



Daylight, Sunlight & Rights of Light Capability Statement

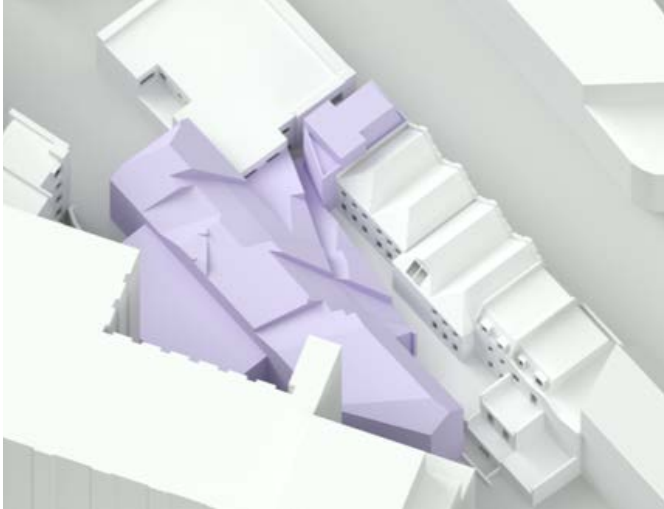




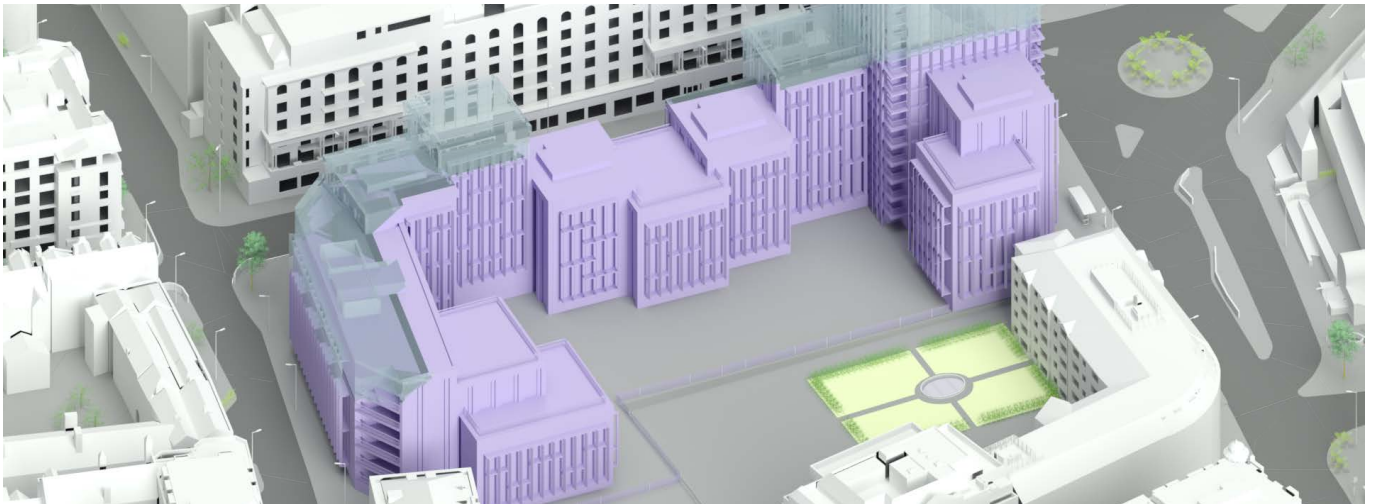
Capability statement

Rights of Light Envelope Studies

1. Maximum Development Potential



2. Development Cutback



There are generally two types of envelope assessments that are often required as part of any rights of light instruction. These are either a Maximum Development Potential Envelope or a Development Cutback Assessment.

Maximum Development Potential

The Maximum Development Potential envelope studies establish how much massing can be added to the site before a potentially actionable impact is triggered by the additional massing. It is often used to aid the design process and provide the design team with an understanding of the main constraints in light terms. At TFT we review several other factors such as the age and use of neighbouring properties to advise where additional massing could exceed the envelope without significantly increasing the risk profile for the development.

Development Cutback

When calculating the appropriate rights of light compensation budget for a development it is important to consider the development cutback method. This involves establishing the amount of profit the developer will make as a result of the interference. To establish this, the parts of the building that are causing the rights of light infringement are removed to a point where adequate levels of light will remain within the neighbouring properties.

