User’s Manual
for the Hawk Wheelchair

Wolturnus A/S recommends that you read this manual before using the wheelchair.
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Hawk

Wolturnus - wheelchair for activ use - user manual 2016

Hawk

Wolturnus - wheelchair for activ use - user manual 2016
1 Introduction

1.1 Foreword

This user’s manual provides users and helpers with essential information about the design, functions, use and maintenance of the Wolturnus Hawk wheelchair for children and adults. The manual contains the information necessary to ensure safe use of the wheelchair. It contains troubleshooting information with solutions (where/if applicable). The Hawk wheelchair is an easy-propulsion active wheelchair made by high-strength aluminum. The wheelchair’s design makes it easy for the user to operate the chair independently. The Hawk wheelchair is custom-built according to the user’s instructions. This ensures that the wheelchair meets the individual user’s requirements. Because the back can be folded and both the rear wheel and side panels are removable, the Hawk is easy to transport. The Hawk wheelchair is ideal for users who want to have an active daily life, indoors and outdoors.

The instructions in this manual are essential for safe and correct use of the wheelchair. Before starting to use it, it is important that both the user and helper read these instructions carefully - paying special attention to the safety instructions. Furthermore, the information provided ensures that the user gets the optimum advantage of the Hawk wheelchair’s features and functions. Keep this user’s manual throughout the lifetime of the wheelchair: it contains information to future questions and it contains guidelines for adjusting and adapting the chair.

This user’s manual has been produced in accordance with DS EN82079-1 ‘Preparation of instructions for use - Structuring, content and presentation’. It is divided into sections. The heading on each page contains the title of the overall section. The footer of each page displays the page number, year, and site of origin of the user’s manual. It also includes the wheelchair’s model.

1.2. Intended Use

The Hawk wheelchair is designed for individual mobility both indoors and outdoors. It is only suitable for persons who are unable to walk or have a mobility problem. Only equipment specified in this user’s manual may be used with the Hawk wheelchair, and vice versa. Wolturnus A/S does not guarantee this product if it is used with accessories or products from manufacturers other than those specified as part of the modular system.

Use of the Hawk wheelchair for any purpose other than the aforementioned will be considered incorrect. In the event of incorrect use, the user - i.e. not the manufacturer - is liable for resulting damage to persons or property.

The Hawk wheelchair may only be used by experienced users. For personal protection and in order to ensure that the Hawk wheelchair is used safely and correctly, it is a requirement that the user and helpers receive training and instructions prior to use of the Hawk wheelchair. To ensure that the Hawk wheelchair is used correctly it has to be operated exclusively as described in this user’s manual. The user bears full responsibility for accident-free use.

1.3 Usage

The Hawk wheelchair’s modular design and versatility makes it suitable for users who have difficulties walking or who have a mobility handicap as a result of:

• Paralysis
• Loss of limbs (leg amputation)
• Limb defects or deformities
• Damaged or defective limbs
• Other illnesses

When adapting the wheelchair for the user, the following should be taken into account:

• Body, height and weight (max. load 120 kg.)
• Physical and mental constitution
• Age
• Residential circumstances
• Surroundings

1.4 Service

In the event of questions or problems that cannot be solved using this user’s manual, please contact Wolturnus A/S customer service at (+45) 9671 7170.

Wolturnus A/S strives to provide full assistance to its customers in every respect. For Wolturnus A/S contact information and a list of service locations - go to section 13 in this manual.

If the Hawk wheelchair has to be returned for repairs we offer to loan you a temporary wheelchair. For further information, please contact Wolturnus A/S.
1.5 CE compliance
The Hawk wheelchair meets the requirements of the European Commission Directive 93/42/EEC for medical devices. The product is classified as a Class 1 on the basis of the classification criteria for medical devices in accordance with section IX of the directive. It follows that Wolturnus A/S has therefore, as manufacturer with sole liability, made a declaration of conformity in accordance with appendix VII of the directive.

1.6 Liability
Wolturnus A/S' warranty only applies if the product is used in accordance with the specified circumstances, purpose and instructions. The frame is covered by a 5-year warranty. Other parts manufactured by Wolturnus are covered by a 2-year warranty. Parts that are designed and manufactured by a third-party manufacturer and mounted on a Wolturnus wheelchair are covered by a Wolturnus A/S warranty that is equal to the warranty provided to Wolturnus A/S by the third-party manufacturer.

Wolturnus A/S is not liable for injury or damage caused by:
• Components and parts that are not authorised by Wolturnus A/S.
• Alteration to the original surface treatment.
• Repairs or alterations to the wheelchair that are not carried out by Wolturnus A/S. All warranty repairs has to be carried out by Wolturnus A/S.
• Incorrect use of the wheelchair (e.g. playing basketball or rugby), or loads that exceed the construction or specified maximum for the wheelchair (in accordance with directive 93/42/EEC for medical devices).
• Circumstances in which the wheelchair is used by any party other than the original owner/user.
• Circumstances involving bad weather or dangerous situations, or in general all types of predictable negligence.
• Lack of maintenance.
• Cleaning with agents that contain acid or alkaline products, with high-pressure equipment or similar.

To keep updated about this product e.g. regarding new features, safety notice, product recalls check www.wolturnus.dk. Contact information and overview concerning all of Wolturnus's products are available at the website - or by contacting Wolturnus A/S customer service at (+45) 9671 7170.

1.7 Returns
In the event that the Hawk wheelchair has to be returned to the supplier or to Wolturnus A/S, e.g. for repairs, it must be transported in its original packaging for optimum protection. It follows that Wolturnus A/S recommends that the original packaging is retained throughout the lifetime of the wheelchair.
2 Safety

2.1 Symbols

**WARNING!**
Warning concerning danger of serious accident or injury

**CAUTION!**
Warning concerning danger of accident or injury

**NOTICE**
Warning concerning danger of technical damage

**INFORMATION**
Operational and service information

2.2 Standards and Directives

All safety information in this user’s manual is based on applicable national laws and regulations in the EU. For other countries, a declaration of conformity with applicable laws and national regulations is required.

In addition to the safety instructions contained in this user’s manual, the user must be familiar with and must comply with applicable regulations from professional associations, concerning accident prevention and regarding environmental protection. All information contained in this user’s manual must be complied at all times without limitations. The Hawk wheelchair is constructed in accordance with applicable regulations. The Hawk wheelchair safety level is approved by CE certification and a declaration of conformity.

