

Architectural Design Statement
to accompany Part 8 Planning Application to Kildare County Council
Social Housing Bundle 3 - Residential Development
at Fortbarrington Road, Athy

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# 0 Introduction and Executive Summary







Above: Site loutline in red, with adjacent lands within notable adjacent lands in KCC ownership outlined in blue

## 2.0 Site Context

#### 2.1 Brief

The design brief for this site is for the development of 73 social housing units and an estate community building. The brief mix as advised by Kildare County Council (KCC) is as follows:

22no. 1 bed units (approx. 30%)
25no. 2 bed units (approx. 35%)
20no. 3 bed units (approx. 28%)
6no. 4 bed units (approx. 7%)

Space standards for houses are to be in accordance with Quality Housing for Sustainable Communities 2007, except where the KCC County Development Plan (CDP) dictates higher standards. For apartments, space standards are to be as set out on the Sustainable Urban Housing - Design Standards for New Apartments 2018, Guidelines for Planning Authorities. A minimum of 12% of units are to be designed to UD standards in accordance with the KCC CDP, the majority of which are to be suitable for older residents. A 4B7P dwelling is to be delivered for a family with particular needs.

#### 2.2 Site Description

Athy is a market town located in Co Kildare ca. 72 km south west of Dublin. The River Barrow is the significant feature in the town and flows through the town centre in a north/south direction, intersecting with the Grand Canal. The town's main vehicular axis runs east/ west along the N78 National Secondary route and forms part of the main street. Athy is also serviced by public rail transport and includes mainline intercity services on the Carlow/ Kilkenny/ Waterford line. The town serves a large hinterland in southern Kildare and Laois.

The site consists of c.2.43ha of greenfield land located approximately 1km to the south of Athy town centre. To the south of the site is a social housing estate and a halting site. To the west is agricultural land. Beyond this land to the west is residential housing bounded by Bennettsbridge Stream which flows east to the Barrow. To the east is Fortbarrington Road (L8990). Along the northern boundary is a narrow strip associated with a former railway line to the rear of a house that fronts the L8990. This area of land is the location of the planned southern distributor road. To the north of this strip of land is residential housing. A creche and local shop is located opposite the application site.

The site, which is currently in agricultural use, is relatively flat at the Fortbarrington Road but rises to the west. Three electricity poles are located close to the road frontage and there are trees along this boundary. The Council's landholding extends to include the adjoining halting site, the area designated as open space to the west, and the adjacent estate of Ardrew Meadows, which contains social housing units managed by both Kildare County Council and Respond Housing. The Council's brief indicates that the adjoining halting site will be extended to accommodate a further 5 traveller units, and the northern edge of the extended halting site development will form the southern boundary to the proposed site.





Above: Ardrew Key Development Area Urban Design Framework proposal from the Athy LAP

#### 2.3 Site Constraints

In addition to the KCC CDP, an Athy LAP, which contains the Ardrew Key Development Area Urban Design Framework has been prepared, which covers the proposed site. This identifies a clear strategy of site facilities, building arrangement, linkages and usage, all of which will inform the development proposals. Although the requirements of the KCC CDP and the LAP are further clarified in the accompanying Planning Statement, the headline items are noted below:

- Density- a minimum of 30 units per hectare to be achieved per Athy LAP.
- Public Open Space (POS) 15% minimum requirement
- Parking- provision of 2 parking spaces per dwelling house; 1.5 spaces per apartment, and 0.25 visitor spaces per apartment.
- Community a social infrastructure audit has been carried out. The proposed development includes a community estate building which will serve the needs of the prospective residents of the development.
- Roads & Transport-There will be a new access junction from the site to Fortbarrington Road, with a new footpath and cycleway provided along the site edge, running north-south. There will be a new signalled crossing point on Fortbarrington Road linking the site to estates to the east. The Athy Distributor Road is currently under construction to the north of the site. A link road in required from Fortbarrington Road to the proposed playing pitches to the west of the site. A pedestrian and cycle link is required to the south west of the site, to the adjacent Ardrew Meadows.
- Typologies- house typologies and a limited quantum of own-door apartment typologies are permitted.
- In addition to the LAP and CDP constraints, the following site constraints will need to be considered within any development proposal
- Whilst the site has generous frontage along Fortbarrington Road, the juxtaposition of the proposed site entrance, and existing and future traffic junctions (in particular the junction at the new distributor road to the north) will need to be carefully considered.
- The southern distributor road will generate traffic noise, and housing will need to be sufficiently set back from the proposed road edge.
- Whilst the site appears reasonably flat, there is a perceptible climb from west to east at the southern boundary, which may need to be considered in the context of accessibility for all.
- The proposed adjacent development to the south, presents a significant boundary to be secured, ideally by means of housing backing on to this boundary. Any dwellings along here must not undermine the privacy of the neighbouring development.
- An existing dwelling to the north east of the site will need to be considered, in terms of the potential for overshadowing etc.
- The balance of POS requirements, parking provision and density will all need to be carefully considered to ensure that the dominant built form and typology is of own door housing, as opposed to apartments.
- The impact of the link road serving the playing pitches will need to be considered, and whether this can also serve as direct access to proposed housing.

#### 2.4 Site Design Approach

The site design approach is strongly influenced by the Athy LAP. A terrace of housing is arranged along the southern site boundary, backing on to the Halting site. This terrace continues along the western boundary of the Halting site, delivering a terrace that overlooks the cycle and pedestrian link towards Ardrew Meadows.

A public open space is located centrally within the development, flanked to east and west by 2 perimeter blocks of housing. A further public open space is located at the north west corner of the site, overlooked by housing to the south.

The variance between the proposed site layout and the Ardrew KDA Urban Design Framework is in keeping with the statement in the LAP that "key building frontages and the layout of the urban blocks may also be varied where it is demonstrated that there is a strong urban design rationale and that passive supervision of public spaces will not be compromised." In this case, in order to achieve a min. density of 30uph, and to maximise own-door housing, the central open space has been contained by housing blocks on three sides. This primary public open space is highly overlooked, and is supplemented by a second POS which is also overlooked and creates a variety of amenity for the residents and the wider locale. The proposed layout creates urban definition and adds passive surveillance along Fortbarrington Road, creates a clear gateway to the scheme, secures the boundary of the existing house to the north, creates a strongly defined central open space at the heart of the new neighborhood.

A central access road serves both the proposed housing and the future sports pitches to the west. All public and private realm are clearly defined, as a result of well-defined perimeter blocks. Whilst the development is pre-dominantly 2-storey in height, compliance with mix and density standards are achieved through the inclusion of triplex apartment buildings to corners, which also help to ensure that there are no blank gable ends at these locations. Parking is all on-street, evenly distributed throughout the development.



Above: Proposed Site Layout Plan, with extent of Part 8 planning application outlined in red

The design rationale outlined below identifies the key issues considered in the design process for the proposed residential scheme on the site under the 12 criteria set out in the Urban Design Manual – A Best Practice Guide 2009.

#### 3.1 Context: How does the development respond to its surroundings?

The development is informed by the Athy LAP, which contains the Ardrew Key Development Area Urban Design Framework. This framework proposes a series of guiding principles for the appropriate development of the site, which balance the needs of both local and wider planning contexts.

