# D-LIGHT

THE LIGHTEST SAFETY





The lightest safety EN/LTF-A

USER MANUAL

Version 1.2, Date: 01.04.2017



## Introduction

## Manual

#### Welcome

Welcome to the Triple Seven Team! We're excited that you have chosen to fly the D-light, and we are certain that this glider will be the perfect lightweight choice for you, all the way from hill training to cloud base. The D-light is developed for maximum safety and ease of use, in a light package. As such, this glider is ideal for weight-conscious pilots just embarking on their first paragliding adventures. It is designed to be your first lightweight glider, to take you on breathtaking hike&fly adventures, on your first XC flights or any other direction you might take in paragliding. We wish you exciting flying adventures!

## **Triple Seven Mission**

Our company goal is to produce high quality products and technologically innovative gliders of all types and classes. We are striving to develop state-of-the-art paragliders, with the optimum compromise between safety and performance. Your success is our inspiration; our goal is your success.

This document contains all the important product information and instructions to help you become familiar with the main characteristics of your new paraglider. It contains instructions on how to use and maintain the wing, but its purpose is not to teach you to pilot this kind of wing. This is not a flying manual. Flying is taught by paragliding schools and certified instructors.

It is important that you take the time to read this manual carefully before the first flight, as thorough knowledge of your equipment enables you to fly safely and to maximize your full potential. If you lend or sell your glider to another pilot, please pass this manual on with it.

If any use of Triple Seven equipment remains unclear after having read this manual, please contact: your local paragliding instructor, your Triple Seven importer or Triple Seven. This product manual is subject to changes without prior notice. Please check www.777gliders.com for the latest information regarding our products.

#### Summary

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- »Lightweight from the word "go"
- » Very easy launch and landing characteristics
- » Progressive handling and easy control characteristics
- »Good balanced wing for maximum piloting ease
- »Excellent longevity for a Hike&Fly paraglider
- »Canopy: Back position intake, reinforced leading edge, smooth trailing edge, low induced drag wingtip, line reduction
- »EN-A, LTF-A class

Lightweight excellence, all the way from hill training to cloud base. The D-light is developed for maximum safety and ease of use, in a light package. As such, this glider is ideal for weight-conscious pilots just embarking on their first paragliding adventures. It is designed to be your first lightweight glider, to take you on breathtaking hike&fly adventures, on your first XC flights or any other direction you might take in paragliding. We wish you exciting flying adventures!







# Before flight

### Elements, components

The D-light is delivered together with a backpack, inner bag, glider strap, Triple Seven T-shirt and a USB key containing this manual.

## Assembly

Before you rush to the first take-off we recommend you take your time to unpack and test your equipment on a training slope. In this way you will have time and will not be distracted or rushed to prepare your equipment, and you will be able to do your first pre-flight check properly.

The place should be flat, free of obstacles, and with light wind. This will enable you to nicely inflate the wing and also familiarize yourself with it while ground handling. Every glider has to be checked by a Triple Seven dealer, however, as a pilot you want to do a proper pre-flight check yourself.

Prepare and lay out the glider like you would normally do. While you are laying it out and walking along the glider, observe the fabric material for any abnormalities. When you are done with the inspection of the canopy, grab the risers and spread the lines, check if the risers and maillons (carabiners) are properly closed. Identify and disentangle the A1, A2, B and C risers and the lines, including the brake lines. Connect the risers' main attachment points correctly to the harness, watch for any twists and make

sure that the main carabiners are properly closed.

#### Harness

The D-light has passed EN-A certification testing using a GH - ABS type harness. This certification allows the D-light to be flown with most harnesses on the market, but keep in mind that changing harnesses greatly influences the feeling of the glider, depending on the effectiveness of the harness weight shift. Check with the harness manufacturer or with your instructor whether your harness is of the proper type.

The length of the harness chest strap affects the distance between the main carabiners and the wing's handling as well as your stability in the harness. Tightening the chest strap increases your stability, but greatly increases the risk of getting twisted after a collapse. A tight

setting may also increase any tendency to lock into a deep spiral. As a rule of thumb, a wider chest strap setting gives you more feedback from the glider, which is good for your climbing efficiency and

increases safety in any flying incident. But we strongly recommend adjusting the length of the harness chest strap according to the lengths used during certification. This setting varies according to the harness size, from 42cm to 50cm.

Check the settings used during testing under the "Certification specimen" section. We recommend that your first flight with the D-light is done using a harness already familiar to you - another rule of thumb is, to experience the feeling of new equipment, change only one part of equipment at a time.

Note that although all Triple Seven products are designed for longevity in their respective classes, the lightweight nature of the D-light makes it even more sensible to take good care of your new paraglider, by looking after it on launch, not leaving it out in strong sunlight, and packing it away soon after you land. These simple precautions will ensure that you get the most out of your

investment, but should be self-evident for ALL paragliders.

#### Accelerator settings

The D-light speed system increases the speed of the glider by 11km/h with the accelerator at full travel, from trim speed at 38km/h to full speed at 49km/h.

Before attaching the accelerator system to the D-light risers, check that the speed system inside your harness is correctly routed and that all pulleys are set correctly. Make sure there are no knots or other obstacles that might make the accelerator catch during use.

The length of the speed bar lines should be adjusted on the ground so that your legs are fully extended at the point of full accelerator travel. While setting the speed line lengths make sure they are long enough, so that the speed system does not accelerate the glider by itself. If in doubt, please consult your instructor or Triple Seven dealer.

