

# MC-Injection Hose

Injection hose for protection against potential and active leaks in construction and cold joints in concrete.

**PRODUCT DESCRIPTION:** **MC-Injection Hose** is PVC hose specially micro openings equally positioned along and around the hose formulated to be durable, robust and fully resistant to continuous immersion in ground water, saline, sewage, alkalis, acids, petrol, diesel and alcohol. The hose has existing openings (slots) for the pressure-fed injection material.

- PRODUCT PROPERTIES:**
- Economic - Reinjection option prevents leaks caused by settlement or structural movement.
  - Non destructive - No drilling or damage to the concrete.
  - Ease of use - Simple installation even at complicated details.
  - Proven and predictable performance.
  - Maintenance free system.
  - Verifiable - testing of joints for water tightness before installation of membrane or back filling.
  - Smooth surface avoids bonding between injection hose and concrete.
  - Suitable for operation under high or low injection pressure.

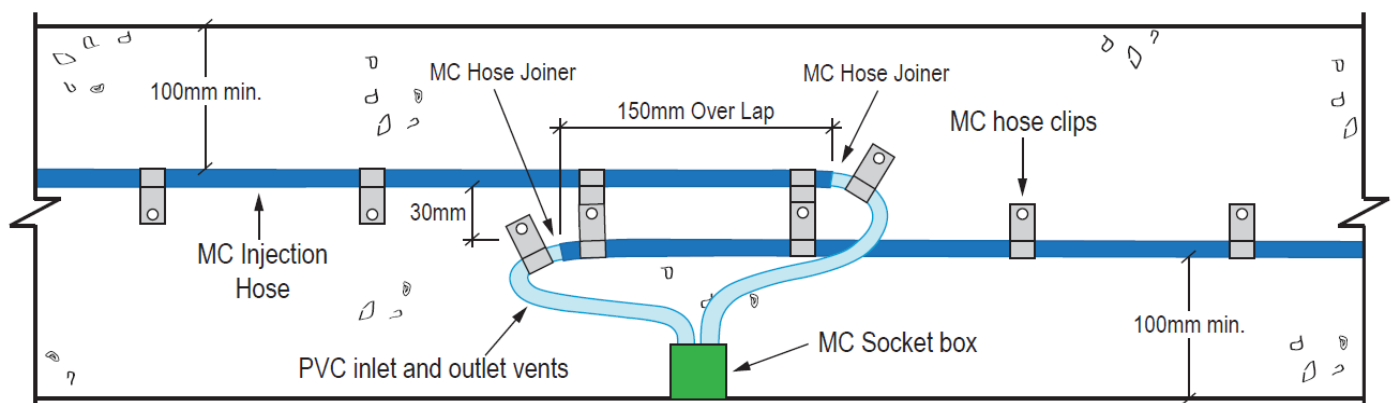
- AREAS OF APPLICATION:** **MC-Injection Hose** system has been designed to prevent passage of water through concrete joints:
- Construction and cold joints.
  - Water excluding structures, e.g. subways and tunnels.
  - Water retaining structures, e.g. canals and reservoirs.
  - Sewage treatment plants.
  - Below ground concrete construction, e.g. around pile heads & basements.

- APPLICATION NOTES:**
- **Specification:** Where shown on the documents, **MC-Injection Hose** shall be made of a smooth finished, PVC based hose with staggered openings. The re-injectable injection hose system shall allow injection of PU, Epoxy resins, acrylate gels and cement suspensions.
  - Installation, injections, reinjection and selection of materials should be conducted by a MC Approved Applicator.
  - Before installing the injection hose, ensure that the correct type of injection hose suitable for the project including all the required parts and equipment has been provided for, as per MC recommendations.
  - **Surface preparation:** The installation surface shall be trowel finished, sound, clean and free from contamination.
  - **Assembly:**
    - The **MC-Injection Hose** system consists of a suitable length of hose plus inlet and outlet vents (See Properties). The inlet and outlet vents are normally housed in a socket box or connected by formwork catchers. These boxes or catchers shall be placed in an accessible area to allow ease of injection
    - Overlapping of injection hose length shall be approximately 100-150mm with subsequent hoses placed between 30-80mm of each other.
    - **MC-Injection Hose** shall be placed in the middle of the wall. In all cases ensure that the hoses are embedded at a minimum distance of 100mm in concrete.

- **Fixing:**
  - Fix the injection and vent hoses to the substrate with hose clips and accessories as supplied by MC. Fixing shall be at 200-250mm centre to centre, to ensure that the hoses do not float in the fresh concrete during casting process.
  - Use sealing caps at the end of vent hoses to ensure that the concrete does not penetrate into the hose.
- **Injection:**
  - When injection needs to be carried out, locate the vent hose, remove the sealing cap and fix suitable injection nipples and accessories. It is imperative that the following steps are followed in the listed sequence.
    1. Fill the hose with injection material using injection pumps until flow is observed at the other end.
    2. Plug the end.
    3. Pressurise the **MC-Injection Hose**.
  - It is essential that the injection material penetrates the joint to ensure this. Maintain the pressure for 5 mins after the material has been injected with no pressure loss observed.
  - Better results are achieved when using moderate pressure and a longer injection time, as opposed to a shorter injection period at elevated pressure.
  - It is recommended to repeat the same procedure from the other end to the other.

**TYPICAL PROPERTIES:**

<b>Material</b>	PVC
<b>Internal dia</b>	6mm
<b>External dia</b>	13mm
<b>Injection opening</b>	Approximately 3mm
<b>Spacing of opening</b>	Approximately 10mm
<b>Location around hose</b>	4 equal positions
<b>Typical injection length</b>	10 - 12m
<b>Injection material</b>	MC-Injekt GL95 TX; MC-Injekt 2300 Top; MC-Injekt 3000 HPS



**Typical drawing**



MC injection Hose



MC Socket box



PVC inlet and outlet vent



MC Hose joiner



MC Hose Clips



Plug

**Note:** The information provided here is based on our experience and correct to the best of our knowledge. It is, however, not binding. It will need to be adapted to the requirements of the individual building projects, to the specific application and to non-standard local conditions. Our data refers to the accepted engineering rules, which have to be observed during application. Given these preconditions we shall be liable for the accuracy of the information given as outlined in our sales and delivery terms and conditions. Recommendations by our employees that deviate from this information are only binding for us if they have been confirmed in writing. In all cases, the generally accepted rules and practices reflecting the current state of the art must be adhered.

Edition **11/2025**. Some technical changes have been made to this print medium. Older editions are invalid and may not be used.