Basement Waterproofing Technical

Plant room / storage safest Waterproofing

First / Primary form of waterproofing

The concrete box forming the basement should be well constructed with correctly placed hydrophilic strips or better still water bars. We recommend the use of additional joint detailing and crystalline slurries to create a type B watertight structure.

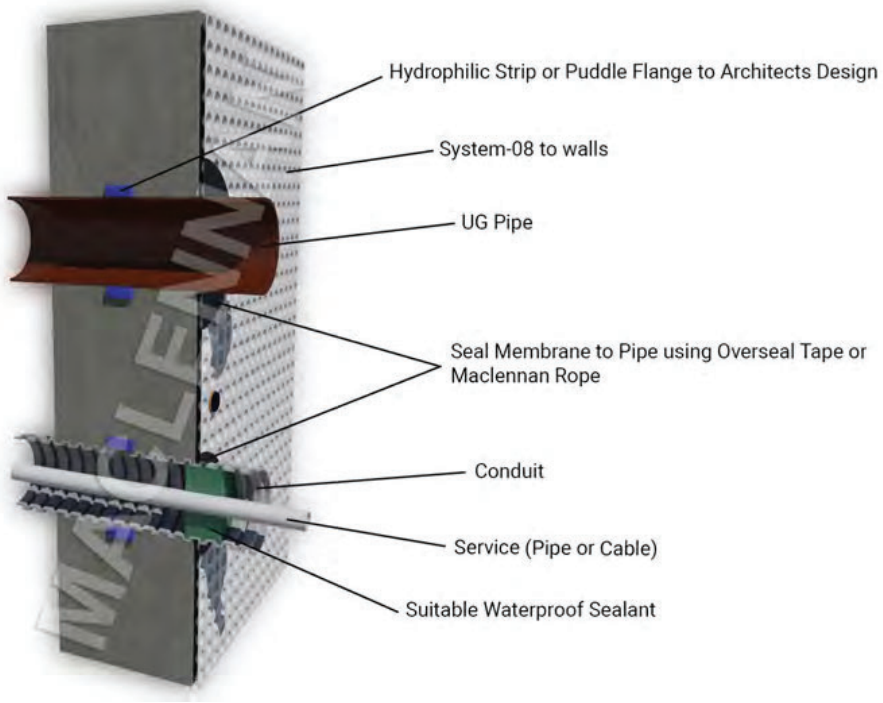
The water bar we recommend is fully serviceable and comes as a hollow hose wrapped with hydrophilic material. In the event of a leak the hose can be filled with acrylic resin or Polyurethane or even cement grout to repair defects in the concrete structure such as cracks, shrinkage voids, or honeycombing. All of which are common and sometimes unavoidable in concrete placement in normal site conditions.

A concrete structure without waterproof additives but with well compacted concrete and no honeycombing and well prepared and detailed joins with water bars will provide a Type B structure. Crack control can be employed by the engineers to provide additional waterproof properties to the construction if required.

Service entries need to be well designed so as they can be watertight but also remediated in the event of damage externally. To this end pipes and cables should be separated by 20mm and coming through the entry in a manner where they are supported but can be moved within the duct for remediation with resin filler if required.

Typical section through RC Wall

- Showing two types of pipe penetrations



Typical Waterbar