 7.11 In interpreting the height and massing approach set out in this SPD particular regard will need to be had to residential amenity in terms of overlooking, overshadowing and visual intrusion. In normal circumstances a minimum distance of 22 metres is sought between facing habitable room windows and 16 metres between habitable room windows and flank walls. Where these distances cannot be achieved developers will need to demonstrate how issues of privacy, light and outlook have been incorporated into the design of dwellings to effectively mitigate any harm.

8 Study areas within the development framework

Riverside Gardens

- 8.1 Erith Riverside Gardens will be one of the most important public spaces within the development framework, playing a representative civic role and capable of accommodating events and festivals. One of the key aims of the remodelling of the Riverside Gardens is to integrate any proposed upgrading of the flood defences into a simple and elegant formal green space, affording access for all to the water's edge. To this end, walls, gates, barriers and other engineering led flood management solutions should be avoided if possible. The area will be designed to meet the highest possible standards of accessibility and inclusion for all. Ramping to overcome the level differences should be subtly integrated into the design of the paving surface. The preferred solution to the flood defences and access is the creation of a simple ridge design (see levels diagram at figure 4 for one potential approach). Trees and planting should be simple and formal, reflecting the character of a contemporary interpretation of formal gardens and enhancing biodiversity habitats where possible. Furniture, lighting and play equipment should be simple and elegant and carefully integrated into the design to avoid unnecessary clutter.

Bexley College

- 8.2 Bexley College has confirmed that it proposes to relocate its main campus to the Erith Western Gateway. This SPD consequently makes provision for a new college building on the central part of the Walnut Tree Depot site. The College's proposals involve a building of approximately 6,500 sqm of floor space on three levels although this may be subject to change as detailed designs are progressed.
- 8.3 The College would be ideally located at the gateway to Erith and would be the first building encountered by people approaching the town from the station. Its main entrance would be off the main pedestrian route into the Erith Western Gateway and on to the town centre beyond. It would have another entrance fronting Stonewood Road, which could provide parking, drop off and servicing areas for the College.

Carnegie Library building

- 8.4 The former Carnegie Library is the only statutory listed building in the Erith Western Gateway and its character and setting should be protected and preserved. It is a prominent and very attractive landmark and will provide an important event on the main pedestrian route from the station to the town centre. The public realm in front of the building should, therefore, be carefully considered to ensure an appropriate context, with the potential for the creation of new and improved spaces and views particularly important.



Study areas

- 8.5 The building is largely vacant, following development of the new library in the shopping centre, and the Council is seeking alternative uses. Preliminary investigations suggest that the building could be converted to accommodate an office or community education type use while respecting its historic features. Investigations are continuing in this regard with a focus on securing an appropriate and sustainable new use for the building.

Orbit towers

- 8.6 The existing towers, Bosworth House and Carrack House, form a prominent landmark in the area and are an established feature of Erith riverside. They are owned by Orbit South Housing Association. They are well maintained, popular with residents and have very few vacancies. Their current condition is generally considered to be good and their long term sustainability and effective integration into the redevelopment of Erith Western Gateway is possible with major improvement works to address specific sustainability and access issues.



- 8.7 Orbit south and its residents have indicated a strong preference for the retention of the towers, together with all necessary refurbishment works required to integrate the building into the new development.
- 8.8 The design framework set out in this SPD shows how the towers could be integrated into an infill development of the site. Any such proposal will need to:
- Fully integrate with the wider development scheme in terms of design and function;
 - Secure the internal and external improvement of the existing towers to the highest possible design, sustainability and liveability standards; and
 - Ensure the environmental impacts of the surrounding redevelopment and construction are mitigated for existing residents as much as possible.

