



Cambridgeshire Quality Panel

Darwin Green BDW3

24 August 2021

Virtual Meeting

Panel: Robin Nicholson (chair), David Birkbeck, Steve Platt, Kirk Archibald, Ashley Dunseath, John Dales

Local Authority: Charlotte Burton (GCSP)

The Cambridgeshire Quality Charter for Growth sets out the core principles for the level of quality to be expected in new development across Cambridgeshire. The [Cambridgeshire Quality Panel](#) provides independent, expert advice to developers and local planning authorities against the four core principles of the Charter: connectivity, character, climate, and community.

Development overview

The site, Darwin Green One, is in the north west fringe of the City and to its north is the A14 Cambridge Northern Bypass. In 2013 the outline application for Darwin Green One was approved for a mixed used development comprising up to 1,593 homes, education and retail facilities, informal and formal recreational space and other social and community buildings.

Darwin Green 3 (BDW3) is one of 7 development phases included within the Darwin Green One approval and is entirely residential in nature.

The proposals for BDW3 comprise circa 200 homes with a range of 1 and 2 bed apartments and 2,3 and 4 bed homes, 40% of which will be affordable. The homes will predominately be 2-storey with some 3-storey townhouses and 4-storey marker apartment blocks along the park frontage helping to frame the main access point and urban squares. An allotment space, available for new and existing residents is also provided within the proposals.

Presenting team

Simon Toplis (HTA), Charles Addison (HTA), Nell Hewett (HTA), Asa Chittock (BDW), Alan Davies (BDW)

Cambridgeshire Quality Panel summary

Connectivity – “places that are well-connected enable easy access for all to jobs and services using sustainable modes”

It will be critical that the direct link from the south-west corner of the site through to Huntingdon Road is delivered to ensure that the vision for high quality cycle routes throughout Darwin Green is achieved.

It is necessary to ensure that good quality, comfortable and easy access is provided from the secondary streets within the site to achieve good connectivity with the pedestrian/cycle route that will link the northern part of Darwin Green with Histon Road. The Panel thought this was too narrow and recommended that the design of the shared paths should refer to the requirements of Local Transport Note 120.

The link through to Histon Road is crucial to the creation of a sustainable travel pattern within this part of the City and the delivery of the route needs to be secured as early as possible to achieve this successfully. Without this connection residents will be forced to make longer trips to access this part of the city and could be deterred from cycling and walking.

The Panel welcomed the introduction of a separate vehicular access to the plots to the south of the Orbital Cycle Route directly from BDW2 which will avoid the need for vehicle crossings over the cycle route within the parcel.

The qualities of the Orbital Cycle Route from the primary street through to Windsor Road need to be presented more clearly in the plans. It was suggested that the whole of this route is put into a single drawing to describe it better as a linear place feature.

It was confirmed that the Windsor Road link is not proposed to be used for emergency access.

Community – *“places where people live out of choice and not necessity, creating healthy communities with a good quality of life”*

There is a distinct lack of permeability through the development, compared with the existing mid-20th century developments to the east around Oxford Road and Windsor Road. So, there is a real danger that the consequence of this will lead to the creation of a gated community at the expense of an integrated and connected community.

Most of the children will attend secondary school at the North Cambridge Academy and therefore most journeys from this parcel and Darwin Green in general will probably use the Windsor Road route. The urban square at the bottom of the site will likely become a location where children will congregate as part of their journey to and from school and therefore further thought is needed around how this space will work in terms of landscaping but also management and maintenance of the space is critical in order to avoid conflict with residents of adjoining properties.

Consideration must be given to all age groups including where teenagers can meet up and not everyone will be able to cycle to Sainsbury's.

Character – “Places with distinctive neighbourhoods and where people create ‘pride of place’

The almost doubling of meaningful open space within the development since the Panel last considered the project is welcomed.

However, there needs to be a framework that demonstrates how the landscape and public realm throughout the development work together with the buildings and the movement network rather than as a series individually designed spaces.

Although the design principles are fine, the Panel considered that the green and blue objectives about what the development is trying to achieve do not yet come across clearly.

