



Oras

Installation and maintenance guide



For products:

6100Z

6104Z 6104Q 6204Z

6105Z 6105Q 6205Z 6205MZ

6110Z

6114Z 6114Q

6204Z

6205Z 6205MZ

6209Z

6214BZ

6215Z 6215Q

6251FZ

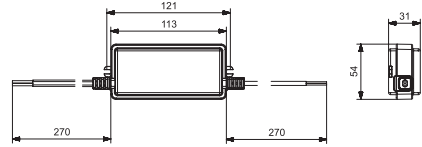
6575Z

6252Z

290004

Input 180-264V 50Hz

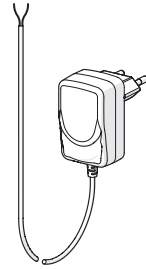
Output 24V, 1.05A 25W



290005

Input 90-264V, 50Hz

Output 24V, 1.04A, 25W



6104Z

I (ISO 3822)

EN 15091

100 - 1000 kPa

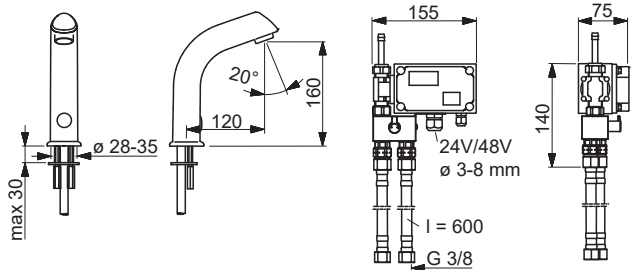
0.11 l/s (300 kPa w/Controller)

220 kPa (0.1 l/s)

max. +70°C

IP 67

24-48V



CE (EMC 2014/53/EU , 2011/65/EU)

6105Z

I (ISO 3822)

EN 15091

100 - 1000 kPa

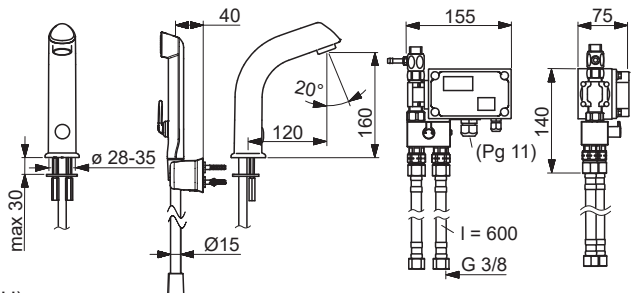
0.11 l/s (300 kPa w/Controller)

220 kPa (0.1 l/s)

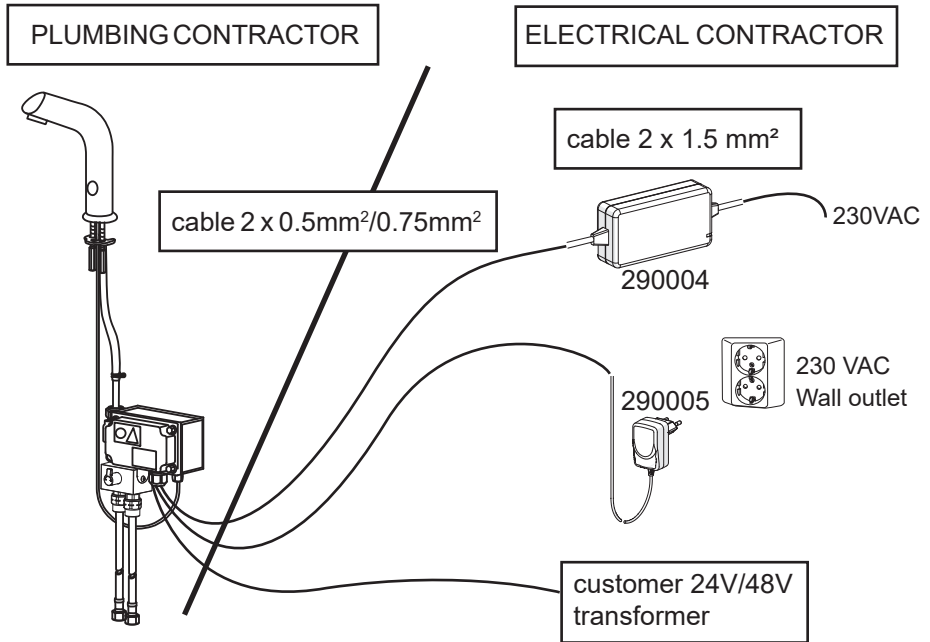
max. +70°C

IP 67

24-48V



CE (EMC 2014/53/EU , 2011/65/EU)



Design Guidelines

HVAC Designer

- Marks the locations (and types) of wired plumbing fixtures in the plans.
- Reviews the required cabling with the electrical designer.