Several elements of this framework are taken as points of departure for the site strategies developed. These include:

- The provision of a terrace of housing to wrap around the edges of the expanded halting site directly to the south.
- The creation of a central, well-enclosed public open space on the site.
- The creation of a strong urban edge to overlook and address the planned playing pitches to the west.
- The inclusion of a play area well positioned vis-a-vis the subject site, Ardrew Meadows and the proposed playing pitches.
- The creation of an urban edge addressing Fortbarrington Road.

The development proposal is low-rise, and sympathetic to the similar local context. Whilst the dominant form is 2-storey, pitched roofed terraced dwellings, a number of apartment duplex and triplex buildings are included in order to deliver a higher site density than that of existing adjoining sites. These buildings are appropriately modest in size, consisting of a single apartment per floor, and typically located at the ends of terraces. Their positioning at street corners ensures that the amenity of adjacent 2-storey terraced dwellings is not undermined.

The design language and finishes are simple and contemporary, with the 2-storey forms of terraced housing in particular being of similar form to adjacent developments. Terraces are arranged on the site following the existing undulating topography as much as is practicable.

Within the immediate, recently developed surburban context, there are no consistent or dominant palettes of materials. We have therefore proposed a primary pallette of materials consisting of buff coloured brick and off-white painted render, that will sit comfortably within the immediate context. Dwellings feature brick to the ground floor frontage for robustness, with render to first floor and generally to side and rear walls. The ground floor brick language continues at the ends of terraces to form the 3-storey apartment triplex 'bookends'.

The proposed development serves to make a positive contribution to the existing neighbourhood. It will ultimately form the gateway to a new sports ground to the west for the benefit of the wider community. In the short term, the back-to-back development along the southern flank will provide security to adjacent residents. Two distinct new areas of public open space, with the central one in particular arranged as a focal point for the proposed development, will provide useful local amenity.

Whilst the site does not include any significant vegetation, it is proposed that much of the existing hedgerow to the northern boundary will be maintained. This will be supplemented with new planting, as described in Section 6.0





#### 3.2 Connections: How well connected is the new neighbourhood?

Several of the guiding principles from the Athy LAP, which contains the Ardrew Key Development Area Urban Design Framework are taken as points of departure for the site strategies developed. These include:

- The inclusion of access from Fortbarrington Road through to the proposed playing pitches to the west.
- The creation of a pedestrian and cycling link to the existing Ardrew Meadows to the south west, to increase connectivity.

The link from the Fortbarrington Road to the proposed playing pitches to the west forms the central spine through the development, with housing and public open space fronting the road on both sides. This arrangement ensures that road infrastructure is well utilized, serving more than one function. It is also safe and secure, in that it is well overlooked.

From this cental spine route, a series of short cul-de-sacs radiate both north and south, separating housing from public open space, and facilitating car-parking within close proximity to dwellings. To the south west of the site, the termination a of cul-de-sac to vehicular traffic allows for the pedestrian and cycle link to Ardrew Meadows, to benefit sustainable travel patterns for short local journeys. This pedestrian link is well overlooked by a terrace of dwellings along it's eastern flank.

Further connectivity is proposed along Fortbarrington road, with a cycle way and pavement included for the length of the site frontage, allowing for further connectivity to north and south by others in due course.

#### 3.3 Inclusivity: How easily can people use and access the development?

The proposed brief has been developed by Kildare County Council, based on their records of housing needs within the locality. The proposed brief includes a broad mix of typologies, and this variety should assist in forming a balanced, sustainable community. A summary breakdown is included in Section 2.1 above.

To comply with KCC's disability strategy, a minimum of 12% of new residential units must be suitable for persons with a disability. In 2020, KCC also identified Athy as an 'Age Friendly Town'. In this context, KCC have directed that the majority of units presented as suitable for persons witha a disability must also be suitable for elderly residents, with these being of 1B2P typology. The exception is the inclusion of a single 4B7P dwelling for particular needs. In total, 11no. (15%) of units have been identified as being suitable for persons with a disability, with the Universal Design principles and standards incorporated in the design of such units. Both the 3B5P and 4B7P dwellings have been arranged to ensure that the living room to the front could be utilised as a bedroom, with the possibility of a shower room adjacent, in accordance with Lifetime Home's best practice.

For the approach to dwellings, the topography of the proposed public ream has been designed to omit ramps and steps, with gently sloped or level approaches in all cases. The public realm is welcoming, with open and inviting public space, but well defined and enclosed front curtilages and private rear gardens and terraces. Separate front curtilages to each dwelling and apartment, with direct access to either an own door or external stair serving upper-level apartments reduces barriers to visitors. The public open space has been designed with facilities for a wide range of interests and abilities, to ensure that it is attractive to a broad spectrum of residents.

# 3.4 Variety: How does the development promote a good mix of activities?

A social infrastructure audit has been completed for the site, which has concluded that all necessary facilities are available within both the immediate and wider area. Notwithstanding this, following consultation with Kildare County Council, an Estate Community Building has been included to provide meeting rooms and facilities for residents of the new and adjacent developments.

In terms of the non-residential amenities included within the development, a public open space is centrally located, featuring a range of activities serving various interests. In contrast, a second, less structured public open space is located to the north west corner of the site, as a quieter space. In the longer term, new sports pitches are proposed to KCC lands immediately west of the site.

The mix of both well designed public open space, and direct access to the adjacent sports pitches (when developed) promotes physical activity. This provides a potential 'Health Gain' to residents.

Top left and left: View of 3d triplex apartment 'Bookend' buildings, with separate own door apartment on each level. Ground floor apartment features private terrace to rear, first and second floor apartments feature balcony overlooking street

#### 3.5 Efficiency: How does the development make appropriate use of resources, including land?

The proposed site density is informed by the Athy LAP, which contains the Ardrew Key Development Area Urban Design Framework. This requires a site density of minimum 30uph to demonstrate efficient land use, with 31.9uph being achieved for the proposed development.

Good site and pedestrian permeability within and outside the site should encourage sustainable modes of transport for short journeys, reducing traffic generated pollution and carbon emissions. SUDS principles have been applied to control rainwater run-off from the site. These range from engineered storm attenuation systems, to the inclusion of swales and sedum roofing that will also enhance biodiversity.

It is proposed that combustibles will not be used for space heating or hot water generation. Instead, individual air source or exhaust air heat pumps will deliver heat and hot water, with a large extent of operational energy coming from renewable electricity. A generous provision of infrastructure will also be provided for charging of battery electric vehicles, and all parking spaces will be ducted to allow for the easy addition of further charging infrastructure in the future.

Dwellings and apartments have been designed with modest plan depths, generous window sizes and dual aspect to all units, to benefit daylight and reduce energy consumption from artificial lighting. Adjacent terraces feature generous setbacks of typically 22m minimum, to both fronts and backs. When combined with pitched roof, 2-storey construction, this arrangement allows for generous sunlight penetration to dwelling and apartment interiors, streets, rear gardens and public space, with minimal overshadowing.

All dwellings and apartment provide for a 3-bin recycling and waste system. End of terrace dwellings provide for this within the rear garden, by means of a side access gate to the street. Mid terrace dwellings feature a covered bin store within the front curtilage, discreetly located to ensure that waste is not seen directly from either the street, or from living or kitchen spaces within dwellings looking onto the street.

Below: View from central POS looking south. Dwelling composition features a mix of full and partial brick frontage, for variety. Note: Full detail of POS finish and features not included in this image, please refer to proposed Landscape Plan.

#### 3.6 Distinctiveness: How do the proposals create a sense of place?

The development is planned around a central public open space, with the main spine access road to it's southern edge. This plan arrangement ensures that the public open space is a useful orientation device, forming a strong identity for visitors to the development. Surface finishes and activities proposed within the public open space allow for further distinction and identity.