#### Brake adjustments

The length of the brake lines has already been adjusted by the manufacturer and is the same as used during the certification test flights. The length is set and fine-tuned during the development of the glider, therefore generally there should be no need to adjust them. We recommend flying this setting for a while, and you can still change it afterwards if you wish to do so. If you change the length of the brakes, do it in a step by step process of 2 cm at a time. Bear in mind that if you make the brake lines too short, they might be applied unintentionally when the speed system is engaged.

### Weight range

Each size of the D-light is certified for its own weight range. The abovementioned weight includes the weight of the pilot and complete paragliding equipment, together with the glider, harness, all accessories and optional ballast. All gliders change flying characteristics when you change the take-off weight. We recommend that you always fly your glider in the specified weight range. To measure your take-off weight, step on a scale with all your equipment packed in the rucksack.

#### **Lower wing loading**

Flying the D-light, as any other glider, in the lower part of the weight range, causes the agility of the glider to decrease, and when flying through turbulence its collapse tendency increases when compared to flying it in the upper wing loading range. However, reactions after a collapse are less dynamic and sink rate improves. Therefore, if you mainly fly in weak conditions, you might prefer this wing loading.

#### **Higher wing loading**

Again, as with any other glider, flying the D-light in the upper part of the weight range increases the stability and agility of the glider. Consequently, there is a slight increase in the glide speed and also gliding performance when flying into a head wind. If you normally fly in stronger conditions and you prefer relatively more dynamic flying characteristics, you should set the take-off weight in the higher wing loading range. Reactions after a collapse may be more dynamic in the upper half of the weight range.

## Wing inflation

Still being on the training slope and having prepared and checked everything, inflate your wing and play with it to get a feel of your new glider while ground handling. By doing this you are making a final check of the canopy and lines, and that everything is in order. You will find that the D-light inflates very easily and smoothly without excessive energy and with minimum pressure while moving forwards. For inflation and lifting the glider you may use only the A1 risers. Do not pull on the risers just with your hands, instead use your whole harness. Your hands should only accompany the rising movement of the wing. When the wing is above you, apply correct pressure on the brake lines and the glider will stay above you.

## Modifications on the glider

Modifications of the lines, risers or speed system may void the certification, as does flying the wing outside of the certified weight range.

## Preflight safety

Before flying the D-light, you should obtain all practical and theoretical training and the certification for flying this kind of wing. Pilots should be physically and mentally fit, using complete paragliding equipment and flying only in conditions suitable for their level of flying expertise.



- 1:

# Flying D-light

## First Flight

Now that you have already familiarized yourself with your new glider while ground handling on a training slope, you are ready for your first flight. For the first flight it is recommend that you choose a familiar flying area and that you fly your new glider in calm conditions.

## Preflight check, equipment

Before every flight you need to do a pre-flight check and the inspection of other equipment. Learn to do this, as it takes no extra time. This procedure may vary, depending on the instructor, pilot or equipment settings. Some pilots have their wing always connected to the harness. However you should have a consistent method of checking and preparing your equipment and doing the final pre-flight check.

- 1. After the arrival on take-off, assess the suitability of the flying conditions.
- 2. While walking around the canopy preparing and spreading out the wing, you should also inspect the canopy.
- 3. After you check the lines and connect the risers to the harness, grab the lines and slide them through your fingers as you walk towards the canopy. In this way you double check that the lines are not tangled, knotted or damaged. If meanwhile the canopy moves, walk around and correct it again.

4. Inspect the harness, reserve, speed system and all connections.

## Final preflight check

- Strap into the harness. The leg straps should be the first to be connected on the take-off and the last ones to be released after the flight. Make sure you are strapped in correctly and wearing a helmet.
- Check the risers for twists, and that the carabiners are properly closed. Check that the speed system is not affecting your risers – accelerating unintentionally.
- 3. Check the lines. The A riser lines should be on top, and all lines untangled. Check that none of the lines are lying over or below the canopy.
- 4. Check the canopy. The glider should be spread out in the shape of an arch and all cells open.
- 5. Check the wind, take-off and airspace. The wind should be favourable for take-off and the pilot's level of experience. Airspace should be clear, together with the take-off area.

#### Inflation, control, take-off

The D-light has easy take-off behavior and does not require any additional advice regarding the forward or reverse launch. Try to divide and practice the take-off procedure into three steps.

- 1. Inflating and raising the glider
- 2. Controlling the wing and wing check
- 3. Acceleration and take-off

It is always advisable to practice and improve launching techniques

as this reduces unnecessary additional stress before the take-off. Wind speeds up to 25 to 30km/h are considered strong and extra care is required for the flight. If you are launching in strong winds we recommend the reverse launch technique, with your brakes in the right hands at all times. Launch the glider with a gentle pull and then walk towards it if necessary, to reduce the relative wind force. When the glider is above you, gently control the wing and take off.

### Line knots or tangles

Should you fail to observe a line knot before getting airborne, or you find yourself flying with a knot and being unable to prevent the unintentional, uncontrolled take-off, try to stay away from the ground or other pilots by flying away from the mountain, before taking any corrective action on the wing.

This means weight shifting and/or counter braking to the opposite side, and controlling the flying direction with the least amount of force needed to fly straight, away from the mountain. Be careful not to apply too much brake or to fly too slow, to avoid a stall or spin. Once you have reached a safe distance away from the mountain, and you have gained height relative to the ground by flying away, you may want to gently and briefly pull the lines that are tangled/knotted. If the knot is on a brake line you may want to gently and briefly "pump" the appropriate brake line.