Capability statement

Transferred Rights of Light



The most common way a right to light can be acquired is via Section 3 of the Prescription Act 1832, which states that the light must be enjoyed uninterrupted for a period of at least 20 years.

Rights do not automatically extinguish when a new building is constructed and can be inherited by the new building if the windows in the new building are in a similar location to the previous building.

It is therefore important to not only consider the age of a neighbouring building, but also to establish what was on the site previously if a building is less than 20 years old as well as the location of the previous windows and building outline.

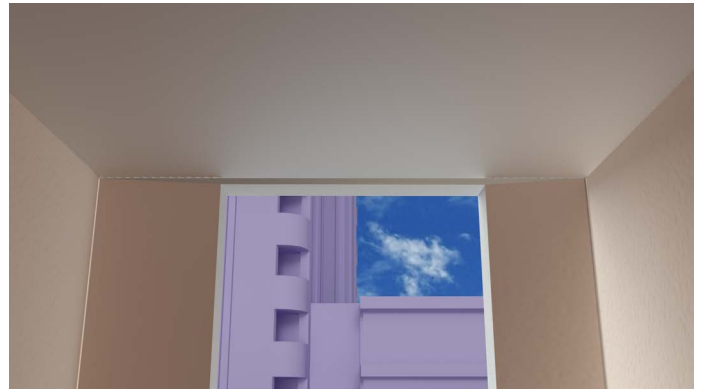
Capability statement

Rights of Light Studies

1. Existing light levels



2. Existing v Proposed light levels



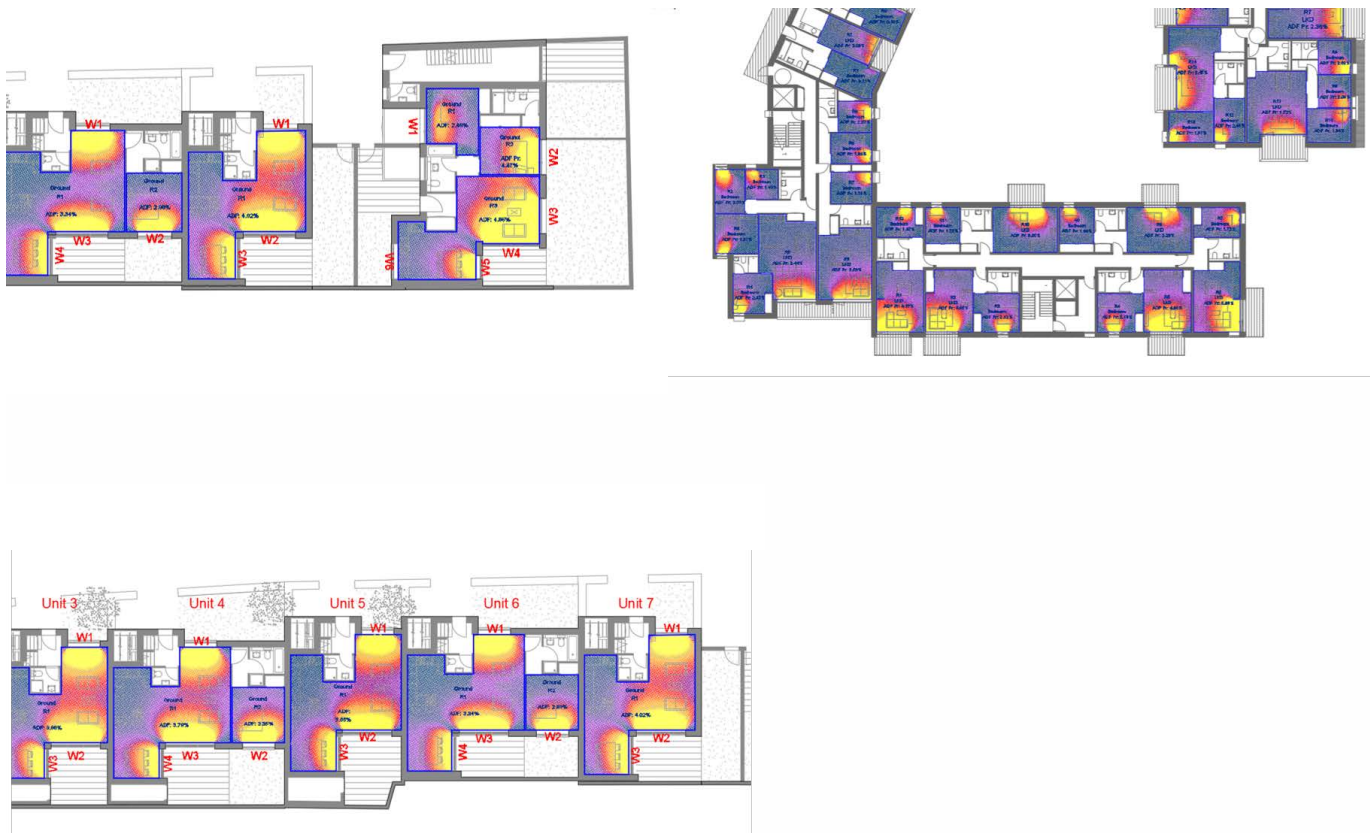
When dealing with rights of light it is important to understand which neighbouring parties have the benefit of a right to light.

