



ADVANCE SUCCESS<sup>4</sup>

Manual Edition 1 / 11\_2016



# Contents

Thank you for flying ADVANCE. . . . .	4	Takeoff and Landing/Balance Strap System . . . . .	26
About ADVANCE . . . . .	5	Using the speedbar . . . . .	26
SUCCESS 4 – Safety & Comfort first . . . . .	6	Flying with the foot stirrup . . . . .	26
Outstanding features . . . . .	6	Flying with ballast. . . . .	27
Features at a glance. . . . .	7	Use for training . . . . .	27
Protectors at a glance . . . . .	9	Winching . . . . .	27
Safety information . . . . .	10	Acro flying . . . . .	27
General recommendations about paragliding . . . . .	10	Tandem flying. . . . .	27
Other brand paragliders. . . . .		Landing in water. . . . .	28
Preparing the product . . . . .	11	Maintenance, repairs and care. . . . .	29
Delivery . . . . .	11	Care and maintenance. . . . .	29
Delivery package . . . . .	11	Check. . . . .	30
Adjusting the harness. . . . .	12	Repairs. . . . .	30
Fitting the foot stirrup. . . . .	16	Disposal . . . . .	30
Attaching the cockpit . . . . .	16	Technical Data . . . . .	31
Installing the reserve. . . . .	17	Material description . . . . .	32
Compatibility check . . . . .	24	Service. . . . .	33
General. . . . .	25	ADVANCE Service Centres . . . . .	33
Ground handling. . . . .	25	The ADVANCE website . . . . .	33
Clipping in . . . . .	25	Warranty. . . . .	33
Takeoff preparation and check. . . . .	25		
Use in practice . . . . .	25		

# Thank you for flying ADVANCE

Congratulations on your choice of an SUCCESS 4 – a quality product from ADVANCE. We hope that you will spend many rewarding hours in the air with it.

This user manual is an important part of the harness. Here you will find instructions and important information about safety, care and maintenance, and that's why we recommend that you read this document carefully before your first flight.

Register your SUCCESS 4 online on [www.advance.ch/warranty](http://www.advance.ch/warranty); you will then receive product updates or safety-related bulletins about the SUCCESS 4 direct from us. This information will also be available to download from our website at [www.advance.ch](http://www.advance.ch), as will the latest version of this manual and further updated information.

If you have any further questions or problems please contact your dealer or get in touch directly with ADVANCE.

Now we wish you a lot of enjoyment with your SUCCESS 4, and always «happy landings».

Team ADVANCE

# About ADVANCE

ADVANCE, based in Switzerland, is one of the world's leading paraglider manufacturers. Since it was founded in 1988, the company has consistently pursued its own directions and concepts, both in development and production. The results are quality products with distinctive characteristics.

Behind the ADVANCE brand name is a team of specialists who share the passion and trust in the company's products. At home in the air themselves, they contribute their valuable personal experience and dedication to the working processes.

Total control of the production process and supervision of the working practices at the ADVANCE factory in Vietnam ensure a high standard of workmanship. Long term relationships with fabric and line manufacturers means that ADVANCE knowledge and expertise also finds its way directly into the development of new materials.

ADVANCE attaches great importance to after-sales customer support, and has built up a worldwide service network for this purpose. An on-going interaction with its customers brings in a steady flow of new knowledge that finds its way into ADVANCE products, thus completing the «Circle of Service».

# SUCCESS 4 – Safety & Comfort first

## **Maximum Safety – maximum Comfort**

The SUCCESS 4 is more than just a new addition to the popular SUCCESS family: its outstanding level of safety - far exceeding the general protector certification criteria – makes it something special. Its perfect seating geometry and a stylishly clean silhouette recommends this modern sports harness to those leisure and cross country pilots who value comfort combined with low aerodynamic drag.

## **Outstanding features**

### **Three protectors for maximum safety**

SUCCESS 4 safety reaches new heights: the main protector extends far up the lower back. From there another foam protector continues up the spine. For the first time side impact protection from German protector manufacturer SAS-TEC is included in the design.

### **Very comfortable thanks to perfect seat geometry**

The SUCCESS 4 specialises in maximum comfort. The latest 3D development methods have produced a harness which fits the human frame to ergonomic perfection. Two foam protectors and the familiar ADVANCE comfort foam support not only the lumbar region, but all of the back in flight.

### **Tailored outline for ideal aerodynamics**

The SUCCESS 4 scores with an exceptionally compact shape and slender silhouette, even though there are two additional protectors inside. A smooth and stress-sharing design guarantees the cleanest aerodynamics - for a total weight from only 3.9 kilos.

