

SystemMobile S61T User guide

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# Symbols, safety



Important information



Observe directions for disposal



Observe directions for disposal



Note! Failure to observe this safety instruction can result in material damage



Warning! Failure to observe this safety instruction can result in material damage, serious injury or death



Caution! Failure to observe this safety instruction can result in material damage, serious injury or death



Caution! Failure to observe this safety instruction can result in material damage or injury



Environmentally hazardous! May pollute the environment – disposal must be handled by an approved specialist company



## General safety information

The details and information in this user guide are provided for the purposes of describing the product and its assembly only. This information does not discharge users from the obligation to conduct their own assessments and checks. It is also important to bear in mind that our products are subject to a natural process of wear and ageing. This guide contains important information that will enable you to use the product safely and appropriately. When sold, rented out or otherwise passed on to another party, this product must be handed over with the user guide. When assembling, operating and maintaining SystemMobile S61T, it is important to ensure that all moving elements are secured so that they cannot be moved inadvertently. Moving parts can cause serious injury! You must therefore read and follow the safety instructions set out below.

All work on and with SystemMobile S61T must be performed with "safety first" in mind.

Do not place your hand within the operating range of the moving components featured in the height-adjustable SystemMobile S61T. Observe the regulations pertaining to accident prevention and environmental protection that apply in the country and workplace where the product is being used.

Use only item products that are in perfect working order. Failure to use original spare parts will invalidate the product warranty!

Check the product for obvious defects. Use the product only within the performance range described in the technical data. Ensure all the safety equipment associated with the product is present, properly installed and in full working order. Do not alter the position of safety equipment, circumvent it or render it ineffective.

- Keep clear of suspended loads.
- Use lifting gear with sufficient load-bearing capacity (see delivery paperwork for product weight).
- · Carefully secure lifting gear.
- Attach lifting gear to the product only at sufficiently stable points.
- Observe environmental conditions.

#### During assembly

Avoid areas that pose slip, trip, fall and jamming hazards. Secure the working area.

#### **During commissioning**

Allow the product to acclimatise for a few hours before starting to use it. Ensure that the partly completed machine satisfies internal company requirements. Only start using a product that has been fully assembled.

### **During operation**

Ensure that only persons who have been authorised by the operator have access to the immediate operating area of the hydraulically height-adjustable SystemMobile S61T. This also applies when the system is not in operation. It must not be possible to actuate moving parts unintentionally. Prevent access below the working surface of the hydraulically height-adjustable SystemMobile S61T. The hydraulically height-adjustable SystemMobile S61T is not suitable for lifting or transporting people.

### **During cleaning**

Close all openings with suitable covers to ensure that cleaning agents cannot penetrate the system. Do not use aggressive cleaning substances. Do not use a high-pressure cleaner for cleaning.

## During maintenance and servicing work

Carry out the prescribed maintenance work at the intervals stipulated in the user guide. Ensure no cables, connections or components are detached or removed. Secure the hydraulically height-adjustable SystemMobile S61T to prevent uncontrolled movement.

### During disposal

Dispose of the product in accordance with the national and international regulations that apply in your country.

### Correct use

SystemMobile S61T is a completed machine within the meaning of the Machinery Directive (2006/42/EC). The hydraulically height-adjustable SystemMobile S61T must be used only in accordance with the technical data and safety requirements set out in this document. SystemMobile S61T is a technical item of factory equipment and is not intended for private use. If major modifications are made, the documentation will need to be renewed or supplemented in accordance with the Machinery Directive.

SystemMobile S61T is a transport and lifting device for making manual ergonomic adjustments with ease. The product is used in industrial environments. SystemMobile S61T must only be operated using suitable hydraulic oil. Internal company requirements and the regulations that apply in the country where the product is being used must be observed. You must not make any design modifications to the hydraulically height-adjustable SystemMobile S61T yourself. We will assume no liability for any resulting damage or injury.

The Declaration of Conformity pursuant to Machinery Directive 2006/42/EC, Annex II, Part 1, Section A for completed machinery can be found on the relevant product page in our Online Shop.