9 Housing forms

Housing design

- 9.1 This development framework can accommodate a wide variety of housing types and layouts. However, some sample house and flat types have been prepared to test the overall capacity of the proposed residential sites (see Appendix 1) and these form the basis of the residential unit figures provided.
- 9.2 Dwellings should comply with the space standards set out in the London Plan (2011) and have regard to the evolving Housing SPG design standards. Affordable units will be expected to meet them, as a requirement of the Interim London Housing Design Guide. All dwellings should be built to lifetime home standards and 10% should be wheelchair accessible, or easily adaptable for residents who are wheelchair users.

Housing design



- 9.3 This SPD makes no firm proposals about the style and appearance of buildings proposed for the Erith Western Gateway, that will be for future planning applications to consider. However illustrative photographs are provided, which give an idea of how the new neighbourhood could look.

Sample house types

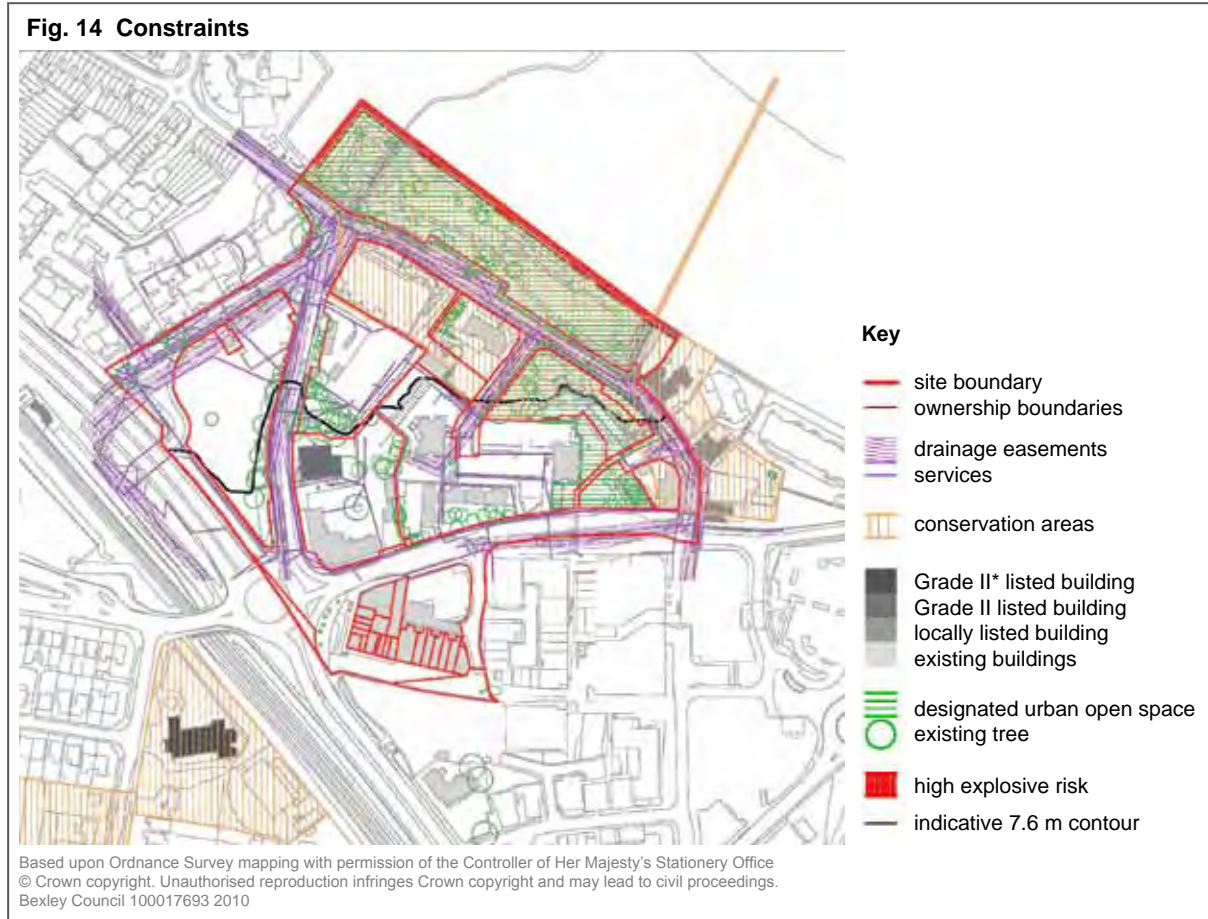
- 9.4 Sample house types have been used to inform the capacity calculations set out above and could be put together to create urban blocks / groups of homes as set out in this SPD. A selection of sectional drawings is provided in Appendix 1 showing combinations of houses, flats, gardens and parking arrangements. It should be noted that these drawings are illustrative only and detailed proposals should meet the London Plan (2011) space standards. They should also have regard to both the Bexley Residential Design Guide (2006) and evolving London Plan housing design guidance.

