

**Award Category:** Design Excellence

Project: Lee Valley White Water Centre, Waltham Cross

Client: Lee Valley Regional Park Authority

Project Team: Faulkner Browns Architects and S&P Architects



The Lee Valley White Water Centre is a new Olympic venue that will host the white water canoeing event at the 2012 Games. It is located in the green belt and at the heart of the Lee Valley Regional Park.

The venue is a hybrid design; partly providing an idyllic and well-landscaped accompaniment to the park, and partly providing an iconic building and an Olympic spectacle to last as a legacy. The

Centre will become an integral part of the Lee Valley Regional Park experience, and a key part of the Waltham Cross Renaissance regeneration strategy.

The Water Centre comprises two courses for the water canoeing event, both of which are fed from pumps capable of delivering up to 13,000 litres per second, using water drawn from an aquifer and stored in a practice lake. Energy is used as efficiently as possible in the development. For example, geothermal and solar thermal systems are used to heat the building, a heat recovery system minimises heat loss, natural ventilation is used where possible, and energy efficient fixtures are used throughout the building.

Within the building, rain water is harvested and used for toilets, and outside, only natural irrigation is used on the grassed landscape areas. Drainage from the Centre runs to grassed drainage swales, particularly crucial given the location of the Centre in the River Lee floodplain.

Not only has sustainability been at the forefront of the design of this facility, but also the appearance of it, and the effect it has on the surrounding landscape. Due to the need to create a hilly landscape and a world-class sporting facility in a flat green belt location, the Centre building has been designed to 'float' upon the landscaped hills necessary for the

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course. The use of wood and black steel within its construction has helped to reduce its impact, while at the same time creating a building which is iconic and distinctive.

## **Judges comments:**

"The design of the Lee Valley White Water Centre has impressed the judges not only because it is such a harmonious addition to the park, but also because it is an iconic design that will be recognised as an Olympic spectacle for years to come."