Please note that by pulling the lines, in the worst case the knot may get stuck in a worse position and the situation may deteriorate, in rare cases even to a stall or spin. Therefore, if you estimate that you can control the wing relatively safely and that the knot is not released by gently and briefly pulling the tangled lines, immediately head for the landing

zone and concentrate on a safe landing.

### Normal flight, best glide

Without any brakes applied and without using the accelerator, the wing flies at the so called "trim speed". In calm air this is theoretically the speed for best glide. The best glide speed depends on the glider's polar and the way the air mass moves, I.e. the wind and the sink/lift we fly through. We recommend reading more about the theory of the best glide and McCready theory.

#### Minimum sink

By applying about 15 to 20cm brake on both sides you slow the glider to the theoretical minimum sink speed. In practical flying we do not recommend using this speed even for thermalling, as you achieve much better climbing and control by letting the glider fly at "trim speed". With correct wing loading you will find that the glider has great climb, reactions and agility.

### Accelerated flight

After you get comfortable flying the D-light, you can start practicing using the speed system, which will provide better performance while gliding against the wind and through a sinking air mass. The D-light was designed to be stable through its entire speed range, but this requires the use of active flying techniques. Note that any glider becomes less stable while flying accelerated and that the

risk of a collapse is higher in accelerated flight. Additionally, the reaction of the glider to a collapse in accelerated flight is more dynamic compared to one which occurs at trim speed.

We recommend avoiding accelerated flight near the ground and to be very alert when using the accelerator in turbulent conditions. Use a soft speed bar, which enables you to accelerate the glider by using only one leg., and use weight shift to control the direction. To control the pitch, change the amount of speed bar. Do not use or pull the brakes while using the speed bar. Use the speed bar progressively when accelerating, and instantly release when you feel a slight loss of tension, pressure or even a collapse. If you encounter a collapse while using the accelerator, release the speed bar immediately before taking any other corrective action. Always keep more distance from the ground when using the speed bar.

## Active flying

This is a basic flying technique for any pilot. It implies permanent control and the correction of pitch and roll movements together with the prevention of any deflations or collapses. In a nutshell this means flying straight through active or turbulent air, so that the pilot keeps the glider vertically above their head at all times, compensating and correcting any unwanted movements of the wing.

#### **Few examples:**

- While entering a strong thermal, the wing will stay a little bit behind relative to the pilot. The pilot should ease the brakes up, allowing the wing to fly faster and to catch up.
- If the wing surges in front of the pilot, the pilot should counter brake until the surge is controlled and then release the brakes

- to let the glider fly normally.
- If the pilot feels a loss of tension on the wing or a loss of pressure on the brakes on one side of the wing, he should smoothly apply the brake on the side with loss of pressure and/ or weight shift to the opposite side until the pressure returns.
   After that, again release the brake and/or weight shift to the neutral position and let the glider fly normally.

The key in all cases is to avoid an over-correction and not to maintain any correction longer than necessary. After each action let the glider fly normally again, to re-establish its required flying speed. You can train or get a feeling for most of these movements safely on the ground while ground handling your glider. Good coordination of your movements and coordination with the wing on the ground will enable you a quick progression when actively flying in the air. The next step is to attend SIV clinics, where you should also get a better understanding of the full brake range and the glider's speeds.

## Flying in turbulence

Wing deflations (collapses) can occur in strong turbulence. The D-light is designed and tested to recover without pilot input in almost all situations, by simply releasing the brakes and letting the glider fly. To train and understand all the manoeuvres described, attend SIV clinics.

#### **Cascade of events**

Many reserve deployments are the result of a cascade of over-corrections by the pilot. Over-corrections are usually not problematic because of the input itself or its intensity; but more due to the timing of the pilot input. After every input you have to allow the wing to re-establish its normal flying speed. Note that over-corrections are often worse than no input at all, particularly on EN A wings like the D-light.

#### **Asymmetric deflations**

Strong turbulence may cause the wing to collapse asymmetrically. Before this occurs the brake lines and the feeling of the harness will transmit a loss of pressure to the pilot. This feedback is used in active piloting to prevent a collapse. If the collapse does occur, the D-light will easily re-inflate without pilot reaction, but the wing will turn towards the collapsed side. To prevent this from happening, turn and actively recover the asymmetric collapse by weight shifting and applying appropriate brake input on the side that is still flying. Be careful not to over-brake your wing's flying side. This is enough to maintain your course and give the glider enough time to recover the collapsed side by itself. To actively reopen the collapsed side after course stabilization, pull the brake line on the collapsed side firmly and release it. You can do this several times with a smooth pumping motion. After the recovery, release the brake lines for your glider to regain its trim speed. Note that asymmetric collapses are much more dynamic when flying accelerated. This is due to the difference in weight and resulting inertia of the (light) canopy and the (heavy) pilot hanging below.

#### Symmetric deflations

Symmetric or frontal deflations normally reopen immediately by themselves without pilot input. The glider will then regain its airspeed accompanied by a small surge forwards. To actively control this event, apply both brakes slightly when the collapse occurs and then instantly release the brakes to let the glider fly.

Be prepared to compensate for a slight surge forward while the glider regains normal flying speed.

