

BISHOP TELEMAR BINDING MANUAL V4.0

Thank you for purchasing the Bomber "Bishop" Telemark binding. We have designed and built this binding to offer top performance and durability. PLEASE READ THIS ENTIRE DOCUMENT BEFORE INSTALLATION AND USE.

Understand that Telemark skiing is a hazardous sport. No matter how good or careful you are, you risk injury when you telemark ski. We urge you to ski in control and obey the area's responsibility code. Bomber Industries, Inc. will not be liable for any direct or indirect injuries or damages caused by the use of this product.

The Bomber "Bishop" Telemark binding is NON-RELEASABLE. In the event of a crash or loss of control they will NOT RELEASE.



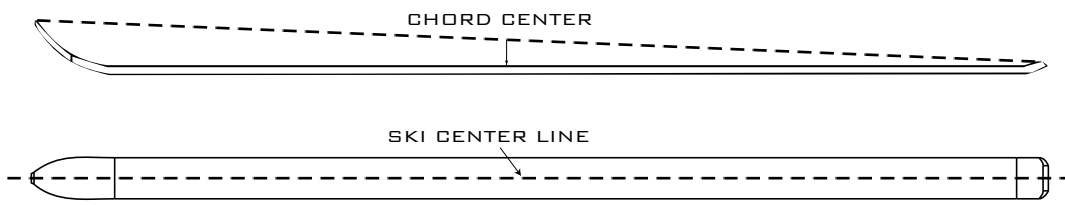
Tools Needed:	Tape measure	Chamfering Bit or Large Drill
	Tape	Drill Stop
	Hammer	#3 Pozidrive Screw Driver
	Center Punch	Wood Glue
	Pen	3.5mm or 9/64" Drill

If you are not comfortable drilling into your own skis and mounting your bindings, please go to your local ski shop and have an underpaid and overworked ski tech do this for you.

MOUNTING TO SKI

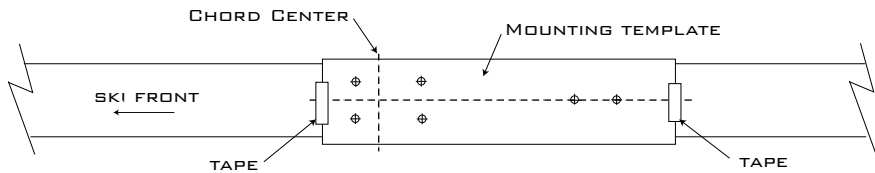
1a If you have skis with the new "Telemark Insert Pattern" (threaded inserts in the ski) you are in luck. You can skip all the mumbo-jumbo below and jump to step #6 and the only tool you need is a screw driver. You're done, move on to the next step - "Mounting Binding and Boot Fitting". We love threaded inserts.

1b Find the CHORD CENTER of the ski by measuring the length of the skis from the tip to the tail. The middle point of this measurement (total length divided by 2) is the CHORD CENTER of the ski. Mark this point on the ski with your pen. At the same time, measure and mark the SKI CENTER LINE.



Line up the supplied template with these marks. Tip: cut the paper template along the "Chord Center" line, this makes lining it up on the ski much easier. Tape the ends of the template to the top of the ski.

Suggestion: We find mounting the binding at *least* 1cm forward of CHORD CENTER is a way to get your ski to initiate the turn more efficiently. This is highly debatable and controversial but, hey, that is why we called it a suggestion.