2.3 General Safety Instructions

- The wheelchair may tip over.
- The Hawk active wheelchair must only be used according to instruction in this manual.
- The Hawk active wheelchair must only be used by trained users and must not be used by any other person than the user.
- The Hawk active wheelchair must only be used to transport one person at a time.
- All safety instructions in this user’s manual and all other relevant documentation must be kept and complied with throughout the lifetime of the chair. The user’s manual must always be available to the user.
- The back and seat upholstery is inflammable, but can be ignited. There extreme care must be taken when in vicinity of flammable items and fire i.e. lit cigarettes.
- To avoid discomfort when using the chair, damaged back or seat upholstery should be replaced as soon as possible.
- Do not force the wheelchair over obstacles when using it on slopes.
- The Hawk wheelchair must not be used on stairs.
- Avoid getting in or out of the wheelchair while on slopes.
- The hip strap (accessory) provides the user with extra stability. It must never be used as a part of the strap attachment system when securing the chair for transport in a vehicle.
- Do not force the wheelchair forward on slopes exceeding 7°.
- Do not park on slopes that exceed 7°, even when the brake pads are activated.

2.4 Safety Requirements for Transport, Assembly and Storage

- Only suitable lifting mechanisms must be used when transporting the wheelchair.
- The wheel locks must be activated when transporting the wheelchair using a lifting platform in situations in which the wheelchair has to be stationary, e.g. in lifts, buses, trains etc.
- The wheelchair must be placed in the middle of the platform and all components - e.g. the anti-tip device - and must be clear of any obstacles and their like if these are in risk of being tangled into the wheelchair during transport.
- When adjusting and adapting the chair, all attachment features - such as screws and nuts - must be fastened according to the instructions in this manual.
- The wheelchair is not intended to be used as a seat when in a motor vehicle.
- For transport in vehicles we recommend that, whenever possible, the user is transferred to the vehicle’s own seats and uses the vehicle’s own safety belts. If this is not possible, It follows that the user must remain in his/her chair an approved, mounted docking system in the vehicle must be utilized.
2.5 Safety Requirements in Usage

- The user and helpers must always ensure that the chair and its safety features are in a proper and safe condition before using the chair.

- The Hawk active wheelchair must be inspected by a Wolturnus-authorised specialist at least once a year in order to ensure that the chair is in proper working order and safe to use.

- The chair must immediately cease to be used if any feature is defective or not operational or if any other circumstance arises which could lead to injury.

- Before starting to use the Hawk active wheelchair, all mechanical adjustments (positioning the seat, accessories, etc.) must be carried out in accordance with the user's individual preferences, prerequisites and abilities. These adjustments may only be carried out by specialists authorized by Wolturnus.

- 120 kg is the maximum load for the Hawk active wheelchair. It must not be exceeded.

- The wheelchair's tires must be inspected visually before use to ensure that there is sufficient tread depth and correct tire pressure. The correct pressure is printed on the tire.

- When used on public roads, the user must obey applicable traffic rules.

- The wheelchair should not be used on slippery surfaces (e.g. ice) or on very rough terrain (e.g. on gravel or small stones).

- When getting in and out of the wheelchair, the user's full weight should not be placed on the footrest or armrests. These cannot bear full body weight.

- Change direction at reduced speed only.

- The wheelchair must only be lifted by gripping the frame parts. Do not grip the footrest or armrests to lift the chair.

- The wheelchair must not be exposed to extreme temperatures, to high humidity or to environments with chlorine (e.g. in saunas or at swimming pools).

- The wheelchair's surface temperature can raise if it is exposed to extreme heat, e.g. in strong sunlight for an extended period of time. There is also a risk of very low surface temperature in the event of extremely cold weather.

- The anti-tip device should be used when travelling on uneven terrain or where hurdles are present. New users are advised to use the anti-tip device at all times.

- Never place fingers between the rear wheel spokes or between the rear wheel and the wheel locks. Caution is advised when travelling through narrow passages.

2.6 User Requirements

- Before starting to use the wheelchair, the user and any helpers must read the user's manual thoroughly and be familiar with its contents.

- The Hawk active wheelchair must only be used by trained users. To ensure this, the user and any helpers has to receive instruction in use of the chair from Wolturnus-authorised specialists.
### 2.7 Type Labels

A type label is attached to the wheelchair. The type label includes the following information:

<table>
<thead>
<tr>
<th>Icon</th>
<th>Information</th>
</tr>
</thead>
<tbody>
<tr>
<td>![image]</td>
<td>Manufacturer and production site</td>
</tr>
<tr>
<td>![image]</td>
<td>The wheelchair's year of production</td>
</tr>
<tr>
<td>![image]</td>
<td>The Model or the type name of wheelchair</td>
</tr>
<tr>
<td>![image]</td>
<td>The serial number of the wheelchair</td>
</tr>
<tr>
<td>![image]</td>
<td>The maximum allowed weight of the user</td>
</tr>
<tr>
<td>![image]</td>
<td>The wheelchair is not intended to be used as a seat in a motor vehicle</td>
</tr>
<tr>
<td>![image]</td>
<td>The wheelchair is intended to be used as seat in a motor vehicle</td>
</tr>
<tr>
<td>![image]</td>
<td>Read the user's manual before using the wheelchair</td>
</tr>
</tbody>
</table>

The type label is placed on the cross tube under the seat facing forward as shown on image 1.

![Image 1 Location of the Type Label](image1.png)
3 Product Description

The Hawk active wheelchair is ideal for users who want to have an active daily life both indoors and outdoors. It can be adapted in various ways, which allows the user to adjust the wheelchair to meet individual preferences and requirements.

The Hawk wheelchair is designed for easy and quick adjustments. It is ideal for new users who need to make continual small adjustments. For example: A new user may find that maximum stability is achieved when the back axle and rear wheel are located relatively far back. A practised user may prefer to have the back axle and the rear wheel located closer to the front casters to reduce weight on the former. This makes the chair easier to manoeuvre because the primary weight is placed on the back axle and rear wheels. The Hawk wheelchair adjustment features are described in section 6 of this manual.