## Features at a glance

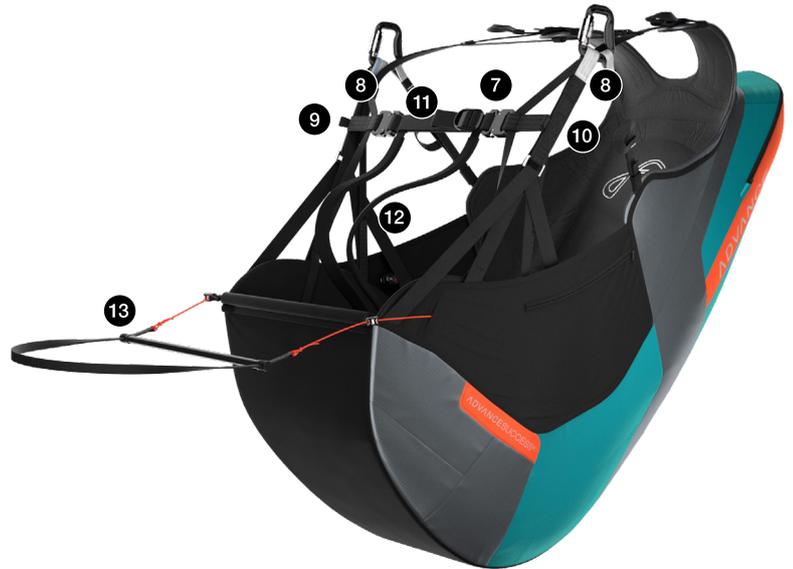
### Side view

- 1 Shoulder strap Velcros (e.g. for a Solario)
- 2 Reserve V-connection channel with zip
- 3 Drink tube opening
- 4 Pocket inside for drink system
- 5 Outer container with Labyrinth closure
- 6 2 side pockets: 1 zip-up outside pocket (left), 1 inside mesh pocket (right)



### Front view

- 7 Popular 2-buckle closure system
- 8 Easy Connect System
- 9 Attachment for optional foot stirrup
- 10 Cockpit or front container attachment
- 11 Markings on the straps for basic settings
- 12 Neoprene covers on the leg straps
- 13 Speed system with carbon speedbar



## Protectors at a glance

A LTF (91/09) certified main protector, additional lumbar and mid spine protectors (both multi-chamber foam) together with visco-elastic SAS-TEC side protection give the SUCCESS 4 a degree of impact defence far in excess of the general certification criteria.

- 1 Main protector
- 2 Additional lumbar and thoracic spine protection
- 3 SAS-TEC side protectors
- 4 Comfort foam
- 5 Carbon seatboard



# Safety information

Like all commercially available reserve parachutes, paraglider harnesses are never suitable for free fall parachuting because their design and construction details do not allow such a thing. Neither the reserve parachute nor its attachments to the harness can withstand the loadings involved in an abrupt opening.

All harness adjustments should be made before the harness is flown. Correct adjustment of the SUCCESS 4 greatly contributes to safety, correct function and comfort in flight.

No protector can offer complete protection against injury. The SUCCESS 4 multi-chamber-foam protectors and SAS-TEC crash defence can only absorb some of the energy of impacts and therefore minimise injuries that might result from unlucky takeoffs and landings.

When carrying out safety training over water, thought should be given to the fact that the air in a foam protector makes it float, and turn the pilot head down. Then there's the risk that foam parts will eventually fill with water and sink, with the pilot.

SUCCESS 4 certification is restricted exclusively to paraglider sport.

## **General recommendations about paragliding**

Taking part in paragliding sport requires appropriate training and a comprehensive knowledge of the equipment, as well as the necessary insurance and licences. A pilot must be able to correctly assess the weather conditions at the chosen site before taking off. His abilities must be sufficient for the demands of the selected paraglider.

The wearing of an adequate helmet, suitable footwear and clothing, and the carriage of a reserve parachute are all essential. Before every flight all items of equipment must be checked for damage and airworthiness. A pre-takeoff check must always be carried out.

While engaged in paragliding every pilot bears sole responsibility for all risks, including those resulting in injury and death. Neither the manufacturer nor the seller of a paraglider can guarantee the safety of a pilot, or be held responsible for it.

# Preparing the product

## Delivery

Before delivery every ADVANCE product has to be checked by the dealer for delivery package contents and correct initial settings. A completed warranty form makes sure that deficiencies of the product, attributable to the manufacturer, are covered by the ADVANCE warranty (see under “Warranty” in the section “Service”).

We ask you to complete this form on the ADVANCE website under “Warranty”, within 10 days of purchase.

