

The Green Building Award:

Department of the Environment Decentralised Offices, Wexford



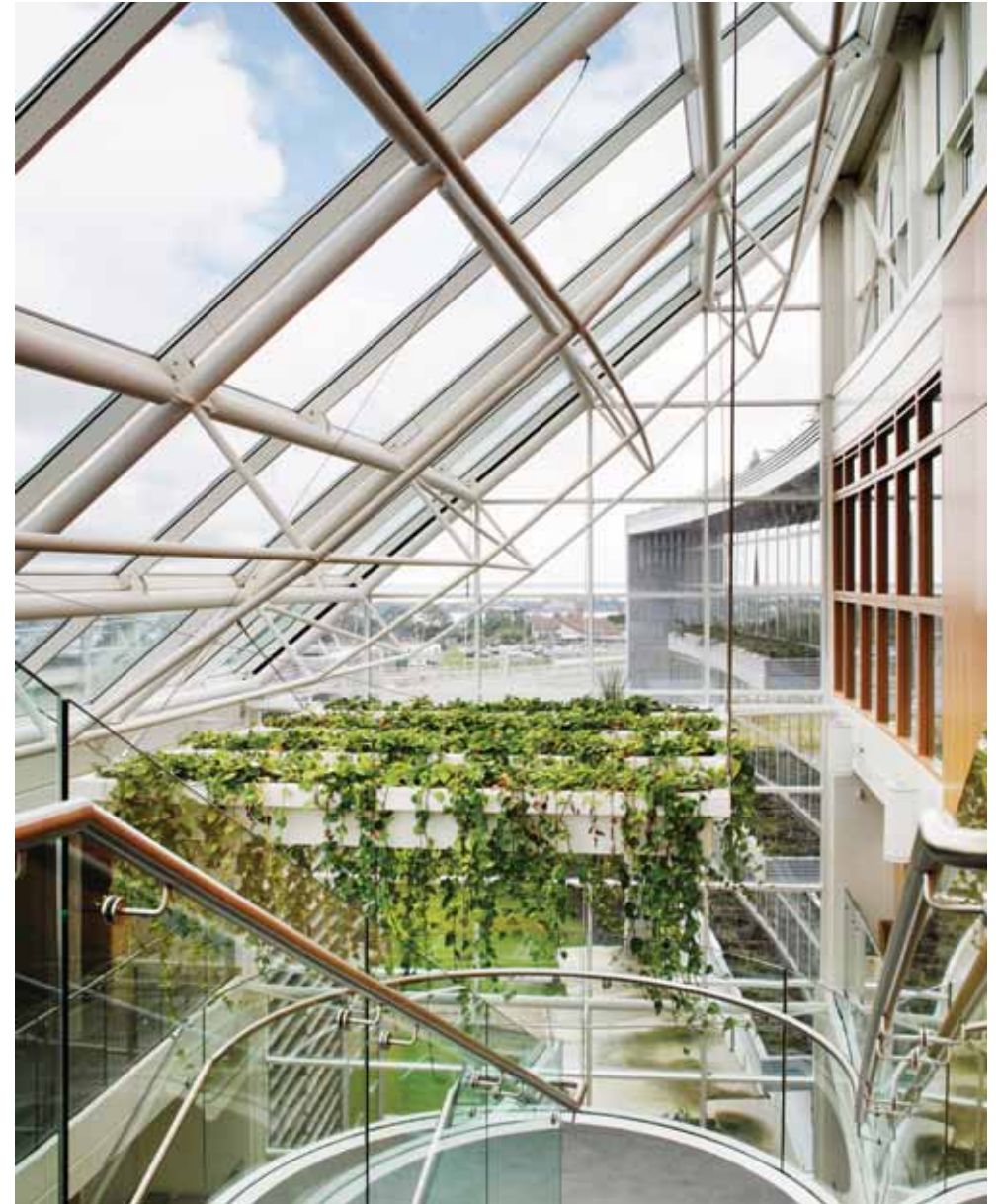
Scott Tallon Walker Architects

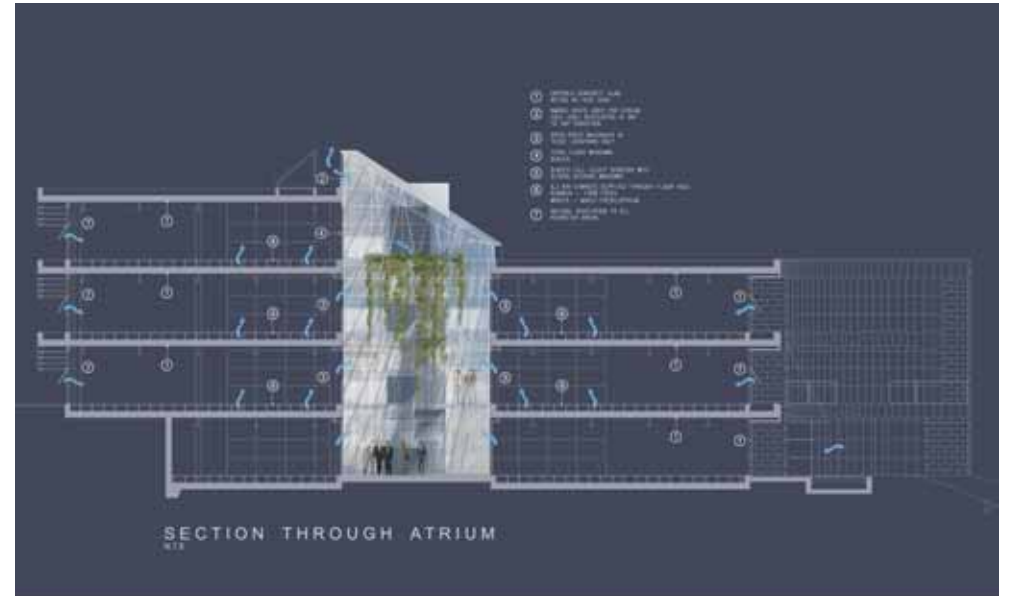
Architectural Description

The concept of the Department of the Environment building at Newtown road Wexford is simple, a sustainable building for the twenty first century addressing the Slaney estuary using two curved and sliding forms to create a sheltering and protective image cutting into the hillside to integrate with its sloping green site.

The scheme was designed by Scott Tallon Walker Architects working closely with Delap & Waller (M/E Engineers), Delap & Waller EcoCo (Sustainability), O'Connor Sutton Cronin (Structure), Tiros (Landscape), Margaret Gowan (Archaeology) and Pierse Contracting. It won a design-build competition managed by Office of Public Works for the provision of 6600m² of new offices for the DOEHLG. The project cost was approximately €16m and was completed in February 2010.

The curved plan symbolises an embracing department open to and welcoming the public whose environment and heritage they are guardians of. The form sits comfortably on the slope and within the angles of the triangular site. Two wings each capable of expansion are interlocked by a glazed internal atrium space which is available for performances, exhibitions and receptions, as well as acting as the assembly space for the conference rooms.





All office areas maximise daylight and contact between interior and exterior. The outside wall provides 85% translucence and 60% transparency and combines with an intelligent lighting system to optimise daylight and minimise energy usage.

