29 Dartmouth Park Road: Supplementary Information

Green Roofs and walls

Camden Development Policy DP22 states that schemes must incorporate green or brown roofs and green walls wherever suitable.

A green roof is proposed in combination with a green wall.

Proposed drawing 'Proposed Plans and Elevations' (reference 132.1A) is annotated at drawing note '5' as follows; '*Flat roof with shallow growing medium*'. The drawing also shows trellising to support the green wall (drawing note 2).

Green roofs

Various green roof techniques were first considered:

- A 'brown roof' was rejected, because of the increased weight of rubble on a timber structure.
- An 'intensive' green roof with deeper growing medium (100mm plus) planted with ivies and ferns was considered an attractive and low maintenance solution. However, the weight of the roof would impact on the construction of the shed, which would become over-engineered and expensive to construct.
- The preferred approach is a 'extensive' green roof with shallow growing medium (less than 100mm) topped with Sedum mats or plug planted Sedum into a porous crushed brick material.

Sedum is a type of vegetation of generally short plants with shallow roots and thick leaves. The roof will be relatively lightweight and demand low levels of maintenance.

A conventional green sedum roof may not thrive across the whole area of the roof, because it is partly under a beech tree and there is less direct sunlight. In this case the sedum will be considered as a successional stage that will lead in time to a more biodiverse roof. Bare areas will be left to naturally regenerate with sedum or other naturally colonising vegetation such as grasses. Regular maintenance will prevent unwanted colonizing plants such as Budlea.

Climbing plants will also be encourage to grow up and over parts of the roof, helping the shed to blend into the garden.

Excess water must be able to leave the roof, to avoid ponding and overloading. A shingle perimeter will deter growth at the margins of the roof and allow free drainage. The roof will drain either to water butts or a soak-away (see notes on fertilizers below). The roof will be designed to be low-maintenance. However, it will still need to be maintained regularly, particularly in the first years after installation, as the planting becomes established.

The first major maintenance will follow the first full growing season (usually 12-18 months), followed by <u>at least</u> yearly checks in late winter or early spring (where breeding birds are expected such works will be undertaken before the nesting season begins).

Maintenance will include as necessary:

- Clearing drainage runs of dead and leaves and vegetation.
- Tying-in.
- Cutting back.
- Clearing dead plants.
- Replacement planting (e.g. planting sedum cuttings covered in substrate in spring or autumn).
- Watering/ feeding.
- Removing any unwanted debris or litter.
- Clearing leaves falling from adjacent trees (late autumn).
- Removing unintentional/undesirable vegetation (e.g. Buddleia).

The preferred approach will be to minimize or avoid fertilizer, as species diversity may be reduced and nutrient levels in storm-water runoff may be increased. Fertilizer will not be applied where rainwater is to be harvested in water butts.

Green walls

The green walls will comprise a mix of self-clinging climbers able to grow directly onto the wall surface (e.g. Ivy, Russian Vine and Virginia Creeper) and climbers, which need support (e.g. Honeysuckle and Jasmine).

The climbers will be supported by the trellis structures (and wires where necessary).

Shed Materials

The front and side elevations will be clad in natural western red cedar planks, laid horizontally.

Kiln dried red cedar has a uniform reddish-brown tone. After long exposure to weather the colour will fade to a silver-grey.



Figure 2: Example of Western Red Cedar Timber

The rear elevation will be Plywood ('Marine ply') treated with dark brown 'Creocote'.

Softwood trellising to support climbing plants will be attached to the front and side elevations in a diamond pattern.

Timber window frames will be stained brown to match.

Trellising, barge boards and timber sheeting will treated with 'Creocote' (a creosote substitute). This will have a dark brown appearance to match the staining to the existing garden trellis. Creocote contains no biocide preserver and is therefore considered less toxic and more sustainable.



Figure 2: 'Creocote 'Dark Brown'.