## Delivery package

Delivery of a SUCCESS 4 harness contains:

- SUCCESS 4 with carbon seatboard
- 1 EN/LTF certified foam protector (LTF 91/09) and 1 lumbar/upper back foam protector
- 2 side SAS-TEC impact shields
- Comfort foam for the back
- Speed system with carbon speedbar
- 2 Alu carabiners

- Reserve connection, and four-flap inner container with reserve handle attached
- Holdback bungees for speedbar
- Getting started booklet

### Optional:

- Foot stirrup

## Adjusting the harness

The SUCCESS 4 is easy to adjust.

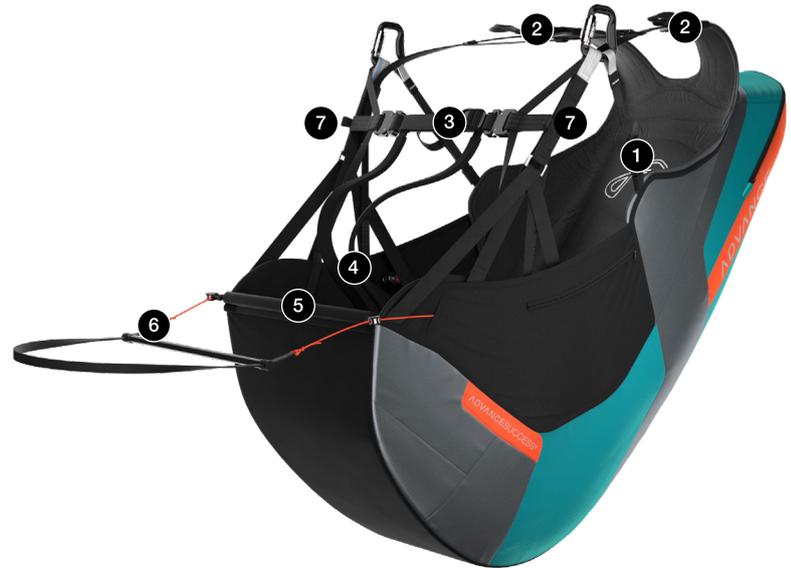
Put the harness on, close the chest strap and leg straps (2-buckle system) and hang the SUCCESS 4 up by its carabiners in a harness stand.

Neoprene covers protect the shoulder, back and chest strap buckles. Their straps are smoothly adjustable over their full lengths, so the sitting position can be quickly and easily adjusted in flight.

The development team have defined the basic settings, and these are indicated as standard by grey sewing on the shoulder, back and leg straps. Pictures in this manual show the various adjustment possibilities.

ADVANCE recommend that you thoroughly familiarise yourself with these adjustments before your first flight in the harness. As well as that you should always make your first test flight with new equipment in quiet weather conditions.

**i** **Info:** For realistic adjustment the harness back pack should be packed as for flight, and the reserve mounted as well. These preparations will provide a good simulation of an in-flight situation.



## 1 Adjusting the upper body angle

Upper body attitude is altered by the adjustable back straps. **1** Pull them in to a reasonably upright back position at which you feel comfortable. These straps are mounted relatively high at the sides to give good back support, and take weight off your shoulders. Pulling in the back straps results in an upright back – loosening them completely will put the pilot in something approaching a lying position. ADVANCE recommend the basic setting.

## 2 Setting the shoulder straps

The SUCCESS 4 shoulder straps can be adjusted to suit the pilot's height and desired sitting position. The neoprene-covered adjusters are at shoulder height and can be set to any position. Pull in the shoulder straps **2** to a loose fit, until they provide light support without putting pressure on the shoulders.

## 3 Chest strap adjustment

The chest strap **3** is used to change the distance between the carabiners. The chest strap is secured with the automatic Quick-release buckles and these make up the Safe-T-System. The wider the chest strap the more agile the seat, and therefore the more effective will be steering by weightshift. A narrow setting results in a quiet and damped feeling from the wing. The adjustment range is very large and the harness agility can be changed to any setting to suit the conditions, as the pilot prefers.



**Caution:** Make sure you close the buckles properly.



**Tip:** The most important thing about setting the chest strap is that you feel happy in your harness..

## 4 Leg strap adjustment

The two leg straps **4** should be adjusted equally, and to a reasonable length that allows free movement during takeoff. This helps with a safe takeoff, and makes sure that you can easily get into your comfortable position when clear of the ground. To adjust the leg straps tilt the seat board forward. The buckles are directly under the seat board trailing edge. The length of the leg straps does not affect agility and weight-shift steering.

## 5 Seatboard angle adjustment

The seatboard **5** angle can be quickly adjusted to any position. Seatboard setting is purely a matter of taste, to suit the pilot's preference.