Sustainability was the key driver in determining all aspects of the design and has influenced the decision process at every stage both in design and construction of the DOEHLG.

The objective set by the Architects was to achieve a BREEAM 'Excellent' rating. Teamwork between contractors and designers evolved sustainable solutions which we believe have delivered this (audit is currently in progress).

The overall effect of the approach to the environment and the use of natural materials make for a cool and pleasant green environment, encouraging interaction and productivity among staff.



Design Features of the Project include:

- Renewable source heating (wood pellet)
- Renewable source water heating (solar collectors)
- Solar shading to Southerly facades
- Exposed concrete used as heatsink
- Automated night time ventilation
- High performance aluminum / timber window system with low embodied energy
- Local materials maximized (eg. Limestone)
- EcoCem 50/50 concrete throughout
- Timbers from renewable sources (FSC)
- Convection based radiators to minimize radiant heat loss
- Materials specification guided by renewable low energy and recyclable materials (eg. Interface 'Cradle to Grave' recyclable backing floor tiles)
- Automated low energy 'smart' lighting
- Permeable grassed parking
- Flood pond to control water runoff encourages bio-diversity
- Green Roofs
- Rainwater harvesting system for WC's, Irrigation to planters etc.
- Water efficient sanitary fittings throughout
- Full accessibility audit carried out with Client
- No artificial cooling except for IT facilities
- High Efficiency air tightness specification tested to 5m3/m2/hr
- Design for easy expansion/adaptability flat slab, demountable partitions, 'knock-out' panels in end gables
- Thermal insulation exceeding normal by 20%
- Ecologically sensitive landscaping, native species

