

- 7.20 Currently, Westminster is facing a massive challenge to upgrade its existing building stock so that it becomes more energy efficient and sustainable. 78% of this building stock lies in conservation areas where the advice of the conservation officer can take precedence over the requirements of the Building Regulations. This is a huge burden to place on the small number of officers concerned.
- 7.21 In some of the 'Great Estate' conservation areas, where the majority of the buildings and streets date from a particular period and are reasonably uniform, this position may be more clear cut (see Figure 7.8). In a historically heterogeneous area like Soho, conservation officers and property owners and developers alike need better targeted information about what is and what is not possible and desirable in terms of sustainable regeneration.

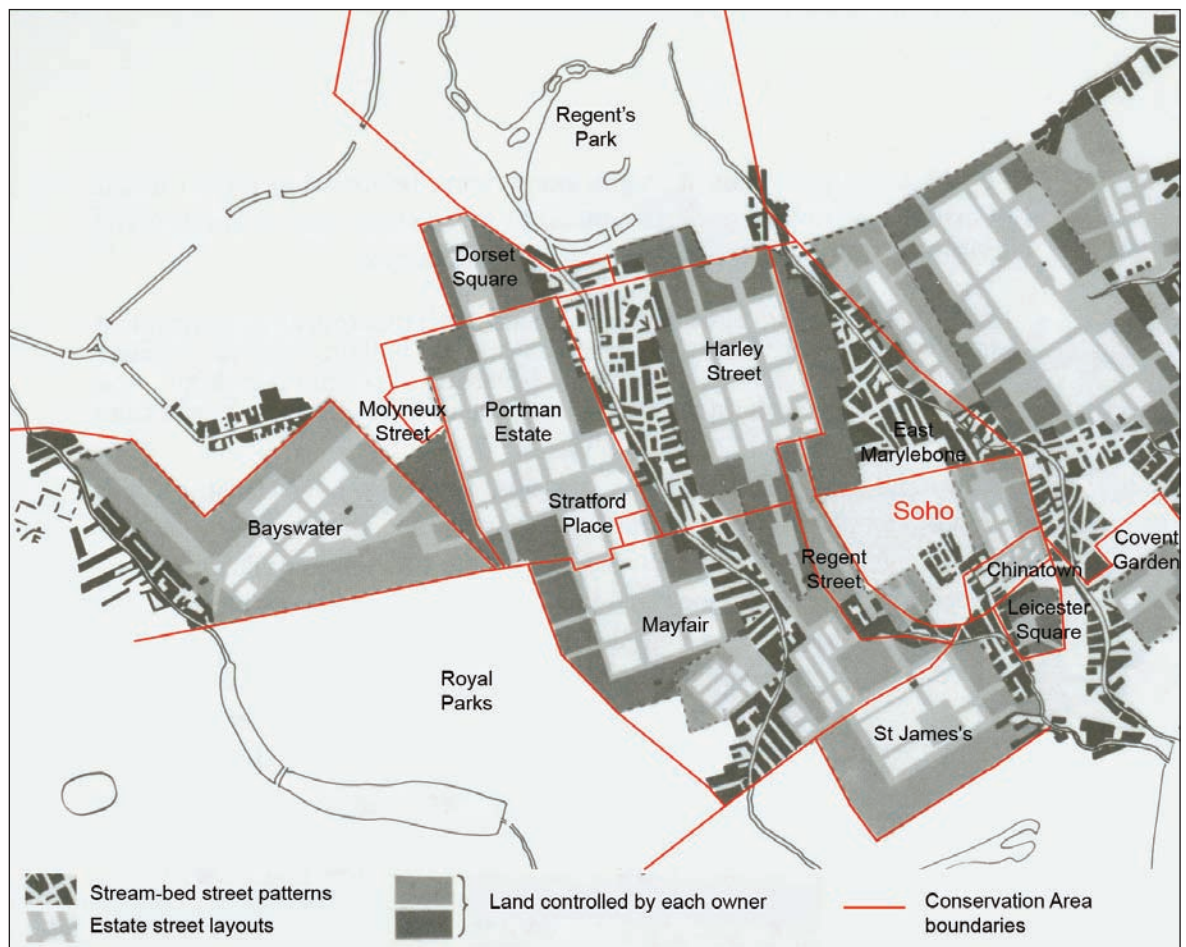


Figure 7.8: Central Westminster's Great Estates and heterogeneous areas within conservation area boundaries