The rear wheel and side panels can be removed and the folding back can be folded down in a locked position. This makes the Hawk wheelchair easy to transport and store. Due to this safety feature of the folding back the Hawk wheelchair can be lifted using the back column.

Because of the Hawk wheelchair’s modular design: additional equipment and accessories can be purchased and retrofitted - e.g. the Wing Back ILSA system. A range of accessories are described in section 7 of this manual. The entire range of accessories, spare parts and additional equipment can be seen at the Wolturnus A/S web shop at www.wshoppen.dk.
4 Delivery and Preparations before Usage

4.1 Delivery
The delivery covers:
• The Hawk wheelchair with main components
• The user’s manual
• Selected accessories (Accessories range. Go to section 7 in this manual)

INFORMATION
The range of accessories are determined by the product configuration that the user chooses when ordering the wheelchair.

WARNING!
The wheelchair may tip over. Wolturnus recommends to use the anti-tip device at all times.

Wolturnus A/S delivers the Hawk wheelchair ready for use. All configurations that are part of the order have been made or will be set up upon delivery by the supplier or a consultant. The Hawk wheelchair is adapted to meet the user’s personal preferences and requirements.

The wheelchair’s functions can be tested by following the instructions in section 6 in this manual.

Troubleshooting: see section 9.

4.2 Preparation before Usage
Before starting to use the Hawk wheelchair, it must be inspected to ensure that it is complete (checklist image 3, page 21) and that all functions are in proper working order. Wolturnus A/S delivers the Hawk wheelchair ready for use.

Main Components (Image 3):
1. Frame with back support and seat
2. Rear wheels
3. Casters
4. Side panels with/without armrest
5. Wheel locks
6. Footrest
5 Transport and Storage

5.1 Transport

For transport or storage, the rear wheels can be removed and the Hawk wheelchair folded. This makes it easy to handle and saves space:

- Fold the side panels down into the seat or remove them, depending on the mounting method.
- Tip the back into the locked position. Ensure that the back is correctly locked on both sides.
- Remove the rear wheels by pressing the Quick-Release in the wheel nave. Then pull off the wheel.

Because the Hawk wheelchair’s back can be locked into a folded position, the chair can be lifted by the back column while folded. The Hawk wheelchair should be kept in a dry place and not exposed to humid conditions. For long-term storage, the wheelchair must be covered to protect it from dust.

5.2 Transfer

The method of transfer to and from the chair is individually selected reflecting the preferences of the user. The most common method is transferring from the side or the front. The following description is based on transfer without third-party help and from one wheelchair to another.

- Place the wheelchair beside and as close to the other seating surface as possible - preferably at a 90° angle.
- Apply the wheel locks on both chairs, when transferring from one wheelchair to the other wheelchair.

- Move the feet from the footrest and place them on the ground.
- Move from the chair close to the other seat. The method of actual transfer will vary from user to user. Use the method that works best.
Transport and storage

When transferring for the first time and until the user gets used to transferring, it is recommended to have a helper present.

**CAUTION!**

*Risk of damage due to overload.*

When getting in and out of the chair, the user must neither place full body weight on the footrest nor the armrests.

**CAUTION!**

The wheel locks must be applied during transfer.
6 Adjustments and Setup

6.1 Adjustable Features

**CAUTION!**

**Risk of accident due to loose screws**

After loosening any threaded screws, they must be replaced with new screws or secured once more with a medium-strength thread paste (e.g. EuroLock A24.20). After making adjustments to the wheelchair, all screws and all nuts must be tightened correctly.

The Hawk wheelchair can be adjusted in various ways. When delivered, the height, width and angle of the seat and the back have been positioned in accordance with the customer's order as received by Wolturnus A/S.

**The Following is Adjustable By the User:**
- The back height, depth and angle
- The seat height, depth and angle
- The armrests and the arm cushion
- The position of the balance point
- The footrest's height and angle
- The height of the anti-tip device
- The wheel lock position
- Caster angle and change of caster and front fork

6.2 Tools

The following tools (Image 16) are necessary for adjustments and settings described in this section:

- A 4 mm Allen key
- A 5 mm Allen key
- 8 mm Allen key
- A 10 mm single-head wrench
- A 13 mm single-head wrench
- A torque wrench
- A measuring tape, a foot rule or a ruler

**NOTICE**

Damaged tools or incorrect use of tools can result in injury or in damage to the chair.
6.3 Adjustment of the Back Angle
The back angle can be raised or lowered in 4° ranges. To adjust the back angle do the following:

- Extend the anti-tip device. This will ensure that the wheelchair does not tip over if the back is angled too far backwards.
- Loosen and remove the bottom bolt that secures the back and the locking bracket (Image 17).
- Move the bolt to one of the other notches in the plate. To pull the backrest further towards you, place the bolt further back. To lean the backrest further back, move the bolt forward.
- Mount and tighten the bolts. Repeat the process on both sides.

When the back angle is folded it is adjustable. The back must be upright during the adjustment.

- Loosen and remove the bracket that locks the back into the folded position (Image 18).
- Turn the small plate which creates a cylindrical hole in the opposite end of the oval opening, and mount the bracket again.
- Repeat the process on both sides, and check that the back is properly locked after adjustment.

When the seat and/or the back upholstery straps have been adjusted, the wheelchair’s point of gravity may have shifted, which may create a risk of backward tipping. Therefore, after adjusting the seat and/or the back upholstery, check the point of gravity and, if necessary, adjust it before using the chair. (See section 6.10).

**WARNING!**

Ensure that the back angle is adjusted equally on both sides and that, after adjustment, the back locks correctly into place both when upright position and folded position.

6.4 Adjusting the Back Depth and Form
The back’s form can be adjusted to suit the individual user’s requirements for support and balance. The Velcro straps under the back upholstery are used to adjust the back’s form.

- Fold up the back of the backrest upholstery to make the Velcro straps visible (Image 19).
- Loosen or tighten individual straps so that the back’s form suits the user’s requirements (Image 20).
- Fold down the back upholstery and secure it to the straps.

Adjustments to the back form and depth affects the benefit the user gets from the chair substantially. Wolturnus A/S recommends that the form and the depth are initially adjusted with assistance from a Wolturnus A/S consultant or from the user’s therapist.