Within this distinctive site plan arrangement 2-storey terraced dwellings are bookended by contrasting 3-storey apartment buildings. The apartment triplex buildings are sufficiently modest in plan form and consistent in architectural language and materials so as not to jar with the adjacent terrace dwellings. However, the street facades are finished in 100% brickwork to give some contrast to adjacent dwellings. Their plan form is long and narrow, so they present a wide frontage on one elevation, with a narrow frontage as one turns the corner. Their location at the end of terraces helps to create a distinctive marker. In addition, where 2 apartment triplex blocks are adjacent, they have been rotated at 90 degrees to each other on plan, so that narrow and wide ends align on the same elevation, to create variety.

To the south west corner of the site, a one-off terrace of single–storey dwellings are located in a short terrace adjacent to the Ardrew Meadows pedestrian link. To the north west corner, a short terrace of dwellings uniquely overlooks the second public open space.

For the long terrace of dwellings along the central access road, the terrace has been broken up into short blocks, with different dwelling typologies within each block. A change of elevation expression exists between typologies, in particular in the arrangement of windows and doors. In addition, distinct blocks along this long terrace feature a contrasting elevational treatment, with 4B7P dwellings at the middle and end of the terrace finished in brickwork over ground and first floor. The block of dwellings at mid terrace have been stepped forward of adjacent dwellings, marking the location of the public open space along the route.

On the approach from Fortbarrington Road, a combination of a terrace gable end, and a short terrace of dwellings, with a triplex bookend all helps to clearly mark the gateway to the site, and to give the development a distinct identity to visitors approaching the site.

The taller triplex blocks, with their distinct architectural language should allow visitors to the site to orientate themselves from some distance. From certain vantage points, such as from along the soon-to-be-built southern link Road adjacent to the site, or from Ardrew Meadows, the form and height of these elements will contrast with, and therefore will be easily read relative to, adjacent terraces.





Above: View along central street, looking west. Carriageway and parking zones are clearly defined, with landscape strip between parking and pavement. Front curtilages are defined by a combination of steel gates and railings, and bin stores

#### 3.7 Layout: How does the proposal create people friendly streets and spaces?

The development has a rational arrangement of streets, based around the central access road running east to west. An analysis of traffic generated by the future playing pitches to the west has been completed, and it has bene concluded that the access road can accommodate this additional traffic, without negatively impacting the quality of the subject development.

The setting out of much of the site has been planned around the delivery of efficient housing blocks, that offer sufficient site permeability. Back-to-back terrace dimensions are just over 22m, to ensure sufficient privacy, but to also ensure that rear gardens are no larger than necessary, for site efficiency.

The short streets that radiate off the central access road are much quieter in nature, and none of these are vehicular through roads. However, each of these vehicular cul-de-sacs allow pedestrians or cyclists to continue their journey, through their connection with public open space, or pedestrian links. Each of these pedestrian links are well overlooked by adjacent terraces of dwellings.

All dwellings and apartments feature either a front door or an access stair, within the front curtilage and easily read from the street. This focuses activity on all adjacent streets, and assists in forming natural surveillance and overlooking.

Pedestrian movement throughout the development is clearly defined, and a 1m wide planted buffer strip is provided between pavements and carparking spaces, to give clear separation between both. As the majority of roads are cul-de-sacs, they are short in nature, with low traffic speeds. The cul-de-sacs either side of the central public open space are surfaced with contrasting materials, and work as a Homezone. The central access road uses horizontal deflection adjacent to the public open space as a speed control device, assisting access to the public open space from housing to the south. Cyclists will share the main carriageways with vehicular traffic, which is justified due to the modest anticipated traffic movements, and the speed control features included within the design.

Public and private space are well defined, with blocks of terraces, in combination with bookend triplex apartment blocks forming strong, defensible perimeter blocks. Each perimeter block features a clearly defined front curtilage to the street edge, with private gardens within the centre of the block. Ground floor apartments at corners also feature a generous private open space behind the building line, to ensure that there is no confusion between public and private space.

#### 3.8 Public Realm: How safe, secure and enjoyable are the public areas?

15% of the site area has been utilised for public open space provision, which matches the minimum requirements of the LAP of 15%. POS has been sited at 2 locations, both centrally and at the site perimeter. This not only allows for a distinct character to be developed for each POS, but it also ensures that each is of a reasonable and manageable scale, that is well contained by adjacent buildings, and easily overlooked.

The central public open space feature terraced housing on 3 sides, all of which have front doors and windows overlooking the street. All dwellings are of modest height, and do not overshadow the POS. The north western POS is overlooked by a terrace of dwellings and an apartment triplex building along it's southern boundary.

The utilisation of terraces of dwellings to form defensible perimeter blocks provides for private rear gardens, each separated from the other by a high wall or fence. At street corners, the triplex apartment tyoplogy has been used to reinforce the perimeter block, with the continuation of brick walls between ends of terraces and the start of the triplex buildings included as part of the architectural composition. Each of the private curtilages at the street edge are defined by a combination of brick walls, railings and gates, and as much curtilage planting as feasible has been included for biodiversity and SUDS gains.

Parking spaces within the public realm are balanced throughout the development. On the central access road, side on parking, interspersed with street trees, provides appropriate parking for traffic levels along this route. For the quieter cul-de-sacs, more end on parking has been included to increase the quantum of parking. The inclusion of street trees and tree pits improves the public realm, assist with speed control, and aids SUDs and biodiversity.





Above left: View of housing to east of central POS, looking south.

Above right: View at west end of central street looking east. A deeper landscaping strip with additional trees is included at this location, between pavement and carriageway.

#### 3.9 Adaptability: How will the buildings cope with change?

Typically, all dwellings deploy a narrow frontage, deep plan arrangement, for maximum plot efficiency, and to the benefit of overall site density. As this approach can lead to lesser potential to successfully extend or re-model the dwelling for changing needs, Lifetime Homes adaptability features have been included where possible. Both the 3B5P and 4B7P dwellings have been arranged to ensure that the living room to the front could be utilised as a bedroom, with the possibility of a shower room adjacent, in accordance with Lifetime Home's best practice. In addition, all ground floor 1B2P apartments and 1B2P dwellings have been designed to UD standards, ensuring that long-term changing needs have been considered within the design from the outset.

All of the new dwellings and apartments will be energy efficient, and equipped for challenges anticipated from a changing climate. All dwellings are dual aspect, with at least one, and sometimes 2 facades benefitting from a south, south east or south west aspect to benefit solar gain. Window openings are large enough for sufficient daylight provision, without being too large to the detriment of heat loss or solar overheating.

At ends of terraces, and in particular to the northern site boundary larger rear and side gardens ensure that there is more potential to extend dwellings to the side and rear, to accommodate changing needs. Within the development, a particular needs dwelling has been included within such a location, to avial of this flexibility.

#### 3.10 Privacy and Amenity: How does the scheme provide a decent standard of amenity?

All dwellings have direct access to private rear gardens, which open directly off ground floor living spaces. The garden sizes are generous, with depth determined by 22m back-to-back dimensions, which means that gardens are in excess of minimum standards in the majority of cases. Ground floor triplex units have a similar rear garden, which is also directly connected to the ground floor living space. Although the rear garden for these units is more overshadowed in comparison with those to dwellings, it is complemented with a generous curtilage area to the street side on two sides of the building. Upper level apartments feature a deep balcony opening off the living space, which is recessed for privacy, and features 2 aspects to maximise solar gain. Open space to apartments will comply with Sustainable Urban Housing – Design Standards for New Apartments.