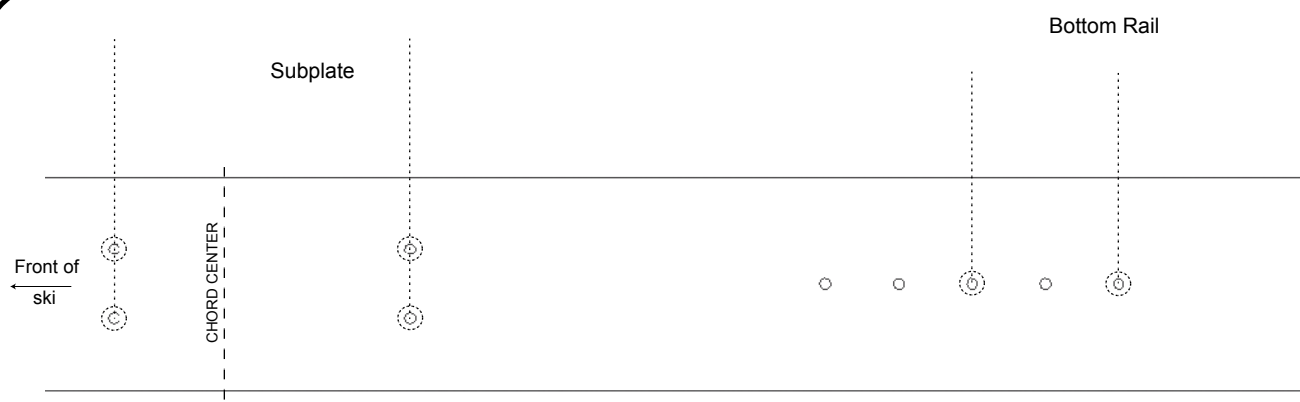
2 Using the CENTER PUNCH or a NAIL, punch all six (6) of the mounting hole center marks. Remove the template. Drill all six holes 3/8" (9.5mm) deep. These holes MUST be at least this deep or the screws may dimple the base of the ski.

WARNING: use either a DRILL STOP or in a pinch, wrap tape around the DRILL at the depth mark and use this as a visual guide ONLY! Holes in the bottom of your skis are bad.

3 When you drill the holes they should look nice and flush with the top of the ski. However, when the screws get installed, chances are the top sheet will bulge up (vacano effect) and cause problems with the binding laying flat on the ski. Use the CHAMFER tool to put a small chamfer on the holes. In a pinch, you can use a large drill (1/4" or 3/8") and JUST use the tip of this drill as a chamfer tool. Do not go nuts with the chamfering, just a small shallow chamfer is all you need.

4 Put a good amount of WOOD GLUE into each hole. Use a small nail or paper clip to work the glue into the holes. Wipe any excess glue from the top sheet of the ski.

Note on EPOXY: Some people swear by the strength gains of epoxy. Our own studies have shown that advantages are not significant and the down side is epoxy can react badly with some ski cores, and it takes major ski surgery to remove these screws if needed. With a well built ski and properly designed bindings (i.e. very low screw height) you will be just fine with using wood glue.

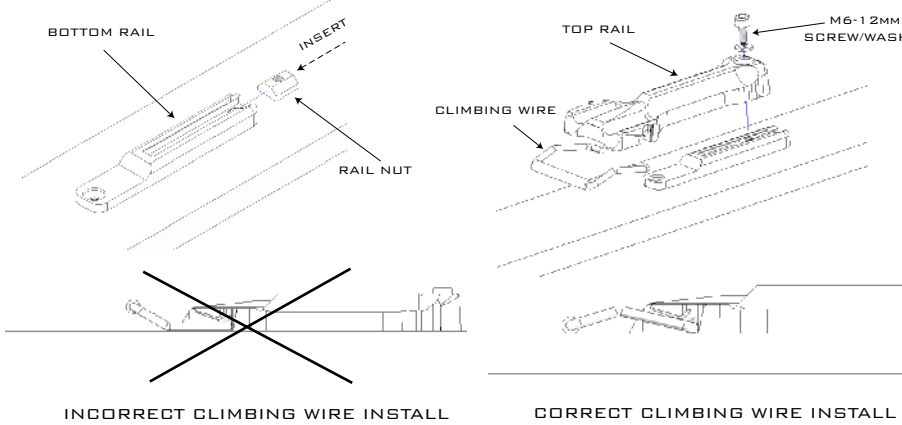


Place SUBPLATE and BOTTOM RAIL onto ski and line up the holes on each part with the drilled holes on the ski. Insert the supplied SKI SCREWS (13mm long) and tighten them down with a #3 POSIDRIVE screw driver. For skis with threaded inserts use the supplied screws for your skis and tighten down with a Phillips screw driver. The indicates where the holes are from the template and the holes to use if your skis have inserts. Check these screws for tightness at regular intervals.