#### Wing tangle, cravat

The D-light is very unlikely to cravat, but it may occur after a severe deflation or in a cascading situation, when the wing tip gets caught in the lines. Pilots should be familiar with the procedure for handling this situation with any glider. Familiarize yourself with the stabilizer main line ("stabilo" line, orange colour) while unpacking and preparing the wing. If a cravat occurs, the first thing to do is to try to keep the glider flying in a straight line. Do this by weight shifting and counter braking the untangled side. After that, grab the stabilizer main line on the tangled side, pull it down until it becomes tight again. At this point the cravat normally releases itself.

Possible solutions of the cravat situations (consult your SIV instructor):

- Pulling the wing tip "stabilo" line
- Using a full stall, but it is essential to be very familiar with this manoeuvre. You also want to have a lot of altitude.
- If you are in a situation where you have a cravat and you are low in rotation or even with twisted risers, then the only solution is to deploy the reserve parachute.

#### Negative spin

In normal flight you are far from negative spin. But, certain circumstances may lead to it. Should this occur, just release the overbraked line progressively and let the wing regain flying speed. Be prepared for a canopy surge forward, and compensate the surge with brake input if necessary.

#### Full stall

A full stall does not occur unintentionally on its own – it happens if you pull both brakes all the way below the seat and hold them there. The wing then performs a so called full stall. Releasing the brakes improperly

may in rare cases lead to a massive surge of the glider, with danger of falling into the canopy. The full stall is a complex manoeuvre and as such outside the scope of this manual. You should practice and learn this

manoeuvre only during SIV clinics, under professional tuition.

#### Deep stall

Generally when in deep stall, the wing has no forward motion and at the same time high sink speed. When in deep stall the wing is almost fully inflated, but looks "limp" and creased from below. The D-light is very unlikely to get into a deep stall unintentionally, but under rare circumstances it could possibly happen if you are flying at a very low speed in turbulent conditions. Also the porosity of the material and line stretch on a very old glider can increase the risk of deep stall. If you have already trained this manoeuvre during an SIV clinic you probably know that it is very hard to keep the D-light in deep stall, because as soon as you apply a little bit more brake you immediately enter a full stall phase, and if you release the brakes just a little bit too much the wing returns to normal flight. If you want to practice the deep stall on SIV courses, you need to master the full stall first.

### Fast descent techniques

Fast descent techniques should be familiar to any pilot, as they are important tools to be used in certain situations. These manoeuvres should be trained as a part of the normal paragliding pilot training at your flying school. We also recommend practicing these manoeuvres during SIV clinics, under professional tuition.

#### Big ears

This is a safe method to moderately loose altitude while still maintaining forward speed. To do big ears, release any brake line loops around your wrist, set your leg on the speed bar, but do not push it. Now pull the outer A lines (the A2 risers in the drawing) on both sides. As long as you keep the A2 risers pulled, the wing tips stay folded and the sink rate increases. To return to normal flight, release the A2 risers, and if necessary apply the brakes with short pumping movements. Release big ears at least 100 meters above the ground. While using big ears, the wing speed decreases, which is why we also recommend using the accelerator half way in combination with big ears to maintain enough horizontal speed and to also additionally increase vertical speed. Be careful not to pull the brakes while making the ears! Steering is done by weight shift only. Always do the big ears first and then accelerate; not the other way around as you risk getting a frontal collapse.

#### B line stall

While in the B-stall the glider has no horizontal speed and the sink rate increases to about -8m/s. To enter the B-stall reach for the B risers just below the maillons and pull both B line risers symmetrically for about 20 cm. To exit the manoeuvre, simultaneously release both risers quickly. On exit the D-light

gently surges forward, without deep stall tendencies.

#### **Spiral dive**

The spiral dive is the most demanding of all three manoeuvres (Big ears, B-stall, Spiral) and should only be trained gradually and always high above the ground. The spiral dive should be practiced and learned on a SIV course under professional tuition. To enter the spiral, weight shift to the desired side and gradually apply the brake on the same side. Then let the wing accelerate for two turns and you will enter the spiral dive.

While in the spiral, control your descent rate and bank angle by applying more or less inside brake. Depending on how steep the spiral is you may need to apply outer brake. To exit the spiral dive we recommend returning to a neutral weight shift position. If you release the inner brake, the wing exits the spiral dive by itself. The D-light has no tendency to remain stable in a spiral, but you should always be aware of the correct procedure for exiting a stable spiral.

To exit a stable spiral dive, weight shift to the opposite side of the turn and apply the outer brake until feeling the deceleration of the wing rotation. Then release the outer brake and let the glider decelerate for the next couple of turns. To avoid a big pendulum movement after exiting the spiral, apply a short brake input on the inner side before the glider exits the spiral.

Warnings (Spiral dive):

 There is a possibility of losing consciousness while in a spiral dive. Never make a spiral with more than -16 to -18m/s vertical speed.

- In fast spirals it may be necessary to apply the outer brake to begin exiting the spiral dive.
- If practicing the spiral dive low, a pilot may not have enough altitude or time to safely exit this manoeuvre.

#### Winch launch

The D-light is easy to launch using a winch and has no special characteristics considering this kind of launching. To practice this launching technique, special training is needed and you need to be aware of the procedures and dangers specific for winching. We do not recommend using any special towing device which accelerates the glider during the winch launch.

#### Aerobatics

The D-light was not designed for aerobatics, therefore, these should not be performed on this glider. In addition to this, any extreme manoeuvres place unnecessary stress on the glider and shorten its lifespan.

