On wall metering option

Please note: external underground meter housing is not required

When the on wall metering option has been selected, the following conditions of service must be adhered to. Failure to comply with any of the conditions below will result in refusal to connect.

Conditions of Service - On Wall AMR Meter

Condition 1 - Wall Mounted Meter Box and insulated ducting must be installed (please refer overview drawing)

- This WRAS approved wall mounted meter box can be located on any elevation of the property.
- The box should be mounted flush to the exterior wall and be installed no higher than 1 metre above finished ground level to the top of the box*
- The insulated ducting must be installed down to 750mm ensuring there are no air gaps between the duct and the wall mounted box.
- The installation of the wall mounted box must comply with the specific manufacturer's installation specifications.

Condition 2 - Coil of pipe at the boundary of the property

- The supply pipe must be laid in a continuous unjointed length to the boundary.
- There must be sufficient length of pipe left coiled at the boundary to reach the water main (the location of the main will be shown on the CAD drawing and approximately how much coiled pipe is required).

Condition 3 – ID Tracing Mesh must be installed or visible

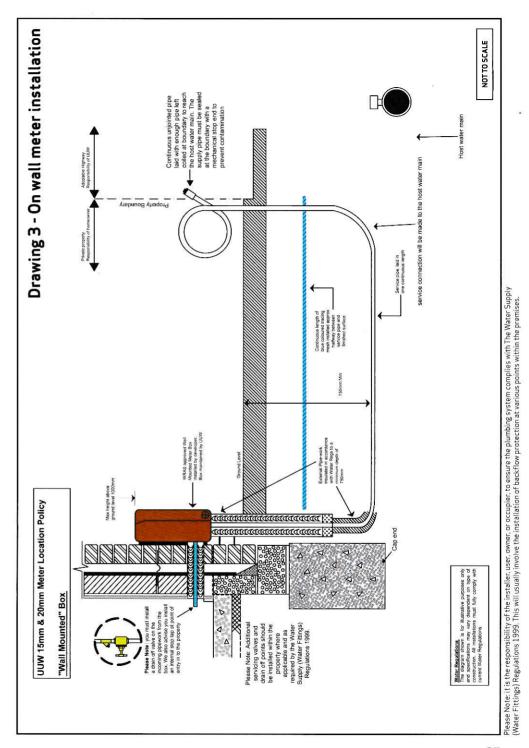
 The supply pipe must have a continuous length of blue tracing mesh laid above it up to the boundary of the property.

Condition 4 - Sealed supply pipe

 The supply pipe must be sealed at the boundary with a mechanical stop end to prevent contamination.

All parts of this installation and the plumbing within the property should comply with the requirements of the Water Supply (Water Fittings) Regulations 1999.

* Important – The final installed height of the on wall box will affect the length of insulated ducting required to reach a minimum depth below ground level of 750mm. Installers must consider how much insulated ducting will be required to reach the required depth as failure to comply with this condition will result in refusal to connect the supply.



The above information explains the typical requirements for this metering option. All ports of this installation and the plumbing within the property should comply with the requirements of the Woter Supply (Water Fittings) Regulations 1999.

Installation Checks - On Wall AMR Meter

For product detail and specifications please refer to manufacturer's guidelines. All installations must fully comply with current water regulations.

- The product is securely located on house wall on any elevation of property.
- The interface between meter box and insulation is a tight fit with no air gap under the meter housing and through the wall.
- That insulation is secured to the same wall as wall mounted meter box (failure to do so could result in separation and a gap due to soil settlement).

- That the door to wall mounted box should close and be secured using the toggle and universal latches – no gap caused by twisting due to uneven wall or pressure from fixings.
- That all joints are properly made using the manufacturer's recommendation.

When installing a wall mounted meter housing there are two ways in which the supply pipe can be taken into the property either through wall or under the footings.