You may only assemble, operate and maintain the hydraulically height-adjustable SystemMobile S61T if:

- You integrate SystemMobile S61T into its surroundings in a proper and safe manner. SystemMobile S61T must only be
  operated in a vertical and upright alignment. The operator is responsible for ensuring the product is properly and safely
  integrated into its operational environment.
- The range of use falls within the performance limits described in the technical data.
- You use SystemMobile S61T in the manner described in the user guide.
- You have carefully read and understood the user guide.
- You are appropriately qualified.
- You are mentally and physically capable of doing so.
- You are authorised to do so by your company.
- You are using only original equipment from the manufacturer.
- You comply with the maintenance intervals.

Unsafe or inappropriate use of the hydraulically height-adjustable SystemMobile S61T runs a risk of serious injury and bruising caused by crushing and cuts.

### Improper use

Improper use is defined as any use of the product for purposes other than those authorised in the user guide and under the definition of correct use. We will assume no liability for any resulting damage or injury.

The following foreseeable types of misuse are expressly classed as improper:

- The foot pedal must not be driven by a motor.
- The attachment or integration of third-party products must trigger a new risk assessment.
- SystemMobile S61T must not be subjected to tensile loads.
- SystemMobile S61T is not suitable for transporting people.
- SystemMobile S61T is not suitable for lifting people.
- SystemMobile S61T is not suitable for private use.
- The intended fastening elements on the preconfigured components must not be replaced.
- Any modification made to the preassembled and preconfigured components shall invalidate the warranty.
- Usage on pallets or tool tables in primary forming and reforming machines
- When physical/chemical effects (vibration, welding currents and similar) could damage the product or its seals.
- Usage on pallets or tool tables that are used to change material properties (magnetisation, radiation, photochemical processes, etc.).



Take note of working areas where separate guidelines apply, particularly with regard to equipment and machinery:

- For use at funfairs and amusement parks.
- In food preparation or where special hygiene stipulations apply.
- For military purposes.
- In mining.
- In potentially explosive and aggressive environments (e.g. ATEX).
- In medical technology.
- In aerospace applications.
- For transporting people.

## Personnel qualifications

Assembly, commissioning, operation, disassembly and maintenance work (including servicing and care) require an adequate knowledge of mechanical and hydraulic engineering and an understanding of the relevant technical terminology. To ensure operational safety, these activities must therefore be carried out only by a qualified person or by trained personnel under the direction of a qualified person. Qualified persons are individuals who – by virtue of their specialist training, know-how, experience and knowledge of pertinent provisions – are able to assess the work that is assigned to them, identify potential hazards and put in place appropriate safety measures. Such qualified persons must comply with the applicable specialist regulations.

## Safety instructions



Observe the safety instructions and handling descriptions in this user guide to avoid personal injury and damage to property.

- Keep this user guide in a place where it can be accessed by all users at any time.
- Observe the regulations pertaining to safety, accident prevention and environmental protection that are applicable in the country
  - where the product is being used.
- Use the item product only when in perfect working order.
- Follow all directions on the product.
- To exclude any risks to people caused by unsuitable spare parts, use only accessories and spare parts that have been approved by the manufacturer.
- Always ensure the product is used correctly.
- You may start up the product only after it has been ascertained that SystemMobile S61T satisfies country-specific provisions and internal company safety regulations.
- Conduct a new risk analysis and assessment for each major modification made to completed machinery.
- Interplay between the product on the one hand and the surroundings on the other can result in risks that only the user is able to identify and minimise, e.g.:
  - Forces generated,
  - Movement generated,
  - Influence of hydraulic and electrical controls,
  - etc.

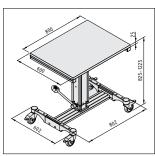
### Personal protective equipment

Wear safety footwear when working on and with the product!

# Product description

The product is used for industrial purposes.

SystemMobile S61T offers stepless height adjustment and manoeuvrability without an electric drive, making it ideal for mobile work benches in environments where there is no direct power source. SystemMobile S61T is adjusted using a foot pedal.