**Tip:** Loosened seatboard straps make it very easy to slip into the harness after takeoff, and the resulting bent leg angle provides roll stability.

## **6 Adjusting the speed system**

The speed system **6** should be adjusted to a length where the full travel of the paraglider speed system can be used. Make sure that the speedlines are not set too short – the wing must not be permanently accelerated in flight.

## **7 Mounting the foot stirrup and a cockpit**

The optional foot stirrup can be attached to the two tape loops **7** underneath the chest strap. These loops can also be used to additionally fasten a cockpit or front container using softlinks. Both of these additional items can also be attached to the carabiners.

## **Replacing parts**

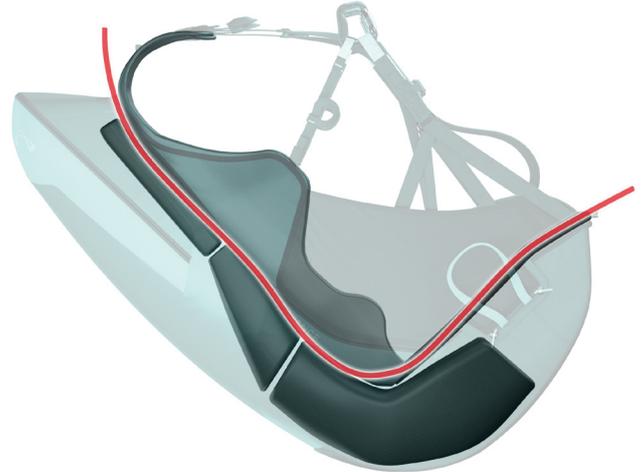
The SUCCESS 4 comes with its five protection components already installed. These are the two foam protectors in the back, the comfort foam in the upper back and the two SAS-TEC crash defences by the seat. Each of these parts can be taken out for repair or exchange.

### **Multi-chamber foam protectors**

All the protectors have their own compartments which can be opened by zip fastener. The main protector's compartment is under the seat, and above it is the mid back protector's place. Both of these can be removed and replaced via the harness back pocket. They should be refitted in order, larger end first, then pushed down into place and their zip fastener closed.

### **Comfort foam**

The comfort lies directly above the mid back/thoracic vertebral protector in its own stowage inside the harness back pocket. Open the zip, take the foam out and replace.



## Fitting the foot stirrup

The optional foot stirrup, included in SUCCESS 4 LTF 91/09 certification, should be fitted as follows:

Attach the black-edged loops to the small tape loops under the carabiners using quicklinks (Maillons Rapide). The short ends go through the metal rings on the outside of the seat sidewalls near the front of the seatboard, and are secured through the plastic buckles. The free ends of the bungee holdback chords go through the plastic rings on the front edge of the seatboard, and are tied to the tape loops on the stirrup sides – as short as practicable, but not under permanent tension.

Connect the stirrup with the speed system as shown. The speedloop will then always be easy to pick up with a foot in flight.

## Attaching the cockpit

There are two tape loops below the chest strap for attaching the cockpit. the main carabiners could also be used.



## Installing the reserve

### General advice

The SUCCESS 4 reserve compartment is in the aerodynamically ideal low position.

 **Caution:** Installing the reserve must be done by a suitably skilled person. Your safety depends on it!

Bear in mind that every reserve/harness combination has its own peculiarities. To ensure reliable functioning it is essential that pilot and packer are familiar with the system before the reserve is installed. We strongly recommend that the reserve is installed by a qualified person or your ADVANCE dealer.

### Suitable reserves/reserve compartment volume

Older type, relatively bulky reserves, are more difficult to deploy from modern and more compact harnesses, especially under high g loadings. The certified reserve volume for the SUCCESS 4 depends on harness sizes. S/M size: 2.5–6,5 litres, L size: 2.5–7 litres.

 **Info:** For a general approximation of a reserve volume, its weight in kilos x 2.7 gives a volume in litres. But, depending on packing style and skill, it can still be that a reserve that conforms to the maximum certified volume for a container, using the weight formula above, cannot be released without problem.

 **Caution:** When installation is complete only a test release/compatibility check can confirm that the actual reserve/SUCCESS 4 combination will work.

 **Caution:** A reserve parachute volume can expand by up to 30 % when it has been newly folded. ADVANCE therefore strongly recommend that a new compatibility test is carried out after every repack.

### Steerable reserves

The SUCCESS 4 can be used with a steerable reserve. The reserve risers connect to the coloured supports under the covers on the harness shoulders, using two maillons, each of 2400 daN minimum safe working load. The reserve risers run to the reserve compartment via the channel at the side. The unused harness V-connection can be led through the opening into the back pocket and stowed away.

