

HL 961

Compact assembly station pipes, valves and fittings



Additional information on the fittings via QR code: 3D STEP files, data sheets, extracts from instructions – scan QR code and try

Description

- **space-saving assembly of real piping and plant installations**
- **familiarisation with the parts and components of plant construction in a comprehensive and practice-oriented manner**
- **online access via QR code to digital information on the valves and fittings**

HL 961 is a space-saving exercise and training system which provides an entirely authentic introduction to industrial pipes and valves and fittings. The assembly kit comprises a wide variety of piping elements, valves and fittings, as well as sealing and fastening components.

A compact and mobile mounting frame permits assembly of a variety of piping systems, plant components and functional units. The piping elements are prepared ready for assembly, and matched to installation lengths and flange connections. The components permit multiple assembly and disassembly.

The training system is designed for students to work together in a learning group. The complete process of constructing a system may take several days if all the steps are followed: obtaining information, planning, deciding, executing, checking and assessing.

The detailed instructional material assists in creating an effective and ordered learning process. It contains technical descriptions and drawings of certain system components. Additional information on the valves and fittings is available online via QR code.

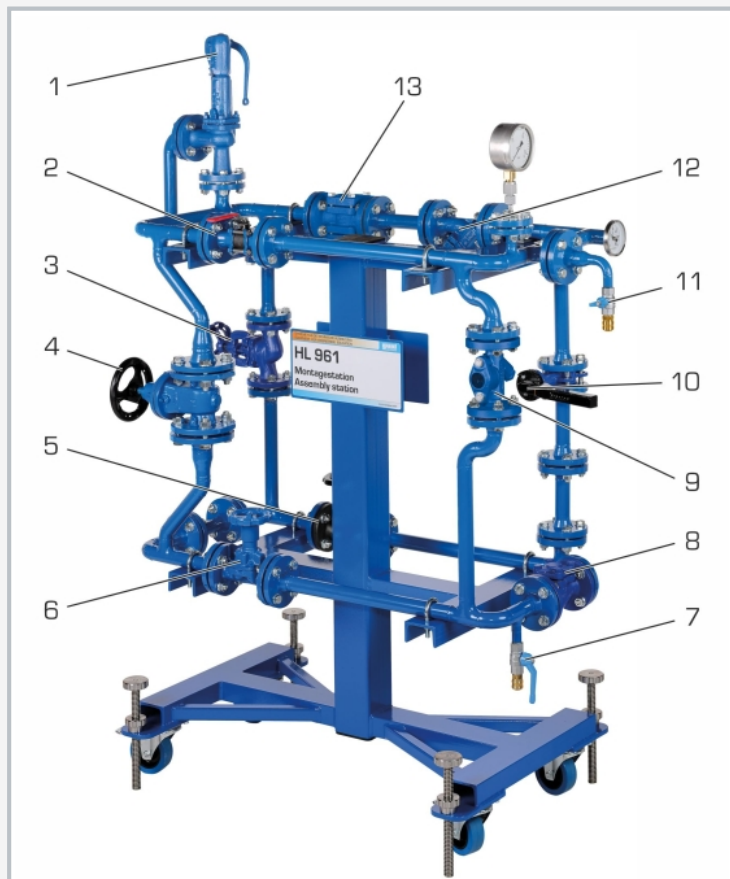
The fully assembled training system can be subjected to a leak test. A hand pump is included in the scope of delivery for this purpose.

Learning objectives/experiments

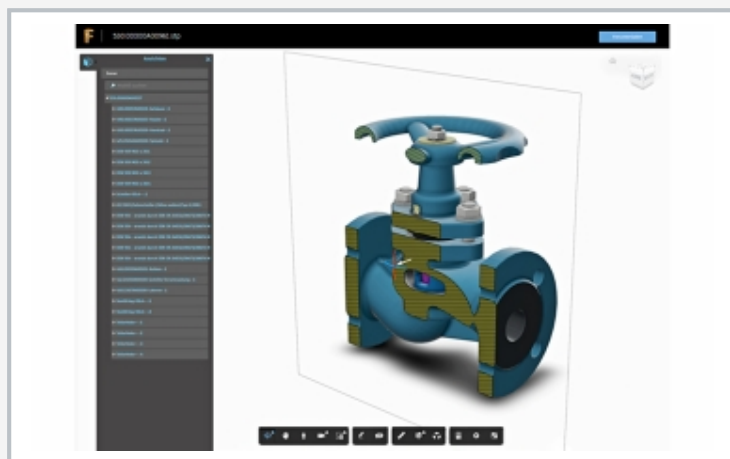
- design and function of valves and fittings, piping elements and system components
- planning of piping and system installations according to specification, e.g. a process schematic
- selection of components and drafting of requirement lists
- technically correct preparation and execution of system assembly
- reading and understanding engineering drawings and technical documentation
- leak test of the fully assembled training system
- digital learning: preparation via QR code with digital information on the valves and fittings

HL 961

Compact assembly station pipes, valves and fittings



1 safety valve, 2 ball valve, 3 shut-off valve, 4 wedge gate valve, 5 piston slide valve, 6 diaphragm valve, 7 ball valve/water connection, 8 non-return valve, 9 steam trap, 10 shut-off butterfly valve, 11 bleeding, 12 strainer, 13 sight glass



Cutting plane in the STEP file

Specification

- [1] assembly exercise for engineering training
- [2] piping network comprising pipe bends, elbows, T-pieces and transitions in nominal widths DN25/DN40
- [3] mobile frame for mounting of pipe network
- [4] pipe connections via flanges
- [5] standard commercially available fittings with flange connections: shut-off valve, diaphragm valve, piston slide valve, ball valve, wedge gate valve, non-return valve, shut-off butterfly valve, safety valve, strainer, sight glass, steam trap
- [6] ball valve for water connection, ball valve for venting
- [7] connection to water supply via hose with coupling
- [8] measuring instruments: manometer, thermometer
- [9] hand pump for leak test
- [10] the kit forms part of the GUNT assembly, maintenance and repair practice line
- [11] online access via QR code with digital information on the valves and fittings

Technical data

Pipe network, 9x pipes, welded, including

- straight pipes
- pipe bends, 90°
- T-pieces
- flanged joints, DN25/DN40

Fittings with flange connections
shut-off valve, diaphragm valve, piston slide valve, ball valve, wedge gate valve, non-return valve, shut-off butterfly valve, safety valve, strainer, sight glass, steam trap

Fittings and measuring instruments

- ball valve for water connection
- ball valve for venting
- manometer
- thermometer

Measuring ranges

- pressure: 0...16bar
- temperature: 0...60°C

LxWxH: 1430x660x1700mm

Weight: approx. 200kg

Required for operation

Water connection and drain via hoses with couplings

Scope of delivery

frame, 1 set of valves and fittings, pipes, piping elements with sealing and fastening material, 1 set of tools, 1 hand pump, 1 set of instructional material