**WARNING!**

When the seat and/or the back upholstery straps have been adjusted, the wheelchair’s point of gravity may have shifted, which may create a risk of backward tipping. Therefore, after adjusting the seat and/or back upholstery, check the point of gravity and, if necessary, adjust it before using the chair. (See section 6.10).
6.5 Adjusting the Back Height
Back height is steplessly adjustable to meet the requirements and preferences of the user.
• Use a 5 mm Allen key to loosen the clamp on the base of the back (Image 21).
• Adjust the back tube to the desired height. Ensure that both back tubes are set at the same height (Image 22).
• Tighten the clamp.

6.6 Adjusting the Seat Length
When delivered, the seat length has been adjusted according to the measurement provided in the customer’s order form, but it can be adjusted if required.
• Remove the seat cushion and release the seat cover from the straps. (Image 23).
• Push or pull the seat cover into the desired position (Image 24).
• Fasten the seat cover on the straps and mount the seat cushion.

6.7 Adjusting the Seat Depth and Form
• Remove the seat cushion and loosen the seat cover from the Velcro straps (Image 25).
• Release the Velcro straps and loosen/tighten them if required, then fasten them (Image 26).
• Mount the seat cover and finally tighten the front strap that is sewn into the seat cover itself.
• Mount the seat cushion.
6.8 Adjusting the Armrest Height

- Lift of the armrest and use a 5 mm Allen Key to remove the bolts that mount the baluster on the side panel (Image 27+28).
- Mount the baluster to the the desired height; then tighten the bolts.

6.9 Adjusting balance point

The wheelchair’s point of gravity and stability can be changed by moving the rear axle forward or backward. By moving the rear axle and therefore the rear wheels forwards, the load on the casters is lightened. Hence it easier to tilt the wheelchair up on the rear wheels. Practised users will find that this makes the wheelchair easier to manoeuvre. Moving the rear axle backwards makes it harder for the chair to tilt up on the rear wheels. The distance between the casters and the rear wheel is increased, which increases the stability during propulsion.

**CAUTION!**

For safety reasons, the wheelchair is delivered with the rear axle placed far back. New users should not adjust this until they are experienced in using the chair.

**CAUTION!**

To prevent the wheelchair from tipping backwards unintentionally; it is recommended that the user always has a helper positioned behind the wheelchair while trying out the balance point adjustments.

Adjusting the Rear Axle:

- Use the Quick-Release mechanism to remove the rear wheels (Image 29).
- Move the wheel locks forward ensuring that they are not in the way as the rear wheels are remounted. Having adjusted the rear axle; the wheel locks must be adjusted again to ensure that the wheel locks are positioned correctly before usage (see section 6.15).
- Use a 5 mm Allen key to loosen the two bolts on the bracket that fastens the rear axle to the frame. Loosen them enough to allow the rear axle with console slide back and forward on the frame (Image 30).
- Find the desired position. Use a foot rule or ruler to check that the distance between the rear axle and the back edge is equal on both sides (Image 31).
- Use a 5 mm Allen key to tighten the bolt with a torque wrench. (Tension 10 Nm/7.4 ft.lbf/88 in.lbf.)
- Mount the rear wheels and adjust the wheel locks as described in section 6.15 (Image 32). Make sure the Quick-Release mechanism is locked correctly; it audibly clicks when correctly in place.
6.10 Adjusting the Footrest Height

- Use a 5 mm Allen key to loosen the front frame clamp on both sides until the footrest is able to be freely slid up and down (Image 33).
- Raise or lower the footrest to the preferred height. Make sure that the footrest is even, e.g. not lop-sided (Image 34).
- Tighten the clamp. (Tension 4 Nm/3,0 ft.lbf/35 in.lbf.) If the clamp is too tight, it can bend the frame.

6.11 Adjusting the Footrest Angle

- Use a 4 mm Allen key and 10 mm single-head wrench to loosen the nuts on the bracket underneath the foot plate (Image 35).
- Turn the foot plate until it is at the desired angle.
- Tighten the nuts.

6.12 Adjusting the Foot Plate Position

The foot plate itself is adjustable can be moved further backward or forward.

- Use a 4 mm Allen key and 10 mm single-head wrench to loosen the bolts on the foot plate, then remove the foot plate (Image 36).
- Mount the foot plate in the second set of foot plate notches. It is also possible to turn the foot plate 180° so the front edge becomes the back edge (Image 37).
- Mount and tighten the bolts.

CAUTION!

Never place full body weight on the footrest.
6.13 Adjusting the Anti-tip Device

When extended, the anti-tip device prevents the wheelchair from tipping backwards. When making adjustments that can affect the balance point and distribution of weight, the anti-tip device should be extended.

- The height of the anti-tip device can be adjusted by loosening the bolt with a 5 mm Allen key (Image 38).
- When it is at the correct height, tighten the bolt.

Standard height from floor to anti-tip device wheel: 60-70 mm (image 39).

**CAUTION!**

Never use the anti-tip device as a pedal or lever.

Misuse could damage the spring function in the anti-tip device. This will make the anti-tip device defective, which can be dangerous for the user.

**WARNING!**

The wheelchair may tip over. Wolturnus recommends to use the anti-tip device at all time.

6.14 Adjusting wheel locks

The Hawk wheelchair is supplied with push wheel locks as standard. The push wheel locks are activated by pressing forwards and can be operated by the user. The push wheel locks are mounted on the wheelchair frame. Other types of wheel locks are mounted in the same way, so the following adjustment instructions can also be used for them.

If the balance point and therefore the position of the rear wheels is changed, or if the wheel size is changed, the wheel locks must be moved and adjusted at the same time. The wheel locks must be moved forward before changing the balance point or rear wheels. After adjusting the balance point or changing the wheels, the wheel locks must be correctly adjusted.

- Use a 5 mm Allen key to loosen the two bolts in the console that fastens the wheel locks to the front-frame (Image 40).
- Move the wheel locks forward and tighten the console lightly so the wheel locks are not in the way.

**CAUTION!**

Ensure the correct tire pressure.

Ensure the tires have the correct pressure before using the chair. The maximum air pressure limit is marked on the side of each tire. It must always be minimum 3.5 bars (350 kPa) on the rear wheels. Like push wheel locks, knee-lever wheel locks are only effective when the air pressure is sufficiently high and when the wheel locks are correctly positioned. (When locked, the brake pad should push the tire in 5 mm (allowing for technical alterations).