Our specialist software enables us to pinpoint exactly which neighbouring windows and rooms will experience a reduction in light as a result of a proposed development and instantly colour code the appropriate level of risk.

We can also show the view of the development from inside the neighbouring rooms to provide a visual representation how the additional massing will be seen.

Capability statement

Daylight & Sunlight



Radiance studies

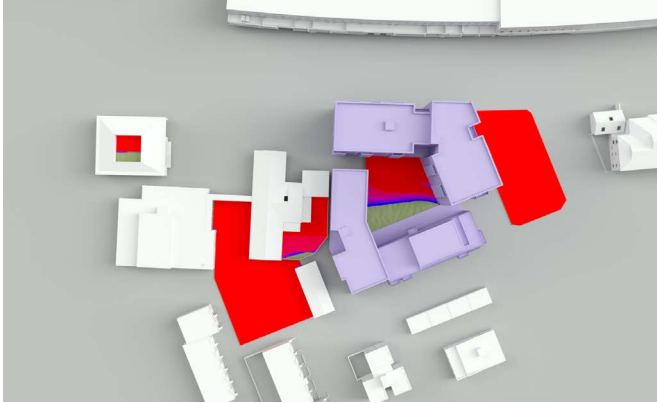
Radiance studies use real climate based data to simulate accurate weather condition worldwide to establish illuminance levels within a room. Climate based modelling is yet to be adopted by the BRE, although it is likely that the current guidelines used to consider daylight and sunlight to proposed habitable rooms will be revised in 2020 to account for the New European Standard for Daylighting (EN17037). The new guidance is likely to focus on the lux levels within a room rather than the visible sky that can be viewed and will be a much more detailed assessment method. The new guidelines are expected to be more difficult to comply with and are likely to be challenging in dense urban locations where daylight levels are already restricted. TFT have already used climate based modelling to support planning applications to help provide a greater understanding of how light enters and disperses within a room and are well-versed in using climate based modelling to aid the design process.

As well as undertaking Daylight Factor assessments, our specialist software has the capabilities to undertake Spatial Daylight Autonomy (SDA) and Annual Sunlight Exposure (ASE) assessments to establish whether an existing building or proposed development has the potential to gain credits under the provisions outlined in the WELL Building Standard and BREEAM guidance.