# Operating data

SystemMobile S61T:

Working height: 682 mm to 1082 mm

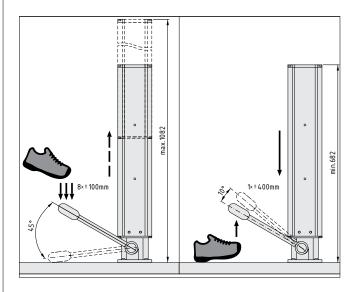
Lift: 400 mm
Restoring force/minimum load: 200 N

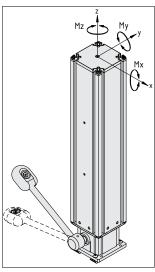
Max. static load: 3000 N (observe maximum bending load)
Max. dynamic load: 1000 N (observe maximum bending load)

Max. moment load Mx, My: 100 Nm (static)
Max. moment load Mz: 50 Nm (static)

Lift per pump actuation: approx. 11-12 mm/pump actuation
Max. lift 400 mm: approx. 36±1 pump actuations

Weight: approx. 39,0 kg









If eccentric loads occur, it is advisable to compensate for these with counterweights. When the product is in its rest position, the maximum moments indicated are permissible, although forces and moments generated by the user must be taken into account. When the product is being raised or lowered, only 50 percent of the maximum values are permissible (dynamic load).

### Service life/cycles:

The hydraulically height-adjustable SystemMobile S61T is subject to regular endurance testing. During these tests, an average of approximately 5000 lift cycles are achieved. One lift cycle is equivalent to the Lift Module travelling up and down.

These tests are carried out under ideal laboratory conditions and provide only limited insight into the actual performance in the ultimate application scenario. Application-specific influences such as side loads, temperatures, soiling and canting have a negative impact on the anticipated performance.

#### Ambient conditions:

Operating temperature range: +5°C to +40°C

Storage temperature: -20°C to +70°C

Relative humidity 5% to 85%

The hydraulically height-adjustable SystemMobile S61T is intended for use in an area that is protected from the weather.

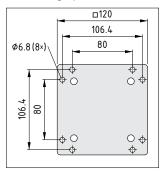
- The area should be free from mould and fungus and show no traces of rodents or other pests.
- Do not set up or use in close proximity to industrial plants that produce chemical emissions.
- Do not set up or use near sources of sand or dust.
- Do not set up or use in an area that is regularly exposed to high-energy surges such as those caused by presses or heavy machinery, for example.
- The product is resistant to many of the substances usually encountered in the production area, such as water, mineral oil, grease and detergents. In case of doubt regarding resistance to certain chemicals such as test oil, alloyed oils, aggressive cleaning substances, solvents or brake fluid, we advise that you contact your local item GmbH branch or distribution partner.
- Avoid long periods of contact with highly acidic or alkaline substances.
- Consult the manufacturer if using in very salty air.

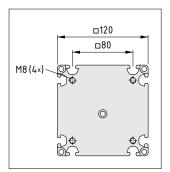
We recommend consulting item Industrietechnik GmbH before using this product in critical areas.

## Assembly and set-up

Checklist	<b>✓</b>
Do not subject the hydraulically height-adjustable SystemMobile S61T to tensile loads.	
When operating the height-adjustment mechanism, ensure no objects (e.g. furniture) or body parts can become trapped.	
To prevent crushing and cuts, nearby objects should be kept at least 50 mm away from the mechanism.	
A minimum safety clearance must be maintained on the ground around SystemMobile S61T to allow for the movement of the foot pedal.	
The travel range and possible collision area around and under SystemMobile S61T must be kept clear, as the structure could otherwise be damaged or tip over.	
Load values must not be exceeded.	
Any unintentional loosening of the connections must be prevented.	
The components must not be exposed to any aggressive chemicals.	
Do not expose SystemMobile S61T to heat, corrosive influences, sharp edges or direct UV radiation (consult your local item GmbH branch or distribution partner if necessary).	