 **Caution:** Steerable reserves tend to take up more volume.

 **Info:** You can also use QuickOut carabiners with a steerable reserve on the SUCCESS 4.

## **In general**

The reserve handle and the four-flap inner container are fixed together and this combination is designed so that the pull of the handle acts equally over the whole width of the inner container. This minimises the risk of the container jamming in the reserve compartment, or the reserve lines getting caught up. The reserve handle together with the four-flap inner container are essential parts of the harness, and this arrangement conforms to the latest LTF certification requirements. Only the original reserve handle with its four-flap inner container is allowed to be used.

## **Packing the reserve in the inner container**

Always fold your reserve to the shape and dimensions of the inner container supplied with the SUCCESS 4. At the final packing stage put the line bundles opposite the reserve handle. When the lines have been stowed in the inner container there should be 90 cm of reserve line remaining outside, between the inner container and bridle/steerable risers.



Close the container flap in the order indicated (1-3). Secure the final container flap (3) with a 5 to 6 cm line loop (ca. 3 finger widths). Now check the tension of the bungee loop and adjust if necessary. --> lift the package by the lines - the weight of the reserve should release the line loop.



### **Closing the inner container**

Now close the outer container flap (red border) with two similar line loops (5 to 6 cm). These two line loops are secured in the two attached rubber bands through their eyelets on the outer flap.



### Connecting the reserve to the harness

The reserve bridle and the harness connection must be connected to each other by the means of a suitable quicklink of at least 2400 daN safe load. These two lines must be stabilised at the maillon, for example by using rubber O rings, to prevent the webbings slipping round and cross-loading the maillon during a reserve deployment.

Connecting these looped ends by looping them through each other is only permissible if it is done by the manufacturer, or someone trained and authorised by him. If this were not to be done correctly there is a risk that the loops will slide on each other when the reserve opens, causing heating, melting and failure of the connection.

**!** **Caution:** Don't use sticky tape instead of O rings for locating the loops on the maillon.



### Putting the inner container in the reserve compartment

First lay the harness V-connection in the compartment, then put the inner container on top. It is essential that the inner container closure flaps face the bottom (when in flight) of the harness. Follow the directions indicated on the inner container and the inside of the reserve compartment. The silver points must lie one on the other. When the inner container is in the compartment two silver rectangles should be visible. the reserve handle connection must not be twisted.

**!** **Caution:** If a repacked reserve does not fit the shape of the inner container it must be refolded to the correct shape.



### **Closing the reserve container**

The outer container flaps are closed by loops and cable. Outer container design supplies the necessary tensions and pressures on the closure loops and cable.

First fold the outer container sides in. The left side goes between the flaps of the right side (Labyrinth seal). The Labyrinth closes itself using small magnets. Now carefully slide the right hand zipper from right to left, then back to the right and stow it in its zipper garage.

Next in sequence comes the zip on the left side, which closes the harness/reserve connection channel. Carefully guide the zip puller all the way down the left side of the container – to the start of the zip track. Then return it upwards to close the channel. Finally stow this zipper in its zipper garage.



### Securing the reserve handle

The two eyelets for the release loops are on the Neoprene pocket that holds the release handle. Fold this pocket down and push the end of the reserve handle inside.

Using two short lengths of line thread the two white closure loops through the metal eyelets, secure the white loops with the ends of the yellow cable and lead these into their buttonholes. It is also possible to do this for the SUCCESS 4 without the help of the packing lines.

Remove these lines carefully, leading them under the yellow cables to avoid damaging the white loops by friction.

**!** **Caution:** To guarantee a correct release always make sure that the yellow cables run freely.

**i** **Info:** The zip fasteners will always open easily and reliably when required – even after long intervals between openings.

**!** **Caution:** Never connect the reserve directly to the inner container!



## Compatibility check

Correct installation of a reserve must always be tested by a test release. To do this sit in the harness, straps fastened with packed back pocket, hanging by its carabiners from a harness hanger. Then pull the reserve out by its handle. It is not sufficient to pull the reserve out when not sitting in the harness as for flight. The release procedure must take place in the flying position, without hindrance, and in accordance with the requirements of this manual. The force required to release the reserve must not be less than 4 daN and not more than 7 daN. If in doubt you should contact a qualified person or your ADVANCE dealer.

The correct throwing technique has to be used – a pull to the side. Anything else can make deployment more difficult.