Tip

If the Bidetta hand shower is installed more than 1.5 m away from the faucet, the cable between the holder and the control unit must be replaced with a longer one (available in 2, 3, 4, and 5 m lengths).

- When using a bus transformer, the power requirement is calculated as: number of products * 20W.

Electrical Designer

- Marks the junction boxes for the plumbing fixtures in the plans.
- Specifies the wiring for the fixtures.
- Designs the wiring between the fixtures and the junction box.

Work Instructions

Step 1

- The electrical contractor obtains and installs:
- Junction boxes for the plumbing fixtures.
 - Pipes and/or cables from the transformer to the plumbing fixtures (2 x 0.5 mm² / 0.75 mm²).

Step 2

- The plumbing contractor obtains and installs:
- The plumbing fixture and the necessary connectors for attaching the fixture to the piping system.

Step 3

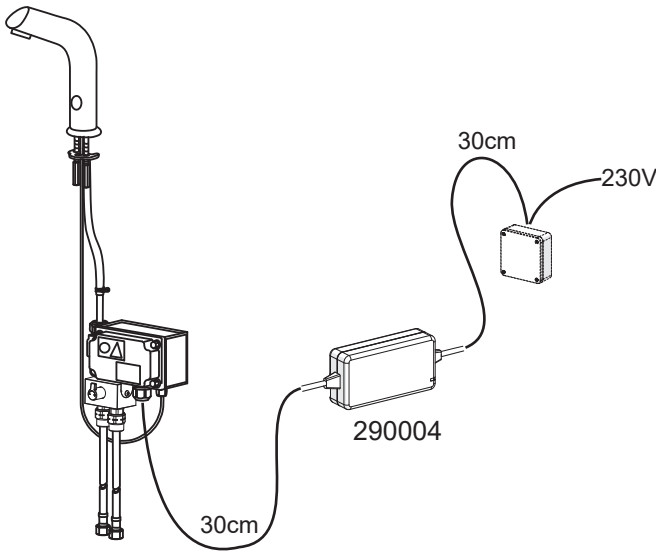
- The electrical contractor:
- Connects the fixture's connecting cable in the junction box.

Step 4

- The plumbing contractor:
- Performs a test run of the plumbing fixture.



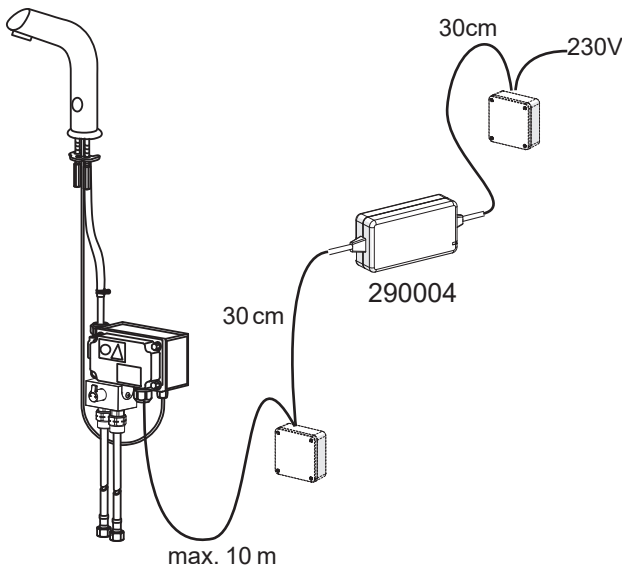
Installation example 1



The transformer 290004 has 30 cm fixed cables on both sides for connection purposes.

- A 230V cable ($2 \times 1.5 \text{ mm}^2$) is brought to the junction box.
- The transformer's own 230V cable is connected to the junction box.
- The transformer's own 24V cable is connected to the faucet control unit.
- Max. 1 faucet per transformer.

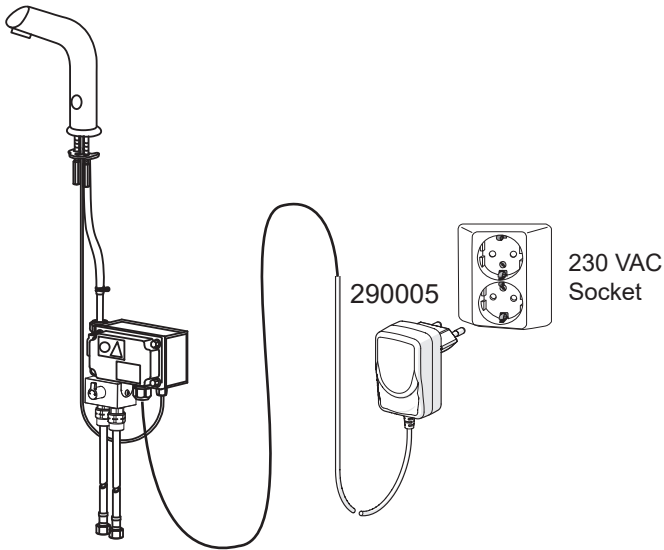
Installation example 2



The transformer 290004 has 30 cm fixed cables on both sides for connection purposes.