**Before adjusting the balance point or changing wheels:**

- Use a 5 mm Allen key to loosen the two bolts in the console that fastens the wheel locks to the front-frame (Image 40).
- Move the wheel locks forward and tighten the console lightly so the wheel locks are not in the way.

**After adjusting the balance point or changing wheels:**

- Loosen the wheel locks.
- Move them backward so the brake pad, when activated, presses sufficiently on the tire. This procedure ensures that the wheelchair is properly locked. As a rule, the brake pad should press the tire at least 5 mm (Image 41).
- Tighten the bolt. Mount the axle and the bolts. (Tension 10 Nm/7.4 ft.lbf/88 in.lbf.)

It is vital that the left and right wheel locks have the same position. Use a foot rule, a measuring tape or a ruler to check that the wheel locks has the same degree of friction when activated.

---

Adjustment and set-up

Before adjusting the balance point or changing wheels:

- Use a 5 mm Allen key to loosen the two bolts in the console that fastens the wheel locks to the front-frame (Image 40).
- Move the wheel locks forward and tighten the console lightly so the wheel locks are not in the way.

After adjusting the balance point or changing wheels:

- Loosen the wheel locks.
- Move them backward so the brake pad, when activated, presses sufficiently on the tire. This procedure ensures that the wheelchair is properly locked. As a rule, the brake pad should press the tire at least 5 mm (Image 41).
- Tighten the bolt. Mount the axle and the bolts. (Tension 10 Nm/7.4 ft.lbf/88 in.lbf.)

It is vital that the left and right wheel locks have the same position. Use a foot rule, a measuring tape or a ruler to check that the wheel locks has the same degree of friction when activated.
6.15 Adjusting the Seat height

The seat height can be adjusted; e.g. if the user wants a different seat height than the one already setup or wants changes to a different wheel size but wants to retain the same seat height.

Changing to a higher or lower seat height

- Fold the back down, remove the rear wheels and turn the wheelchair over (Image 42).
- Use a 5 mm Allen key to loosen the clamp on the caster mounting bracket and remove the rear axle console (Image 43).
- Loosen and remove the spacing axle between the rear axle console and the frame console. If there is no spacing axle, the rear axle will be directly joined to the frame console (Image 44).
- Mount the spacing axle correctly on the frame console. Make sure the axle is tightened sufficiently (see chart for correct relationship between seat height and rear wheel size.)
- Mount the rear axle console and tighten the clamp.
- Repeat on the opposite side of the wheelchair. Make sure that the spacing axles are mounted in the same way so the seat height is even - i.e. not lopsided.

Changing the wheel size and retain the seat height

- Follow the aforementioned procedure.
- Use two 5 mm Allen keys to loosen and remove the bolt and the axle that mounts the caster in the front fork.
- Move the caster up a notch in order to lower the seat height, or a down a notch to raise the seat height, or change to another size caster (Image 45). Or change the caster with front fork (see section 6.19)
- Mount the axle and bolts. (Tension 10 Nm/7.4 ft.lbf/88 in.lbf.)

<table>
<thead>
<tr>
<th>Rear wheels</th>
<th>Spacing axle</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>0 mm</td>
</tr>
<tr>
<td>22” (radius 275 mm)</td>
<td>387.5 mm</td>
</tr>
<tr>
<td>24” (radius 300 mm)</td>
<td>412.5 mm</td>
</tr>
<tr>
<td>25” (radius 312 mm)</td>
<td>425 mm</td>
</tr>
<tr>
<td>26” (radius 325 mm)</td>
<td>437.5 mm</td>
</tr>
</tbody>
</table>

Tabel 1: Theoretical chart - correlation between the seat height, the rear wheel size and the connecting axle length.

6.16 Adjusting the Seat Angle

The seat angle can be adjusted in two ways. The caster can be adjusted, which changes the seat height to the front and thus the seat angle. The rear wheel can be adjusted, which changes the seat height to the rear and thus the seat angle.

Adjusting seat height to the front

To adjust the seat angle, the caster size can be changed. A larger caster raises the seat height to the front. A smaller caster lowers the seat height to the front.

Caster change: when only the caster is being changed, follow the instructions in section 6.16; when caster and front fork are being changed, follow the instructions in section 6.19.
Adjustment and set-up

Adjusting seat height to the rear
The seat angle can also be changed either by changing to larger or smaller rear wheels or by changing the spacing axle as described in section 6.16.
A larger spacing axle or rear wheel raises the seat height to the rear. A smaller spacing axle or rear wheel lowers the seat height to the rear.

**WARNING!**
During adjustment of the seat height and/or angle, the wheelchair’s point of gravity may have shifted, which may create a risk of backward tipping. Therefore, after adjusting the back, check the point of gravity and, if necessary, adjust it before using the chair. (See section 6.10).

6.17 Adjusting the Caster Angle
The caster angle may need adjustment if the caster size is changed or moved to another notch in the front fork.
- Use a 5 mm Allen key to loosen the four inner bolts on the caster casing (Image 46).
- Turn the caster and the bearing housing with cap. Use a bubble level to ensure that the front fork is vertical (Image 47).
- Tighten the bolt. (Tension min. 10 Nm/7.4 ft.lbf/88 in.lbf.)

6.18 Changing Caster with Front Fork
- Remove the four bolts in the caster casing and remove the bearing housing cap with a 5 mm Allen key (Image 48).
- Use a 12 mm Allen key to remove the nut. Keep a grip on the caster so it doesn’t swivel (Image 49).
- Pull out the fork with caster and push the new one into place (Image 50).
- Tighten the nut. Do not tighten the nut too much; it must still be possible to rotate the front fork easily in the caster casing.

**NOTICE**
To avoid obstruction, ensure that the caster and front fork are vertical.
7 Accessories and Equipment

A wide range of accessories and equipment are available for Wolturnus active wheelchairs. The most popular accessories are described in this section. The full range of accessories and order information are available at the Wolturnus A/S web shop at www.wshoppen.dk.

7.1 Height-adjustable Push Handles

Height-adjustable push handles can be chosen when ordering the wheelchair or purchased subsequently for retrofitting. If retrofitted, a bracket will be included as a replacement for the clamp on the back base.

