

**LIGHTSPEED
LIFT** 



*Roisin Willis
World Record Holder
LightSpeed Lift Supporter*

ELEVATE PERFORMANCE

LIGHTSPEED LIFT TRAINING GUIDE

**(218) 481-7242
LIGHTSPEEDLIFT.COM**



**LESS
IMPACT
HAS A**

**BIG
IMPACT** >>>

LIGHTSPEED LIFT **VISION**

PURPOSE

The purpose of this guide is to assist in using and training with LightSpeed Lift systems. This guide is intended for professionals working with clients or patients in a fitness or therapeutic setting. Conducting a physical screening to determine the users health prior to using the LightSpeed Lift system for therapy or exercise is recommended.

MISSION STATEMENT

The Mission of LightSpeed Lift is to produce and distribute equipment that safely and effectively supports people as they stand, walk or run. The use of LightSpeed Body Weight Support systems during activity will increase speed, reduce recovery time, and promote safe mobility for Every Body.

VISION

The vision of LightSpeed Lift is to become the premier Body Weight Support System for the running and rehabilitation market. People will recognize that walking and running with the LightSpeed Lift support is an efficient, effective, and practical way to achieve better health and happiness.

LIGHTSPEED LIFT IS A PATENTED SYSTEM. ANY INFRINGEMENT OF THE PATENT IS STRICTLY FORBIDDEN

US PATENT 9,370,680 B1, ISSUED JUNE 21, 2016

STATEMENT FROM THE FOUNDER, MALCOLM MACAULAY, MS, PT

"LightSpeed Lift is a tool that can change lives. After over 25 years of using Body Weight Suspension, I have seen so many smiles and heard so many "ah-ha's!," from so many people, I've never grown casual about the life-changing force that LightSpeed Lift provides.

Maybe you or a client have gained weight, and walking causes pain and requires more exertion than seems healthy. Perhaps you or a client are a long-time runner resigned to just getting slower but still long to experience the joy of running fast -whatever fast is to you- again. An injury or surgery may have caused a hitch in your giddyup that won't go away. Experiencing weakness from a stroke, accident, misuse, disuse, or critical injury can sap you and make getting back on your feet impossible.

Whatever the reason or challenge, you owe it to yourself and your clients to try exercising with a LightSpeed Lift Body Weight Suspension system. Countering 20-40 pounds of gravity while stabilizing balance will significantly boost the body's movement memory. Like any new experience, it may take several times using LightSpeed Lift until you fully appreciate the boost that our Body Weight Suspension system can give to your overall vitality. Be persistent. Keep using your new LightSpeed Lift! Your exercise experience and results will surely reach a new level!"

**DON'T WAIT! YOU AND YOUR CLIENTS DESERVE BETTER HEALTH RIGHT NOW.
LIGHTSPEED LIFT—MOVEMENT FOR EVERY BODY!**



Malcolm Macaulay, Inventor & CEO

LIGHTSPEED LIFT **ANATOMY**

LS-300 & LSP-400

For the LS-300 (not shown) and LSP-400 Models, there are slight variants to the size of the uprights, yet the overall features of the two models are the same.

LSP-400

1 Uprights: There are four uprights with numbered slots for Attachment Bars.

2. Attachment Bars: Both attachment bars should be placed at the same height on the front and rear uprights. Eye Bolts are in the middle of the bar on the bottom surface. Attachment bars are released by lifting gently, then rotating the bottom out. To insert in a new slot, place the top end first, rotate the bottom into the slot, then drop down.

3. Gusset Plates: Eight plates, two on each upright, secure the uprights.

4. Floor Supports: Left and Right floor supports connect the LightSpeed system front to back and are the attachment site for the base plate. Ensure these bars are level on the floor.

5. Base Plate: This heavy support bar holds the left and right sides of the LightSpeed Lift system together.



LSP-400

The attachment bars should be removed from the frame when the treadmill is used without attaching the user to the LightSpeed Lift system.

LSX-500

1. Uprights: There are four uprights with numbered slots for Attachment Bars.

2. Attachment Bars: Same as the 3 & 400 systems.

3. Floor Supports: Left and right floor supports rest on the floor connecting the LightSpeed Lift system front to back. Ensure these bars sit flush and level on the floor.

4. Front and Rear Floor Stabilizing Bars: These bars keep the bottom of the frame square.

5. Banner: Two steel banner pieces fit outside the frame on the top of the LSX-500.

6. Header Bars: Header bars connect the banner, the Uprights and the Overhead Cage.

7. Overhead Cage: Two sections of steel tubing support the overhead safety straps.

*** Overhead Support Harness (Shown & explained on page 7):** Two nylon straps, blue and red, are connected to the frame through the Overhead Cage and a Nylon Tension Strap.

*** Nylon Tension Strap (Shown & explained on page 7):** is looped around the Left and Right Over Head Cage Bar, with the lower section being threaded through the top end of the Overhead Safety Strap.