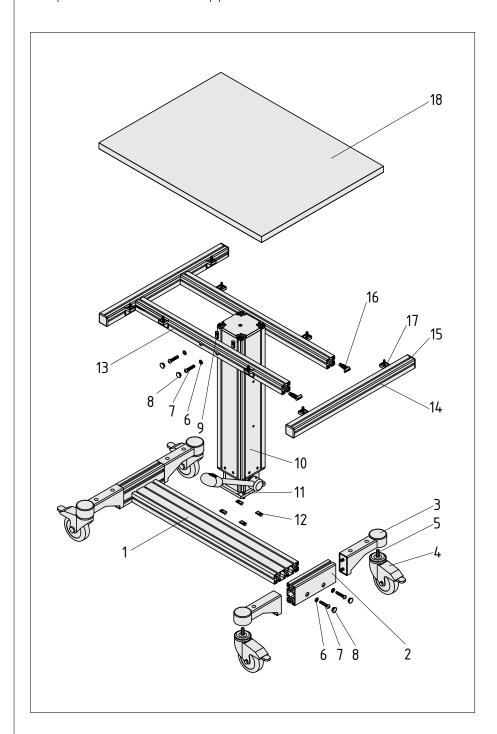
# Assembling SystemMobile S61T





Base plate

Top plate





Position	Article-Number	Name	Remark
1		Profile 8 120x40 light - 700mm	machined
2		Profile 8 80x40 2N light - 200mm	machined
3	0.0.642.76	Castor Support 8 80x40	
4	0.0.602.40	Castor D100 swivel with double-brake	
5		Countersunk screw DIN7991 M10x25 with microencapsulation	Part of Castor Support 8 80x40 Tightening torque: M <sub>A</sub> =40Nm
6		Washer ISO 7092 - 8 -200 HV, bright zinc-plated	
7	8.0.000.10	Button-Head Screw ISO 7380 M8x40 (ULS)	Tightening torque: M <sub>A</sub> =25Nm
8	0.0.492.55	Cap 8 D15	
9	0.0.480.48	T-Slot Nut V 8 St M8	
10	0.0.698.62	Lift Module 8 120x120 HF	
11	8.0.000.08	Button-Head Screw ISO 7380 M6x20 (ULS)	Part of Lift Module 8 120x120 HF Tightening torque: M <sub>A</sub> =10Nm
12	0.0.480.50	T-Slot Nut V 8 St M6	Part of Lift Module 8 120x120 HF
13		Profile 8 40x40 light - 720mm	machined
14		Profile 8 40x40 light - 592mm	machined
15	0.0.627.16	Cao 8 40x40	
16	0.0.388.08	Automatic-Fastening Set 8	Tightening torque: M <sub>A</sub> =14Nm
17	0.0.617.63	Table-Top Fastening Set 8	
18		Table-Top 25 800x600	machined

For ergonomic reasons, it is recommended to assemble the system on a sufficiently large and secure table top.

- To begin with, assemble the basic frame, incl. Castor Supports, Castors and Impact Buffers.
- Ensure all the Castors are locked and that the Lift Module is fully retracted then place the Lift Module on the centre of the basic frame. Screw the Lift Module to the T-Slot Nuts that have been rolled into the grooves, paying attention to the alignment of the foot pedal.
- Now take the longer sections of Profile 8 40x40 and screw them first flush to the Lift Module and then to the shorter profile sections, which should be centred. Use two Automatic Fasteners on the inside and two Caps 40x40 (mallet) for each shorter profile section.
- Align the table top correctly and screw it to the upper frame using Table-Top Fasteners. (Cordless driver, T40 Torx); attach remaining Caps



To ensure the Lift Module is not unintentionally extended, do not pick up SystemMobile S61T by its table top. If the Lift Module is pulled out by hand, the foot pedal must be pumped up to the top end position to vent the system.

Assemble SystemMobile S61T vertically and upright and make sure it is level. This ensures it functions correctly and will prevent premature wear.