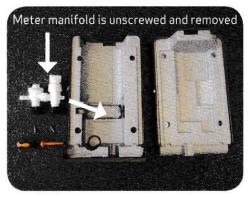
Option 1 - Core

Drill through wall with pipework Universal key ducted (minimum 90mm) and Impermeable insulated to membrane seals wall water regulations Toggle gaps Latch standards 3 OPTION 1 Easy access to control valve and water meter (if required) Ducted insulation to the Seal compliant with manufacturer's **Building Regulations** specification Approved Document Option 2 - Taken Part L1A back under footinas via **INSUduct** ducted insulation Standard 25mm ø MDPE pipe adaptor available for 32mm ø MDPE or 3 OPTION 2 copper

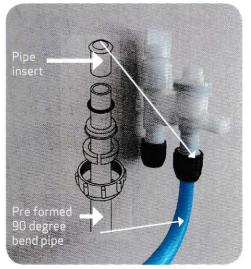
Through wall

When using this option the first step is to remove the meter housing door and remove the manifold contained within the box.

On wall box with door removed and manifold taken out

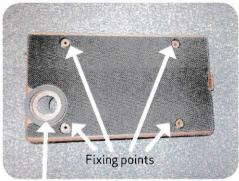


The pre formed 25mm 90 degree bend is firmly inserted into the outlet port of the manifold (remember to use the pipe insert)



The wall must be core drilled and ducted (as shown in core drilled specification on page 28) where you would like the pipe to enter the property (usually 1 brick up from DPC).

IMPORTANT - There must be a 7.5mm projection of the ducting sleeve on the outside face to marry up with the on wall meter housing



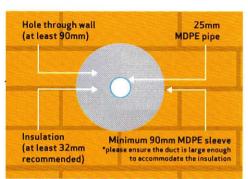
View from back of housing showing hole which must marry up exactly with core drilling, insulation and sleeve to take pipe into property

When using option 1 the installer will provide an insulated duct through the wall. It is important this duct is exactly aligned to fit the hole at the back of the box to retain full frost protection

Failure to correctly duct and insulate the pipe through the wall will result in the inspection failure or refusal to connect.

Core Drilled Specification



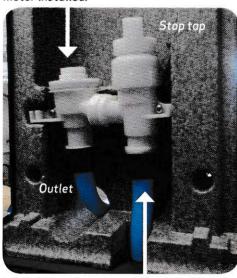


Take the manifold and re-install within the meter housing by pushing the outlet pipe into the duct and through the wall and reaffix the manifold and door.

The inlet pipe is attached to the inlet in the same manner

In the case of an **under the footings installation** both the inlet and outlet supply pipe are affixed to the exterior wall through insulated ducting taken back down the exterior wall though the insulation as per manufacturer's guidelines.

Meter adaptor with blank plug in situ – Blank plug removed at a later date and meter installed.

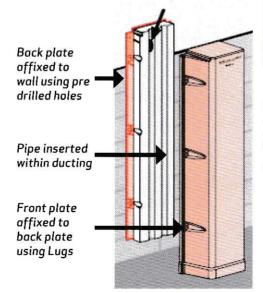


Inlet – Pipe taken through insulated ducting into wall box and fixed here

Fixing the insulated ducting

It is advisable to use the ducting specified by the housing manufacturer with the external meter housing in order that a secure fit can be achieved between the ducting and the meter housing. Any air gap between the meter housing and ducting will result in inspection failure or refusal to connect by the water company.

The 25mm PE pipe that has been laid in one continuous length out to the property boundary at a minimum depth of 750mm will meet this ducting (or additional ducting) at 750mm below finished ground level. The back plate of the ducting is affixed to the wall. The pipes are fed into the back plate of the ducting to the inlet of the wall mounted meter box. The front plate of the ducting is affixed using the lugs.



Wall Mounted Example (without ducting in ground)

Please be aware that the location of the footings may affect the insuduct positioning, below is an example of an acceptable installation used to overcome this.



Please Note: the above diagram shows the wall mounted box before the underground ducting was added, ducting will need to be done before you backfill your trench/request an inspection