Retrofitting height-adjustable push handles

- Loosen and remove the back upholstery.
- Remove the Velcro straps just above the back column and remove the clamp on the back base on both sides (Image 52).
- Mount the bracket and triangle. The triangular plate with slots is used when mounting with Velcro straps. Use a 5 mm Allen key to tighten the bolts (Image 53).
- Mount the back tubes and the push handles in the bracket. Position them at the preferred height and then tighten the grip.
- Mount the Velcro straps in the triangular bracket and place the back upholstery over the straps.

7.2 Wing Back Multi-adjustable ILSA System

The Wing Back ILSA system, developed by Wolturnus A/S, is a combined ergonomic support system for trunk and back that can be optimised. It can be used to meet a wide range of individual seating position requirements.

The Wing Back ILSA system is exceptional because the upper part of the back can be adjusted for depth, width and height and also function as a side/body support. Independent of one another, the left and right sides are steplessly adjustable. Hence asymmetric adjustment is possible.

7.3 Wheel Locks

The Hawk wheelchair is supplied with push wheel locks as standard. A range of different wheel locks is available. These can be chosen when ordering the wheelchair or subsequently purchased for retrofitting. The full range of wheel locks can be seen at the Wolturnus A/S web shop: www.wshoppen.dk.

7.4 Upgrading the Rear Wheels, the Push Rims and the Tires

The rear wheels and the is upgradable to stronger, technically more advanced models e.g. Synergy rear wheels and titanium push rim or Schwalbe Marathon or MTB puncture-proof tires. The full range of rear wheels, push rims and tires can been seen at the Wolturnus A/S web shop at www.wshoppen.dk.

7.5 Upgrading the Casters

Aluminum casters are available. Depending on the wheelchair’s current wheel type, it may be necessary to replace both the caster and front fork. The full range of casters can be seen at the Wolturnus A/S Web shop at www.wshoppen.dk.

7.6 Quick-Release axle with tetra-grip for rear wheels

The Quick-Release mechanism with tetra-grip makes it easier for, for example, tetraplegics to release the Quick-Release and remove the rear wheels. Further information is available at the Wolturnus A/S web shop at www.wshoppen.dk.
7.7 Quick-Release Axles for Casters
If quick caster changes are required, a Quick-Release axle can be mounted in the front fork. Further information is available at the Wolturnus A/S web shop at www.wshoppen.dk.

7.8 Side panels
The Hawk active wheelchair is supplied with Dibond side panels as standard. A range of other side panels made of different materials, with and without mudguard, is available. The full range of side panels can be seen at the Wolturnus A/S web shop at www.wshoppen.dk.

7.8 Thermal Bridge Insulation for Side Panels
To insulate in order to prevent thermal bridges, the side panels can be covered with neoprene. Aluminum side panels are particularly well-suited for this treatment since aluminum conducts heat. Neoprene can either be glued on or secured with Velcro. Templates for custom-made side panels are retained at Wolturnus A/S ensuring that the right neoprene cover can be recreated in the future.

7.9 Frame Protectors
Frame protectors are available to protect the front part of the frame from impact and scratches. Frame protectors are folded tightly on to the frame and secured with built-in Velcro straps. They can be purchased at the Wolturnus A/S web shop www.wshoppen.dk.

7.10 Spoke Protectors
Spoke protectors prevent fingers from getting caught in the spokes during propulsion. A wide range of spoke protectors is available with a choice of neutral or patterned designs. The full range of spoke protectors can be seen at the Wolturnus A/S web shop at www.wshoppen.dk.

7.11 Calf-support Straps for Adjustable-by-Angle Footrests
Calf-support straps prevent the feet from sliding off the footrest. The straps are adjustable to ensure that the user’s feet are correctly placed on the footrest. To adjust depth, loosen or tighten the Velcro on the calf-support strap.

7.12 Bags
Catheter bags are available in three leather models:
- Catheter bag for mounting on the back
- Small catheter bag for mounting under the seat
- Large catheter bag for mounting under the seat

The catheter bag range can be seen at the Wolturnus A/S web shop at www.wshoppen.dk.

7.13 Seat Cushions
Seat cushions are available in various models and in the required size and thickness. The seat cushion range is available at the Wolturnus A/S web shop at www.wshoppen.dk.

7.14 Straps, Belts and Fasteners
A range of straps and belts for different uses is available. The hip strap is one of the most used ones. It is recommended for usage when the wheelchair is in motion, ensuring that the user does not fall out. The full range of straps and belts can be seen at the Wolturnus A/S web shop at www.wshoppen.dk.

If the wheelchair is not delivered with a hip strap this can be mounted afterwards. The hip strap kit for retrofitting consists of a hip strap, two clamps for mounting around the seat tube plus bolts and the required number of nuts
- Fit a clamp on the tube of the seat frame against the wheelchairs back in each side
- Mount the hip strap-clamp and tighten it with the bolts included
8 Cleaning and Maintenance

8.1 Maintenance
Each time the wheelchair is used, operational parts, and particularly wheel locks, should be checked to ensure that they are in proper working order. After being loosened 2-3 times when making adjustments or changing parts, self-locking nuts should be replaced.

The following table gives an overview of how to maintain the chair.

<table>
<thead>
<tr>
<th>Component</th>
<th>Functions and Inspection</th>
<th>daily</th>
<th>month</th>
<th>1/4 year</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tires</td>
<td>Tires visibly pumped</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Tires unamaged</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Test/adjust tire pressure (see side of tire)</td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td></td>
<td>Check thread depth (min. 1 mm)</td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>Rear wheel</td>
<td>Directional stability during use</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Wheels rotate freely without misalignment</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Nuts on rear wheel mounting bracket are tight</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Caster</td>
<td>No front fork obstruction</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Wheels rotate freely without misalignment</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Axle bolts correctly tightened</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Cap bolts correctly tightened</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Folding back</td>
<td>Fasteners are not obstructed</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Nuts and bolts are tightened</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>The pawl locks correctly in the bracket</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Footrest</td>
<td>All locking mechanisms are in working order</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>No obstructions or damage</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Upholstery</td>
<td>No damage or wear to upholstery</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Securing straps function</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Seat and back upholstery correctly positioned</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Wheel locks</td>
<td>Wheel locks in working order</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Correct wheel lock pressure on tire(s) (5 mm)</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Side panels and</td>
<td>Arm rest cushion is not loose</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>armrests</td>
<td>Side panel and armrest mounting nuts and bolts are tightened.</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Screws</td>
<td>All nuts and screws are tightened</td>
<td></td>
<td>X</td>
<td></td>
</tr>
</tbody>
</table>

In the event of faults or missing parts, contact the supplier or Wolturnus A/S. Contact information, go to section 13.