### Primary controls failure

If for any reason you cannot use the brake lines, you have to pilot the wing to the landing place by using weight shift. Weight shift should be enough to safely land the glider. You can also use the C risers to control and steer the wing. Be careful not to over-handle the glider by using the C riser technique when steering. By pulling the C risers too far you may cause a stall or a negative spin. Land your glider at trim speed without using the C risers, to avoid

over-handling the glider low above ground. We recommend using only weight shift.

## Landing

Similarly to the take-off, the D-light's landing characteristics are easy. In turbulent conditions it is advisable to apply about 15% of brake, to increase stability and the feeling of the glider.

Before landing, adopt the standing position as this is the most effective and the safest way to compensate the touch down with your legs. Again we recommend training the landing manoeuvre, as it might be useful to be able to land in small places, especially in an unknown cross country terrain. Learn to evaluate the wind direction by observing the signs on the ground and your drift while making turns. This is useful for cross country, when landing away from your usual landing field. Another advice we suggest taking into account in stronger winds is to head for the landing field earlier, thus making sure you reach them. Likewise, always look for possible alternatives downwind.

#### Brake handle attachment

With extremely light setup of the risers, we have designed also the loop in which you can attach the brake handle to the riser. Before flight, brake handle needs to be detached on the side with the brake line avoiding the line running trough the loop.

# Maintenance

## General advice

Careful maintenance of your glider and the following simple guidelines will ensure a much longer airworthiness and performance of your wing:

- Pack your glider after you land and do not expose it to unnecessary UV radiation, by leaving it unpacked in the landing.
   The sun UV radiation degrades the cloth and line material.
- Fold your glider as recommended under "Packing instructions" below.
- If the glider is damp or wet when you pack it, partially unfold it at home to allow it to dry. Do not dry it in direct sunlight.
- Avoid exposing the glider to violent shocks, such as the leading edge hitting the ground.
- Avoid dragging the glider on the ground or through rocky terrain as you might damage the lines or canopy.
- Avoid stepping on the lines or canopy, especially when they are lying on a hard surface.
- Avoid exposing the glider to salt water, as it damages the lines and the canopy material (wash with fresh water).
- Avoid bending your lines, especially in a small radius.
- Avoid opening your glider in strong winds without first untangling the lines.
- In general, avoid exposing your glider to very hot or humid environments, UV radiation or chemicals.

It is important to pack your glider correctly, as this prolongs its lifespan. We recommend that you fold the glider like an accordion, neatly aligning the cell walls with the leading edge reinforcements, side by side. The wing should then be folded in three parts or two folds. The wing should be packed as loosely as possible. While packing be careful not to trap any grasshoppers inside your canopy as they will chew through the canopy cloth. By adhering to these few simple guidelines you ensure that your glider last longer and preserves its best performance. for longer.

### Storage

Correctly packed, store your glider in a dry place at room temperature. The glider should not be stored damp, wet, sandy, salty or with objects inside the cells of the glider. Keep your equipment away from any chemicals.

## Cleaning

If necessary always clean your glider with fresh water and a cloth only, without using any cleaning chemicals. This includes both lines and canopy. More importantly, always remove stones or sand from the canopy as they will gradually damage the material and reduce the glider's lifespan.

## Repair

To repair small damages (less than 5cm) to the canopy, you may use rip stop repair patches. Greater damages, including damage to stitches and lines, should be repaired by a specialized repair shop. Damaged lines should be replaced by a Triple Seven dealer. When replacing a line it should always be compared with the counterpart for adjusting the appropriate length. After the line was repaired, the wing should be inflated before flying, to ensure that everything was done correctly. Major repairs, such as replacing panels, should only be carried out by a Triple Seven distributor or Triple Seven. If you are unsure about the damage or in any doubt please contact Triple Seven.

## Packing instructions

# Packing the Triple Seven D-light

#### 1. FOLD THE GLIDER LIKE HARMONICA







2. ALIGN THE CELLS







#### 3. FOLD LEADING EDGE BACK TOWARD TRAILING EDGE AND ALIGN THE CELS









4. FOLD THE GLIDER IN THREE PARTS





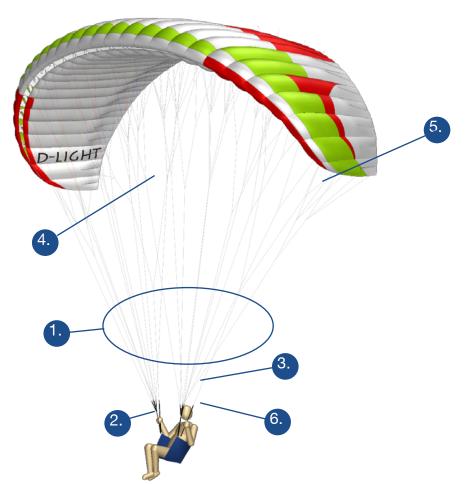




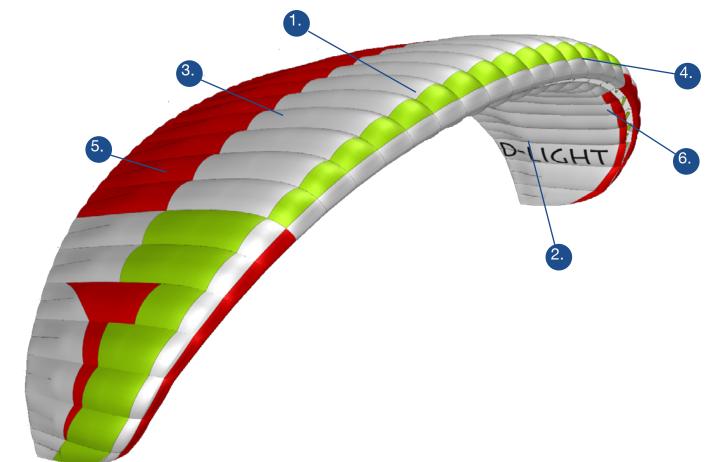
5. FINISHED



# Technical data



- 1. Suspension lines
- 2. Risers
- 3. Main lines
- 4. Middle cascades
- 5. Upper cascades
- 6. Brake lines