The following factors can make successful reserve opening more difficult, or prevent it – especially if any apply together:

- Reserve too big – too much volume for the compartment or inner container.
- Reserve not folded to the shape of the inner container.
- Incorrect throwing technique. A pull to the side is required (Caution: don't pull the reserve handle straight upwards).
- 

- The reserve volume was suitable for the harness when first fitted in the new harness, but after a repack it is too big.
- Pilot arm length is a factor: short pilots with short arms can sometimes not pull out the reserve.
- Deployment under high g (more than 3g, for example in a spiral dive).



**Info:** A successful compatibility test can reinforce the tester's confidence in the reserve system.



**Caution:** Before every flight check that the reserve handle is in its correct position, and that the yellow cables are correctly sited.



**Tip:** We recommend a brief check of the reserve handle during every flight. This helps to memorise its position. We also advise you to mentally rehearse the sideways pulling and throwing action.

# Use in practice

## General

The SUCCESS 4 should be flown in an upright or slightly reclined attitude so that the pilot has a good view in front.

The SUCCESS 4 has many helpful qualities. If the harness is correctly set up information from the glider is transmitted directly to the pilot's mid section. The weight of the upper body is evenly distributed up to the shoulders; pressure points are avoided, blood flow is not restricted, and mental concentration remains good, even on long flights.

The SUCCESS 4 can be made very agile, or strongly damped in flight. The agility of the harness is set by the chest strap, and this can be easily adjusted in flight. We recommend that the harness is set quite damped for the student, and in turbulent air. But this is very much a matter of personal taste, and will always be up to the pilot.

## Ground handling

The SUCCESS 4 is very convenient for ground handling because of its light weight, and the ability of its pilot to stand upright and freely move both body and helmeted head (for looking vertically upward).

## Clipping in

The EASY CONNECT coloured markings on the carabiner support loops make it especially easy to clip in an ADVANCE paraglider to the SUCCESS 4. The pilot only has to make sure that the red and blue markings on the paraglider risers join the equivalent red and blue lines on the SUCCESS 4 harness carabiner loops. The EASY CONNECT SYSTEM contributes to greater safety before takeoff.

## Takeoff preparation and check

Before every takeoff you should check the following:

- 1 Harness and helmet clipped up, reserve OK?
- 2 Lines clear?
- 3 Canopy clear?
- 4 Wind direction and strength assessed?
- 5 Airspace and field of view clear?

## Takeoff and Landing/Balance Strap System

SUCCESS 4 freedom of pilot movement combined with the Balance Strap System greatly simplifies takeoffs and landings. Running shoulder straps enable a pilot to adopt a completely upright stance for takeoff and landing, and freely carry out the expansive steps sometimes required.

The running single-point seatboard support of the Balance Strap System makes it easy for the pilot to slide into the seat after takeoff, and stand up again before landing. This traditional balance principle first comes into effect after lift off if the pilot raises the thighs to a 90 degree angle to the body. Without the help of the hands the pilot then automatically slips back into the seat. Pushing the hips and legs forward before landing has the opposite effect, and the SUCCESS 4 tips the pilot forward for landing and running. Like at takeoff, hands can stay safely on the brakes. The Balance Strap System looks after itself – another safety plus.

## Using the speedbar

The SUCCESS 4 has a speed system already fitted. The carbon speedbar hangs under the front of the seatboard and is easy to reach because of the bungee hold-backs. These also make sure that the speedbar does not interfere with a reserve throwing.

Pushing the speedbar alters the pilot's sitting position. The upper body leans back, pushing the shoulders into their straps. The seatboard takes up a flatter attitude and supports the pilot.

 **Caution:** Connect the speed system to the paraglider for every flight. Free-swinging speed lines could prevent a successful reserve throwing.

## Flying with the foot stirrup

ADVANCE recommends that you only use the optional foot stirrup specially designed for the SUCCESS 4, and the only model to have been included in the LTF 91/09 certification process.

High attachment points provide a maximum of comfort. The legs are supported without effort, and long flights remain a pleasant experience.

Attachment adjacent to the seatboard and elastic locating tapes make it impossible for the stirrup to get caught up with the reserve.

Only use the supplied SUCCESS 4 speedbar when flying with a foot stirrup.

## Flying with ballast

The SUCCESS 4 was not designed for carrying water ballast and does not have special stowage space for it.

If you want to increase your weight with water ballast, the two tape loops under the ends of the chest strap could be used as attachment points. The main carabiners could also be used for this purpose.



**Info:** If a water bag is hung from the main carabiners, or the loops mentioned above, you should be aware that the flying behaviour of the wing can be altered, and, in particular, agility reduced.

## Use for training

The SUCCESS 4 is perfect for flying schools. Suitable adjustment provides comfortable standing upright before takeoff, ease of getting in the seat after takeoff, a pleasant upright sitting position in the air, damped agility from the harness in flight and quick standing up before landing. An appropriately adjusted harness agility in flight, and the quick and instinctive stand up facility for landing contribute much to comfort and safety.