Wolturnus A/S recommends that the Hawk wheelchair is serviced at least once a year by the supplier or Wolturnus A/S.

8.2 Cleaning and Disinfection

The wheelchair should be cleaned regularly according to how often it is used and how dirty it is.

Clean the frame, plastic parts and wheels with a mild cleaning agent. After cleaning, dry all parts with a dry cloth.

Clean cushions and upholstery with warm water and washing-up liquid. Remove stains with a sponge or a soft brush. Rinse afterwards with clean water and allow the parts to dry before mounting and using.

To disinfect, use water-based agents and follow the manufacturer’s instructions.

Do not use corrosive cleaning agents, solvents or hard brushes.

Do not wet-wash. Do not use high-pressure equipment or a water jet. The wheelchair components must not be put in a washing machine.

Clean the seat and back upholstery, cushions, handles and armrest before disinfecting.
8.3 Changing a Tire

If a tire is punctured, the user or a helper may be able to change it without assistance. The procedure requires having strong hands, practical ability and suitable tools. It is advisable to have a puncture repair kit and an air pump for emergencies (excluding situations with-proof tires). Suitable air pumps, puncture repair kits or puncture sprays that fill the tire with expanding foam can be purchased at most bicycle shops.

Removing tires and tubes
- Gently pull the tire edge over the edge of the rim with a tire lever (or two, if it is sitting very tightly). Take care not to damage the rim or the tube (Image 56).
- Screw off the valve nut and pull the valve out from the rim and the rim strap.
- Pull out the tube from between the tire and the rim (Image 57).

Repair and check-ups
- Repair the tube according to the instructions in the repair kit or replace it with a new tube.
- Before remounting the tire and tube, make sure that no foreign objects that may have caused the puncture are caught in the rim or tire.
- Ensure that the tire band is intact. It protects the tube against damage from the spokes.
- Push the tube into place between the tire and the rim.

Mounting tires
- Gently pull the clear tire edge over the edge of the rim. Starting with the valve.
- Check that there are no twists at all in the tube, otherwise air can get out.
- Work the whole way around until the last section of the tire edge is taut and can be edged into place with one or two levers.

Pumping
- Check on both sides that the tube is not caught between the tire edge and rim.
- Push the valve lightly in and pull it out again to make sure that it is not caught on the tire edge.
- Fill the tire with air to the point where it is still possible to press it in with a thumb. If the control lines on both sides of the tire indicate the same distance to the rim edge, the tire is centred. If the tire is not centred, let some air out and adjust the tire until it is centred. Now pump up the tire to its maximum working pressure (see the side of tire) or at least 3.5 bars (350 kPa). Then screw the dust cap on, tightly.

CAUTION!
Ensure that the tires have the correct pressure before using the chair. The maximum air pressure limit is marked on the side of the tire. It must always be on a minimum of 3.5 bars (350 kPa) on the rear wheels. Like push wheel locks, the knee-lever wheel locks are only effective when the air pressure is sufficiently high and when they are correctly positioned. (When locked, the brake pad should push the tire in 5mm (allowing for technical alterations).
## 9 Troubleshooting

During routine maintenance, it may be necessary to make adjustments or repair faults. In most cases, the solution to the problem can be found on the following list:

<table>
<thead>
<tr>
<th>Problem</th>
<th>Solution</th>
<th>Reference</th>
</tr>
</thead>
<tbody>
<tr>
<td>The caster makes noise or is resistant</td>
<td>Check if there is dirt between the fork and caster or dirt in the fork ball-bearings. Clean off the dirt and tighten the screws. If they do not roll freely, change the ball-bearings.</td>
<td>Section 6.16, Section 6.19</td>
</tr>
<tr>
<td>The front fork shakes</td>
<td>Loosen and remove the bearing housing cap. Then tighten the nut to a degree where the front fork with wheel can still rotate easily. Make sure that the caster is vertical.</td>
<td>Section 6.19</td>
</tr>
<tr>
<td>The rear wheel makes a loud clicking noise</td>
<td>Check and tighten the spokes and the push rim mounting screws. Check that nothing is pushing against the rear wheel or the rear wheel’s spokes.</td>
<td></td>
</tr>
<tr>
<td>Rear wheel resistance</td>
<td>Check if the rear wheel is misaligned. Check if, for example, the side panel or another part is pushing against the rear wheel. Check if the rear wheel bearings are worn down and need replacement.</td>
<td></td>
</tr>
<tr>
<td>Loud clicking noise</td>
<td>Check and tighten the screws in the rear wheel and caster mounting brackets</td>
<td>Section 6.10, Section 6.19</td>
</tr>
<tr>
<td>The footrest is lopsided</td>
<td>Check that the foot plate is horizontal and adjust the footrest height.</td>
<td>Section 6.11-13</td>
</tr>
<tr>
<td>The wheel locks do not work properly</td>
<td>Check that both wheel locks are correctly positioned. Inspect the rear wheel tires for wear and tear, and for faulty tire pressure.</td>
<td>Section 6.15, Section 8.3</td>
</tr>
</tbody>
</table>

If the problem cannot be solved with the aid of the troubleshooting section, contact the supplier or Wolturnus A/S. Contact information, go to section 13.
## Technical Specifications