- Canopy
   Bottom surface
- 3. Top surface4. Leading edge
- 5. Trailing edge6. Intake cell openings

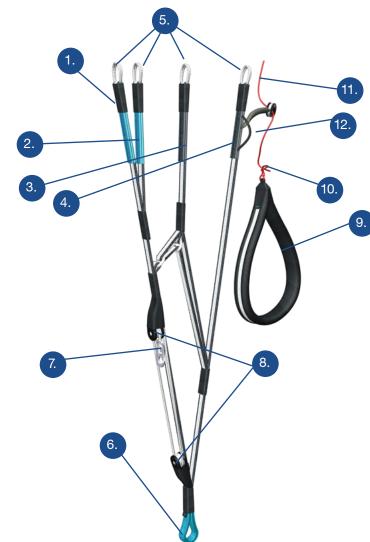
## Technical data

SIZE			D-light S	D-light M
CELLS	NUMBER		29	29
	ASPECT RATIO		4.4	4.4
PROJECTED	AREA	m²	20.1	23.2
	SPAN		7.85	8.39
RISERS		A	В	С
D-light S	LENGTHS (mm)	520	520	520
D-light S	LENGTHS (mm)	390	423 S-Distance pulleys: 13	
D-light M	LENGTHS (mm)	550	550	550
D-light M	LENGTHS (mm)	410	455 M-Distance pulleys: 14	
D-light L	LENGTHS (mm)	580	580	580
D-light L	LENGTHS (mm)	430	477 L-Distance pulleys: 15	
SIZE			D-light S	D-light M
	TRIMS		NO	NO
IN FLIGHT WEIGHT	MINIMUM	kg	60	80
	MAXIMUM	kg	85	105
GLIDER WEIGHT		kg	2.7 kg	3.1 kg
CERTIFICATION		EN/LTF	Α	Α

## Materials description

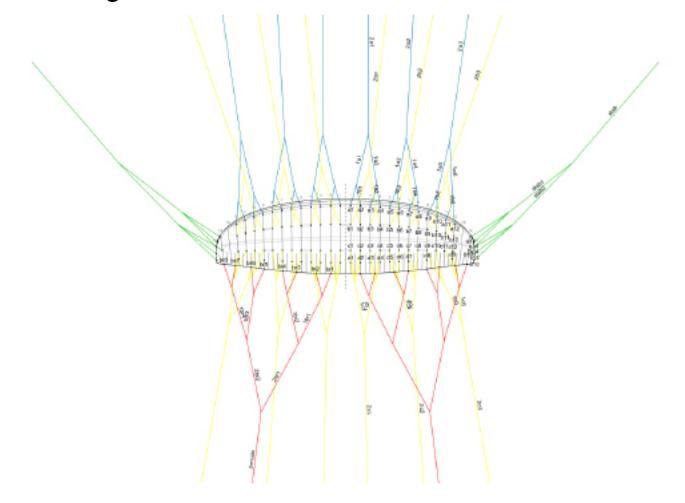
CANOPY	FABRIC CODE
Upper surface	SKYTEX 27
Bottom surface	SKYTEX 27
Profiles	SKYTEX 27 HARD
Diagonals	SKYTEX 27 HARD
Internal construction E H-Straps, Mini ribs	O-Ribs, SKYTEX 27 HARD
Thread	Serafil 40/2000, 60/2000
SUSPENSION LINES	FABRIC CODE
Upper cascades	PPSL 125, DSL 70
NAC L III	DD01 0 404 / DD01 404 400 70
Middle cascades	PPSLO 191 / PPSL 191,128, 70
Main	TSL 380, 280, 220, 190
Brake lines	PPSL 125, DSL 70
Main brake	PPSL 200
Thread	Serafil Amann 60/0415
RISERS	FABRIC CODE
Material	Dyneema
Color indicator	Cordura 200/200PU
Brake Swivel	Tylaska
Maillons	Dyneema
Pulleys	Speed: 4 x Finsterwalder Mini role metal
	28mm, Brake: 2 x Riley plastic 35mm

## D-light risers



- 1. A1 riser
- 2. A2 riser, (Ears)
- 3. B riser, (B-Stall)
- 4. C riser
- 5. Maillons
- 6. Main attachment point
- 7. Speed bar attachment point
- 8. Speed bar pulleys
- 9. Brake handle
- 10. Brake line pulley
- 11. Main brake line
- 12. Brake handle attachment loop