Alternate Mounting Position: both the SUBPLATE and BOTTOM RAIL have an extra set of mounting holes that allow you to move the Bishops 2.7cm (1.06") forward from the original mount. Combined with the Bishop's upper position adjustment you can go as far as 3.7cm (1.46") forward! And even more than that with skis with double sets of inserts. We love threaded inserts.

MOUNTING BINDING AND BOOT FITTING

1 INSTALL TOP RAIL:
Slide the RAIL NUT into the channel of the BOTTOM RAIL.

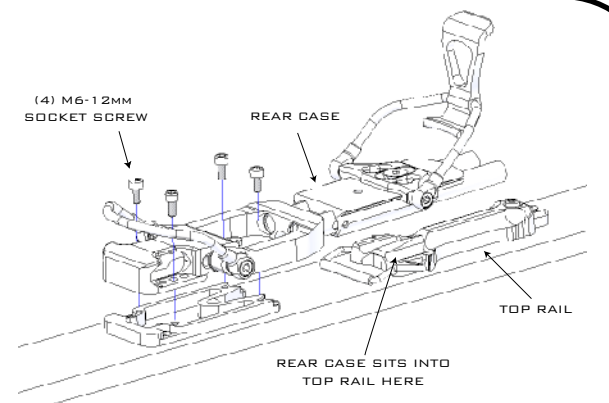


Install the TOP RAIL over the BOTTOM RAIL and make sure the hole at the end of the TOP RAIL lines up with the RAIL NUT. Insert the M6-12mm SOCKET SCREW and WASHER into the TOP RAIL, through the BOTTOM RAIL, and into the RAIL NUT. Do not tighten down yet, allow the TOP RAIL to slide back and forth.

Make sure you have the CLIMBING WIRE correctly installed in the proper position. See pictures on right.

2 MOUNT BINDING TO SUBPLATE:

Place the TOE BLOCK onto the SUBPLATE and line up the holes with the threaded holes in the SUBPLATE. Install the supplied (4) M6-12mm SOCKET SCREWS through the TOE BLOCK and into the SUBPLATE.



Before tightening the (4) SCREWS down make sure the REAR CASE is sitting on the front section of the TOP RAIL. This will automatically make sure the entire binding is perfectly lined up with the ski. NOW tighten down the (4) SCREWS. Use the supplied 5mm HEX KEY.

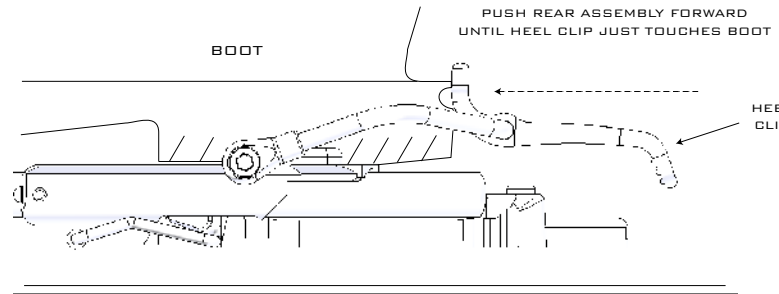
3 FIT THE BOOT:

We highly recommend the following steps with the boot by itself as opposed to being worn by the over anxious skier. Only after ALL installations and adjustments have been made, do we recommend the "carpet test" with your boots on.

Remove the M8-12mm FLAT HEAD SCREW from the SOLE BLOCK. Place the boot into the TOE BAIL making sure it is all the way forward.

The Bomber "Bishop" is NOT AMBIDEXTROUS, there is a right and left binding which is clearly marked on the KNUCKLE of each binding with an "L" and "R".

Place the heel of the boot onto the SOLE BLOCK and then slide the entire REAR ASSEMBLY forward until the end of the HEEL CLIP just touches the back of the boot. (See picture). Remove the boot (careful not to move the REAR ASSEMBLY) and then re-install the M8 SCREW and tighten down with the 5mm HEX KEY.

