

# ARC BRUSHES AND ROLLERS

## 3.0 TEMPERED STEEL

### ARCA0200

The special 3.0 tempered steel brush is used for the ski-base speeding process in fast disciplines. It has the function of micro-scratching the ski structure to allow a better flow of the micro-drops of water agglomerated in a globular shape between the ski-base and the snow. It is used on the saturation paraffin without scraping it so that the excess paraffin



layer lubricates the mechanical action of the steel wires. The brush must be held crosswise with respect to the ski and tilted at 45 ° with respect to the ski-base so that the steel wires run freely and micro-scratch the ski-base without jamming. Brush at least 5/10 times the ski-base from tip to tail without stopping so to remove the excess paraffin without showing the ski-structure. It is a fundamental procedure for speed disciplines.

## 2.5 TEMPERED STEEL ANGLED WIRES with containment nylon loop

### ARCA0210

The 2.5 tempered steel brush is used in the World Cup for the first brushing of any racing paraffin in fast disciplines and for the acceleration process of the base in technical disciplines. It has the function of micro-scratching the ski-base structure to allow a better flow of the micro-drops of water agglomerated in a globular form between the ski base and



the snow. It is used after removing the excess of saturation paraffin with the plexy scraper, without making the ski-base structure appear, so that a thin layer of paraffin remains to lubricate the mechanical action of the steel wires. The brush has angled wires so that they slide freely and straighten the base without jamming. 3 brushing cycles are carried out from tip to tail with wavy movements, making the ski-base structure appear. The external nylon wire loop prevents the metal wires from bending outwards.

## 2.0 HARD STAINLESS STEEL ANGLED WIRES with containment nylon loop

### ARCA0160

It is used for the first brushing of any type of racing paraffin in all disciplines. It removes the excess of paraffin left by the plexy scraper and it maintains the function of micro-scratching the impression to allow a better flow of micro-drops of



water agglomerated in a globular form between the ski base and the snow. The brush has the wires inclined in such a way that they run freely and straighten the base without jamming. 3 brushing cycles are carried out from tip to tail with wavy movements, making the ski-base structure appear. The external nylon wire loop prevents the metal wires from bending outwards.

### **1.0 SOFT STAINLESS STEEL with containment nylon loop**

ARCA0110

ARCA0165

ARCA0335

ARCA0365

It is used to deeply free the ski-structure base with any type of high melting point, microcrystalline, hard racing paraffin. It also has the function of micro-scratching the ski-structure base more finely to allow a better flow of the micro-drops of water agglomerated in a globular form between ski base and the snow. Finally, this brush can also be used during the



cleaning of the base to make the detergent act in depth. 3 brushing cycles are performed from tip to tail with wavy movements (manual brushes), freeing the micro-incisions of the ski-structure base in depth. The manual brushes are made with the outer lap in nylon to prevent the metal wires from bending outwards. The ROTO brushes are made with a spiral insertion to increase the surface and the brushing capacity without leaving vertical stripes on the ski-base as with standard rotating brushes.

### **HARD BRASS with containment nylon loop**

ARCA0120

ARCA0170

It has the same use of the 2.0 HARD STAINLESS STEEL but, unlike the steel, it does not have the function of micro-scratching the ski-structure base. Therefore some ski-men in both Alpine and Nordic World Cup prefer to use rigid brass



for the first brushing of racing paraffins. 3 brushing cycles are carried out from tip to tail with wavy movements, making the ski-base structure appear. The manual brushes are made with the outer lap in nylon to prevent the metal wires from bending outwards.

### **SOFT BRASS with containment nylon loop**

ARCA0125

ARCA0175

ARCA0340

ARCA0370

It has the same use of 1.0 SOFT STAINLESS STEEL, unlike the steel, it does not have the function of finely micro-scratching the ski-base structure. Therefore, some World Cup ski-men in both Alpine and Nordic skiing prefer to use the soft brass to deeply free the ski-structure with every type of high-melting point, hard microcrystalline racing paraffin. Furthermore, this brush is commonly used during the cleaning operations of the ski-base to make the detergent act in depth. 3 brushing cycles are carried out from tip to tail with wavy movements (manual brushes), deeply freeing the micro-grooves of the ski-structure. The manual brushes are made with the outer lap in nylon to prevent the metal wires



from bending outwards. ROTO brushes are made with a spiral insertion to increase the surface and brushing capacity without leaving vertical stripes on the base as with standard rotating brushes.