## Line plan D-light





## Line lengths D-light S

Triple Sev	en D-ligh	t <b>S</b> Lines Lenç	gth (mm)									LIN	E CHEC	K			
First galle	ery											a1	5764	c1	5792	br1	6616
Lines A	mm	Lines B	mm	Lines C	mm	Lines D	mm	<b>BR</b> lines	mm			a2	5702	c2	5734	br2	6386
a1	1082	b1	983	c1	1120	d1	1298	br1	956			аЗ	5694	сЗ	5725	br3	6168
a2	1020	b2	919	c2	1061	d2	1245	br2	726			a4	5737	с4	5765	br4	6142
a3	1012	b3	909	с3	1053	d3	1233	br3	907			а5	5733	с5	5741	br5	5996
<u>a4</u>	1055	b4	954	c4	1093	d4	1263	br4	881			а6	5698	с6	5710	br6	5815
a5	1051	b5	948	с5	1069	d5	1237	br5	855			а7	5699	с7	5704	br7	5692
a6	1016	b6	913	с6	1037	d6	1198	br6	674			a8	5734	с8	5747	br8	5620
a7	1017	b7	915	с7	1031	d7	1188	br7	755			a9	5703	с9	5684		
a8	1052	b8	952	с8	1074	d8	1128	br8	683			a10	5628	c10	5608		
a9	1017	b9	936	с9	1011	d9	898					a11	5568	c11	5545		
a10	942	b10	860	c10	935	d10	1170					a12	5523	c12	5499		
a11	882	b11	806	c11	872							a13	5095	c13	5034		
a12	837	b12	770	c12	827							a14	5024	d1	5967		
a13	1135	b13	1163	c13	1073							b1	5669	d2	5914		
a14	1063	b14	1062									b2	5604	d3	5903		
				,								b3	5595	d4	5933		
Second ga	allery			,								b4	5640	d5	5907		
Lines A	mm	Lines B	mm	Lines C	mm	Lines D	mm	BR lines	mm			b5	5633	d6	5868		
1a1	1061	1b1	1061	1c1	1061			1br1	1648			b6	5599	d7	5858		
1a2	1061	1b2	1061	1c2	1061			1br2	1248			b7	5601	d8	5798		
1a3	1061	1b3	1061	1c3	1061			1br3	1107			b8	5638	d9	5568		
1a4	1061	1b4	1061	1c4	1061			1br4	903			b9	5622	d10	5128		
1a5	1061	1b5	1061	1c5	1061							b10	5546				
1a6	1061	1b6	1061	1c6	1061							b11	5492				
Stab1	796	Stab2	796									b12	5456				
Main Line	es									Main stabilo	3165	b13	5123				
Lines A	mm	Lines B	mm	Lines C	mm	Lines D	mm	BR lines	mm	BR main	mm	b14	5023				
2a1	3630	2b1	3900	2c1	3630			2br1	1904	2br1	2130						
2a2	3630	2b2	3900	2c2	3630			2br2	1926								
2a3	3630	2b3	3900	2c3	3630												

## Line lengths D-light M

Triple Seven D-light M Lines Length (mm)											LIN	E CHEC	K				
First galle	ery											a1	6192	c1	6223	br1	710
Lines A	mm	Lines B	mm	Lines C	mm	Lines D	mm	BR lines	mm			a2	6126	c2	6160	br2	686
a1	1162	b1	1056	c1	1203	d1	1394	br1	1027			а3	6117	сЗ	6151	br3	662
a2	1096	b2	987	c2	1140	d2	1337	br2	780			a4	6163	с4	6194	br4	659
a3	1087	b3	977	c3	1131	d3	1325	br3	974			а5	6159	с5	6168	br5	644
a4	1133	b4	1025	c4	1174	d4	1357	br4	946			a6	6122	с6	6134	br6	624
a5	1129	b5	1018	c5	1148	d5	1329	br5	919			a7	6123	с7	6128	br7	6115
a6	1092	b6	981	c6	1114	d6	1287	br6	724			a8	6160	с8	6174	br8	603
a7	1093	b7	983	c7	1108	d7	1276	br7	811			a9	6127	с9	6106		
a8	1130	b8	1023	с8	1154	d8	1212	br8	734			a10	6046	c10	6025		
a9	1093	b9	1006	с9	1086	d9	965					a11	5982	c11	5957		
a10	1012	b10	924	c10	1005	d10	1257					a12	5933	c12	5908		
a11	948	b11	866	c11	937							a13	5474	c13	5408		
a12	899	b12	827	c12	888							a14	5397	d1	6411		
a13	1219	b13	1249	c13	1153							b1	6090	d2	6354		
a14	1142	b14	1141									b2	6021	d3	6342		
												b3	6011	d4	6374		
Second ga	allery											b4	6059	d5	6346		
Lines A	mm	Lines B	mm	Lines C	mm	Lines D	mm	BR lines	mm			b5	6052	d6	6304		
1a1	1140	1b1	1140	1c1	1140			1br1	1770			b6	6015	d7	6293		
1a2	1140	1b2	1140	1c2	1140			1br2	1341	,		b7	6017	d8	6229		
1a3	1140	1b3	1140	1c3	1140			1br3	1189			b8	6057	d9	5982		
1a4	1140	1b4	1140	1c4	1140			1br4	970			b9	6040	d10	5512		
1a5	1140	1b5	1140	1c5	1140							b10	5958				
1a6	1140	1b6	1140	1c6	1140							b11	5900				
Stab1	855	Stab2	855									b12	5861				
Main Line	es									Stabilo Lines		b13	5504				
Lines A	mm	Lines B	mm	Lines C	mm	Lines D	mm	BR lines	mm	BR main	mm	b14	5396				
2a1	3900	2b1	3900	2c1	3900			2br1	2046	2br1	2265						
2a2	3900	2b2	3900	2c2	3900			2br2	2069								
2a3	3900	2b3	3900	2c3	3900												
20		,		*													

