

APPROX

EcoHomes 2006 Pre-assessment Estimate on proposed development at Queens Road, Reading

Items shown in *italics* are to be confirmed as the design progresses.

Issues		Score	Pass 36 Good 48 Very Good 58 Excellent 70 READING BOROUGH COUNCIL 24 FEB 2010 PLANNING	
Energy Total		14.67		
Transport Total		8.00		
Pollution Total		3.64		
Materials Total		5.41		
Water Total		6.67		
Land use and Ecology		8.00		
Health and Wellbeing		7.00		
Management Total		8.00		
Total all sections		61.39		
Topic		% credits	Details	Score
Ene 1	Carbon Dioxide emissions:		Ecosphere report gives whole building DER = 18.31 kg/m ² /yr	8.25
	< or = to 40 kg/m ² /yr	0.92		
	< or = to 35 kg/m ² /yr	1.83		
	< or = to 32 kg/m ² /yr	2.75		
	< or = to 30 kg/m ² /yr	3.67		
	< or = to 28 kg/m ² /yr	4.58		
	< or = to 26 kg/m ² /yr	5.50		
	< or = to 24 kg/m ² /yr	6.42		
	< or = to 22 kg/m ² /yr	7.33		
	< or = to 20 kg/m ² /yr	8.25		
	< or = to 18 kg/m ² /yr	9.17		
	< or = to 15 kg/m ² /yr	10.08		
	< or = to 10 kg/m ² /yr	11.00		
	< or = to 5 kg/m ² /yr	11.92		
	< or = to 0 kg/m ² /yr	12.83		
	< or = to -10 kg/m ² /yr	13.75		
Ene 2	Building envelope		Ecosphere report gives average = 1.00 W/m ² /K	1.83
	HLP < or = to 1.3 W/m ² /K	0.92		
	HLP < or = to 1.1 W/m ² /K	1.83		
Ene 3	Drying space			
	Provision of drying space	0.92		
Ene 4	Ecolabelled white goods:		Fridge-freezer to PD & shared is 'A' rated - A+ required for credit No other white goods Guidance to HA units	0.92 0.00 incl.
	A* rated fridges/freezers	0.92		
	A rated washing machines, dishwashers & B dryers	0.92		
	OR Guidance on labelling	0.92		
Ene 5	Internal Lighting		At least 75%	1.83
	40% dedicated low energy lights specified	0.92		
	75% dedicated low energy lights specified	1.83		

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Topic		% credits	Details	Score
Ene 6	External lighting: Space lighting to accommodate only CFL or fluorescent strip Intruder lighting max.150W with PIR Security lighting to accommodate CFL or fluorescent strips with sensors or timers	0.92	Common parts & undercroft lighting not shown on plans. Suggest that: Space lighting to accommodate only CFL or fluorescent strip and Intruder lighting max. 150W with PIR Security lighting to accommodate CFL or fluorescent strips with sensors or timers	0.92
		0.92		0.92
Energy Total (maximum 22.00)				14.67
Tra 1	Public Transport URBAN & SUBURBAN 80% of development within: 1000m of a 30 min peak & hourly off peak service	1.00	Development is within 500m of several bus stops. Bus services meet the EcoHomes criteria.	2.00
	500m of a 15 min peak & half hourly off peak service	2.00		
	RURAL 80% of development within: 1000m of an hourly service	1.00		
	OR a community bus service 500m of an hourly service OR community bus service	2.00		
Tra 2	Cycle storage Provision of cycle storage for: 50% of dwellings	1.00	There is secure & weathertight cycle storage for every unit.	2.00
	95% of dwellings	2.00		
Tra 3	Local amenities 500m of food shop & post-box	1.00	B & B Convenience Store, 106 Queens Road	1.00
	1000m of 5 from:	1.00		1.00
	Food shop if not claimed above			
	Postal facility		21-22 Market Place	
	Bank/cash machine		Murco 69 London Road	
	Pharmacy		Fourways Pharmacy 195 London Road	
	Primary School		St Johns CofE, Orts Road	
	Medical centre		Elden Road Surgery, Eldon Road	
	Leisure centre		Arthur Hill Leisure, Kings Street	
	Community centre			
Tra 4	Home Office Space & services for home office	1.00	There are space & services for occasional working from home.	1.00
Transport Total (Maximum 8.00)				8.00