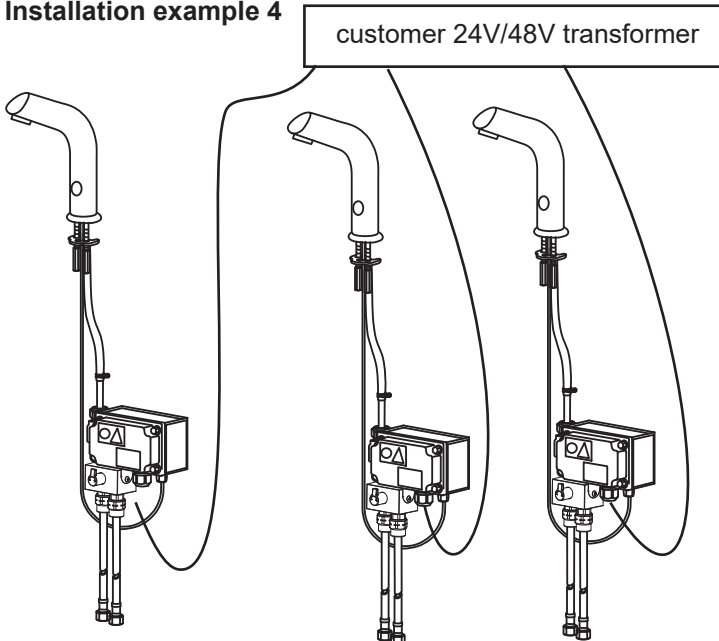
- A 230V cable ($2 \times 1.5 \text{ mm}^2$) is brought to the junction box.
- The transformer's own 230V cable is connected to the junction box.
- The transformer's own 24V cable is connected to the junction box.
- From the junction box, the 24V must be wired to the control unit with cable of which outer diameter is $\varnothing 3-8 \text{ mm}$ ($2 \times 0.5 \text{ mm}^2 / 0.75 \text{ mm}^2$).
- Max. 1 faucet per transformer.

Installation example 3



- The plug-in transformer has a 1.5m long cable.
- A socket is installed near the control unit for connection purposes.
- The plug-in transformer's cable is connected to the connector in the control unit.
- Max. 1 faucet per transformer.

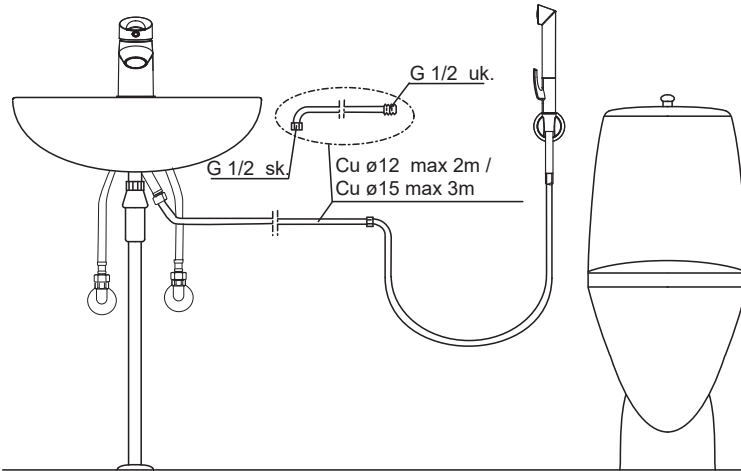
Installation example 4



- Max cable length / (AVG20/0.5 mm²)
24V 50 m
48V 100 m
- Max cable length / (AVG18/0.75 mm²)
24V 100 m
48V 200 m
- Calculate the power output: 20W*number of products
 - From the bus transformer, cabling is done directly to the control units of all faucets using 24V/48V, with an outer diameter of Ø 3-8 mm (2 x 0.5 mm² / 0.75 mm²).



Extended Bidetta Installation



When using an extended Bidetta installation, Oras cannot guarantee the normal operation of the faucets. Bypass flow (water coming from the spout while using the Bidetta hand shower) may occur depending on the specifics of the installation.