## **TAMPICO**

ARCA0100

ARCA0150

ARCA0330

ARCA360

Tampico is a natural vegetable fiber obtained by drying from an agave from the semi-desert areas of northern Mexico, the Lechuguilla. It is a flexible and resistant material with a very fine texture that keeps its qualities unchanged over time. The natural color of the fiber is creamy white and its main feature is a unique micro abrasiveness due to the



presence of incorporated calcium oxalate crystals. The tampico is used for the second brushing of the ski-base by smoothing the micro-scratching work started with the metal brushes at the micrometric level. 3 brushing cycles are carried out from tip to tail with wavy movements (manual brushes), removing the paraffin residues left on the ski-base by working with the metal wires. The WORLD CUP manual brushes are made with an innovative and exclusive diagonal insertion, scientifically studied, which evenly distributes the brushing surface and increases the removal capacity of the paraffin. ROTO brushes are made with a spiral insertion to increase the surface and brushing capacity without leaving vertical stripes on the base as with standard rotating brushes.

## **HARD HORSEHAIR**

ARCA0140

ARCA0190

ARCA0345

ARCA375

Coming from the tail or the mane of horses, it is a very fine hair that has excellent brushing properties and uniform distribution of brushed substances. The stiffness depends on the height of the cut which differentiates its use. The stiff horsehair is cut very short, therefore it is proposed for deep brushing in the micro-cavities of the ski-base after using the tampico and in any case before the final polishing. 3 brushing cycles are carried out from tip to tail with wavy



movements (manual brushes), uniformly distributing and definitively removing the paraffin residues left by previous processes. The stiff horsehair brush is also used by many ski-men in the World Cup with a forward/backward movement exerting pressure on its entire surface for the uniform distribution of waxes after hot or cold application. The WORLD CUP manual brushes are made with an innovative and exclusive diagonal insertion, scientifically studied, which evenly distributes the brushing surface and increases the removal capacity of the paraffin. The ROTO brushes are made with spiral insertion to increase the surface and brushing capacity without leaving vertical stripes on the base with standard rotating brushes.

## **HARD NYLON**

ARCA0130

ARCA0180

The rigid nylon brush is used for smoothing and polishing the surface of the ski-base with any type of paraffin. The rigidity is given by the large diameter of the nylon threads in such a way as to have a support surface with rounded cusps. Its regular use allows you to round and polish the ridges of the ski-structure and micro-scratches made with metal wires improving the lateral sliding of the slab, a decisive factor in maintaining speed. This brush is used with forward /



backward movements applying pressure on its entire surface. 3 brushing cycles are carried out, evenly distributing and polishing the surface layer of paraffin. In the World Cup it is widely used to speed up the base with both saturation paraffin and racing paraffin before final polishing with the soft nylon or the soft horsehair. The WORLD CUP manual brushes are made with an innovative and exclusive diagonal insertion, scientifically studied, which evenly distributes the brushing surface and increases the removal capacity of the paraffin.

### **SOFT NYLON**

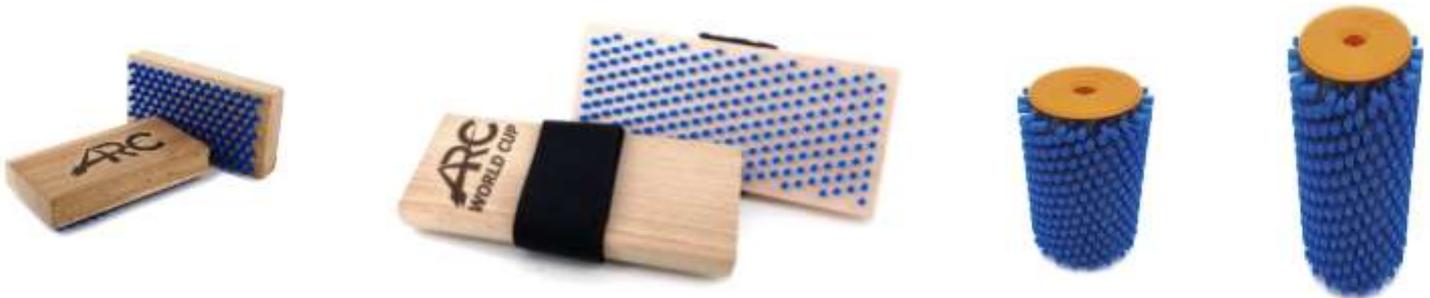
ARCA0135

ARCA0185

ARCA0350

ARCA380

The blue soft nylon brush is the most used brush in the World Cup for the final deep polishing of the ski-base structure. The fine wire and the short cut, combined with the narrow tuft insertion and the characteristics of non-deformability and elasticity typical of nylon, allow even the finest cuts of the ski structure to be polished. 3 brushing cycles are carried



out from tip to tail with wavy movements, obtaining a perfectly shiny ski-structure ready for competitive performance. The WORLD CUP manual brushes are made with an innovative and exclusive diagonal insertion, scientifically studied, which evenly distributes the brushing surface and increases the removal capacity of the paraffin. The ROTO brushes are made with spiral insertion to increase the surface and brushing capacity without leaving vertical stripes on the base as with standard rotating brushes.