Topic		% credits	Details	Score
Pol 1	Insulation ODP and GWP Insulating materials with Ozone Depleting Potential of zero & Global Warming Potential of < 5 in either manufacture or composition Roof (incl. roof hatch) Wall - internal & external (incl. doors & window lintels) Floor (incl. Foundations) Hot water cylinder (incl. Pipe insulation & other thermal store)	0.91	Insulating materials with Ozone Depleting Potential of zero & Global Warming Potential of < 5 in either manufacture or composition	0.91
Pol 2	NOx emissions 95% of dwellings must be served by heating & hot water systems with average NOx emission rate : < or = to 100 mg/kWh < or = to 70 mg/kWh < or = to 40 mg/kWh	0.91 1.82 2.73	<i>Communal boiler to have NOx less than 40 mg/kWh</i>	2.73
Pol 3	Reduction of surface runoff Reducing peak surface runoff rates to either natural or municipal systems by 50% in low risk areas, 75% in medium risk areas, 100% in high risk areas for: Hard surfaces Roofs	0.91 0.91	No attenuation.	0.00
Pol 4	Zero emission energy source Carry out & act on feasibility study considering low emission & renewable energy AND 10% total energy demand from local renewable or low emission sources OR 15% total energy demand from local renewable or low emission sources	0.91 0.91 1.82	No renewable or low Carbon emission sources.	0.00
Pol 5	Flood Risk Mitigation Development in zone with low annual probability of flooding Development in zone with medium annual probability of flooding & ground level of building, car parking and access is above design flood level. OR	1.82 0.91	These credits may be awarded based upon a Flood Risk Assessment.	0.00
Pollution Total (Maximum 10.01)				3.64

	Topic	% credits	Details	Score
Mat 1	Environmental Impact of Materials A rating from Green Guide for Housing for: Roof External walls Internal walls - party walls & internal partitions Floors Windows External surfacing Boundary protection	 1.35 1.35 1.35 1.35 0.90 0.45 0.45	 <i>Unlikely to be A rated in Green Guide</i> <i>Likely to be A rated in Green Guide</i> <i>Likely to be A rated in Green Guide</i> <i>Unlikely to be A rated in Green Guide</i> Aluminium <i>Unlikely to be A rated in Green Guide</i> <i>Unlikely to be A rated in Green Guide</i>	 0.00 1.35 1.35 0.00 0.00 0.00 0.00
Mat 2	Responsible sourcing of Materials: Basic building elements Majority of materials responsibly sourced in: 1 Frame 2 Ground floor 3 Upper floors (including loft boarding) 4 Roof (structure & cladding) 5 External walls (including cladding) 6 Internal walls (including partitions) 7 Foundations/substructure 8 Staircase (including tread, rises & stringers)	0.9 to 2.71	Some credits may be awarded.	0.00
Mat 3	Responsible sourcing of Materials: Finishing elements Majority of materials responsibly sourced in: 1 Stair (including handrails, balustrades, banisters but excluding staircase) 2 Window (including sub-frames, frames, boards, sills) 3 External & internal door (including sub-frames, frames, linings, door) 4 Skirting (including architrave, skirting board & rails) 5 Panelling (including any other trim) 6 Furniture (including fitted: kitchen, bedroom & bathroom) 7 Fascias (soffit boards, bargeboards, gutter boards) 8 Any other significant use	0.90 to 1.35	Some credits may be awarded.	0.00