All dwellings are dual aspect, with smaller 2B4P units featuring dual aspect living spaces. Apartments are dual aspect by means of a corner aspect, but in reality, they feature some windows or openings on all 4 sides, albeit with those facing the gables of existing terraces and adjacent rear gardens arranged to ensure that privacy of adjacent properties is not undermined. Access stairs and balconies to triplex apartments have been similarly configured to ensure that adjacent amenity is not undermined.

A new southern distributor road is proposed adjacent to the site boundary, and as a result, all housing is set back over 31m from this boundary in accordance with best practice. None of the other site frontages or thoroughfares are deemed to generate any significant traffic or airborne noise, and there are no other notable sources of noise pollution. Dwellings are arranged to be consistent over each storey, with living spaces and bedroom spaces located beside similar space to adjacent dwellings. This will reduce the requirement for any special acoustic requirements at party wall locations. Apartment floors and flanking structure will be detailed in accordance with building regulations and best practice, to ensure that potential for noise nuisance between floors is minimsed.

All dwellings for the development feature generous storage provision, spread throughout the dwelling. Storage provision is in compliance with the KCC County Development Plan, which requires storage provision significantly in excess of national standards. All storage is arranged to be useful and accessible, and of good proportions. Storage to triplex units is partly internal within the apartment, supplemented with an external store at street level, for storage of large bulky items.







Above: Proposed primary materials of light coloured render (left), light coloured clay brick with off-white mortar (middle), and artificial roof slate/ roof tile (right). Refer to elevation drawings for details of other materials.



Above: Material composition shown to typical dwelling/ apartment triplex block arrangement. Note common brick treatments to binstores, select curtilage walls and ground floor walls to dwellings (some dwellings to feature brick to first floor also as illustrated on elevation drawings). String course detail at top of ground floor window head between brick and render, with canopy and flashing to sit below top of string course. Triplex block in matching brick, with solid balustrade panel to street elevation of balconies.

#### 3.11 Parking: How will the parking be secure and attractive?

All parking within the development is unallocated and on-street, balanced throughout the site. This allows for an efficient off-setting of parking through-out the site, so that parking needs for those with relatively high levels of car ownership can be offset by those that do not own a car. The balanced distribution of parking adjacent to front doors aids both convenience and security, with natural passive surveillance of both car-parking and routes to car-parking from dwellings and streets. The balanced distribution of parking, softened by the inclusion of on-street tree planting helps to minimise the impact of car-parking.

Parking surface materials are to be distinct from the adjacent street surfaces, and will be finished in tramacadam or concrete. This means that the parking elements of the public realm are clearly defined, and the separate delineation helps with speed control on the adjacent carriageway. It is proposed that cycle storage will be accommodated within the rear gardens, or within private curtilages in all cases.

#### 3.12 Detailed Design: How well thought through is the building and landscape design?

Generally, materials proposed to both the public realm and buildings have been proposed to strike a reasonable balance between aesthetics, cost effectiveness and long-term maintenance.

Generally for dwellings, higher quality materials are utilised on the street frontages only where they will be seen, with rear and side walls to private gardens finished in more cost-effective painted render. Corner apartment buildings are finished more extensively in brick to all sides, as their form will be read from various vantage points as these buildings are taller than adjacent dwellings. We have proposed a light buff coloured brick generally to street facades, with render used on first floor to the majority of dwellings for variety and cost-effectiveness. The use of brick is included at all areas immediately access to the public and to residents, and this materials robustness will help to weather the impact of day-to-day living.

Building are simply detailed with careful consideration to the weathering of materials. All pitched roofs to dwellings will feature a reasonable overhang, to provide protection to render below. Window sills will feature traditional concrete sills, with generous overhangs, again to prevent staining of render from run-off. The junction between brick and render elements is to feature a similar concrete string course, to give a robust transition, and to again assist weathering. All other materials, including windows, doors, rainwater goods and fascias, will be either aluminium or alu-clad, with a painted or PPC coating for longevity and to minimize maintenance. All parapets to walls and to the cappings of the apartment triplex buildings will also feature a generous parapet capping, in either concrete or PPC aluminium.

For other applied building features, canopies to front doors will feature a flat roof, with alu-clad fascias to visible edges (including soffits), and with a membrane or metal capping to the upper surface. Balconies are to be drained, with a solid balustrade to the street edge, finished in either PPC aluminium sandwich panel cladding, or color coated fibre cement panel cladding. Return rails are to be metal with PPC coating, to match balcony structure (should balcony structure not be reinforced concrete).

As it is proposed that all dwellings and apartments will require a heat pump for space and water heating, any external condensers are to be located within rear gardens, or to the private terrace areas behind the street frontage. There will not be a requirement to site such equipment visibly in front curtilages in any circumstances.

Visible bin stores are to be minimised by utilising rear gardens for storage where access is possible. This allows any remain bin stores within private curtilages to be evenly distributed to minimise impact. Bin stores have also been positioned to minimise views of waste from both the street and from living spaces within the dwelling. All apartments within duplex or triplex blocks have their own separate bin stores within their private curtilage areas.

For a commentary on landscape materials, please refer to Section 7.0 of this report.

# I.0 Schedule of Accommodation



The proposed brief has been developed by Kildare County Council, based on their records of housing needs within the locality. The proposed brief includes a broad mix of typologies, and this variety should assist in forming a balanced, sustainable community. A summary breakdown is included below:

Current Brief - Schedule of			
accommodation			
Apartments	No.	Area (m2)	Comments
1B2P triplex (g/f)	6	57.9	UD unit
1B2P triplex (1/f)	6	56.4	
1B2P triplex (2/f)	6	54.8	
2B4P duplex (1/f)	1	77.8	
Total apartments	19		
Dwellings	No.	Area (m2)	Comments
1B2P dwelling	4	57.1	UD unit
1B2P dwelling 2B4P dwelling	24	57.1 89.6-90.4	UD unit
•			UD unit
2B4P dwelling	24	89.6-90.4	UD unit
2B4P dwelling 3B5P dwelling	24	89.6-90.4 107.8	UD unit  Particular needs dwelling
2B4P dwelling 3B5P dwelling 4B7P dwelling	24 20 5	89.6-90.4 107.8 130.6-131.4	
2B4P dwelling 3B5P dwelling 4B7P dwelling 4B7P dwelling	24 20 5	89.6-90.4 107.8 130.6-131.4	

# 5.0 Housing Quality Assessment

The proposed scheme has been developed in a manner which employs best practice in urban design and having regard to the following policy documents:

- Quality Housing for Sustainable Communities 2007
- Urban Design Manual A Best Practice Guide 2009
- Sustainable Residential Development in Urban areas (Cities, Towns & Villages) 2009 Guidelines for Planning Authorities
- Sustainable Urban Housing Design Standards for New Apartments 2018, Guidelines for Planning Authorities.
- S.I. 604 2006: Child Care (Pre-school Services) (No.2) Regulations 2006 and (Amendment) Regulations 2006
- Design Manual for Urban Roads and Streets (DMURS)
- Council Development Plans, LAPs and AAPs

Within Appendix A of this report, we have included a detailed Housing Quality Assessment (HQA) for each dwelling and apartment. For the purposes for clarity, the HQA has been presented to include a full breakdown of the variable parameters within each unit, including:

- The unit number identifier, which corresponds with the unit numbering included on the site layout drawing SHB3-ATY-AR-COA-DR-0011
- The accommodation type (dwelling or apartment), and typology (number of beds and persons)
- The Gross Internal Area (GIA) for each unit
- The target floor area for each unit
- For apartments, the +10% allowance, and whether the unit complies as a +10% unit.
- The predominant orientation or aspect of the unit
- Clarification as to whether the unit is single or dual aspect
- The private open space provision for each unit
- Whether the apartment or dwelling is designed to UD standards

The above table summarises the total number of apartments and dwellings, in terms of

- A breakdown of mix
- A summary of dual aspect vs single aspect provision
- A summary of compliance with the +10% requirements
- A summary of compliance with communal open space requirements

For each unit, a reference is included to a further series of drawings and schedules, where a full breakdown of each typology is included. This summarises:

- Plans, sections and elevations (as relevant for each apartment), and a schedule including
- A breakdown of individual living space areas, and the combined living space area
- A breakdown of individual bedroom areas, and the combined bedroom area
- A breakdown of individual storage areas, and the combined storage area
- Combined circulation areas
- Plant areas

In conclusion, the Housing Quality Assessment indicates that all units meet the design standards outlined in the documents listed above. A majority of the units exceed these standards. This provides the flexibility and adaptability which are key components of sustainable development. The layout of the site also means that the number of single aspect north facing units which do not overlook an amenity is eliminated, with all units enjoying a dual aspect. Additionally for apartments, the majority of the units are 10% above the minimum areas described in the Design Standards for new Apartments.

#### 6.1 Energy Efficiency Strategy

The strategy to deliver sustainable, energy efficient design and low cost of use in response to climate change includes the following measures and is further elaborated in the Energy Strategy by Semple & McKillop Ltd submitted with this planning application:

- All units have been designed to have a compact and efficient form. Use of terraced arrangement reduces exposed envelope and consequent heat loss.
- The external envelope to all units is highly insulated to reduce heat loss
- Windows are sized appropriately to balance heat loss and potential solar gain
- The detail design will consider the most efficient and appropriate heating system, including heat pumps combined with demand control ventilation. Provision for PV panels on each roof has been included
- Materials with long life and low embodied energy are preferred to reduce impact on the environment
- The energy performance of each house will comply with the requirements of the building regulations, achieving NZEB with a BER of A3/ A2 or better.
- The detailed design will consider water saving measures including water saving devices and water butts for garden water use
- SUDs compliant tree pits, and the use of planted swales
- Storm water is attenuated on site before discharge at limited flow rate to the public sewer management as described in the civil engineering report
- The landscape proposals have been designed by Mitchell Associates to contribute to the sustainability of the design
- Proposed new tree planting and variety of new planting to support greater biodiversity

#### 6.2 Building Lifecycle Analysis

It is intended that the development will be delivered through a Public Private Partnership (PPP) structure which will include maintenance and tenancy management services. Under this arrangement, the appointed PPP Company in partnership with an Approved Housing Body, will be responsible for the maintenance and management of the development and the life cycling of building elements on behalf of Wicklow County Council and the residents over a 25-year period. Thereafter the maintenance and management of the development will be handed over to Wicklow County Council.

As part of the appointment of the PPP Company, a performance specification will be developed that will outline the level of robustness and life expectancy of materials to be used, the required maintenance regimes and the residual life of building elements at the end of the 25-year period. The performance specification will cover external envelope materials, internal and external communal areas and all areas within the public realm including approaches to providing lighting, heating, hot water provision and other services.

At this planning stage, consideration has been given to external materials to housing, boundaries, and the public realm. The material descriptions, within this Design Statement and on the accompanying planning drawings, have been chosen to provide durable, long life, low maintenance materials and services for the residents. Refer also to the Compliance Report on Part L and Life cycle drafted by Semple McKillop, Consultant Services engineers.

The following tables typical performance indicators for a range of external materials as described on the planning drawings.

External Material Typical Performance	Indicators
Roof	
Description	Fibre cement or concrete tiles
Typical Life Expectancy	30 years ++
Robustness & Security	High – generally not in vulnerable locations
Replacement & Repair	High- easily replaced in case of damage
Typical Maintenance	Very low maintenance
Entrance Canopy Windows & Doors	
Description	Powder-coated aluminium
Typical Life Expectancy	45-50 years
Robustness & Security	Good resistance to accidental damage
Replacement & Repair	Moderate- able to be touched up
Typical Maintenance	Low maintenance
Balconies & Railings	
Description	Powder-coated metal
Typical Life Expectancy	Metal structure typically 70 years
Robustness & Security	High resistance to accidental damage
Replacement & Repair	Moderate- able to be touched up
Typical Maintenance	Low maintenance
External Brick	
Description	Clay brick
Typical Life Expectancy	50-80 years. Pointing, 25-50 years
Robustness & Security	Very high resistance to accidental damage
Replacement & Repair	Excellent- easily replaced
Typical Maintenance	Very low maintenance
External Render	
Description	Render finish
Typical Life Expectancy	Circa 25 years
Robustness & Security	High resistance to accidental damage
Replacement & Repair	Good - able to be repaired locally
Typical Maintenance	Low maintenance
Rainwater Goods	
Description	Powder-coated metal
Typical Life Expectancy	40-50 years
Robustness & Security	Good resistance to accidental damage
Replacement & Repair	Excellent- easily replaced
Typical Maintenance	Low maintenance
External Steps	
Description	Concrete
Typical Life Expectancy	80 years
Robustness & Security	Very high resistance to accidental damage
Replacement & Repair	Good - able to be repaired locally
Typical Maintenance	Very low maintenance



## Above: Landscaping proposals

## **Public open Space**

The development will include two areas of public open space. An open space located centrally to the development and a space to the southwest. Both open spaces are designed for both informal passive and active recreation.

## 7.1 The Central Public Open Space

The central public open space is proposed to strike a balanced between soft and hard/active landscape. Native tree planting will be set within low shrub, groundcover planting and wildflower meadow to create a buffer from the surrounding roads and proposed residential units. This will also further encompass and define the central open space area. Mown grassed space will be bordered by wildflower meadow for seasonal interest, habitat value and informal play opportunity. Spring bulbs will be planted into the grass to provide additional seasonal colour. This large grass area will provide scope for informal ball games and other activities. A proposed swale will assist the site SuDS and drainage strategy and will be fully planted with appropriate species which will encourage an additional ecology type. The central POS will also include a basketball half-court with mounded shrub and tree planting adjacent to limit stray basketballs. North from this will be a designated 200m2 play space with robust play elements. This space will be edged by a communal bench seating area which will allow for south facing seating and resting opportunities.

# 7.2 Southwest Open Space

The southwest open space again will be a mixture between both informal passive and active recreation. Formed with a native hedge and tree planting mix to the west and north edges, this space will be defined with an informal flowing trail leading the user to external exercise equipment with bench seating opportunities adjacent. The grass seeded areas will be bordered by wildflower meadow and shrub planting for seasonal interest, visual amenity and general increased habitat value

















# 7.3 Planting Strategy

The general planting strategy throughout the scheme is for significant structure tree planting with 2 metre clear stems to provide a leafy canopy layer, softening the proposed buildings and a base layer of shrub planting to create low level seasonal interest and colour softening the hard surfaced areas, curtilage and car parking. Eye level between the two planting types is kept clear to maintain sight lines throughout the scheme.