LSX-500

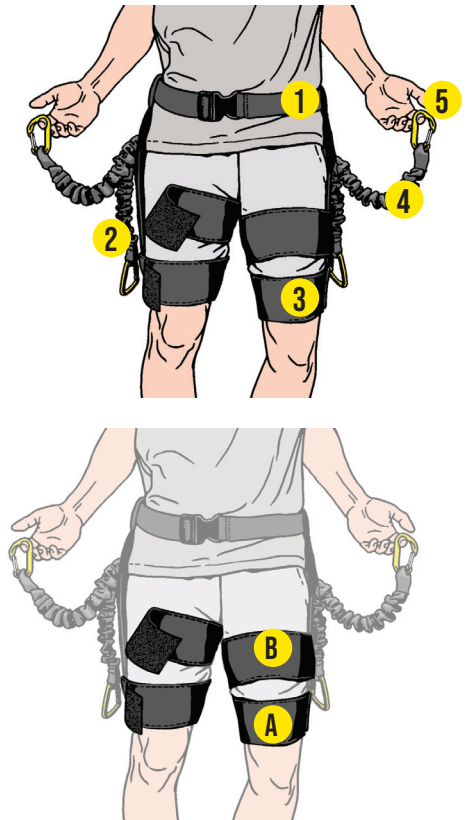


LIGHTSPEED LIFT

UNIVERSAL LIFT BELT AND SUPER LIFT BELT

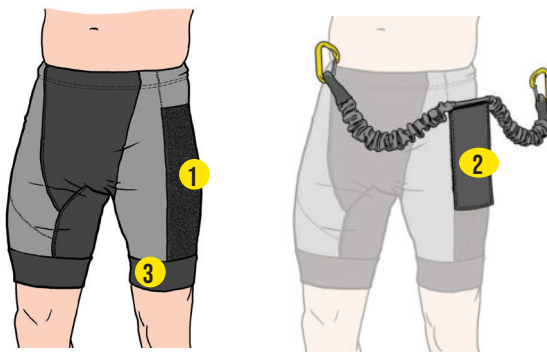
The Tubular nylon covering the biasing cords on the Universal Lift Belt is Black.
The Tubular nylon covering the biasing cords on the Super Lift Belt is Yellow, and
The Super Lift Belt has 40% more lift and support compared to the Universal Lift Belt.

- 1. Waist Belt:** The waist belt holds the downward straps in position during positioning and wrapping. Position comfortably above the waist. Need not be tight.
- 2. Downward Strap:** with loop velcro facing out. Attachment for Elastic Leg Wraps.
- 3. Elastic Wraps:** There are two adjustable 4" elastic wraps on each Downward Strap. Position the lower wrap (A) on the bottom of the Downward Strap then around the thigh so that the wrap is approximately 1" above the patella. Pull snugly. The upper Elastic Wrap (B) is placed 2-3" above the lower wrap. Pull gently around the thigh making sure it does not ride up into the groin.
- 4. Biasing Cords:** The Biasing Cords, enclosed in either black or yellow tubular nylon are at the heart of the LightSpeed Lift. The Super Lift Belt with the Yellow Tubular cover has a stronger biasing cord to provide 40% more lift and stability.
- 5. Carabiners:** Carabiners connect the Biasing Cords to the Attachment Bars.



MAGIC SHORTS AND LIFT STRAPS

Magic Shorts: Breathable moisture-wicking material provides comfort and mobility. Durable side panels (1) with medical grade loop Velcro accept and secure the Lift Straps (2) keeping the patented Tri-planer lift force centered during the most demanding runs. Four inch elastic webbing (3) on the bottom of the shorts ensures the fit and keeps the shorts stable while running.



FINDING THE RIGHT HEIGHT AND LATCHING IN



EXERCISE PROGRAMS

SORE MUSCLES AND JOINTS

(Hips, Knees, Ankle, Foot, Etc.)

Begin with 12" of Lift. Start walking or running. If gait is still painful, adjust the bars upward one or two notches to create more Lift and decrease the joint load.

- > Start Slowly!
- > It's ok to hold onto the bars or straps, but a free arm swing is best.
- > Set the incline to 2-3%. This decreases impact stress.
- > Gradually increase the duration of exercise and increase the speed.
- > Arthritis pain varies, so the exercise speed and duration vary based on symptoms.
- > If pain increases, move the bars up one notch for increased Lift.
- > If you're feeling good, go slightly faster or longer.