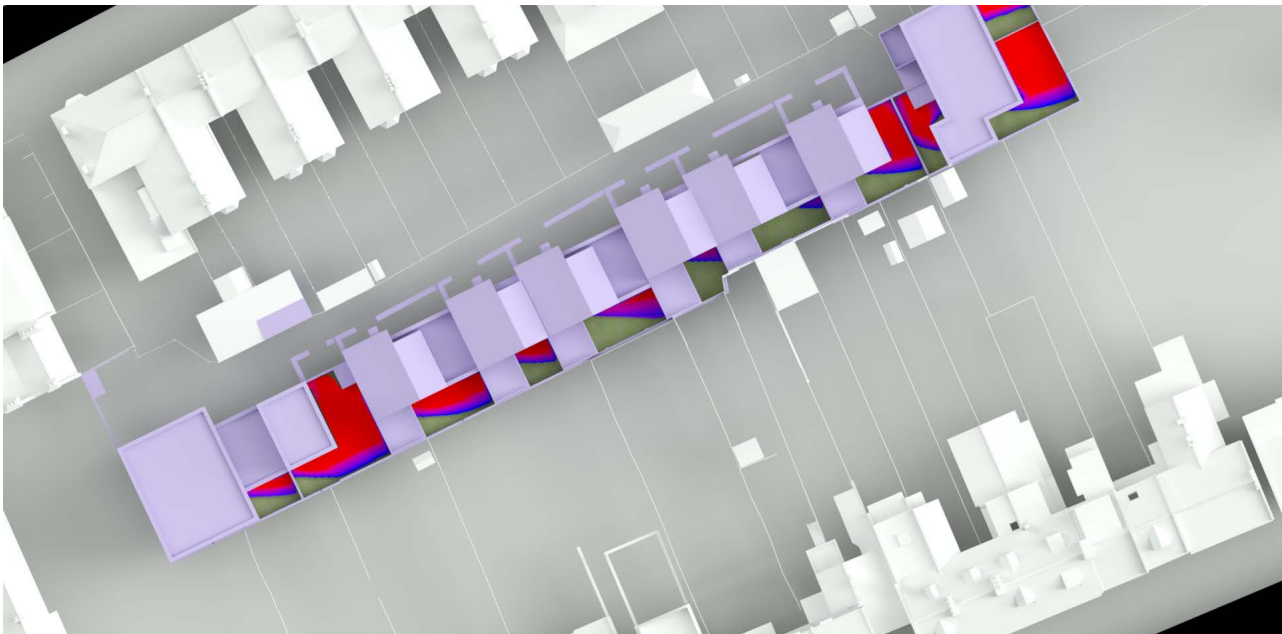
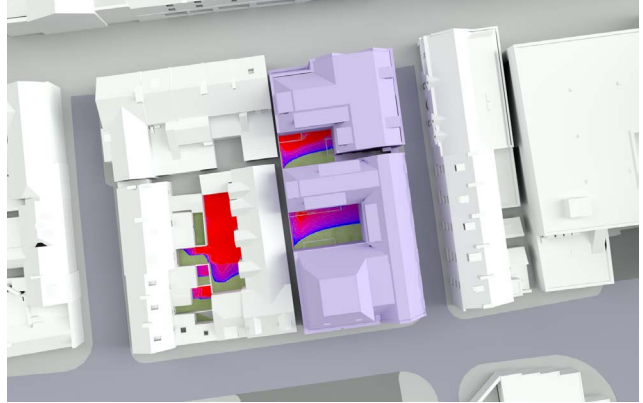
Capability statement