# 7.4 Open space structure trees

Native and naturalised tree species are to be planted within the public open space to increase opportunities for native wildlife. These will ultimately be large scale trees to designate a parkland character.

# 7.5 Street trees

Street tree planting will consist of species with fastigiate or neat forms suitable to the scale of the streetscape and those which will thrive in a streetscape environment. Street tree planting is located to avoid impacts with street lighting. Street trees will be planted into a minimum of 1.2m3 topsoil (or to the requirements of the local authority parks department, whichever is greater), with the use of urban tree soils and topsoil loaded rootcells to increase rooting areas outside the main tree pit area as necessary.

## 7.6 Garden trees

Rear gardens will be planted with small-medium scale fruit trees or flowering trees to provide softening and punctuation of the garden landscapes.

Below: The following table is an extract from Drawing SHB3-ATY-AR-COA-SH-0050, which has been included separately with this application

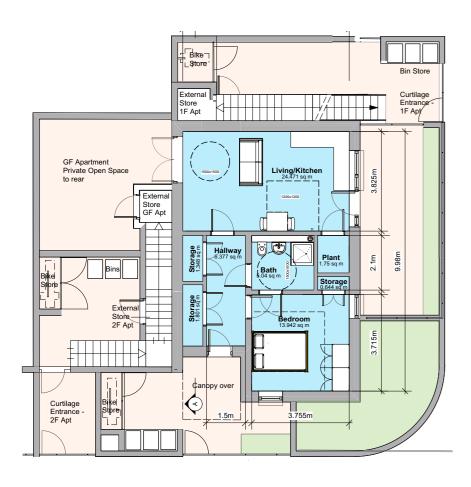
	Unit Number	Unit Type	1B/2B/3B/4B	Floor Area	Min. Target Area	10% GFA	10% > Floor Area	Aspect	Orientation	Private Outdoor Space	Reference for Further
Dwelling Types											
Dwelling Types	0										
	Dwl. No: 01	Dwelling Type 01	1B/2P	57.1 sq m	55 sq m	N/A	N/A	Dual	NE	57.695 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 02	Dwelling Type 01	1B/2P	57.1 sq m	55 sq m	N/A	N/A	Dual	NE	48 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 03	Dwelling Type 01	1B/2P	57.1 sq m	55 sq m	N/A	N/A	Dual	NE	48 sq m	SHB3-ATY-AR-COA-DR
	Dwl. No: 04	Dwelling Type 01	1B/2P 2B/4P	57.1 sq m	55 sq m 85 sq m	N/A N/A	N/A N/A	Dual Dual	NE NE	60.031 sq m 85.623 sq m	SHB3-ATY-AR-COA-DR- SHB3-ATY-AR-COA-DR-
	Dwl. No: 05 Dwl. No: 06	Dwelling Type 02 Dwelling Type 03	3B/5P	89.6 sq m 107.8 sq m	100 sq m	N/A	N/A N/A	Dual	NE	68.057 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 07	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	NE NE	67.916 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 08	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	NE	68.251 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 09	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	NE	63.759 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 10	Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	NE	59.12 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 11	Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	NE	78.7 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 12	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	NE	66.713 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 13	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m 85 sq m	N/A N/A	N/A N/A	Dual Dual	NE NE	66.498 sq m 54.319 sq m	SHB3-ATY-AR-COA-DR- SHB3-ATY-AR-COA-DR-
	Dwl. No: 14 Dwl. No: 15	Dwelling Type 02 Dwelling Type 02A	2B/4P 2B/4P	90.3 sq m 89.6 sq m	85 sq m	N/A	N/A N/A	Dual	SE	72 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 16	Dwelling Type 02A  Dwelling Type 02A	2B/4P	89.7 sq m	85 sq m	N/A	N/A	Dual	SE	62.75 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 17	Dwelling Type 02	2B/4P	90.4 sq m	85 sq m	N/A	N/A	Dual	SW	67.3 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 18	Dwelling Type 03	3B/5P	107.8 sg m	100 sq m	N/A	N/A	Dual	SW	65.834 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 19	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	SW	67.086 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 20	Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	SW	55.339 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 21	Dwelling Type 02A	2B/4P	89.8 sq m	85 sq m	N/A	N/A	Dual	NW	70.3 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 22	Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	NW	61 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 23	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A N/A	N/A N/A	Dual	SE SE	95 sq m 57.921 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 24 Dwl. No: 25	Dwelling Type 03  Dwelling Type 03	3B/5P 3B/5P	107.8 sq m 107.8 sq m	100 sq m	N/A N/A	N/A N/A	Dual Dual	SE	57.921 sq m	SHB3-ATY-AR-COA-DR- SHB3-ATY-AR-COA-DR-
	Dwl. No. 25	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	SE	76.523 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 27	Dwelling Type 03	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	SE	65.455 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 28	Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	SE	48.433 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 29	Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	SE	66.794 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 30	Dwelling Type 04B	4B/7P	130.6 sq m	110 sq m	N/A	N/A	Dual	SE	110.074 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 31	Dwelling Type 04	4B/7P	130.6 sq m	110 sq m	N/A	N/A	Dual	SE	84.283 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 32	Dwelling Type 04	4B/7P	130.6 sq m	110 sq m	N/A	N/A	Dual	SE	83.122 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 33	Dwelling Type 04B	4B/7P	130.6 sq m	110 sq m	N/A	N/A	Dual	SE SE	108.642 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 34 Dwl. No: 35	Dwelling Type 02	2B/4P 2B/4P	89.6 sq m 89.6 sq m	85 sq m 85 sq m	N/A N/A	N/A N/A	Dual Dual	SE	68.744 sq m 48.433 sq m	SHB3-ATY-AR-COA-DR- SHB3-ATY-AR-COA-DR-
	Dwl. No: 36	Dwelling Type 02 Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	SE	63.412 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 37	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	SE	72.625 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 38	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	SE	57.787 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 39	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	SE		SHB3-ATY-AR-COA-DR-
	Dwl. No: 40	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	SE	72.169 sq m	
	Dwl. No: 41	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	SE		SHB3-ATY-AR-COA-DR-
	Dwl. No: 42	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	SE	57.96 sq m	
	Dwl. No: 43	Dwelling Type 04A	4B/7P	131.4 sq m	110 sq m	N/A N/A	N/A	Dual Dual	SE SW	135.981 sq m	SHB3-ATY-AR-COA-DR- SHB3-ATY-AR-COA-DR-
	Dwl. No: 44 Dwl. No: 45	Dwelling Type 02 Dwelling Type 03	2B/4P 3B/5P	89.6 sq m 107.8 sq m	85 sq m 100 sq m	N/A	N/A N/A	Dual	SW	62.435 sq m	SHB3-ATY-AR-COA-DR-
	Dwl. No: 46	Dwelling Type 03	3B/5P	107.8 sq m	100 sq m	N/A	N/A	Dual	SW		SHB3-ATY-AR-COA-DR-
	Dwl. No: 47	Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	SW	55.6 sq m	
	Dwl. No: 48	Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	NW	76.5 sq m	
	Dwl. No: 49	Dwelling Type 02	2B/4P	89.7 sq m	85 sq m	N/A	N/A	Dual	NW	60.296 sq m	SHB3-ATY-AR-COA-DR
	Dwl. No: 50	Dwelling Type 02	2B/4P	89.7 sq m	85 sq m	N/A	N/A	Dual	NW	61.7 sq m	SHB3-ATY-AR-COA-DR
	Dwl. No: 51	Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	NE	57.84 sq m	
	Dwl. No: 52	Dwelling Type 02	2B/4P	89.6 sq m	85 sq m	N/A	N/A	Dual	NE	67.727 sq m	
	Dwl. No: 53	Dwelling Type 02	2B/4P	89.5 sq m	85 sq m	N/A	N/A	Dual	NE	69.543 sq m	SHB3-ATY-AR-COA-DR
	Dwl. No: 54	Dwelling Type 04C	4B/7P	144.7 sq m	110 sq m	N/A	N/A	Dual	NE	88.8 sq m	SHB3-ATY-AR-COA-DR-