### **SOFT HORSEHAIR**

ARCA0145

ARCA0195

The soft horsehair brush is cut longer than the rigid horsehair in order to have the bending characteristics necessary for the final polishing of the ski-base structure. It is generally used as the last brush after having performed the surface



polishing of the ski-structure with the rigid nylon. In the World Cup some ski-men prefer the soft horsehair as an alternative to the soft nylon for the distribution and deep polishing of waxes and medium / low melting point paraffins which require less removal than with blue soft nylon. 3 brushing cycles are carried out from tip to tail with wavy movements obtaining a perfectly shiny ski-base structure.

## **POLYESTER ROLLER**

AREL05011

AREL05012

Polyester is a material with flexibility and high mechanical resistance as well as high waterproofing characteristics and resistance to dirt and heat. Consequently it is particularly suitable for use in the rolling of waxes both cold and hot exerting without problems the necessary pressure to apply them evenly on the ski-base. The roller rubbing on the surface of the insole generates heat, facilitating the application of any product. For some years the polyester roller has



been more and more used instead of the cork roller in order to eliminate the problems associated with the low mechanical resistance of the cork itself (crumbling). The polyester roller is also suitable for the application of any type of liquid paraffin, increasing its duration. It is used by performing 3 rolling cycles from tip to tail of the ski-base with carry-over movements, at a drill speed of about 1000 rpm, exerting the necessary pressure to spread the product in the ski-base.

## **MERINO WOOL ROLLER**

AREL13081

AREL13082

Merino wool is a highly flexible material with an incredibly fine pile of approximately 18 microns in diameter. It has a high absorption and covering capacity and is ideal for the use on micro-rough and micro-scratched surfaces as the ski-base. Therefore, the merino wool roller is particularly suitable for applying waxes and liquid polymers considering that rubbing on the insole also generates heat, facilitating application. 3 rolling cycles are carried out from tip to tail of the ski-base at a drill speed of about 1000 rpm by pressing the roller on it to facilitate the spread of the gliding products.



In World Cup, one roller is used for each different product. Furthermore the merino wool roller, used at high rotation speed (1500/2000 rpm) without pressing on the base, is particularly suitable for the final polishing of any wax or polymeric accelerator, both solid and liquid, after polishing with the soft nylon or the soft horsehair brush. Also in this case it's necessary to carry out 3 rolling cycles from tip to tail of the ski-base. The micrometric hairs polish in depth where wires or hairs of the other brushes cannot reach. A different roller from the one used for the application must be used for polishing.

## **SPEEDTEX FINE ROLLER CHARGED WITH SILICA CARBIDE**

ARGA0110

ARGA0120

Made of laminated TNT of micrometric polyester filaments, it has high mechanical strength, waterproofness and resistance to dirt and heat. The fine roller is charged with silicon carbide and it is used to smooth the polyethylene base after dressing the ski structure with the stone grinding machine and whenever the ski base is damaged by abrasion. The



filaments of the roller penetrate deeply into the ski structure and have the dual function of detaching the residual polyethylene micro-hairs and orienting the texture of the polymer in the opposite direction to the direction of gliding so that the ski structure becomes more sliding in every direction. The roller must be used before finishing the edges (alpine discipline) and before the saturation or the protection ski base waxing. 3 working cycles from tip to tail have to be performed at a drill speed of nearly 1000 rpm without exerting pressure. After its use, the ski base must be carefully cleaned with detergent to eliminate processing residues. The grain of the silicon carbide has been carefully chosen to carry out the work detailed here. Numerous tests with the digital roughness tester have found that the use of the micro-abrasive roller does not significantly change the Ra, Rq and Rz of the ski structure on which it is used, a determining factor in order not to alter the research work on the ski structures made by companies and national teams.

## **SPEEDTEX SUPER-FINE ROLLER CHARGED WITH NYLON**

ARGA0115

ARGA0125

Made of laminated TNT of micrometric polyester filaments, it has high mechanical strength, waterproofness and resistance to dirt and heat. The super-fine roller is charged with nylon therefore it is used to deeply clean and polish the ski base structure after cleaning the ski base and/or before the base waxing and the race waxing. The filaments of the



roller penetrate deeply into the ski structure and have the dual function of freeing up as much space as possible for the paraffin and orienting the texture of the polymer in the opposite direction to the direction of gliding so that the ski structure becomes more sliding in every direction. 3 working cycles from tip to tail have to be performed at a drill speed of nearly 1000 rpm without exerting pressure. It is advisable to always use the super-fine roller before the race waxing. Unlike the fine roller, the Speedtex Super-Fine roller does not have micro-abrasive smoothing functions.