Topic		% credits	Details	Score
Mat 4	Recycling Facilities			
	Storage of recyclable waste			
	Internal storage only	0.90		
	External storage (or LA collection) only	0.90		
	Internal & external (or LA collection) storage	2.71	Provision for internal & external storage of recyclable waste.	2.71
Materials Total (Maximum 14.00)				5.41
Wat 1	Internal water use		Average consumption = 41.12 m ³ /bedsp/yr	
	< 52 m ³ /bedspace/yr	1.67	6/4 litre dual flush toilet	
	< or = to 47 m ³ /bedspace/yr	3.33	Aerating taps	
	< or = to 42 m ³ /bedspace/yr	5.00	9 litre/minute shower	
	< or = to 37 m ³ /bedspace/yr	6.67	Standard size bath	
	< or = to 32 m ³ /bedspace/yr	8.33	Best practice white goods to PD & typical practice to HA	5.00
Wat 2	External water use			
	Rain water collection system for watering gardens & landscaped areas	1.67	Awarded by default	1.67
Water Total (Maximum 10.00)				6.67
Eco 1	Ecological value of site			
	Building on land of inherently low ecological value	1.33	Development on inner city brownfield site	1.33
Eco 2	Ecological enhancement			
	Enhancing the ecological value of site through consultation with an accredited expert	1.33	An ecologist will not be retained	0.00
Eco 3	Protection of ecological features			
	Ensuring the protection of any existing ecological features on site	1.33	Default credit	1.33
Eco 4	Change in ecological value of site			
	Between - 9 & - 3 species	1.33		
	Between - 3 & + 3 species	2.67		
	Between + 3 & + 9 species	4.00		
	Greater than + 9 species	5.33	No change in ecological value	2.67
Eco 5	Building footprint			
	Total combined Floor area to Footprint ratio for all houses is > 2.5:1			
	AND Total combined Floor area to Footprint ratio for all flats is > 3.5:1	1.33		
	Total combined Floor area to Footprint ratio for all dwellings is > 3.5:1	2.67	9 storey block	2.67
Land Use and Ecology Total (Maximum 11.99)				8.00

	Topic	% credits	Details	Score
Hea 1	Daylighting			
	Provision of adequate daylighting, according to BS 8206 part 2			
	Kitchen	1.75	Unlikely to achieve DF=2%	0.00
	Living rooms, dining rooms & studies	1.75	Unlikely to achieve DF=1.5%	0.00
	View of sky in all above rooms	1.75	Unlikely to achieve view of the sky	0.00
Hea 2	Sound Insulation			
	Pre-completion testing for every 10 dwellings in a group			
	Testing approx. 50% of walls/floors	1.75		
	Testing approx. 66% of walls/floors	3.50		
	Testing approx. 66% of walls/floors AND exceed Part E by 3dB	5.25		
	Testing approx. 66% of walls/floors AND exceed Part E by 5dB	7.00	There will be a schedule of sound testing to meet EcoHomes requirements & Part E will be exceeded by 5dB.	7.00
Hea 3	Private space			
	Provision of private or semi private space	1.75	Not all units have private space	0.00
Health and Wellbeing Total (Maximum 14.00)				7.00
Man 1	Home User Guide			
	Provision of 'non-technical' guide to occupiers on:			
	Environmental performance of homes	2.00	These criteria will be met	2.00
	Information about site & surroundings	1.00	These criteria will be met	1.00
Man 2	Considerate Constructors			
	Demonstrate commitment to comply with best practice site management principles	1.00		
OR	Demonstrate commitment to go significantly beyond best practice site management principles	2.00	This will be met	2.00

	Topic	% credits	Details	Score
Man 3	Construction Site Impacts Strategy to monitor, sort & recycle construction waste on site	1.00	<i>These criteria will be met</i>	1.00
AND	Evidence that 2 or more shown below are achieved	1.00		
OR	Evidence that 4 or more shown below are achieved	2.00		2.00
a	Monitor & report CO ₂ or energy arising from site activities			
b	Monitor & report CO ₂ or energy arising from transport to & from site activities			
c	Monitor & report water consumption from site activities		<i>These criteria will be met</i>	
d	Adopt best practice policies in respect of air pollution arising from the site		<i>These criteria will be met</i>	
e	Adopt best practice policies in respect of water (ground & surface) pollution occurring on the site		<i>These criteria will be met</i>	
f	80% of site timber is reclaimed, reused or responsibly sourced		<i>These criteria will be met</i>	
Man 4	Security Commit to work with Architectural Liaison Officer & achieve Secured by Design award.	1.00	<i>These criteria will not be met</i>	0.00
	Security standards for external doors & windows to achieve minimum of either: LPR1175SR1 or PAS24-1	1.00	<i>These criteria will not be met</i>	0.00
Management Total (Maximum 10.00)				8.00

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