(Source: Max Lock Centre. Adapted from David Grahame Shane's field analysis of Central London 1971, Rowe, C. and Koetter, R. 1975, p114; Conservation area boundaries from Westminster City Council d)

Corporate social responsibility and landlord's initiatives

- 7.22 The issue of split incentives was raised in the interview with John James of Soho Estates (Appendix 3) and introduced in Chapter 3. Landlords are primarily responsible for improving the thermal performance of buildings. Tenants are mainly responsible for running costs including, in particular, fuel bills and gain the financial rewards of any landlord investment (unless the latter are able to raise rents). As there is little incentive for landlords to invest, it is the occupiers who bear the costs of the poorer thermal performance with the resulting deterioration over time of building services and fabric.
- 7.23 Despite this, several of the major landlords in Soho have adopted a corporate social responsibility approach to retrofitting sustainability in the area. This is important because it involves major landholdings and a substantial proportion of the properties in the area (Figure 7.9). Additionally, if such work is well-publicised, it sets a precedent of best practice for others to follow.
- 7.24 Publicity has to be managed carefully as it is often the case that models of good practice generate a lot of interest (including requests for visits), which the owners concerned have to field (see, for example, interview with Jonathan Lane, Shaftesbury PLC, Appendix 3). In this respect, it might be better if information about best practice in the area was channelled through a third party body, the task of which was simply to promote sustainable retrofitting in Soho.
- 7.25 However, while larger property owners may have developed corporate social responsibility strategies (see Box 7.2) that have required them to address sustainability issues in the management of their buildings, it is much less likely that smaller owners and tenants will have the incentive to do so or awareness of how to go about it.
- 7.26 The tenants and occupants of Soho's buildings also have a major role to play and have influence over, or are directly responsible for a major part of carbon emissions from buildings. Clearly, in undertaking retrofitting measures, it is the owners' responsibility to ensure that tenants are aware of their responsibilities in using the building properly so that energy and resource efficiencies can be effectively realised.
- 7.27 However, most tenants will also be responsible for making their own installations in retail premises, offices, restaurants, and places of entertainment which will be highly energy intensive. There will be particular patterns of waste and water consumption and management and additional specialist guidance on sustainable approaches may be necessary.
- 7.28 As noted, Energy Performance Certificates, are being gradually introduced as properties are sold and let. These will give new owners and tenants guidance on how building thermal performance can be improved. However, this guidance is very general and gives little indication of how occupants and owners can take an integrated approach to sustainability in a mixed-use, multi-occupant context.
- 7.29 Building refurbishment and retrofitting companies may come without certified approval and appropriate expertise. Trust is often lacking. Considerable online guidance exists but accessing it is often confusing and involves time consuming search processes to find out what is relevant. Limited grants, subsidies and other forms of financial support may be available but they are little publicised and the 'small print' can render them inappropriate.

Box 7.2: Good practice - Corporate responsibility policy on sustainable development - Shaftesbury PLC

Shaftesbury PLC is a property investment group, which focuses on the Central London area. Its properties are all within London's West End, in the areas of Carnaby Street, Seven Dials/ Covent Garden and Chinatown, which are within Conservation Areas and cover listed buildings. Its properties are on average about 350 sq. m.

Its investment strategy aims to 'foster and develop a special character of villages' of the areas, by 'promoting exciting and dynamic environments for its tenants that will create sustained out-performance of income and capital values. In response to Listed Building and Conservation Area legislation, Shaftesbury refurbishes and manages properties to meet the needs of existing and prospective tenants without changing the existing character and features of the building. Shaftesbury also has a strong commitment to sustainability, as well as to re-use and careful management of its properties.