10 Phasing of development

- 10.1 Although the Erith Western Gateway project is premised on the comprehensive redevelopment of the area to achieve identified aims and objectives, it is acknowledged that, as a result of technical and market constraints, this is likely to occur in stages over time. Given the prospect of difficult market conditions and narrowing margins for the foreseeable future it is considered that initial phases of development are likely to centre around those sites which are least constrained and, therefore, easiest to deliver.

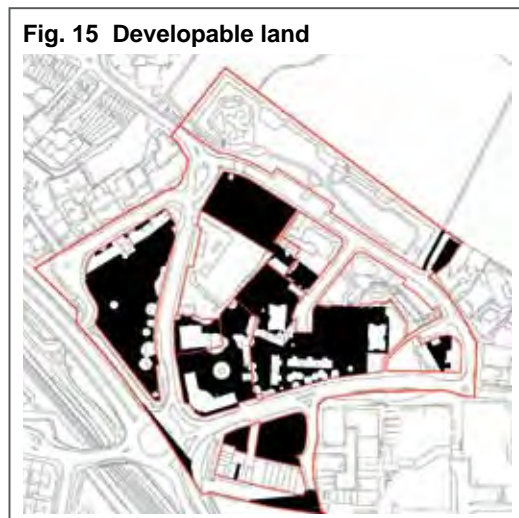
Phasing

10.2 An analysis of site constraints has, therefore, been undertaken to highlight the risks, costs and impacts that the delivery of this development framework may entail and identify the most likely initial phases. The key constraints are shown in Figure 14.



10.3 This information has then been used to undertake an initial assessment of developable area. The approach taken has generally been risk averse: to avoid impinging on constraints unless there would have been unacceptable negative consequences in terms of design quality. The restructuring of ownerships and projecting development straddling ownership boundaries has also been avoided.