When positioning SystemMobile S61T, ensure there is adequate space to operate the foot pedal.



The column profiles (outer/inner) must not be mechanically altered or fitted with additional guides. Overdetermination of the guide leads to premature wear. Connections to the outer Lift Module profile can be made by twisting T-Slot Nuts 8 into the groove or by using Automatic Fastener 8.



Caution: Product may tip when on a gradient and cause injury!

Caution: Eccentric load may cause product to fall over!



The customer must take design steps to prevent any hazards caused by the customer's connecting structure, such as crushing points. Observe the permissible loads. The product must only be subjected to compressive loads. The hydraulic unit in SystemMobile S61T does not need to be vented before use.

# Commissioning and operation

Visually inspect all components before and after installation to rule out potential damage caused during transport and/or installation. Individuals without the proper authorisation are not permitted to disassemble system components.

If components are found to be damaged, please contact your local item GmbH branch or distribution partner.



Caution: Failure to observe instructions in the user guide can result in injury.

Caution: Injury caused by improper use, incorrect use and misuse!

Users are permitted to operate the product only after they have read and understood the user guide, particularly the "Safety instructions" section.

Elements of this product move during use.

Injuries can occur if the product is not used correctly or within its technical performance parameters. If any changes occur to the product that compromise its safety, the user is obligated to report them immediately to the safety officer or the person who is responsible for safety and stop using the product.

Caution: Injury caused by raising or lowering movement!

Reaching into the travel range while the product is raising or lowering is prohibited.

#### Raising

The raising motion is generated by the inner, hermetically sealed hydraulic lifting unit and foot pedal. A piston is used to pump the oil into a plunger cylinder. To raise the top plate, press the foot pedal down by approximately 30° several times. A reset spring returns the foot pedal to its starting position.

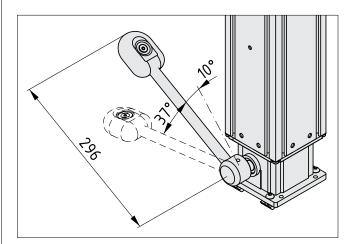


Caution: It is advisable to use a limit stop for the foot pedal. Attempting to depress the foot pedal beyond the lower stop when pumping it exerts stress on the pin in the connection between the pedal and column and can result in damage.

### Lowering

To lower the top plate, lift the foot pedal by approximately 10°. This allows the weight of the user application to force the oil out of the plunger cylinder and back to its reservoir. The top plate will sink down.





SystemMobile S61T must be incorporated into its working environment to suit the relevant application and in line with internal company regulations.

- In every situation, you must ensure that the product will not tip over and the load is securely positioned when travelling around curves, over ramps and on slopes.
- Secure the load to suit the anticipated stresses.
- SystemMobile S61T is suitable for pushing around and positioning loads weighing up to 300 kg (static) or 100 kg (dynamic). Caution: Observe bending load.
- SystemMobile S61T is designed to be moved at walking pace.
- A minimum load of approx. 10 kg, which is achieved by the table top in the intended application, is required to lower the system.
- To ensure the system is used safely, we recommend the use of Handles Al 550 (0.0.644.02).

## Maintenance and servicing work



Warning notice for maintenance work.

Before commencing maintenance work on the system, ensure that it is unloaded and retracted. Stabilise the work bench/application where the system is located. This avoids the risk of potential personal injury and material damage during maintenance work.

This information does not discharge users from the obligation to carry out their own assessments and checks. It is also important to bear in mind that our products are subject to a natural process of wear and ageing.

When maintaining SystemMobile S61T, it is important to ensure that all moving elements are secured so that they cannot be moved inadvertently. Rotating and moving parts can cause serious injury!

All work on and with SystemMobile S61T must be performed with "safety first" in mind.



Visual checks and functional tests should be performed regularly according to the level of utilisation and environmental conditions. Due to the way the hydraulic cylinder works, the entire Lift Module will need to be replaced if it stops functioning properly and is no longer able to complete its task.

Please contact your local item GmbH branch or distribution partner.

