MAX FORDHAM

	Sustainability Criteria	Minimum Standard	Best Practice	Innovative	Pioneering	Notes
Construction Materials	1 Embodied carbon in fabric	Embodied carbon not assessed. Preference stated for locally sourced materials	Structure engineered to minimise material mass. Cement replacements used, e.g. GGBFS in concrete heavy materials. Materials specified to be from local sources and provenance rigorously checked during construction	Detailed life cycle analysis of embodied carbon in structure including assessment sourcing and transportation energy. Results used for material selection. Structure engineered to work at 90% capacity [Wise]	Structure made from entirely low embodied energy materials, with known and mainly local provenance. Building serviceability regulations challenged [Wise]. Carbon Profiling technique utilised and used to inform building design and material selection [Sturgis]	Highly building specific and metrics not sufficiently standardised to allow benchmarks to be used as meaningful targets. Wise, June 2010, Building.co.uk, "What if everything we did is wrong" 2010, Sturgis Associates, "Redefining Zero".
	2 Building and materials re-use	Preference for standard sizes of elements such as steel beams/columns or precast units	Future flexibility of building considered. High grade materials designed for recyclability. e.g. Using lime mortar. Different material layers made identifiable or visible	Flexibility of future use demonstrated by typical conversion example designs. Avoid composite materials. Consider fastenings for easy dismantling	Flexibility and future use drives design. Label & log or e-tag main elements	
	3 Recycled and reclaimed Content	15% recycled content likely as standard.	30% recycled content	45% recycled content	60% recycled content	Only applies to relevant materials
	4 Material Toxicity	Avoidance of high VOC content paints, sealants etc and all ozone depleting materials including insulation	PVC cabling exchanged for LSF. Non petro-chemical based insulation materials. All 'C' rated materials avoided	'B' and 'C' grade materials avoided. VOC-free paints and timber. Natural materials where possible. Eliminate PVC	Use only natural materials where products exist. 80% of materials 'A' or 'A+' rated	Ratings refer to BRE Green Guide
Climate Change Adaptation	5 Climate change adaptation	No considerations beyond those embodied in regulatory compliance	Potential impacts reviewed with client, strategic principles discussed and reported concerning key risks	Design is influenced by climate change adaptation implications	Design approach driven by climate change adaptation implications	See TSB report 'Design For Future Climate', 2010, & UKCIP for further guidance
Landscape & Biodiversity	6 Landscape and biodiversity	Local planning requirements met. Mitigate against negative biodiversity impacts where feasible	Consult an ecologist on biodiversity enhancement, giving preference to local species. Integrated landscape and water strategy with landscape management plan provided	Attach equal weighting to biodiversity as for water, M & E and people, in overarching Green Infrastructure strategy. Landscape works in harmony with design and climate including deciduous planting to reduce summer urban heat island and internal solar gain where appropriate	Biodiversity enhancement key driver in Green Infrastructure Strategy. Landscape significantly influences building design.	Biodiversity is the variety of species within an ecosystem, used as a measure of the health of biological systems.
Water	7 Mains water consumption	Commercial - > 5.5 m3/person/yr Schools - 4.4 m3/pupil/yr	Commercial - 4.5 m3/p/yr Schools - 3.0m3/pupil/yr	Commercial - 1.5 m3/p/yr Schools - 1.5 m3/pupil/yr	Commercial- <1.5 m3/p/yr Schools - 0.5 m3/pupil/yr	
	8 Drainage systems	Carry out Flood Risk Assessment No increase in stormwater run-off.	Thorough site hydrological characterisation, design responds to environment, including SUDS where appropriate. Rainwater harvesting for WCs and irrigation.	Drainage system fully integrated into the environment. Consider reedbed treatment for irrigation.	Closed loop water system. Waste-to-Energy plant or alternatives to water base foul drainage	Highly site specific
Waste	9 Construction waste minimisation	Contractor to produce Site Waste Management Plan (SWMP) to identify waste streams and areas for segregation on site or post collection.	Establish waste streams during design, set key KPI's early on. Waste reviews on design team meeting agendas. Divert 75% by weight of non hazardous project waste from landfill.	Implement Modern Methods of Construction throughout design. Account for site conditions impacting waste. Materials logistics plan.	Achieve zero net waste for project.	see WRAP for guidance on SWMP's and waste minimisation strategies
	10 Operational waste recycling	Adequate space for storing recyclable waste.	Managed recycling processes involving space for separating and collecting recyclables. Encourage occupants to recycle.	Provide incentives for recycling. On site composting for biodegradable waste.	Waste stream feeds on or off-site anaerobic digestion for biogas production.	
Transport Issues	11 Transport	Some covered cycle storage.	Full cycling support provisions as part of travel plan. Utilise video conferencing. Access considered in site selection.	Fully site specific travel plan covering site infrastructure and awareness raising. Electric vehicle charging points. Utilise virtual video conferencing.	Accessibility drives site selection. Feed transport into personal carbon trading scheme.	Adequate provision of storage lockers for change of clothes, helmet etc, can require a significant amount of internal space
Management	12 Stakeholder involvement and design process	Use of industry Standards. Standard client briefing.	Early consultation with stakeholders with the declared intention that this may affect design proposals. Stakeholders fully understand standards and design	Open design process with published response to stakeholder proposals. Design strategy tested with stakeholders. New boundaries set	Feed back results into industry standards	
	13 Construction site management	Main contractor has CCS or alternative certification. Energy use in construction metered	Main contractor has 32 pts under CCS or an alternative certification. Main contractor operates EMS including monitoring and setting targets for energy use	Main contractor has CCS score 36 or more. Energy and water use targets are met and results published	A significant proportion of construction energy is generated on site with temporary renewables.	
	14 Sustainable procurement of consumables	Sourcing of office supplies and cleaning products considered	Sustainable procurement of office supplies and cleaning products and food and monitoring of consumption.	Mostly paperless organisation. All consumables sustainably procured. Some food grown on site	Some organic food grown on site, with the rest seasonal, local.	
Productivity & Health	15 Healthy environments	Building has no or only a slight negative impact on productivity. Meet regulation for internal comfort including air quality.	No impact on productivity. Connection to outside. Air quality monitored.	Slightly positive impact on productivity. Psychological and social impacts assessed during design.	Building has noticeable positive impact on productivity. Strive to create a 'sense of place'.	Productivity a highly subjective measurement. See http://www.cibse.org/pdfs/8aratcliffe.pdf for further guidance