

	A	B	C	D	E
1					
2		<b>Grenfell Tower</b>			
3		<b>Planning and Building Regulations Requirements</b>			
4					
5					
6		Level	Original Use	Proposed Use	Planning Requirements
		G	Reception, Boxing Club, &Storage	Reception & Nursery	n/a, under area threshold
7					

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6	Relevant Building Regulations	Material Change in Use	Change of Energy Status
7	Part L2B (Existing, non-domestic)	No	No

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1																								
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6	<b>Work on Controlled Fittings and Services</b>	<b>Commissioning of Fixed Building Services</b>																						
	<p>Yes</p> <p><b>Controlled Fittings</b></p> <p>U-values of controlled fittings to comply with "Table 3 - Standards for controlled fittings".</p> <p><b>Controlled Services</b></p> <p>Comply with "Non-Domestic Building Services Compliance guide" for</p> <p>a. Heating and hot water, b. Mechanical ventilation, c. Air Conditioning, d. Fixed internal lighting, e. Renewable energy</p>	<p>Comply with regulation 44</p>																						
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Renovation of Thermal Elements

U-values of any new thermal element to comply with "Table 5 - Upgrading retained thermal elements (column b, Improved)"

Table 5 Upgrading retained thermal elements

Element <sup>1</sup>	U-value W/m <sup>2</sup> .K	
	(a) Threshold	(b) Improved
Wall – cavity insulation	0.70	0.55 <sup>2</sup>
Wall – external or internal insulation	0.70	0.30 <sup>3</sup>
Floors <sup>4,5</sup>	0.70	0.25
Pitched roof – insulation at ceiling level	0.35	0.16
Pitched roof – insulation at rafter level <sup>6</sup>	0.35	0.18
Flat roof or roof with integral insulation <sup>7</sup>	0.35	0.18