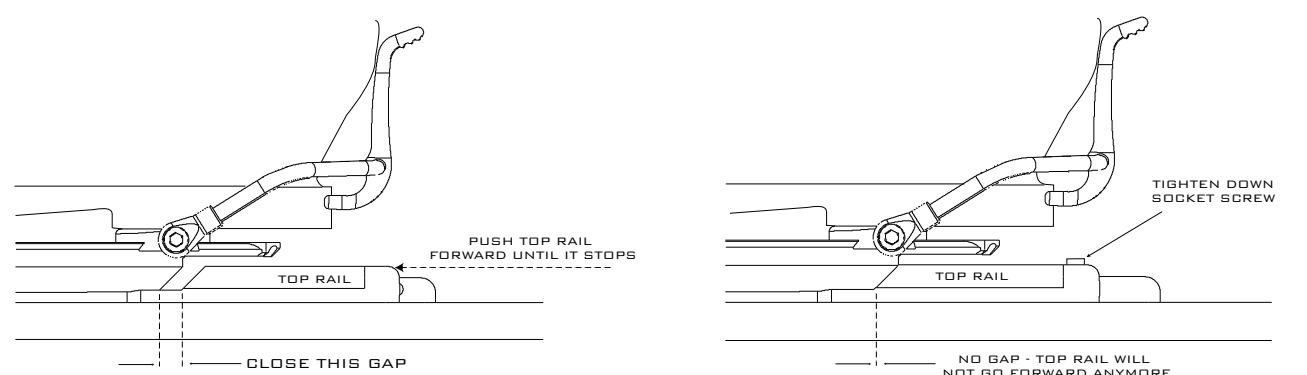


What you are looking for is a good strong "snap" from the HEEL CLIP but not so tight that it is hard to get into the binding.

4 ADJUST THE TOP RAIL:

VERY IMPORTANT! Do not skip this step. The TOP RAIL is a unique feature of the Bomber "Bishop" Telemark binding. It maintains constant forward pressure on the binding every time you step down and it keeps the boot from slipping out the back of the binding, something we believe is a short-coming with other bindings. Skipping this step will result in "Don Rickles" like taunts from us as we pass over you on the chair.

When all other adjustments are made (or changed) and the boot is installed in the binding, that is the time to make this adjustment. It will always be the last thing you do. With the boot and binding in the down position (flat on ski) slide the TOP RAIL forward until it stops. You will know it is there because if you go any further, the boot/binding will start to lift up. Now tighten down the M6-12mm SOCKET CAP SCREW in the TOP RAIL.



You are now ready to use and enjoy the Bomber "Bishop" Telemark binding. However, proceed to the "PERFORMANCE ADJUSTMENTS" section to learn more about ways to make the binding feel the way that works best for you.

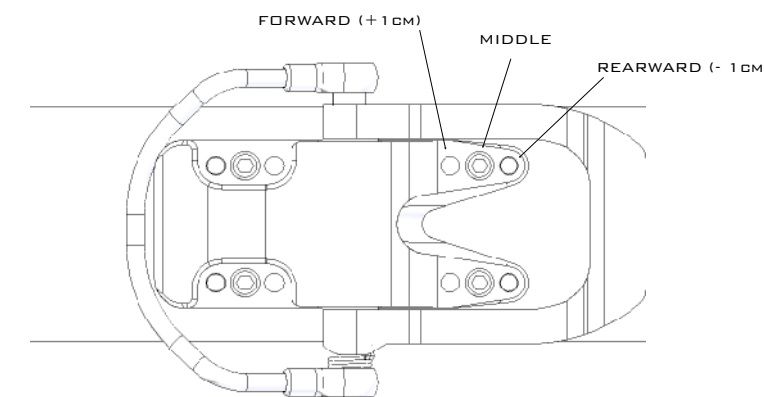
PERFORMANCE ADJUSTMENTS

The Bomber "Bishop" Telemark binding has three core adjustments that will allow you to make the binding feel and perform the way that feels best for you. We highly recommend taking the time to experiment with some or all of these adjustments.

BINDING POSITION ON SKI

The FRONT BLOCK of the binding has three sets of mounting holes. Moving the binding forward or rearward (1cm) from the middle set can greatly effect how your skis feel and perform. Just remove the (4) M6-12mm SOCKET SCREWS, reposition the binding, and then reinstall the screws.