Below: The following table is an extract from Drawing SHB3-ATY-AR-COA-SH-0050, which has been included separately with this application

Apartment Type 01 Apartment Type 02 Duplex Type 02	1B/2B/3B/4B  1B/2P	57.9 sq m 56.409 sq m 56.409 sq m 56.409 sq m 56.409 sq m 56.471 sq m	45 sq m 45 sq m	49.5 sq m 49.5 sq m	True True True True True True True True	Dual Dual Dual Dual Dual Dual Dual Dual	NE NW NE SE SW SE	22.198sq m 22.198sq m 22.198sq m 22.198sq m 22.198sq m 22.198sq m	SHB3-ATY-AR-COA-DR-0102/0-SHB3-DR-0102/0-SHB3-ATY-AR-COA-DR-0102/0-SHB3-ATY-AR-COA-DR-0102/0-SHB
Apartment Type 01 Apartment Type 02	1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P	57.9 sq m 57.9 sq m 57.9 sq m 57.9 sq m 57.9 sq m 347.5 56.409 sq m 56.409 sq m 56.409 sq m 56.313 sq m	45 sq m 45 sq m	49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m	True True True True True True True True	Dual Dual Dual Dual Dual Dual Dual	NW NE SE SW SE	22.198sq m 22.198sq m 22.198sq m 22.198sq m 22.198sq m	SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 01 Apartment Type 02	1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P	57.9 sq m 57.9 sq m 57.9 sq m 57.9 sq m 57.9 sq m 347.5 56.409 sq m 56.409 sq m 56.409 sq m 56.313 sq m	45 sq m 45 sq m	49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m	True True True True True True True True	Dual Dual Dual Dual Dual Dual Dual	NW NE SE SW SE	22.198sq m 22.198sq m 22.198sq m 22.198sq m 22.198sq m	SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 01 Apartment Type 02	1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P	57.9 sq m 57.9 sq m 57.9 sq m 57.9 sq m 57.9 sq m 347.5 56.409 sq m 56.409 sq m 56.409 sq m 56.313 sq m	45 sq m 45 sq m	49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m	True True True True True True True True	Dual Dual Dual Dual Dual Dual Dual	NW NE SE SW SE	22.198sq m 22.198sq m 22.198sq m 22.198sq m 22.198sq m	SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 01  Apartment Type 02	1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P	57.9 sq m 57.9 sq m 57.9 sq m 57.9 sq m 347.5 56.409 sq m 56.409 sq m 56.409 sq m 56.313 sq m	45 sq m 45 sq m	49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m	True True True True True True	Dual Dual Dual Dual Dual	NE SE SW SE	22.198sq m 22.198sq m 22.198sq m 22.198sq m	SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 01 Apartment Type 01 Apartment Type 01 Apartment Type 01  Apartment Type 02	1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P	57.9 sq m 57.9 sq m 57.9 sq m 347.5 56.409 sq m 56.409 sq m 56.409 sq m 56.313 sq m	45 sq m 45 sq m 45 sq m 45 sq m 45 sq m 45 sq m 45 sq m	49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m	True True True True	Dual Dual Dual Dual	SE SW SE	22.198sq m 22.198sq m 22.198sq m	SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 01 Apartment Type 01 Apartment Type 02	1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P	57.9 sq m 57.9 sq m 347.5 56.409 sq m 56.409 sq m 56.409 sq m 56.313 sq m	45 sq m 45 sq m 45 sq m 45 sq m 45 sq m 45 sq m	49.5 sq m 49.5 sq m 49.5 sq m 49.5 sq m	True True True	Dual Dual	SW SE	22.198sq m 22.198sq m	SHB3-ATY-AR-COA-DR-0102/0 SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 01  Apartment Type 02	1B/2P 1B/2P 1B/2P 1B/2P 1B/2P 1B/2P	57.9 sq m 347.5 56.409 sq m 56.409 sq m 56.409 sq m 56.313 sq m	45 sq m 45 sq m 45 sq m 45 sq m	49.5 sq m 49.5 sq m 49.5 sq m	True	Dual		22.198sq m	SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 02	1B/2P 1B/2P 1B/2P 1B/2P 1B/2P	347.5 56.409 sq m 56.409 sq m 56.409 sq m 56.313 sq m	45 sq m 45 sq m 45 sq m	49.5 sq m 49.5 sq m	True	Dual			
Apartment Type 02	1B/2P 1B/2P 1B/2P 1B/2P	56.409 sq m 56.409 sq m 56.313 sq m	45 sq m 45 sq m	49.5 sq m			SE	Fag. 12	
Apartment Type 02	1B/2P 1B/2P 1B/2P 1B/2P	56.409 sq m 56.409 sq m 56.313 sq m	45 sq m 45 sq m	49.5 sq m			SE	F = = ==	
Apartment Type 02	1B/2P 1B/2P 1B/2P	56.409 sq m 56.313 sq m	45 sq m		True			5sq m	SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 02 Apartment Type 02 Apartment Type 02	1B/2P 1B/2P	56.313 sq m		49 5 sa m		Dual	SE	5sq m	SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 02 Apartment Type 02	1B/2P		45 sq m	10.0 04 111	True	Dual	SE	5sq m	SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 02		56 471 sq m	40 84 111	49.5 sq m	True	Dual	SE	5sq m	SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 02	1B/2P	30.77 1 39 111	45 sq m	49.5 sq m	True	Dual	SE	5sq m	SHB3-ATY-AR-COA-DR-0102/0
Duplex Type 02		56.434 sq m	45 sq m	49.5 sq m	True	Dual	SE	5sq m	SHB3-ATY-AR-COA-DR-0102/0
	2B/4P	77.809 sq m	73 sq m	80.3 sq m	False	Dual	NW	7.283sq m	SHB3-ATY-AR-COA-DR-0103/0
		416.3							
			I						
Apartment Type 03	1B/2P	54.786 sq m	45 sq m	49.5 sq m	True	Dual	SE	5sq m	SHB3-ATY-AR-COA-DR-0102/
		54.786 sq m						5sq m	SHB3-ATY-AR-COA-DR-0102/0
		54.786 sq m							SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 03		54.786 sq m							SHB3-ATY-AR-COA-DR-0102/
Apartment Type 03		54.786 sq m							SHB3-ATY-AR-COA-DR-0102/0
Apartment Type 03	1B/2P		45 sq m	49.5 sq m	True	Dual	SE	5sq m	SHB3-ATY-AR-COA-DR-0102/
		320.1							
		6448 172							
		6868.362							
		6868.362							
	Apartment Type 03 Apartment Type 03 Apartment Type 03	Apartment Type 03 1B/2P	Apartment Type 03 1B/2P 54.786 sq m  6448.172	Apartment Type 03	Apartment Type 03	Apartment Type 03	Apartment Type 03 1B/2P 54.786 sq m 45 sq m 49.5 sq m True Dual Apartment Type 03 1B/2P 54.786 sq m 45 sq m 49.5 sq m True Dual Apartment Type 03 1B/2P 54.786 sq m 45 sq m 49.5 sq m True Dual Apartment Type 03 1B/2P 54.786 sq m 45 sq m 49.5 sq m True Dual Apartment Type 03 1B/2P 54.786 sq m 45 sq m 49.5 sq m True Dual Apartment Type 03 1B/2P 54.786 sq m 45 sq m 49.5 sq m True Dual Apartment Type 03 1B/2P 54.786 sq m 49.5 sq m True Dual  6448.172	Apartment Type 03	Apartment Type 03