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2																												
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5																												
6	Consequential Improvements		Evidence Required by RBKC Building Control	EPC																								
7	<p>Consequential improvements are not required as the useful floor area of the non-domestic levels (G and Walkway) comes to less than 1000 m<sup>2</sup>.</p> <p>However the improvements that are being undertaken as part of the principal works (controlled fittings upgrade, upgrade or new thermal elements, new low carbon heating, natural ventilation and new high efficiency lighting scheme will mean that at least 10% of the project costs will be going towards consequential improvements listed in "Table 6 - Improvements that in ordinary circumstances are practical and economically feasible".</p>	<table><tr><th colspan="2">Table 6 Improvements that in ordinary circumstances are practical and economically feasible</th></tr><tr><td colspan="2"><i>Items 1 to 7 will usually meet the economic feasibility criterion set out in paragraph 6.5. A shorter payback period is given in item 6 because such measures are likely to be more capital intensive or more risky than the others.</i></td></tr><tr><th>No.</th><th>Improvement measure</th></tr><tr><td>1</td><td>Upgrading heating systems more than 15 years old by the provision of new plant or improved controls</td></tr><tr><td>2</td><td>Upgrading cooling systems more than 15 years old by the provision of new plant or improved controls</td></tr><tr><td>3</td><td>Upgrading air-handling systems more than 15 years old by the provision of new plant or improved controls</td></tr><tr><td>4</td><td>Upgrading general lighting systems that have an average lamp efficacy of less than 40 lamp-lumens per circuit-watt and that serve areas greater than 100 m<sup>2</sup> by the provision of new luminaires or improved controls</td></tr><tr><td>5</td><td>Installing energy metering following the guidance given in CIBSE TM 39</td></tr><tr><td>6</td><td>Upgrading <b>thermal elements</b> which have U-values worse than those set out in column (a) of Table 5 following the guidance in paragraphs 5.12 and 5.13</td></tr><tr><td>7</td><td>Replacing existing windows, roof windows or rooflights (but excluding display windows) or doors (but excluding high-usage entrance doors) which have a U-value worse than 3.3 W/m<sup>2</sup>.K following the guidance in paragraphs 4.23 to 4.28</td></tr><tr><td>8</td><td>Increasing the on-site low and zero carbon (LZC) energy-generating systems if the existing on-site systems provide less than 10% of on-site energy demand, provided the increase would achieve a simple payback of 7 years or less</td></tr><tr><td>9</td><td>Measures specified in the Recommendations Report produced in parallel with a valid Energy Performance Certificate</td></tr></table>	Table 6 Improvements that in ordinary circumstances are practical and economically feasible		<i>Items 1 to 7 will usually meet the economic feasibility criterion set out in paragraph 6.5. A shorter payback period is given in item 6 because such measures are likely to be more capital intensive or more risky than the others.</i>		No.	Improvement measure	1	Upgrading heating systems more than 15 years old by the provision of new plant or improved controls	2	Upgrading cooling systems more than 15 years old by the provision of new plant or improved controls	3	Upgrading air-handling systems more than 15 years old by the provision of new plant or improved controls	4	Upgrading general lighting systems that have an average lamp efficacy of less than 40 lamp-lumens per circuit-watt and that serve areas greater than 100 m <sup>2</sup> by the provision of new luminaires or improved controls	5	Installing energy metering following the guidance given in CIBSE TM 39	6	Upgrading <b>thermal elements</b> which have U-values worse than those set out in column (a) of Table 5 following the guidance in paragraphs 5.12 and 5.13	7	Replacing existing windows, roof windows or rooflights (but excluding display windows) or doors (but excluding high-usage entrance doors) which have a U-value worse than 3.3 W/m <sup>2</sup> .K following the guidance in paragraphs 4.23 to 4.28	8	Increasing the on-site low and zero carbon (LZC) energy-generating systems if the existing on-site systems provide less than 10% of on-site energy demand, provided the increase would achieve a simple payback of 7 years or less	9	Measures specified in the Recommendations Report produced in parallel with a valid Energy Performance Certificate	<p>Report outlining how we comply with;</p> <p>I. Controlled Fittings and Services</p> <p>II. U-values of New thermal elements</p> <p>III. U-values of renovated thermal Elements</p> <p>IV. Details of how the renovation meets the Consequential Improvements.</p> <p>Evidence provided in Architectural and M&amp;E design information.</p>	Yes
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6	Notes
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	A	B	C	D	E
8		Mezzanine	Nursery	Residential	n/a, under area threshold
9		Walkway	RBKC TMO offices	Boxing Club and Offices	n/a, under area threshold
10		Walkway+1	Offices (Social services, now derelict)	Residential	n/a, under area threshold
11		4th to 23rd	Residential (Dwelling)	No Change	BREEAM Domestic Refurbishment 2012, achieve a "very good" rating.
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	F	G	H
8	<b>Part L1B</b> (Existing Domestic) Extract from Part L1A; <i>"3.5 The erection of a new dwelling is not a material change of use. Approved Document L1B applies where a dwelling is being created in an existing building as the result of a material change of use of all or part of the building."</i>	Yes	No
9	<b>Part L2B</b> (Existing, non-domestic)	No	No
10	Part L1B (Existing Domestic)	Yes	No
11	<b>Part L1B</b> (Existing Domestic)	No	No
12			
13			
14			
15			

	I	J										
8	Yes <b>Controlled Fittings</b> U-values of controlled fittings to comply with "Table 1 - Standards for controlled fittings". <b>Controlled Services.</b> Comply with "Non-Domestic Building Services Compliance guide" for a. Heating and hot water, b. Mechanical ventilation, c. Air Conditioning, d. Fixed internal lighting, e. Renewable energy	Comply with regulation 44										
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	K																	
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8																		
9																		
10	No new thermal elements will be built. Controlled fittings will be replaced other thermal elements will be renovated.																	
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	M	N	O	P
8	Consequential improvements do not apply as residential units are 72 and 48 m <sup>2</sup> in floor area.		Report outlining how we comply with; I. Controlled Fittings and Services II. U-values of renovated thermal Elements III. U-values of renovated thermal Elements  Evidence provided in Architectural and M&E design information.	Yes
9	As pre Level G		As pre Level G	Yes
10	As per Mezzanine Level		As per Mezzanine Level	No
11	Consequential improvements do not apply as residential units are 72 and 48 m <sup>2</sup> in floor area.		Report outlining how we comply with; I. Controlled Fittings and Services II. U-values of renovated thermal Elements III. U-values of renovated thermal Elements  Evidence provided in Architectural and M&E design information.	No
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11	A SAP calculation will be required to supply the BREEAM assessment with evidence for energy improvements and % of energy from the LZC heat source. This information would be supplied to building control to quantify the energy improvement that has been made as part of the renovation.
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