Its Corporate Responsibility Policy is reviewed annually to monitor and report its performance. Apart from the environment, the Corporate Responsibility Policy also covers Social Responsibility and Community Engagement

The Environment Responsibility Policy emphasises on restoration and repair. This policy is in line with Government policy on the re-use of existing development land, and minimising the use of resources. As a result of the small average property size, air conditioning installation is generally avoided and temperature control measures are incorporated in refurbishment design.

Shaftesbury's environmental strategy targets specific policy goals in the purchase, management, refurbishment and construction of properties and aims to operate in an environmentally sustainable manner throughout its activities as well meet all the legal requirements and continually improve on its environmental performance. Other objectives include promoting staff environmental awareness and provide appropriate training where necessary and engaging with its stakeholders to ensure that it is responsive to their expectations.

Among the environment measures used in its reporting are:

- Carbon dioxide emissions from direct energy use for the Head Office (tonnes CO₂)
- Carbon dioxide emissions associated with energy use in common parts of tenanted portfolios (tonnes CO₂)
- Waste recycled as proportion of waste generated at Carnaby/ Seven Dials (tenant generated waste)
- Performance against requirements of Considerate Constructor Scheme – percentage of assessed schemes that achieved target

(Source: Shaftesbury PLC. 2006, Shaftesbury PLC. 2007)

