

The Design Team can specify on the drawings issued for tender

1. The basement structure should be totally dry inside from the waterproof, reinforced concrete alone
2. from the base of the structural floor slab to 150mm above outside ground level.
3.
 1. All joints should be scabbled, cleaned and kept clean.
 2. All concrete pours supervised and any rejected concrete to be replaced by the contractor.
 3. Cube samples to be taken after 20m³, 60m³ and 100m³ cumulative totals of waterproof concrete and tested at an ACAS accredited laboratory to BS EN 12390 parts 3 and 8. Pass 8mm. 20m³ means mid-way through a load being discharged. Not before discharge begins and the opportunity to then add water.
 4. No concrete kickers.
 5. No tie bar holes or other holes.
 6. No ICF or twin wall.
 7. Walls formed and filled a maximum of 2m high before continuing higher.
 8. Floors over the basement either concrete cast insitu or engineered timber joists, only. No steel beams supported by the retaining wall.

4. The basement structure will be inspected after the whole structure is complete: the roof is on, the windows are in, the basement cleared, cleaned and dried, and just after a period of heavy rain.

Any damp areas, seepage or leak to be fully repaired by the contractor and the inspection remade.

5. Nothing should cover any part of the basement structure before this inspection has passed and been formally signed off.

Waterproof, reinforced concrete is essential because it cannot be damaged by following-on trades or site operations, such as backfilling, scaffold poles and crane lifts.

If the structure cannot be fully waterproofed then repairs must still continue until no leak exceeds 'seepage', which means small drips stuck to the surface occasionally coalesce together and run down the wall.

In which case, the basement could never flood and the seepage needs to be channelled and removed with a very minor internal drainage system - which should be entirely at the contractor's expense because it is easily avoided.

On no account should there be a sump beneath the basement floor slab because site insurance will not cover the contractor excavating and men working that deep.