

The Sackler Galleries

For:
Royal Academy
of Arts



The Sir Norman Foster and Partners' masterplan for the Royal Academy combines conservation with new construction. In addition to providing a new suite of galleries there was also the need to reanimate unused or neglected parts of Burlington House and improve circulation through the building. When the Royal Academy moved into Burlington House in 1869, they added the Diploma Galleries as an extra floor to house their Diploma works and built their Main Galleries to the rear on the site of the old garden. A 4.2 metre lightwell separated the original house and the Main Galleries.

Visitors to the Academy were unaware of this as the grand staircase, which rises up from the entrance hall to the Main Galleries at the first floor level, bridges the two parts of the building, disguising the lightwell.

This might be acceptable were it not for the inaccessibility of the Diploma Galleries. From the entrance hall they were reached by a staircase or an antiquated lift. From the Main Galleries they could not be reached at all. This



rendered the Diploma Galleries unappealing with the result that the main suite of Lord Burlington's rooms on the first floor were often used instead.

The Foster scheme makes the lightwell the fulcrum of the Academy's new masterplan. New doorways open onto a new staircase and lift which knit together all five floors of the building. There is direct access to the Diploma Galleries, now the Sackler Galleries, and the Library at the top and the restaurant at ground level. The opening up of the

lightwell reveals two hitherto hidden facades. On one side the classical garden front of the original Burlington House and facing it, the stone parapet of Sidney Smirke's gallery. The new construction in the lightwell is freestanding, with a glazed edge at each level to allow light to spill down the two facades. A glazed lift car and a glass staircase emphasise the specifically late twentieth century character of the new construction.

The new Sackler Galleries form the centrepiece of the redevelopment programme. Based upon the plan configuration of the original, the galleries have been completely rebuilt. The old roof to each gallery was removed and replaced with a new barrel-vaulted roof with central roof lights. The simple barrel-vaulted roof echoes the form of the main galleries and a uniform floor level has been established to improve circulation. Full controls over temperatures, humidity and air movement have been installed. Electronically controlled louvres make possible the display of a wide range of works from watercolours to sculpture and all ductwork is concealed above coved

plaster ceilings. The galleries are reached through a new glazed reception area at the top level of the lightwell, which incorporates the parapet of the Main Galleries.

The new structure consists of a series of curved 203 mm deep steel universal beams supported on RHS posts. The sensitivity of the existing structure precluded the application of any additional horizontal or vertical loading. To accommodate the new vertical loads the infill to the brick arches which formed the gallery floors was removed and new light weight concrete floor slabs constructed on steel beams and stooled off the main existing arch beams. This enabled the galleries to have a common floor level.

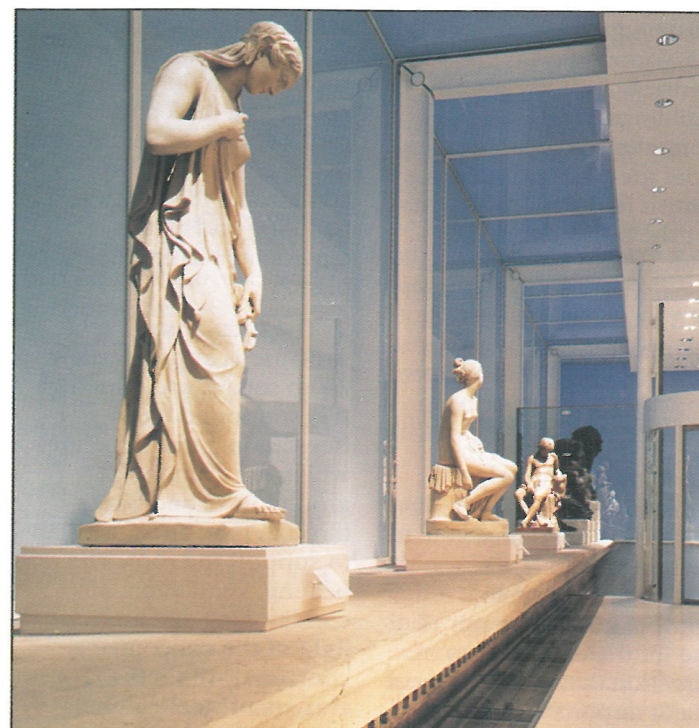
The circulation problems were solved by infilling the lightwell and introducing a lift and staircase. The infill of the lightwell was achieved by introducing three slender CHS columns along the centre line with tapered cantilever arms supporting the floors. The separateness of the new structure from the existing is accentuated by glazed margins at the edges of the floors supported on fabricated tapered steel tee sections.

The columns supporting the stairs are restrained at their full height by a glass bridge. The structure of the bridge is a Vierendeel girder laid horizontally with infill glass panels. The stairs are constructed from flat steel stringers supporting stainless steel angles which carry translucent glass treads. The roof to The Gap consists of half portals fabricated from open beam sections. In order to enable continuous translucent glazing to extend from the wall over part of the roof, eaves members are not present to the portals. Horizontal stability of the portal is achieved through a



partial concrete roof deck spanning the full length and built in to the end brick walls of Burlington House. The use of the existing stone

parapet walls to the Main Gallery as exhibition space required the post to the half portals to be located at the back of the parapet.



Judges' Comments:

Steelwork, structural glass and careful restoration of part of the existing fabric combine to produce marvellous spaces in both circulation areas and in the new galleries. Lightness of touch and the refinement of detailing in the exposed steelwork are exemplary.



AWARD

Architects:
Sir Norman Foster
and Partners

Structural Engineers:
YRM Anthony Hunt
Associates

Steelwork Contractor:
Custom Metal
Fabrications Ltd

Construction Management:
Bovis Construction Ltd