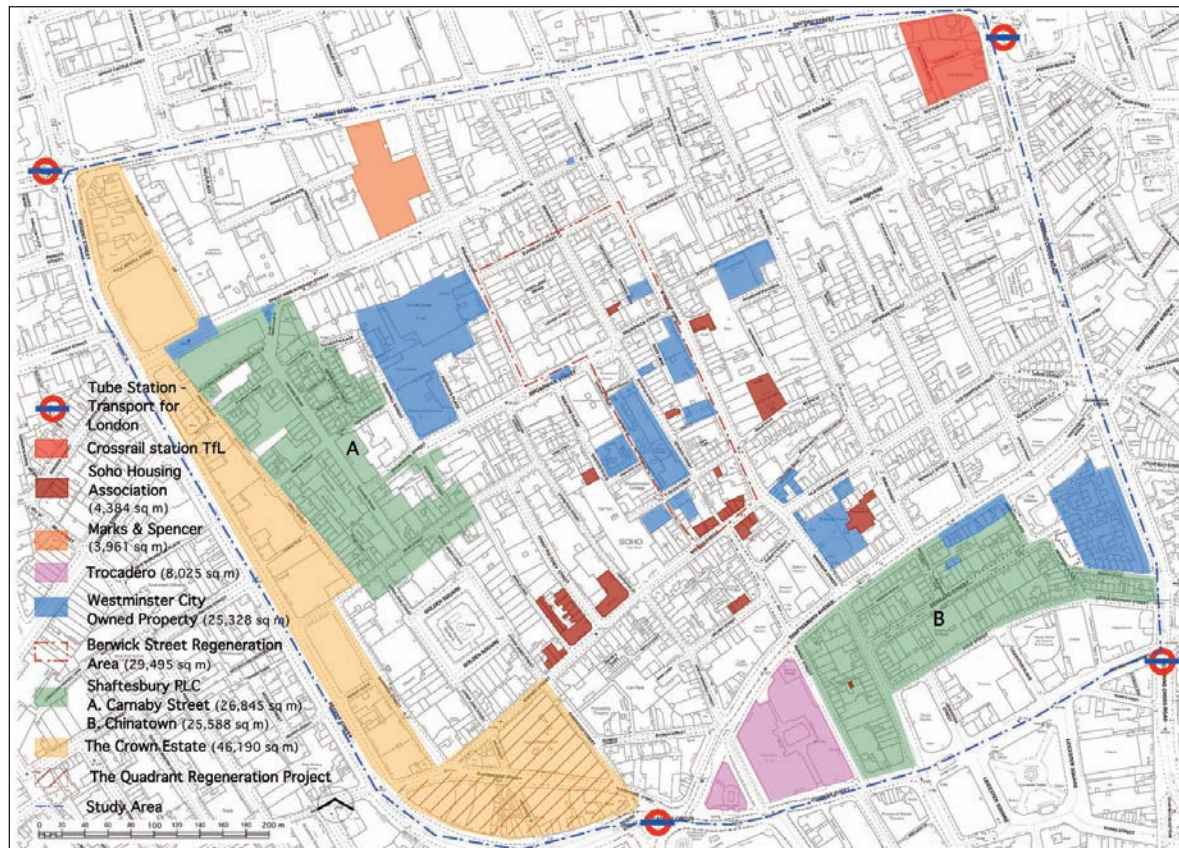


Figure 7.9: Major landholdings and regeneration projects in the study area

(Source: Max Lock Centre based on Ordnance Survey map)

| 93

- 7.30 Landlords in the UK are beginning to make use of 'green leases' which set energy consumption, water usage and waste production targets for tenants.² Failure to meet targets results in financial penalties. Rent reviews on existing tenancies may assess tenants' performance against these targets as a factor in negotiation.³ Other forms of new lease structure are also being considered include 'gross leasing' whereby landlords pay all the running costs of a building, giving them greater control and an incentive to press for improvements to tenants energy or water performance.⁴
- 7.31 Combining green and gross leasing with smart metering, for example, provides a flexible system with financial incentives for tenants to be more efficient in their energy and resource use. If they commit to a particular ceiling in energy use for example, and the smart metering informs both parties that this has been exceeded, tenants might be required to pay the additional costs (or alternatively have their rent reduced where they are particularly efficient or the property is temporarily not in use). Alternatively, it could be operated on a banding system where tenants move between bands according to sustainability performance.
- 7.32 Green leases schedules were initially introduced by the Australian Department of the Environmental and Water Resources and the Australian Government Solicitor for government agencies in 2006 and were expanded to the private sector as a voluntary initiative. In the Australian system, there are eight different schedules designed to be used with both gross and net leases.⁵

2. See, for example, WSP Environment & Energy. 2008. From carbon@wspgroup.com.

3. MRW. 2007.

4. *ibid.*

5. London Climate Change Agency. A good practice guide is available from the Green Leases Building Management web site, managed by the Centre for Research in the Built Environment at the Welsh School of Architecture (Green Leases Building Management).

Box 7.3: Corporate social responsibility in the West End by John Lewis Partnership

The John Lewis Partnership have produced a Sustainable Construction Framework setting out standards to minimise environmental and local impacts in the construction of their new stores and refurbishments of existing stores. A Sustainability Action Plan is drawn up before planning application is submitted. In refurbishing the Oxford Street store, John Lewis is reducing its CO₂ emissions by 24%, around 1,300 tonnes per annum, in its £60 million makeover flagship store included replacement boilers and lighting.

An initiative in February 2007, initiated by John Lewis and organised by the New West End Company (responsible for the largest Business Improvement District in the UK), sets a target of a 50 per cent reduction in traffic in Oxford Street and Regent Street over five years and a major reduction in the energy demands of shops.

The company targets a reduction of CO₂ emissions as a percentage of sales by 10 per cent in 2010 over 2001/2 levels, and energy efficiency improvements of 5 per cent by 2008 and 10 per cent in 2013 (against a 2003/4 baseline). John Lewis switched to green electricity (from 100% renewable sources) in all of its 26 department stores and 185 Waitrose supermarkets across the country by including the Oxford Street store.

(Source: ES. 2007a. John Lewis Partnership)