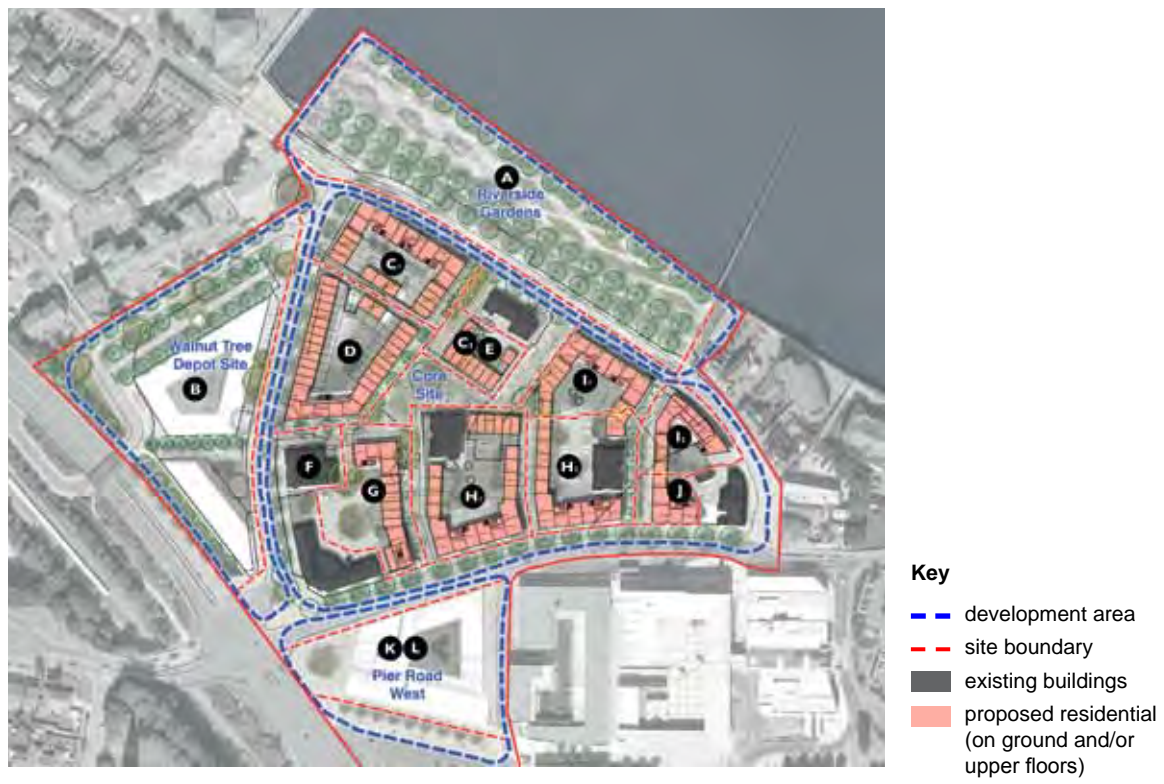
10.4 Figure 15 shows the results of this analysis and confirms the potential area on which development could take place unimpeded by significant constraints. This also serves to illustrate that mitigation of some of the site constraints will be necessary to realise meaningful development of the area.



10.5 On this basis the following sites are likely to be among the first to emerge:

- Site B - Walnut Tree Depot
- Site C1 - former swimming pool site
- Sites C2 and E - land to rear of Running Horses Public House
- Site G - currently Council offices car park
- Site I1 - public gardens on south side of High Street
- Site I2 and J - public gardens to south west of High Street.

Fig. 16 Development sites



10.6 Any phasing strategy will need to consider carefully impacts on the overall regeneration benefits of area wide development, visual and residential amenity and the proper functioning of the development, particularly in terms of access, servicing and parking. Initial phases should be acceptable in their own right and should not have to rely on the delivery of later phases to comply with this SPD or any other relevant policy or guidance. The Council will also have regard to how phasing impacts on the overall viability of the scheme to ensure significant disadvantages do not result in terms of the planning gain sought.

Transport

11 Transport and movement

Street network

- 11.1 The internal street hierarchy and secondary streets and mews in particular should be in accordance with the principles of Manual for Streets while the primary streets and Erith High Street should generally accord with the guidance in Manual for Streets 2. The network of paths and roads will provide permeability across the site and convenient links to key destinations. The streets will be uncluttered and safe for all users and will not become vehicle dominated spaces. In order to utilise as much of the existing infrastructure as possible, a number of the existing roads should be retained. Walnut Tree Road, Erith High Street and Bexley Road could continue to operate one-way clockwise (see paragraph 11.2) with new junctions off of them providing access to the new residential streets. Access and egress should be made via the Bexley Road junction with Bronze Age Way and Queens Road, also known as ‘Queens Road junction’.
- 11.2 Two-way traffic could be introduced in all roads, providing additional flexibility for vehicular movement. However, it is recognised that in order to do so assessments on the impact of such traffic movements on the wider network need to be considered. Therefore, it may be unachievable to fully or partly adopt such an approach without undermining the capacity of the Queens Road/Bronze Age Way junction and the function of this strategic distributor road for London (that forms part of the South Thames Development Route).