Line I	eno	ıths	D-li	q	ht l	L

Triple Seven D-light L Lines Length (mm)											LINI						
First gallery												a1	6489	c1	6530	br1	7458
Lines A	mm	Lines B	mm	Lines C	mm	Lines D	mm	BR lines	mm			a2	6420	c2	6464	br2	7199
a1	1219	b1	1108	c1	1262	d1	1463	br1	1078			аЗ	6411	с3	6454	br3	6953
a2	1150	b2	1036	c2	1196	d2	1403	br2	818			a4	6459	с4	6499	br4	6923
a3	1141	b3	1025	c3	1187	d3	1390	br3	1022			а5	6455	с5	6472	br5	6760
a4	1189	b4	1076	c4	1232	d4	1424	br4	993			а6	6416	с6	6436	br6	6555
a5	1185	b5	1068	c5	1205	d5	1395	br5	964			a7	6417	с7	6430	br7	6416
a6	1146	b6	1029	c6	1169	d6	1350	br6	760			a8	6456	с8	6478	br8	6336
a7	1147	b7	1031	c7	1163	d7	1339	br7	851			a9	6421	с9	6407		
a8	1186	b8	1073	c8	1211	d8	1272	br8	770			a10	6336	c10	6322		
a9	1147	b9	1056	с9	1140	d9	1013					a11	6269	c11	6251		
a10	1062	b10	970	c10	1055	d10	1319					a12	6217	c12	6199		
a11	995	b11	909	c11	983							a13	5744	c13	5671		
a12	943	b12	868	c12	932							a14	5657	d1	6727		
a13	1279	b13	1311	c13	1210							b1	6390	d2	6667		
a14	1198	b14	1197									b2	6318	d3	6655		
												b3	6307	d4	6688		
Second ga	allery											b4	6358	d5	6659		
Lines A	mm	Lines B	mm	Lines C	mm	Lines D	mm	BR lines	mm			b5	6350	d6	6615		
1a1	1196	1b1	1196	1c1	1196			1br1	1857			b6	6312	d7	6603		
1a2	1196	1b2	1196	1c2	1196			1br2	1407			b7	6314	d8	6536		
1a3	1196	1b3	1196	1c3	1196			1br3	1248			b8	6356	d9	6277		
1a4	1196	1b4	1196	1c4	1196			1br4	1018			b9	6338	d10	5783		
1a5	1196	1b5	1196	1c5	1196							b10	6252				
1a6	1196	1b6	1196	1c6	1196							b11	6191				
Stab1	897	Stab2	897									b12	6150				
Main Line	es									Main stabilo	3568	b13	5771				
Lines A	mm	Lines B	mm	Lines C	mm	Lines D	mm	BR lines	mm	BR main	mm	b14	5658				
 2a1	4086	2b1	4092	2c1	4092			2br1	2147	2br1	2392						
	4086	2b2	4092	2c2	4092			2br2	2171								
2a3	4086	2b3	4092	2c3	4092												

# Safety and responsibility

Paragliding is a dangerous and high risk activity, where safety depends on the person practicing it. By purchasing this equipment you implicitly state that you are a certified paragliding pilot, and you accept all risks involved in paragliding activities, including serious injury and death. Improper use or misuse of paragliding equipment considerably increases these risks.

The designer, manufacturer, distributor, wholesaler and retailer cannot and will not guarantee your safety when using this equipment, or accept responsibility for any damage, injury or death as a result of the use of this equipment. This equipment should only be used by qualified and competent pilots or by pilots under supervision of qualified paragliding instructors. You must not use this equipment if you are not trained.

You alone, as a qualified and competent pilot, must take full responsibility to ensure that you understand the correct and safe use and maintenance of this paragliding equipment, to use it only for the purpose that it was designed for, and to practice all proper safety procedures before and during its use.

## Guarantee

Triple Seven WARRANTY:

All Triple Seven paraglider products are fully warranted for 24 months against material defects which are not the result of normal wear or accidental damage.

# Registration information

To fully use all Triple Seven maintenance and warranty services you need to register your glider on our website. Wanting to provide good product support, we invite you to do so, even if you bought your glider second-hand.

#### **Triple Seven Warranty & Product registration:**

http://www.777gliders.com/tripleseven/support

## Get involved

As a new Triple Seven pilot we invite you to contact us in case of any technical or practical issues regarding equipment or techniques. We also invite you to send us your flying photos, videos or even postcards. We would like to hear from you and your exciting adventures with your new D-light! Finally, join our Facebook community and share the passion. Have fun!

## Contact

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#### Online resources

For complete help, the latest news, product information and support go to:

#### Official website:

www.777gliders.com

#### Facebook:

www.facebook.com/TripleSevenParagliders

#### **Newsletter register:**

www.777gliders.com/newsletter/subscriptions

## Ask questions, make suggestions General questions:

info@777gliders.com

# Top 5 tips

- 1. Master your takeoff and ground handling techniques. This is great way to get a feeling for the glider and basic active piloting skills while still safely on the ground.
- 2. Fly together with friends and have fun! Share exciting stories and ask questions to more experienced pilots.
- 3. Safety first, remember that its better to stay on the ground wishing to be in the air then to be in the air wishing to be on the ground. The mountain will still be there tomorrow.
- 4. Step by step, practice your equipment and techniques. Climbing is the most important! Practice it, especially in weak conditions, and don't be afraid to bomb out.
- 5. Attend safety and XC courses and learn to fly your glider safely. "Gašper Prevc"