This also can be used to bring the boot back to the same spot if you make adjustments to the MAIN PIN position (see "Main Pivot Position" below). Don't forget to readjust the TOP RAIL to match this new binding position ("Mounting Binding" section #4).

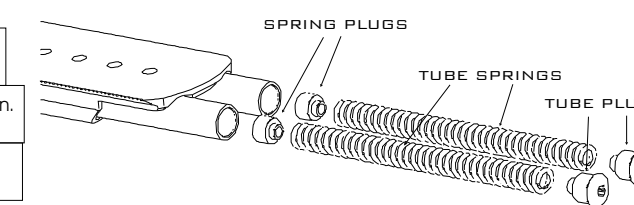


CHANGEABLE SPRING RATES

There are two configuration available for the Bishop at the time of purchase, "Performance" and "Tour". Each one will affect the amount of heel retention the binding puts on your boot. In other words, the amount of resistance you feel from the binding when you "drop the knee".

To change the TUBE SPRINGS, remove the TUBE PLUGS (5mm Hex Key) and then remove the TUBE SPRINGS. Before inserting the TUBE SPRINGS make sure to lightly coat them in a water proof, low temperature grease like the "Bomber Butter" that is for sale on our website. Make sure the SPRING PLUG is in place (see picture) when reinstalling the springs. Reinstall the TUBE PLUGS being VERY careful to align the threads before applying force. DO NOT over tighten these TUBE PLUGS, the tension from the springs acts like a spring washer and keeps them in place. Over tightening them could damage the TUBES. Put a little of the same grease on the threads and just SNUG it down.

Model	Springs	Characteristics
PERFORMANCE	(2) Hard Springs	Maximum forward boot pressure and heel retention. Resort/performance skiing. Medium/heavy skiers.
TOUR	(1) Soft Spring (1) Hard Spring	Medium forward boot pressure and heel retention. Touring and resort skiing. Light weight skiers.



MAIN PIVOT POSITION

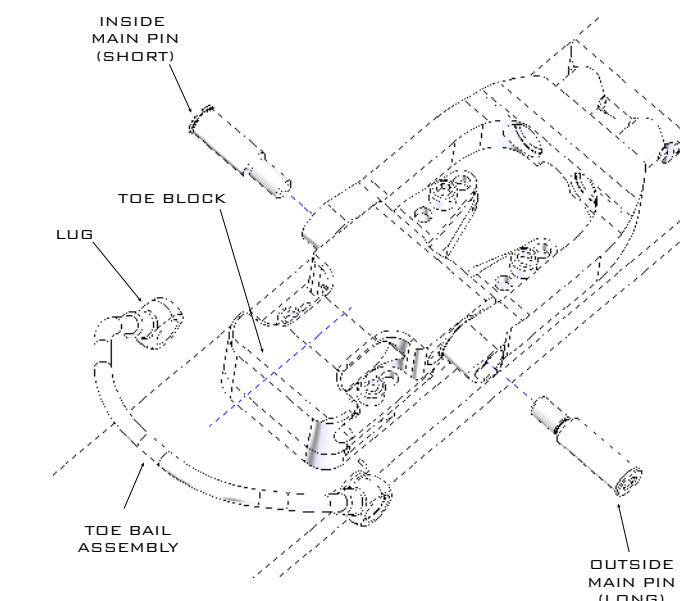
This is the grand-daddy adjustment of them all. This one single adjustment will greatly affect the feel of your Bomber "Bishop" bindings. This adjustment can be made on the hill, but we do not recommend it. Our philosophy is, find a setting that works for you under most conditions, and stick with that.

Remove the MAIN PINS from the TOE BLOCK. Remove the TOE BAIL assembly, being careful not to rotate the LUGS or lose the BAIL RETURN SPRING. Move the KNUCKLE to the desired pivot position and then re-install the MAIN PINS.