Fig. 17 Movement diagram



- 11.3 The Queens Road junction will require modification to address future capacity issues. The Council has commissioned studies to investigate improvement options and it has been identified that the signalisation of the junction along with carriageway widening will provide the required future capacity. Detailed plans have been prepared and a planning application for the works has been approved. Although the required funding has not yet been secured for the junction works the Council has prepared a funding strategy which will include planning obligation contributions from relevant developments. The stable operation of this junction is considered key, and the street network should seek to maximise capacity improvements.

Streetscape

- 11.4 An internal street layout that facilitates vehicular movement and provides pedestrians with direct, attractive and convenient routes between the riverfront, residential properties, retail and railway station should be provided. Streetscapes should have different treatments in order to influence the behaviour of traffic users. Internal residential roads will be treated in such a way that encourages reduced vehicle speeds, increases pedestrian and cycle activity and acts as a sufficient deterrent for motorists seeking 'short cuts'. The treatment of roads within the SPD area is discussed within section 6. Street furniture and paving surfaces, including those in the major open spaces, should have regard to the nature of existing treatments within the area in terms of materials, colours, textures and patterns.

Public transport

- 11.5 The site is currently well served by a number of bus routes that provide connections to Bexleyheath (99, B12, 602), Thamesmead (229, 669, 602), Woolwich (99 & 469), Sidcup (229, 669) and Bluewater Shopping Centre (428). This development framework does not foresee the requirement for any amendment to the routing of existing services as they can be accessed within short walking distances from the proposed development. Erith Railway Station is situated to the west of the development area and provides regular services to London Bridge (35 minutes), London Charing Cross (45 minutes) and Dartford (9 minutes). The development framework proposes to improve upon the connectivity between the Station and the development site. An attractive paved walking environment should link the Station through the proposed college site to the residential area whilst a contribution to the provision of disabled access to the London bound platform may also be sought where appropriate.

Parking and servicing

- 11.6 The parking needs of residents, visitors, shoppers and commuters should be carefully balanced, in order to encourage the use of sustainable travel and create attractive streets. In accordance with Bexley's Core Strategy the parking standards sought will have regard to both recently revised national guidance and the parking standards set out in the London Plan (2011) but will also take into account the appropriate local circumstances. Most of the visitors to the area, particularly to the commercial premises to the south of Bexley Road, come from the surrounding area, where there is relatively low public transport accessibility, resulting in car borne trips. In this context, it is considered that parking for residents could be provided at approximately one space per dwelling, including provision for the mobility impaired, through a mix

Sustainability

of on-street and under-croft parking areas subject to the support of an appropriate transport assessment and travel plan. Additional parking could be available for visitors and shoppers on a 'Pay & Display' basis together with potentially new provision for commuters nearer the existing railway station. It is anticipated that on-street parking will be managed as a Controlled Parking Zone (CPZ) in a similar manner to current arrangements. In order to provide an alternative to private car ownership, schemes such as a 'car club' will be encouraged, while cycle parking to the standards set out in the London Plan (2011) will also be sought.

- 11.7 Development proposals should also ensure that suitable provision is made for the servicing requirements of commercial and other relevant users.

12 Sustainability

- 12.1 The main requirements for Erith Western Gateway's regeneration from a sustainability point of view are:

- to improve connectivity to the railway station, the bus network and the surrounding communities;
- to manage flood risk at the development area scale and at the building scale, particularly in areas at risk (minimisation of impervious surfaces, filter strips and swales, basins and ponds, water recycling, etc.);
- to protect and enhance ecology and biodiversity (on water edges, open spaces, and buildings, including the use of green roofs and walls) and create improved connections with Bexley Green Grid and the South East London Green Chain networks;
- to integrate the scheme into the Sustrans national cycle network route 1, which passes through Erith High Street (a connection should be provided to the railway station and through the town centre) and improve walking links supported by wayfinding measures;
- to retain and re-use existing buildings where they are the subject of statutory protection or can be practically and viably converted to other uses;
- to design a development / buildings which have the ability to reduce the impact of and adapt to climate change;
- to incorporate the latest standards in energy and water efficiency, sustainable drainage, waste reduction, use of renewable and non-polluting materials and renewable energy;
- to consider the setting up of a local decentralised energy network that could link to a wider network;
- to incorporate a structure to sustain the quality of the public realm and community assets through long-term arrangements for estate management and neighbourhood governance; and
- to encourage a reduction in private car use.

- 12.2 In addition to these requirements, the buildings will have to respond to local, regional and national established and emerging policy, including:

- Sustainable design and construction and carbon dioxide emissions policies within the London Plan (2011) and guidance within relevant London Plan Supplementary Planning Guidance;
- the Bexley Sustainable Design and Construction Guide (2008), which sets out a number of key principles for all developments;
- the Government's aspiration for all new homes to be zero carbon from 2016, and for all non-residential buildings to be zero carbon from 2019; and
- the fact that a range of funding streams are increasingly linked to the achievement of high Code for Sustainable Homes / BREEAM targets.

12.3 The securing of community energy is encouraged as part of a robust sustainability strategy for the area. In this regard the provision of an energy centre within the overall development should be considered. Any facility could incorporate a gas-fired or biomass powered Combined Heat and Power plant alongside central gas boilers. Centralised or decentralised renewable energy systems could further reduce carbon dioxide CO₂ emissions, with allowable solutions contributing to the achievement of Zero Carbon status for the residential dwellings. Energy Services Companies (ESCOs) are able to finance, design, build and/or operate a community energy scheme, from the provision of heating to the provision of heating, cooling, water and data. Involving an Energy Services Company early during the development process presents distinct benefits and is encouraged, as is the investigation of the incorporation of other elements of the town centre into any scheme and the potential use of surplus heat from the Riverside Resource Recovery Limited (RRRL) plant, which has recently been constructed in Belvedere. The Council, as part of the evidence base for its Local Development Framework, commissioned research into the feasibility of carbon reduction policies in the borough, including the potential for higher standards of sustainable design and the establishment of a decentralised energy network in Erith. This study is available on the Council's website

Flooding

12.4 The Council has an approved Level-1 Strategic Flood Risk Assessment (SFRA) for the borough, and its findings have informed the approach within this SPD, whilst regard has also been had to recommendations within the Thames Estuary (TE) 2100 Study. The Erith Western Gateway is partially situated within a defended Flood Zone 3a location. The flood defences along this reach of the Thames currently provide a 1 in 1000 year standard of protection and are reported as having a crest height of 7.12m Above Ordnance Datum (AOD). As such, Planning Policy Statement 25 - Development and Flood Risk (PPS25) requires the residual tidal flood risk to be evaluated. Residual risk describes the risk which remains despite the presence of

Fig. 18 Flood Zone 3



Sustainability

flood defences. A failure in the flood defences has been modelled and has informed the SPD.

- 12.5 The distribution of land uses within the site has been guided by the PPS25 sequential approach to land use planning, in which car parking and open space have been placed in the areas of greatest flood risk. The vertical distribution of uses within buildings will also need to be informed by the requirements of PPS25 and the latest detailed Environment Agency guidance, in that the internal layout of residential units should ensure the most vulnerable living areas (i.e bedroom spaces) are located above the predicted flood water level of 6.7m AOD. Unimpeded vertical movement through buildings should also be provided so as to enable access to safe refuge at or above a level of 7m AOD. Figure 4 (on page 11) illustrates potential ground levels and the proposed new line of the flood defence. This will reduce the overall flood risk to the site and surrounding area as the height of the defence would increase to 8.12m AOD and the defence structure is considered to be less vulnerable to failure than the existing structure, in the event of impact from a collision.