The development will need to achieve meaningful biodiversity net gain and whilst the images are very aspirational, they do not clearly signpost how this objective will be achieved in an affordable way. There was a feeling that the landscape appears over-designed and is trying to achieve too much; the Panel considered that a ‘less is more’ approach should be considered.

The landscape as proposed will require considerable maintenance and this together with issues around the standard and cost associated with adoption must be considered.

The palette of materials for the buildings were clear and easily understood. This clarity needs to be extended to the landscape, especially the hard materials and surfaces.

More detail is needed on the building elevations, the location of meter boxes, rainwater downpipes, bin stores and cycle parking. It was unclear how some of the perimeter blocks in the north-west of the parcel will be finished off in terms of external finishes and boundary treatments. It was recognised that the architecture is still developing but there is a need for long elevations to illustrate these issues.

There are concerns about the constructability and the embodied carbon in all the brick.

The Panel liked the double gabled buildings however questioned whether the valley gutters will be sufficient to cope with more frequent and extreme rainfall events. The Panel raised the question as to whether there could have been an alternative courtyard house typology for the terrace backing onto the houses along Tavistock Road.

Climate – “Places that anticipate climate change in ways that enhance the desirability of development and minimise environmental impact”

The Panel was disappointed with the lack of emphasis on Climate and that the scheme has been registered under current building regulations. This will be a lost opportunity to design for the development as zero-carbon enabled and to futureproof the buildings.

There needs to be some articulation in the design to demonstrate how gas will be replaced with electric, space for heat pumps and battery storage, along with a strategy for retrofitting PVs included in the architecture.

There is no mention of how the surface water will be managed. There is a dependence on piping away the rainwater which will have a high embodied carbon impact, rather than getting it into the ground where it lands with swales and rain gardens.

Some of the south and west facing apartments should be modelled for overheating in combination with daylight assessments.

Specific recommendations

The panel appreciated the thorough virtual site visit and presentation. It was noted that the landscape architect was unable to attend and the Chair reiterated that it was important all disciplines are represented at the panel.

Connectivity

- Further thought needs to be given to how cycles and pedestrians from the north of the site (Northern Edge Park) connect with the Transverse Green Corridor, particularly in term of cycle track widths and how they cross over areas of public open space.
- The direct routes to Huntingdon Road and Histon Road are important and the Panel encourages the applicant to continue their work in seeking the delivery of these connections.
- The application should include a drawing showing the full extent of the Orbital Cycle Route within the site and the interface beyond the boundary to demonstrate how the character of the route will respond to different conditions along its length and to show how it responds to peak flows of cycles and pedestrians.
- The shape of the plot and the layout adopted has inherently led to a street network characterised by cul de sacs. This poses an issue for residents and other users

such as delivery vehicles due to the lack of turning places throughout the development. Further thought should be given to improving permeability for vehicles.

Community

- The Panel welcomes and encourages the efforts being made to create connections with the existing communities despite the apparent reluctance from those communities at present.
- Further thought needs to be given to how the route to North Cambridge Academy will work given the demand create by pupils at peak times of the day.

Character

- The Panel was pleased to see the increase in open space, but the application should include a framework within which the landscape and open space sit.
- The landscaping could be a less overdesigned to maximise biodiversity gains within the site and reduce ongoing maintenance.
- The architecture is still in development but will need to provide details of how essential elements such as PVs, heat pumps and battery storage will be integrated as part of the architecture.
- The applicant should give further thought to developing a courtyard typology for the plots of the eastern street and adjacent to the rear of the properties on Tavistock Road.
- The 3-storey walk up apartments work well especially the gable detailing, however there is some concern over the functional effectiveness of the valley gutters given changing weather events.

Climate

- Whilst it was acknowledged that the development is pre-registered under existing regulations there needs to be more work in terms of describing and creating a net zero enabled development to allow it to respond in the future.
- More attention needs to be given to thermal efficiency of the building fabric and the localised areas where overheating may be an issue.

Contact details

For any queries in relation to this report, please contact the panel secretariat via growthdevelopment@cambridgeshire.gov.uk

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Background information list and plan

- Applicant's background note
- Main presentation
- Overall Plan

Documents may be available on request, subject to restrictions/confidentiality.

BDW3 Masterplan