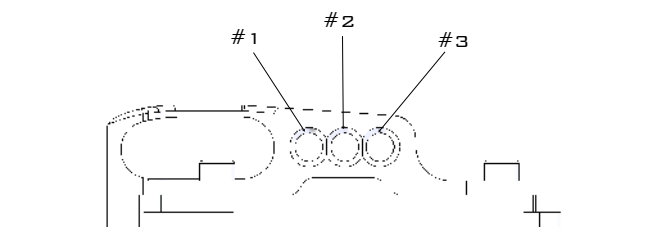
Please note that the MAIN PINS come in a SHORT and a LONG length. The LONG MAIN PIN goes on the outside of the binding and is marked with a circle on the head of the pin. The SHORT MAIN PIN goes on the inside of the binding. You MUST put a dab of thread-lock on the PIN threads and a bit of water proof grease on the shoulder area of the MAIN PINS. Make sure to tighten down both MAIN PINS quite tight and check these periodically for tightness.

Now, some of you might have already figured out that by moving the MAIN PIVOT POINT you are also moving the boot fore and aft as well. You can offset this effect by taking advantage of the "Binding Position on Ski" adjustment described up top. For example, say to run the MAIN PIVOT in the #3 position (rear) you are now moving your boot back 1 cm relative to the ski. So moving the entire binding forward one setting on the SUBPLATE will offset this and put you back in the same spot.

Don't forget to readjust the TOP RAIL to match this new binding position ("Mounting Binding" section #4).



PIVOT POSITION	PERFORMANCE
#1 / FORWARD	Very "neutral" feeling binding. Super touring mode. Boot bellows break is minimized.
#2 / MIDDLE	Medium resistance from the binding. Combination of good touring and good descending. Boot bellows break is similar to other standard telemark binding toe boxes. Recommended starting point.
#3 / REAR	Maximum resistance from the binding. Resort skiing with optimized down hill performance. Boot bellows break is maximized.



MAINTENANCE

Like any piece of performance equipment, the Bomber "Bishop" Telemark binding needs a little loving now and then.

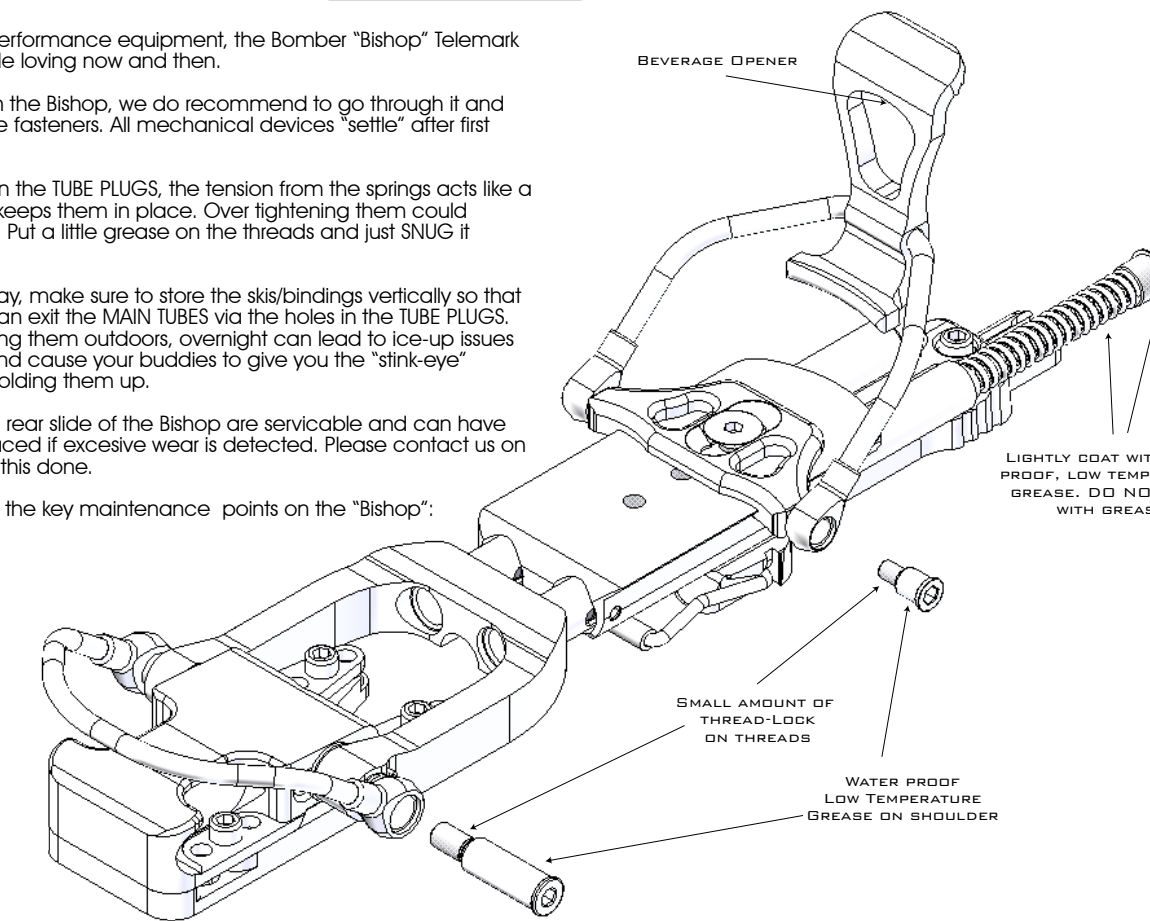
After the first day on the Bishop, we do recommend to go through it and re-tightening ALL the fasteners. All mechanical devices "settle" after first being used.