Overshadowing

1. Manford Way, Hainault



2. Montague Street, Worthing



3. Orford Mews, Walthamstow

Sun Hours on Ground

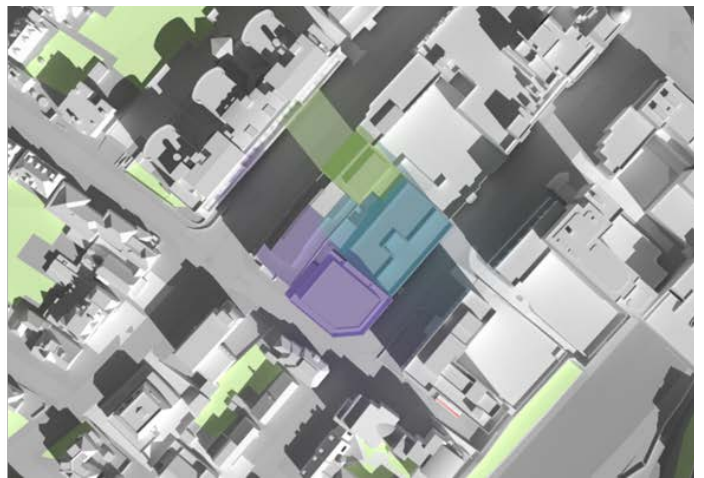
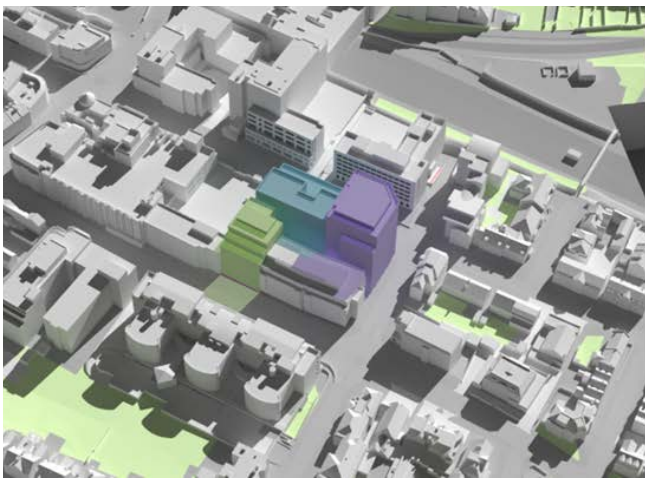
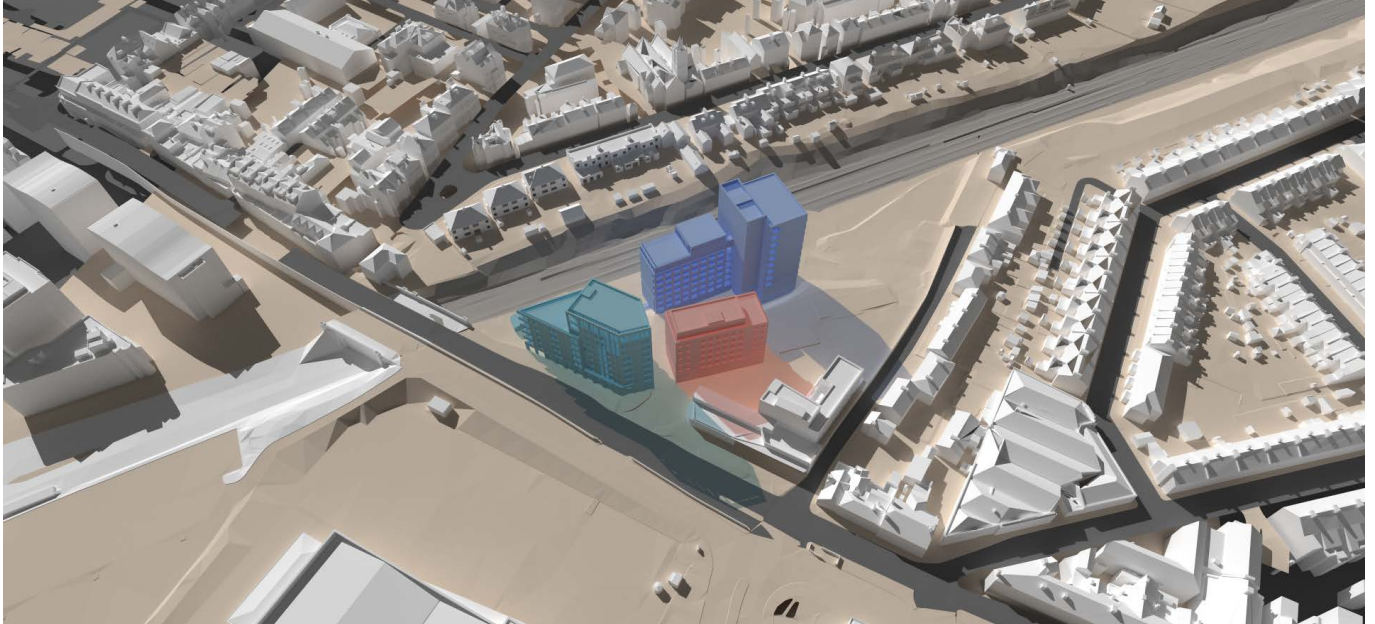
The Sun Hours on Ground assessment consider whether an existing or proposed amenity areas such as gardens, playgrounds, parks will benefit from sufficient levels of sunlight. The BRE guide recommends that at least 50% of any amenity area should be able to receive at least 2 hours of direct sunlight on 21 March.

Not only do our assessments establish the areas that comply with the guidance, they also calculate the sun contours for 10 min intervals with a view to showing how the shadow travels across an amenity area. This additional information can be invaluable during the design development phase of a scheme ensuring that the impacts to neighbouring amenity area are moderated and allows designers to ensure that specific areas within a proposed development will benefit from good levels of sunlight.

Capability statement

Overshadowing

1. St Albans Road, Watford



Transient Shadow

New developments have the potential to cast additional shadows to neighbouring public and private amenity spaces. In dense urban locations it can be difficult to establish the exact path of the additional shadow caused by a proposed development as it merges with that of the surrounding buildings.

By using different colours, our software clearly illustrates the shadow path in the existing and proposed condition for different buildings at any time and day throughout the year.



Development



Built Assets



Sustainability