BEGINNING A WALKING OR RUNNING PROGRAM

Begin with 12" of Lift. If the gait is still painful, adjust the bars up one or two notches

- > Keep the pace conversational during the first few sessions.
- > Increase the duration before increasing the pace!
- > Use 2-3% elevation to recreate the stress of running outside.
- > At the 3rd or 4th session, increase the speed to 0.5-1 mph faster than your normal pace. Keep the same duration.
- > Use LightSpeed Lift 6-8 sessions before you walk/run at full Body Weight either on a treadmill or outside.
- > Ongoing program: Alternate 1-2 sessions of LightSpeed Body Weight Support training with 1-2 sessions of full Body Weight exercise.

DIABETES AND WEIGHT LOSS

Begin with 12" of Lift. If the gait is still painful, adjust the bars up one or two notches

- > Use extra lift—start with the bar 14" above the hip vs. 12" normally used.
- > Begin slowly and seek to add duration.
- > Use 3% incline.
- > Try to alternate running and walking even without increasing the speed. This fuels a feeling of accomplishment.
- > Vary the speeds.
- > Use hand weights and upper body movement to increase the intensity.

IMPROVING SPEED AND RAISING ANAEROBIC THRESHOLD

- > Your LightSpeed Lift Training Pace (LS-TP) should be 30 seconds/mile faster than a normal, training pace (N-TP).
- > If N-TP = 9 min/mile (6.7 mph) then LS-TP would be 8.5 min/mile (7 mph).
- > Practice 2 runs at the LS-TP for a normal training duration.
- > After the 2 acclimating sessions:
 - > 5 min. Warm-up at normal TP
 - > 1' LS-TP. - 2' LS-TP + 1mph.
- > Alternate this 5-15 times, then cool down for 5' at normal TP.

HELPING WITH BALANCE AND CONFIDENCE

Muscular weakness, Dizziness, Poor Endurance, Stroke rehab., Traumatic Brain Injury:

- > Assume a slow progression in duration and speed.
- > Assume that the LightSpeed Lift may feel strange and uncomfortable at first.
- > Allow time for standing and getting used to the Lift feel prior to starting the Treadmill.
- > Practice the safety stop.
- > Practice balance challenges with the treadmill belt stopped.
- > Practice stepping on and off the belt at slow speeds.
- > Practice walking while holding the elastic straps.
- > Practice running even at walking speeds—it's empowering to run!

STRESS, ANXIETY, AND DEPRESSION

- > Aerobic exercise is a prime antidote to stress!
- > Keep the sessions easy in speed and effort but seek to increase the duration.
- > Longer duration exercise increases the therapeutic effect of exercise!
- > Continue to challenge and change up your workouts.
- > Keep a log!
- > Be consistent!
- > Set goals: distance, speed, duration, a long hike with friends/family, a race.

SETTING
THE HEIGHT



LATCHING IN



LIGHTSPEED LIFT **ANATOMY**

OVERHEAD SAFETY HARNESS AND NYLON TENSION STRAP*

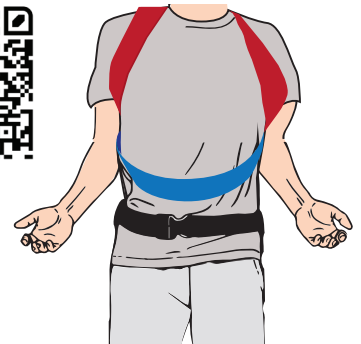
Built for the LSX-500, the support harness adds safety and stability while working with clients or athletes who pose a higher risk of falling due to speed or activity. The overhead harness is not designed to provide lift. Carefully inspect the fit of the harness, so it does not constrict blood flow or pose any sort of hazard. Regularly check the straps for wear. Contact LightSpeed Lift for any questions regarding your harness.

Two 2" nylon webbing loops: One red, one blue

One nylon tension strap with metal clinch clasp.

The Safety Harness connects to the nylon tension strap between the Overhead Cage bars

Test before public use.



ADDITIONAL **INFORMATION**

CARE INSTRUCTIONS

Frame: Regularly wipe down steel. Check bolts for tightness every six months.

Lift Belts and Lift Straps: Inspect stitching for signs of wear or loose stitching and repair as needed or send back to LightSpeed Lift for repair. The Belts can be laundered. The Leg Wraps will eventually lose elasticity. Order Replacements from LightSpeed Lift.

Magic Shorts: Machine washable. Dry on low heat.

Warranty:

Frame: 5 years

Lift Straps: 2 Years

Lift Belts: 2 Years

Leg Wraps: 1 Year

We are dedicated to your continued success! We want to be part of your Team just as you are a part of ours. Please feel free to reach out to us at any time with feedback, questions, or opportunities. We look forward to hearing how you are making a change! If you ever find yourself in Duluth, MN, and would like a tour of our operation, please reach out to us! We warmly invite visitors!

(218) 481-7242

LightSpeedlift.net

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LIGHTSPEED LIFT



Thank you for your support and interest in LightSpeed Lift. We look forward to working with you for years to come!

SEND US YOUR LIGHTSPEED SUCCESS STORIES

LIGHTSPEEDLIFT.COM