Bidetta faucets are designed to function correctly when using the original 1.5 m shower hoses.

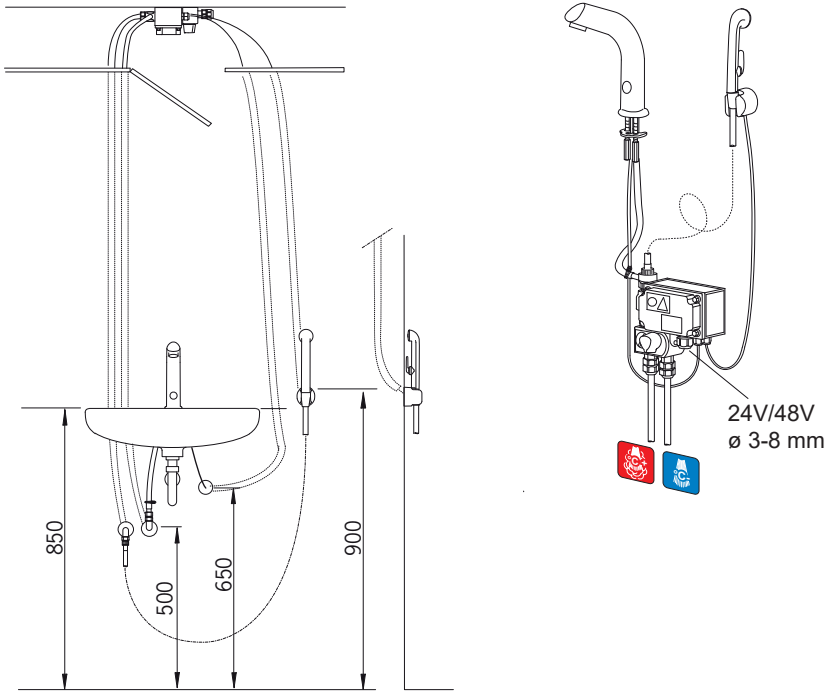
Tip

If the Bidetta hand shower is installed more than 1.5 m away from the faucet, the cable between the holder and the power source must be replaced with a longer one (available in 2, 3, 4, and 5 m lengths). The water supply to the Bidetta hand shower hose can be extended using a pipe, which must be Cu $\varnothing 12$ mm, Cu $\varnothing 15$ mm, or an equivalent PEX pipe. The maximum pipe length is 3 m.

NOTE!

When using extended piping for the Bidetta hand shower, a small amount of water may flow from the faucet's spout when the hand shower is in use. This is due to the increased flow resistance in the hand shower.

Installation Example when the Control Box is to be Placed Outside the Room



- The control box is installed in a suspended ceiling with a service hatch, with the cover facing downwards.
- From the suspended ceiling, pipes are run to the hand shower and spout beneath the sink, where the angle valve boxes are located.
- G 1/2 elbow connectors are used at the angle valves
- Ejector 197068 enables a G 1/2 outlet from the side of the ejector for the spout.
- The outlet for the hand shower from the ejector is G 1/2.
- Protective pipes (PVC 16 or 20) are routed from the suspended ceiling to the hand shower holder and beneath the sink for the photocell cable.
- Photocell cable lengths: 3/6/9 m.
- Hand shower holder cable length: 5 m.
- Shower hose length: 1.5 m.
- The hand shower can be installed on either side of the sink.

Required products from Oras:

6105Z	touchless basin faucet with Bidetta
198081/X	3/6/9 m photocell cable
197033/5	hand shower holder cable 5 m
261998	elbow connector, G 1/2 x G 1/2 2 pieces
197068	ejector G 1/2
198008V	hose connector for spout hose

About Oras Group

Oras Group is a significant European provider of sanitary fittings: the market leader in the Nordics and a leading company in Continental Europe.

The company's mission is to create the smartest water experiences for everyone and its vision is to become the Perfect Flow Company.

The Group has two strong brands, Oras and Hansa. Oras Group is owned by Oras Invest, a family company, and an industrial owner.

The domicile of Oras Ltd, the parent company of the Group, is located in Rauma, Finland, and the Group has three manufacturing sites: Kralovice (Czech Republic), Olesno (Poland) and Rauma (Finland).

The Group operates with its own staff in 17 markets. Oras Group's net sales were 233.5 million euros in 2021 and at the end of the period the company employed 1255 people.

ORAS Ltd
Isometsäntie 2, P.O. Box 40
FI-26101 Rauma
Tel. +358 2 83 161
Fax +358 2 831 6300
info.finland@oras.com
www.oras.com



943495ENG-10-24