Surface water management strategy

- 12.6 The management of surface water run-off, to ensure that run-off rates are not increased, is a fundamental requirement of PPS25. The reduction in current rates of run-off is also advocated by regional and local policy and guidance and the Pitt Review, as is the sustainable management of surface water.
- 12.7 The development framework seeks to, sustainably manage discharge from the site and sustainably manage surface water through a range of integrated techniques as follows:



Examples of surface water gullies



Water storage solutions

- As an alternative to piped drains, it is proposed that surface water generated by buildings and areas of hard standing should be captured using a series of channels and gullies of sufficient capacity to meet local requirements.
- These conduits should discharge into attenuation areas which should take the form of permanently wetted features that have both an urban realm enhancement and ecology benefits function. These features would provide the required storm water storage above the standing water level.
- The scheme should incorporate additional storage to address the risk of the drainage outfalls being blocked potentially in the form of linear urban canal features or if appropriate as underground storm storage cells. Figure 19 illustrates how these surface water management techniques could be linked to form an integrated sustainable drainage system.

12.8 Consideration should be given to how this strategy would be implemented as part of a phased development of the area, and to tide levels on the Thames and their effect on site drainage.

Fig. 19 Drainage infrastructure



13 Other relevant matters

Designing out crime

- 13.1 It will be important for any scheme to embrace the principles of designing out crime. The development framework set out in this SPD reflects considerations such as defensible space and natural surveillance (including proper lighting) as well as proposing the clear definition of public and private spaces, the creation of active frontages, the proper design of car parking areas and avoiding left over areas with no

Other matters

clear function. In working up detailed schemes early liaison is recommended with the Police.

Water supply and waste management

- 13.2 Bexley sets high standards for the management of waste streams and the collection of waste for recycling. All buildings should be designed with appropriate access to suitable sustainable waste and recycling facilities in accordance with British Standards. The Council's residential design guide 'design for living' provides further information in this regard. All waste and recycling issues should be addressed at an early stage in consultation with the Council's Waste Management Team.
- 13.3 It is essential that developers demonstrate that adequate water supply and sewerage infrastructure capacity exists both on and off the site to serve the development and that it would not lead to problems for existing users. Where there is a capacity problem and no improvements are programmed by the water company, then the developer needs to contact the water authority to agree what improvements are required and how they will be funded prior to any occupation of the development.

Noise and air quality

- 13.4 Noise from road traffic in Bronze Age Way and Queens Road is considered to be a potential issue and a detailed assessment of noise exposure levels will be required for sensitive users likely to be affected.
- 13.5 On-site parking and traffic movements could have an adverse impact on air quality for residents and potential occupiers/employees in the new development. An air quality assessment may, therefore, also be required to accompany any planning application(s).

Contamination

- 13.6 This large area has accommodated a variety of activities and uses including a tram depot, a flour mill and a swimming pool. A phase 1 and 2 site contamination assessment was undertaken by the Council in 2007 to provide details of potential environmental risk and geotechnical properties and these will be made available to prospective developers. Although the phase 1 assessment is unlikely to have changed significantly in its findings in the intervening period the phase 2 will have to be updated in accordance with current guidelines and to reflect proposed changes in the development plan as outlined in this SPD and subsequent proposals.

Conservation and archaeology

- 13.7 The Erith High Street Conservation Area lies partly within the Erith Western Gateway area and development will be required to conserve or enhance its character or appearance. The Western Gateway area also includes a Grade II listed building, and lies adjacent to a number of locally listed structures.
- 13.8 Erith Western Gateway sits within an Area of Archaeological Search which runs along the line of the River Thames. This area has been in occupation since prehistoric times and a number of important finds from various periods have been documented.