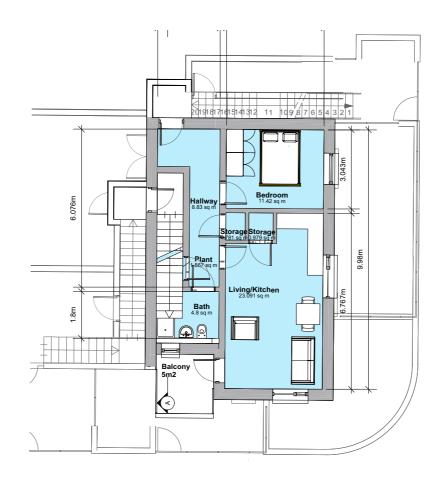
All private open space associated with apartments will be located adjacent to the main living space as per Section 3.0 of Design Standards for New Apartments.

Below: The following is an extract from Drawing SHB3-ATYAR-COA-DR-0102, which has been included separately with this application. Proposals for apartments only have been included here. All private open space associated with apartments will be located adjacent to the main living space as per Section 3.0 of Design Standards for New Apartments.



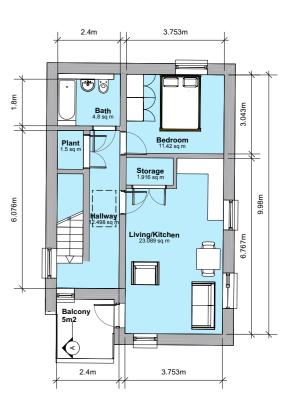
Plan (above) and Legend (right): Apartment Type 01 - Ground floor 1B2P

Unit Type Schedule of Ad	ccommmodation
1 bed 1 storey apt (1B2P)	
Area compliance with KCC C	DP & DSFNA 2018
Target Minimum floor areas	
Aggregate GIA	45.0m2
Aggregate Living	23.0m2
Aggregate Bedroom	11.4m2
Aggregate Storage	3.0m2
Min. Width (Liv/Kit)	3.3m
Min. Width Achieved	See Floor Plans
Min. Width (Bed)	2.8m
Min. Width Achieved	See Floor Plans
Area Breakdown	
GIA - 1B/2P GF (UD)	59.3m2
Aggregate GIA	59.3m2
Room Name	Area
Living/Kitchen	24.5m2
Aggregate Living	24.5m2
Bedroom	13.9m2
Aggregate Bedroom	13.9m2
Storage	0.6m2
Storage	1.3m2
Storage	1.8m2
Aggregate Storage	3.8m2
Plant	1.8m2
Bath	5.0m2
1	1



Plan (above) and Legend (right): Apartment Type 02 - First floor 1B2P

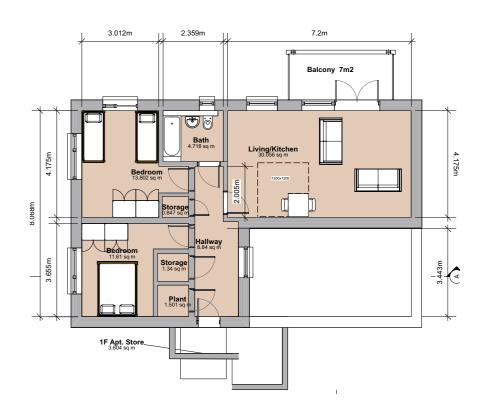
Unit Type Schedule of Ad	commmodation			
1 bed 1 storey apt (1B2P)				
Area compliance with KCC C	DP & DSFNA 2018			
Target Minimum floor areas				
Aggregate GIA	45.0m2			
Aggregate Living	23.0m2			
Aggregate Bedroom	11.4m2			
Aggregate Storage	3.0m2			
Min. Width (Liv/Kit)	3.3m			
Min. Width Achieved	See Floor Plans			
Min. Width (Bed)	2.8m			
Min. Width Achieved	See Floor Plans			
Area Breakdown				
GIA - 1B/2P 1F	53.3m2			
Aggregate GIA	53.3m2			
Room Name	Area			
Living/Kitchen	23.1m2			
Aggregate Living	23.1m2			
Bedroom	11.4m2			
Aggregate Bedroom	11.4m2			
Storage	1.0m2			
Storage	0.8m2			
Aggregate Storage	1.8m2			
Plant	1.6m2			
Bath	4.8m2			



Plan (above) and Legend (right): Apartment Type 03 - Second floor 1B2P

Unit Type Schedule of A	ccommmodation
1 bed 1 storey apt (1B2P)	
Area compliance with KCC C	DP & DSFNA 2018
Target Minimum floor areas	
Aggregate GIA	45.0m2
Aggregate Living	23.0m2
Aggregate Bedroom	11.4m2
Aggregate Storage	3.0m2
Min. Width (Liv/Kit)	3.3m
Min. Width Achieved	See Floor Plans
Min. Width (Bed)	2.8m
Min. Width Achieved	See Floor Plans
Area Breakdown	
GIA - 1B/2P 2F	59.3m2
Aggregate GIA	59.3m2
Room Name	Area
Living/Kitchen	23.1m2
Aggregate Living	23.1m2
Bedroom	11.4m2
Aggregate Bedroom	11.4m2
Storage	1.9m2
Aggregate Storage	1.9m2
Plant	1.5m2
Bath	5.0m2
<b>•</b>	•

Below: The following is an extract from Drawing SHB3-ATY-AR-COA-DR-0102, which has been included separately with this application. Proposals for apartments only have been included here. All private open space associated with apartments will be located adjacent to the main living space as per Section 3.0 of Design Standards for New Apartments.



Plan (above) and Legend (right): Duplex Type 02- First floor 2B4P

Unit Type Schedule of A	ccommmodation				
2 bed 1 storey duplex (2B4P)					
Area compliance with KCC (	DP & DSFNA 2018				
Target Minimum floor areas					
Aggregate GIA	73.0m2				
Aggregate Living	30.0m2				
Aggregate Bedroom	24.4m2				
Aggregate Storage	6.0m2				
Min. Width (Liv/Kit)	3.6m				
Min. Width Achieved	See Floor Plans				
Min. Width (Bed)	2.8m				
Min. Width Achieved	See Floor Plans				
Area Breakdown					
GIA - 2B/4P 1F	77.8m2				
Aggregate GIA	77.8m2				
Room Name	Area				
Living/Kitchen	30.1m2				
Aggregate Living	30.1m2				
Bedroom	13.8m2				
Bedroom	11.6m2				
Aggregate Bedroom	25.4m2				
Storage	0.8m2				
Storage	1.3m2				
Aggregate Storage	2.2m2				
Plant	1.5m2				
Bath	4.7m2				