DO NOT over tighten the TUBE PLUGS, the tension from the springs acts like a spring washer and keeps them in place. Over tightening them could damage the TUBES. Put a little grease on the threads and just SNUG it down.

At the end of the day, make sure to store the skis/bindings vertically so that the melting snow can exit the MAIN TUBES via the holes in the TUBE PLUGS. Like any gear, leaving them outdoors, overnight can lead to ice-up issues the next morning and cause your buddies to give you the "stink-eye" because you are holding them up.

The main pivot and rear slide of the Bishop are serviceable and can have the "bushings" replaced if excessive wear is detected. Please contact us on how you can have this done.

The diagram shows the key maintenance points on the "Bishop":



TIPS AND TRICKS

! When adjusting the binding on the hill, take the time to clean out ALL the snow and ice from the 5mm sockets found on all the fasteners. Not doing so may result in stripping the socket.

! While transporting the skis, the bindings have a tendency to "pivot freely" and treat your hands like King Louis XVI's head in a guillotine during the French Revolution. To keep this from happening, put the two skis together via ski/binding leash (available at www.bomberfele.com), then clip the leash from each binding to the other binding. You can travel without losing your head - or your hands.

! Due to advancements in computer power and modern day manufacturing, Bomber has been able to integrate a beverage bottle opener on the HEEL CLIP of the Bishop. Please be responsible and share with friends.

Available Accessories:

- ! Second Ski Kit
- ! Ankle Type Safety Leash
- ! Ski Binding Strap
- ! 5mm Knuckle-Saver Shop Wrench
- ! Main Tube Springs - Soft and Hard
- ! "Bomber Butter" - Low temp grease
- ! Bomber Swag: Hats, boot bag, stickers



Manufactured by:
BOMBER INDUSTRIES, Inc.
P.O. Box 1667, 129 W. 10th St. Unit A
Silverthorne, CO, 80498, USA
Phone: 970-513-7733 Fax: 970-513-7833
E-Mail: bomber@bomberfele.com
www.bomberfele.com

LIMITED THREE YEAR WARRANTY

The Bomber "Bishop" Telemark Binding is warranted by Bomber Industries, Inc., to be free from defects in workmanship and materials to the original purchaser for a period of THREE YEARS from the date of purchase. In the event of a defect in workmanship or materials covered by this warranty, Bomber Industries will either repair or replace the defective components at its option, at no cost to the Purchaser except for transportation and shipping charges. Warranty does not cover finish, fading, or normal wear. The warranty does not cover stripped or damaged screw heads or threads. The warranty does not cover bindings that have been abused or mis-used in any way. Please contact us BEFORE sending your product in for warranty. You will need to include your proof of purchase. ANY ATTEMPT BY THE PURCHASER TO REPAIR OR MODIFY THE BOMBER BISHOP TELEMAR BINDING WILL VOID THE WARRANTY.

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