<table>
<thead>
<tr>
<th>Weights and Measures</th>
<th>SB 350</th>
<th>SB 375</th>
<th>SB 400</th>
<th>SB 425</th>
<th>SB 450</th>
<th>SB 475</th>
<th>SB 500</th>
</tr>
</thead>
<tbody>
<tr>
<td>Seat Width (SW) (mm)</td>
<td>350</td>
<td>375</td>
<td>400</td>
<td>425</td>
<td>450</td>
<td>475</td>
<td>500</td>
</tr>
<tr>
<td>Total Width (TW) (mm)</td>
<td>515</td>
<td>540</td>
<td>565</td>
<td>590</td>
<td>615</td>
<td>640</td>
<td>665</td>
</tr>
<tr>
<td>Seat Width - adjustability</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>Seat Depth (SD) (mm)</td>
<td>350-410</td>
<td>350-450</td>
<td>350-500</td>
<td>350-500</td>
<td>350-500</td>
<td>350-500</td>
<td>350-500</td>
</tr>
<tr>
<td>Seat Depth - adjustability</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Seat Height (SH) (mm)</td>
<td>380-500</td>
<td>380-500</td>
<td>380-500</td>
<td>380-500</td>
<td>380-500</td>
<td>380-500</td>
<td>380-500</td>
</tr>
<tr>
<td>Seat Height - adjustability</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Back Height (BH) (mm)</td>
<td>300-500</td>
<td>300-500</td>
<td>300-500</td>
<td>300-500</td>
<td>300-500</td>
<td>300-500</td>
<td>300-500</td>
</tr>
<tr>
<td>Back Height - adjustability</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>(Back) adjustment by Angle</td>
<td>+/-4º</td>
<td>+/-4º</td>
<td>+/-4º</td>
<td>+/-4º</td>
<td>+/-4º</td>
<td>+/-4º</td>
<td>+/-4º</td>
</tr>
<tr>
<td>Locking of Back when Folded</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Front Frame Model (U/UV)</td>
<td>U/UV</td>
<td>U/UV</td>
<td>U/UV</td>
<td>U/UV</td>
<td>U/UV</td>
<td>U/UV</td>
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</tr>
<tr>
<td>Turning Radius (mm)</td>
<td>600</td>
<td>600</td>
<td>600</td>
<td>600</td>
<td>600</td>
<td>600</td>
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</tr>
<tr>
<td>Tara-weight with Rear Wheels (kg)</td>
<td>11</td>
<td>11</td>
<td>11</td>
<td>11</td>
<td>11</td>
<td>11</td>
<td>11</td>
</tr>
<tr>
<td>Tare-weight without Rear Wheels (kg)</td>
<td>7</td>
<td>7</td>
<td>7</td>
<td>7</td>
<td>7</td>
<td>7</td>
<td>7</td>
</tr>
<tr>
<td>User Weight</td>
<td>Max. 120 kg</td>
<td>Max. 120 kg</td>
<td>Max. 120 kg</td>
<td>Max. 120 kg</td>
<td>Max. 120 kg</td>
<td>Max. 120 kg</td>
<td>Max. 120 kg</td>
</tr>
<tr>
<td>Rear Wheel Camber</td>
<td>0º - 3º</td>
<td>0º - 3º</td>
<td>0º - 3º</td>
<td>0º - 3º</td>
<td>0º - 3º</td>
<td>0º - 3º</td>
<td>0º - 3º</td>
</tr>
<tr>
<td>Balance Point adjustability</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>(Optional) Securing in Vehicles</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>(Optional) Arm Rest</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>(Optional) Anti-tip Device</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
</tbody>
</table>

NB: Max. user weight 120 kg will not usually be relevant when choosing a narrow seat width.

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Technical data
11 Instruction for Usage

11.1 Instructions for Reuse

The Hawk active wheelchair is suitable for reuse by a subsequent new owner. Since the wheelchair is individually custom-made, it is essential that the chair’s measurements and equipment are tailored to suit the new user. It follows that it is important to ensure that the chair’s functions and features have not been altered to a degree that could create a safety risk for the new user or any third parties during the lifetime of the chair.

Based on market studies and on its knowledge of contemporary technology, Wolturnus A/S has calculated that the Hawk active wheelchair, when used, serviced and maintained in accordance with the original instructions, has a lifetime of 5 years (excluding time kept in storage by an authorised dealership or the user). Note that with careful care and proper use, the Hawk active wheelchair can be used for a longer period than the defined lifetime.

Prior to reuse, the wheelchair must be carefully cleaned and disinfected. Then the product must be inspected by an authorised specialist to assess its condition, wear and tear, and damage. All worn or damaged parts and components that do not suit or are not designed for the new user must be replaced. This user’s manual includes a service plan (see maintenance chart section 8) and detailed information about the Hawk wheelchair.

11.2 Disposal

The Hawk wheelchair is delivered in a brown cardboard box that can be handed into to recycling centres or cardboard collection points. The protective bubble wrap on the frame must be disposed of as combustible waste. The aluminum frame must be disposed of as metal. The upholstery and side panels must be disposed of as combustible waste.

12 Environment

Wolturnus A/S strives to respect the environment as far as possible. An assessment has been done to determine the Hawk wheelchair’s effect on the environment during its life cycle. During development, materials and forms are chosen that minimise waste of energy and material during production.

Wolturnus A/S has a unique approach to individual user’s measurement and to the subsequent special design of the chair to meet the user’s needs, preferences and requirements. Combined with the wheelchair’s mechanical quality, this ensures that the user can use the wheelchair for many years. The Hawk wheelchair lifetime is calculated to be approximately 5 years if maintained according to the instructions in this user’s manual. The long lifetime limits the wheelchair’s effect on the environment.

Furthermore, meticulous quality control throughout the production process ensures that faults are rare, which limits the need to use superfluous resources on repairs or replacement products.

Generally, all functions, working processes and labor at Wolturnus A/S are carried out with respect for the environment. Aluminum residue after the production process is collected in containers and delivered for recycling. During the mounting process, the usage of hazardous agents is kept to a minimum. Furthermore all work processes meet occupational safety requirements (APV). The usage of all materials is continually optimized to ensure minimum waste.
13 Manufacturer and Service Locations

Service Locations
Authorised distributors representing Wolturnus A/S in other countries:
• Finland: Respecta - (www.respecta.fi)
• The Netherlands: Double Performance - (www.doubleperformance.nl)
• New Zealand: Euromedical - (www.euromedical.co.nz)
• Spain: Batec Mobility - (www.batec-mobility.com)

After-sales spare parts are available for all Wolturnus wheelchairs.

In Denmark, authorised sales consultants throughout the country are in direct contact with Wolturnus A/S about spare parts, service and repairs.

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Website: www.wolturnus.com
Webshop for purchasing equipment and spare parts: www.wshoppen.dk