Take note of the following maintenance instructions:

Maintenance work	Frequency	Person responsible
Cleaning, visually inspecting SystemMobile S61T and checking the Lift Module Checking the smooth running properties and the rolling behaviour of the castors	Daily	User
Checking the screw fittings, retightening them if necessary. Checking the Lift Module	Half-yearly inspections	Expert
Checking the wear on the guide unit based on play in the guide. If play is more than 0.5 mm, the Lift Module must be replaced.	Half-yearly inspections	Expert
<ul> <li>Checking for smooth operation over the entire travel range when under a light load</li> <li>Lift the foot pedal until the table top is fully lowered.</li> <li>Secure the test weight to the table top (15 kg).</li> <li>Press down on the foot pedal several times until the table top is fully raised.</li> <li>Lift the foot pedal until the top plate is fully lowered.</li> </ul>	Yearly	Expert



Maintenance work	Frequency	Person responsible
Checking the hold valve of the inner lifting unit when under load		
Caution: If the product's table top sinks down on its own, stop using the product!		
Lift the foot pedal until the table top is fully lowered.	Yearly	Expert
<ul> <li>Secure the test weight to the table top (100 kg).</li> </ul>		
<ul> <li>Press down on the foot pedal several times until the table top is fully raised.</li> </ul>		
• The table top must not sink down on its own.		
Checking for smooth operation over the entire travel range when under load	Yearly	Expert
Repair Repair work must be carried out only by item GmbH.	In the event of damage	item GmbH branch/distri- bution partner

The following cleaning work is to be carried out on the mechanical components on a regular basis:

- Cleaning using cleaning cloths or rags.
- Lightly greasing the metallic components (e.g. plates, guides, etc.).

## Disposal



The product can be recycled or re-used (after any necessary refurbishment and replacement of components). The use of appropriate materials and easy dismantling ensure the product can be recycled.



Improper disposal of this height-adjustable application can pollute the environment.

Please therefore dispose of the height-adjustable SystemMobile S61T in full accordance with the laws of your country. Caution: Environmentally hazardous. The disposal of individual components must be handled by an approved specialist company due to the potential for environmental pollution.

Always follow the local statutory regulations and provisions when disposing of electrical and electronic components (e.g. travel measuring systems, sensors, etc.).



Environmentally hazardous

The disposal of individual components must be handled by an approved specialist company due to the potential for environmental pollution. Individual materials must be disposed of in accordance with the applicable directives and regulations and environmental conditions.

Special attention must be given to the disposal of components that contain residues of hydraulic fluids. The disposal instructions in the safety data sheet must be observed. The safety data sheet can be found on the relevant product page in our Online Shop.

# Hydraulic oil

The widely sold HLP32 V hydraulic oils are made by Shell.

The following details are provided by the manufacturer. The complete safety data sheet can be found on the relevant product page in our Online Shop. If you have any questions, please contact your local item GmbH branch or distribution partner.

Shell Tellus Oil 32

Product code 001B0667

InfoSafe No. ACKQ4DE/ger/deu/C
Issued date 29 April 2004
Product Type/Use Hydraulic oil
Supplier Shell Deutschland

Emergency Tel. +49 (0)40-6324-5110

## Warranty

Warranty: 12 months. The warranty covers free delivery of parts or complete units ex-works. However, this is conditional on receipt of a written notice from the customer that includes a description of the fault. The replaced parts must be returned to item Industrietechnik GmbH within six weeks for inspection, otherwise the cost of the replacements and their shipping will be charged.

Start of warranty: Day of delivery, but no later than three months after delivery!

## Documentation and development

A process of continuous product development ensures that products from item Industrietechnik GmbH always exhibit a high standard of innovation. Consequently, there could be inconsistencies between this guide and the product you have acquired. item Industrietechnik GmbH can also not exclude the possibility of errors. We therefore ask for your understanding that the information, illustrations and descriptions provided here cannot constitute an entitlement to any claims. You can find the latest version of this user guide at item24.com.

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