Any developer(s) will be required to cooperate in ascertaining, recording and, where appropriate, recovering or preserving in situ material of archaeological interest discovered in the area. The developer(s) will be required to implement a programme of archaeological work in accordance with a written scheme of investigation to be submitted and approved by the local planning authority.

Site management

- 13.9 In order to safeguard the amenities of nearby residents, users of local facilities and businesses and the safety of highway users, a construction methodology statement will be required. This should include the programme and details of construction work, storage of materials, hours of working, methods of abating noise and dust, targets to minimise demolition and construction waste, wheel washing and street cleaning arrangements, routing of construction vehicles through the area and parking of contractors' vehicles.
- 13.10 Measures to safely manage polluted materials must be agreed, whilst the protection or re-provision of essential infrastructure, such as the electricity sub station, will be sought. In view of the sensitivity of the area the design and maintenance of site hoardings and associated temporary advertisements during construction will also be a matter for agreement with the local planning authority.

Affordable housing

- 13.11 In accordance with Policy CS10 of the Bexley Core Strategy (2012), the Council will seek the maximum reasonable amount of affordable housing within the Erith Western Gateway area. Having regard to local circumstances a minimum of 35% of homes should normally be affordable housing. In considering the levels of affordable housing, where the developer suggests that site viability does not permit full provision at the level required by the policy, this will need to be demonstrated by a full financial appraisal. The Council will take a strategic view of provision across the area, so as to ensure maximum flexibility on individual sites, provided this does not prejudice the securing of the required quantum of affordable homes or its appropriate integration into the overall scheme.
- 13.12 A target of 70% will be social rented and 30% will be intermediate housing, unless otherwise agreed. Detailed proposals on the nature of the affordable units will be considered in the context of the existing character of the development area and will have regard to the desirability of creating mixed and balanced communities. Full details of the Council's approach to affordable housing is set out in its Affordable Housing Supplementary Planning Document (March 2006).

Planning obligations

- 13.13 Any proposals for the area will be expected to mitigate adverse impacts arising directly from development. The Council will seek to ensure such mitigation by way of a legal agreement, either through planning obligations or, for the disposal of any Council owned site, through a development agreement. The Council's approach to planning obligations is set out in its Planning Obligations Guidance SPD (2008). The Council also provides a planning obligations calculator which will give an initial

Other matters

indication of the levels of contribution likely to be sought. This can be found on the Council's website.

- 13.14 The Mayor of London has proposed a Community Infrastructure Levy (CIL) which will apply to varying degrees across Greater London, and is likely to come into affect in the spring of 2012. The levy will apply to all relevant development granted planning permission following its adoption and will be in addition to and take precedence over any planning obligations. Further information can be found on the Greater London Authority's website at: www.london.gov.uk/

Planning applications

- 13.15 This SPD enables the Council to take a more flexible approach to the nature of applications to be submitted during the phased development of the Erith Western Gateway area. Detailed applications on individual sites will be considered in the broader context of the development framework set out in this SPD and may be resisted where they are adjudged to prejudice its delivery.

Appendix 1 Sample House Types

It should be noted that these drawings are illustrative only and detailed proposals should meet the London Plan (2011) space standards. They should also have regard to both the Bexley Residential Design Guide (2006) and evolving London Plan housing design guidance.

Terraced houses

Three-storey town house with and without a lower parking garage level



Three-storey mews house with integral parking



Appendix 1

Apartment buildings

Typical **corner block** of apartments with four flats per floor. This could stand on the ground or be built over street level commercial units or undercroft car parking. Every flat is dual aspect. In the detailed design of successive phases the typical plans would be modified to suit a specific brief and context. Variations could include taller corner blocks, upper level duplexes and set-backs in plan or section.



Typical **mid-terrace** block of apartments. This variant provides useful future flexibility in the detailed design of future phases.



If you would like the information in this leaflet in a different format, please call 020 8303 7777 and ask for Communications/Graphics. The reference to quote is 604171/12.11