## Winching

ADVANCE harnesses are suitable for winch launching. The SUCCESS 4 may only be connected to the tow link using rope loops or maillons (quick links) fixed directly to the main carabiners. If you are in any doubt you should always consult the winch driver or someone authorised by the manufacturer.

## Acro flying

The geometry and strength of the SUCCESS 4 means that it is capable of flying acro manoeuvres without problem; but this harness has stowage for only one reserve parachute. As a matter of principle ADVANCE would only recommend a harness with provision for two reserves for acro flying.

## Tandem flying

Because of its size the SUCCESS 4 is not suitable for tandem flying – either for pilot or passenger.

## Other brand paragliders

The harness can be flown with every paraglider. There is no restriction.

## **Landing in water**

In general, caution is advised when flying over water, whether it be crossing a lake during a cross country, or during SIV safety training. In particular a pilot can land in the water during SIV, intentionally or otherwise. As with all harnesses you should consider that the protector floats initially and can turn the pilot face down, head under water. Wearing a lifejacket is essential during SIV training.

### **Landing in water without a lifejacket**

If an unintentional water landing takes place, outside the protection of the SIV environment, the harness buckles must be unfastened immediately and the SUCCESS 4 taken off. Otherwise the risk of drowning is very high. As general advice ADVANCE recommend that the SUCCESS 4 is not flown over water.

### **Landing in water with a lifejacket**

Even when landing in the water during SIV, with a lifejacket, it is recommended that the SUCCESS 4 buckles are unfastened and the harness taken off before getting into the boat. When full of water the harness gets very heavy and makes it very difficult for the pilot to board the rescue boat.

## **Care and maintenance after landing in water**

After contact with water all the SUCCESS 4 protectors should be taken out. Then harness, protectors and reserve inner container should be carefully laid out in the shade outside to dry, or, even better, the empty harness itself could be hung up by its carabiners and gently wafted to and fro. The reserve should be removed and dried separately. It must then be repacked and reinstalled in the SUCCESS 4.

# Maintenance, repairs and care

## Care and maintenance

The SUCCESS 4 was designed for high loading and extreme demands. The requirements for the choice of materials were accordingly set especially high. But the life of the harness depends, to a great extent, on the way it's looked after by its users, and we recommend that the harness is routinely inspected for signs of wear, damaged seams and webbing, and that damaged parts are replaced. It is especially important to note that any suspected damage should be immediately taken to an authorised workshop for repair.

 **Caution:** Do not modify your harness, and never fly with a harness that has any kind of damage to its webbing.

It is recommended that the harness is completely checked at least once a year: this must include the condition of the seams and webbing parts, and the operation of the buckles. Don't forget the regular airing and repacking of your reserve parachute. If your reserve has been thrown in an emergency your harness should also be checked by the manufacturer or an authorised service centre.

Ultraviolet light, temperatures below -20°C and above +60°C, humidity, salt water, aggressive cleaning agents, unsuitable storage as well as physical abuse (dragging over the ground) speed up the ageing process.

The life of your harness can be greatly extended if you observe the following points:

- Allow a wet or damp harness to dry completely at room temperature, or outside in the shade. Always repack your reserve.
- If your harness gets wet with sea water rinse it thoroughly in fresh water. Always repack your reserve.
- Only clean your harness with fresh water, and a little neutral soap if necessary. Never use solvents.
- Check the harness connection and reserve bridle after every reserve deployment.
- A qualified person must check the harness after any very high loading (e.g. heavy crash).
- Regularly inspect the harness for damaged seams and webbing. In particular check the harness/reserve connection and the seams near the main carabiners.
- Don't subject the harness to extremes of temperature and make sure it gets adequate ventilation, to prevent condensation forming.
- Do not leave the harness in the sun (UV radiation) before and after flying.

Most reserve parachute manufacturers recommend an inspection and repacking every six months, so as to guarantee a fast and routine opening every time. If the reserve gets wet, damp or overheated it must definitely be repacked. We strongly recommend that you let a qualified person pack your reserve. In addition, ADVANCE also strongly recommend that you regularly check the front container to see that the yellow cables run through their loops properly. Then you can be sure they will easily release the reserve when required.

## **Check**

The complete set of equipment has to have a check at an official ADVANCE checking organisation after every 24 months, or 150 flights, or 150 flying hours – whichever comes first. At a check all components are evaluated according to strict guidelines and with great care. Finally the overall condition of the paraglider is assessed and recorded on the test record.