Information management and guidance; community action

- 7.33 A common theme of this report is the range of information and advice available on sustainability issues. This is partly because, in looking area-wide at Soho and Chinatown as a whole, we have been covering a wide range of actors as well as a wide range of sustainability issues. The information that is available tends to be targeted at particular groups, businesses, households, individuals, local authorities, housing associations, etc. It is also focused on particular sectors – energy, water, waste, etc. or at sustainability issues as a whole for interest groups (e.g. the Carbon Trust serving the business community).
- 7.34 Many organisations have been set up to provide information and guidance for particular issues. Often, the Government has initiated these. Others are civil society organisations, particular pressure groups or organisations set up to provide advice in particular areas, with or without financial support from the government. There are also trade associations promoting products in particular sectors, professional bodies and research centres – independent (often Government-funded) or attached to Universities. There are also regional and locally-focused advice bodies or networks dealing with sustainability issues or green issues as a whole. Many of these groups sit within larger organisations.
- 7.35 While considerable information on retrofitting solutions exists online or in print, the diversity of sources is confusing and sometimes contradictory. It is not always easy or obvious how to access relevant advice, skills and expertise or financial support. This profusion of sources of information is made possible by the existence of the internet which increases our overall capacity to make information and advice available by many orders of magnitude. However, in particular with sustainability measures this is something of a mixed blessing and presents a problem of information ‘overload’.

Box 7.4: CARRA: Linking CO₂ reduction to urban regeneration (Islington 2004)

The CARRA (Carbon Assessment and Reduction in Regeneration Areas) project, initiated by the Borough of Islington in partnership with the Peabody Trust, the Islington Energy Advice Centre and the London Metropolitan University, aimed to link climate protection with urban regeneration in an underprivileged part of London.

The project was run between 2002 and 2004 and was half-funded by the European Commission's *Life* programme. It actively involved local communities in order to increase awareness of climate-related issues and the need to reduce carbon emissions. The project employed a 'carbon budget' and was organised in three main phases:

1. A 'carbon baseline' was formulated to determine and record energy use and CO₂ emissions in the area.
2. Five 'energy action' projects were initiated involving schools, residents of housing estates, and small and medium-sized enterprises (SMEs).
3. A review of the overall impact of the action projects in order to engage citizens and stakeholders, as well as integrate the project aim into local policies, programmes and actions.

A 2.1 % reduction in CO₂ emissions from 112,356 tonnes to 110,095 tonnes per annum was achieved. The project also successfully engaged different sectors of the community in local action.

(Source: Islington. 2004)

- 7.36 Many of the organisations and web sites that offer useful information and advice are listed in this report. However, we feel that there is also a need for a 'one-stop shop' to provide guidance on retrofitting sustainability in Soho and historic areas in general, with a particular emphasis on providing information for small owners and occupiers who would be the major beneficiaries. This could be virtual in the form of a web 'portal' providing links and targeting visitors to appropriate sources of information

Surveys, modelling and environmental assessment methodologies

- 7.37 For the reasons already noted, retrofitting Soho for sustainability is as much a community issue as it is one for property owners working individually and in isolation from one another. For this reason, we would like to see the environmental audit that is proposed as part of the Soho Action Plan extended to include an outline survey of the building fabric. The issues of particular focus in this study are the roofscape, which offer the greatest potential for retrofit measures, and an audit of building types to provide a basis for more targeted sustainability advice.
- 7.38 We further recommend that limited sample surveys and energy audits are carried out to determine the construction, condition, pattern of use and baseline environmental performance of established building types. This will facilitate the development of model or typical packages of retrofitting measures, taking an integrated and holistic approach by building on the innate characteristics of the buildings concerned. This is a task that could involve English Heritage in developing its broader guidance for sustainable refurbishment.

- 7.39 In order to facilitate the development of urban design guidance, we believe that any proposed environmental audit of Soho should be extended to include visual, photographic and thermo-imaging studies, including aerial surveys of the built form of Soho and Chinatown so the appropriate location for retrofitting measures affecting the external envelopes of buildings can be mapped and used for practicable criteria for appropriate solutions.
- 7.40 More accurate predictions of the performance impacts of inter-related measures would be required than is possible with the existing SAP methodologies, for example. The Building Research Establishment should be encouraged to develop their existing BREEAM methodology to target the range of building types found in Soho and similar mixed-use, predominantly commercial areas.
- 7.41 The data from sample surveys would be a sound foundation the modelling of the larger, long-term strategies for sustainable retrofitting of Soho and Chinatown using, for example, the methodologies employed in the London 2016 Energy Scenarios.