You can find more information about the check in this manual in section «Service», or on [www.advance.ch](http://www.advance.ch).

## **Repairs**

As a general rule you should not attempt to repair a harness yourself. The various seams are made with great precision, and, for this reason, only the manufacturer or an authorised service centre may make repairs using original materials.

## **Disposal**

Environmental protection plays an important role in the selection of materials and the manufacture of an ADVANCE product. We use only non-toxic materials that are subjected to continuous quality and environmental impact assessments. When your harness reaches the end of its useful life in a number of years' time, please remove all metal parts and dispose of the rest of the harness in a waste incineration plant.

# Technical Data

## SUCCESS 4

### S

### M

### L

Pilot height	cm	155–172	165–187	175–202
Seatboard width	cm	34.0	35.5	37.0
Seatboard depth	cm	40	44	46
Support point height	cm	42	44	46
Chest strap width	cm	42–54	42–54	42–54
Harness weight	kg	3.90	4.00	4.20
Load test			LTF 1651, 120kg	
4-chamber foam protector certification			LTF 91/09	
Colours			Coffee Brown/Fusion Yellow – Pacific Blue/Fire Red	

## Material description

<b>Description</b>	<b>Name &amp; Dimension</b>	<b>Manufacturer</b>	<b>Breaking load</b>
Leg strap	70337 – 15 mm – Polyamid	Güth & Wolf	1'000 kg
Back strap	70337 – 15 mm – Polyamid	Güth & Wolf	1'000 kg
Shoulder Strap	70337 – 15 mm – Polyamid	Güth & Wolf	1'000 kg
Two buckle closure system	Clip-in buckle system Cobra	Austrialpin	
Cloth seat	Nylon Oxford 210D, PU3	Seunghee	
Cloth back	Nylon Ripstop Oxford 210D, PU3 Stripes: Nylon Robic 100D, PU2	Seunghee	
Carabiner	Alias – 22 kN Aero Tec Twist Lock	Edelrid	2'243 kg
Reserve V-connection	Dyneema 10 mm	Techni Sangle	2'320 kg

# Service

## ADVANCE Service Centres

ADVANCE operates two company-owned Service Centres that carry out checks and repairs of all types. The workshops based in Switzerland and France are official maintenance operations, certified by the German Hanggliding and Paragliding Federation (DHV), which has many years' experience and in-depth product-specific expertise. The ADVANCE worldwide service network includes other authorised service centres which provide the same services. All service facilities use original ADVANCE materials exclusively. You can find all the information about checks and repairs, and the relevant addresses at [www.advance.ch](http://www.advance.ch).

## The ADVANCE website

At [www.advance.ch](http://www.advance.ch) you will find detailed information about ADVANCE and its products, as well as useful addresses which you can contact if you have any questions.

Among the things you will be able to do on the website are:

- complete the warranty card online up to 10 days after purchasing the glider, enabling you to enjoy the full benefits of the ADVANCE warranty.

- find out about new safety-related knowledge and advice concerning ADVANCE products
- download an application form in PDF format which you can use when sending your glider in for a check at ADVANCE.
- find an answer to a burning question among the FAQs (Frequently Asked Questions)
- subscribe to the ADVANCE Newsletter so that you will be regularly informed by e-mail about news and products.

It is well worth visiting the ADVANCE website regularly because the range of services offered is continuously being expanded.

## Warranty

In order to enjoy the full benefits of the ADVANCE warranty, you are requested to complete the relevant form on the website in the «Warranty» section within 10 days of purchase.

As part of the ADVANCE warranty, we undertake to rectify any defects in our products that are attributable to manufacturing faults. In order for a warranty claim to be made, ADVANCE must be notified immediately on discovery of a defect, and the defective product sent in for inspection. The manufacturer will then decide how a possible manufacturing fault is to be rectified (repair, replacement of parts or

replacement of the product). This warranty is valid for three years from the date of purchase of the product. Warranty and Service Intervals begin from the date of the glider's first flight, recorded on the identification plate. If no date is evident the applicable date is that on which the glider was transferred from ADVANCE to the ADVANCE dealer. The ADVANCE warranty does not cover any other claim. Claims in respect of damage resulting from careless or incorrect use of the product (e.g. inadequate maintenance, unsuitable storage, overloading, exposure to extreme temperatures, etc.) are expressly excluded. The same applies to damage attributable to an accident or normal wear and tear.



# ADVANCE

advance thun ag  
uttigengstrasse 87  
ch 3600 thun

fon +41 33 225 70 10  
fax +41 33 225 70 11

[www.advance.ch](http://www.advance.ch)  
[info@advance.ch](mailto:info@advance.ch)