



Quality Marine
Equipment Since 1981

VELOX PLUS

Antifouling Paint For Metal
Under The Waterline

SPRAY

Application Instructions



Thank you for selecting Velox Plus Antifouling Paint to protect your metal below the waterline.

Please read all information and application instructions before beginning!

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Important Note Concerning Humidity & Drying Metal Surfaces

If any of the following conditions exist, it is good practice to heat the metal surface to be painted beforehand with a heat gun (keep Velox Plus Paint, acetone and any other flammables at a safe distance).

- If the metal surfaces to be painted has just recently been removed from the water.
- Conditions where dew may form on the metal surfaces.
- High humidity and temperature. If applying Velox Metal Primer while the dew point is between 65°F (17.5°C) and 74°F (23.5°C).




This heating practice will dry the metal surface well enough to ensure the Velox Metal Primer adheres to the metal. Once the surface has been heated, let it cool to ambient temperature before applying the Velox Metal Primer.

DEW POINT INDEX

Application of Velox Metal Primer on running gear: temperature, humidity and dew point.

Temp (F)	Relative Humidity								
	100	90	80	70	60	50	40	30	20
40	40	37.3	34.3	31	27.3	22.9	17.7	11.1	2.2
45	45	42.2	39.2	35.8	32	27.5	22.1	15.5	6.4
50	50	47.2	44.1	40.6	36.7	32.1	26.6	19.8	10.5
55	55	52.1	48.9	45.4	41.4	36.7	31.1	24.1	14.7
60	60	57.1	53.8	50.2	46.1	41.3	35.6	28.5	18.8
65	65	62	58.7	55	50.8	45.9	40.1	32.8	23
70	70	66.9	63.5	59.8	55.5	50.5	44.6	37.1	27.1
75	75	71.9	68.4	64.5	60.2	55.1	49	41.4	31.2
80	80	76.8	73.3	69.3	64.8	59.7	53.5	45.8	35.3
85	85	81.7	78.1	74.1	69.5	64.2	57.9	50.1	39.4
90	90	86.7	83	78.9	74.2	68.8	62.4	54.4	43.5
95	95	91.6	87.8	83.6	78.9	73.4	66.8	58.6	47.6

- Velox Metal Primer and Velox Plus Paint should **NOT** be applied at temperatures below 41° F or above 95°F.
- The temperature of the metal parts to be coated must be higher than the dew point.
- It is not recommended that Velox Metal Primer be applied when the dew point is higher than 74°F (23.5°C).

	Green colored cells show temperature/humidity levels at which it's ok to apply Velox Metal Primer.
	Yellow cells show temperature/humidity levels at which some attention must be paid before applying Velox Metal Primer.
	Red cells show temperature/humidity levels at which we DO NOT recommend applying Velox Metal Primer.

COVERAGE ESTIMATES

- Primer and Velox Plus Paint are available in .25 liter, and .50 liter cans.
- Normal coverage is approximately 4 square meters (43sq.ft) per ½ liter.
- Flat surfaces, trim tab and rudder coverage is approximately 5 square meters (53sq.ft) per ½ liter.
- Propeller or stern drive coverage is approximately 2.5 square meters (26sq.ft) per ½ liter.
- One 16" four blade prop will use approximately .125 liter for each coat.
- One 30" four blade prop will use approximately .25 liter for each coat.
- One 40" four blade prop will use approximately .50 liter for each coat.

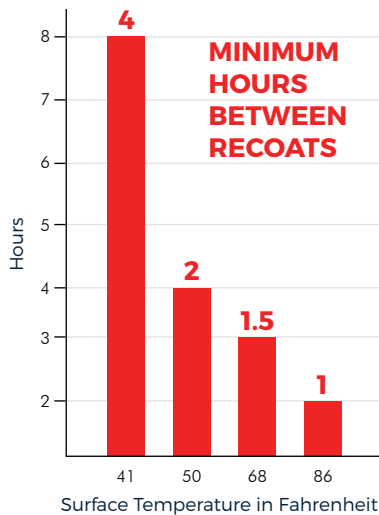
RECOAT TIMES / TIMES BEFORE LAUNCH

Dry Time (Using 68°F, primer & two coats of paint)

Primer: **1.5 hours**
 Paint (1st coat): **1.5 hours**
 Paint (Final coat): **12 hours**
 Total Time= **15 hours**

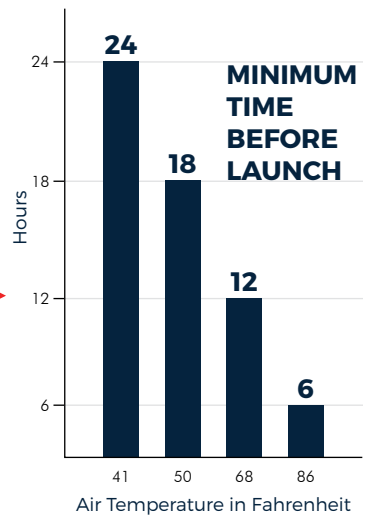
*Additional coats of paint will add 1.5 hours per coat unless final coat.

Colors: **White or Black**
 Specific gravity: **1.20 - 1.30**
 Application: **Spray gun**
 Thinner: **Not necessary**



◀ Minimum time between each coat based on surface temperatures.

▶ Time before you can launch the boat based on air temperature after last application of paint.



Application Conditions

Temperature: _____

Humidity: _____

Dew Point: _____

Heat Surface? Y / N

Metal Surface Temperature: _____

IMPORTANT: With a Scotch-Brite pad, scuff the Velox Plus painted surface either after allowing a full cure or just before launch to ensure proper leaching of the biocide.

APPLICATION INSTRUCTIONS

Equipment Needed

- Velox Metal Primer
- Velox Plus Paint
- Pure acetone
- PPE (mask, gloves, etc. - read label)
- Stirring paddle
- Power sander
- 80 grit sand paper discs
- Clean rags
- Paint strainer (mesh)
- Spray gun
- Wear suitable protective clothing, goggles, mask and gloves as prescribed!



Tools and materials needed.

Surface Preparation

- All metallic surfaces must be rough and clean. (See page 4)
- For cleaning grease and dirt use only pure acetone. When a new clean rag with fresh pure acetone stays clean, the prop is clean.
- Never wash the sanded surface with acid, water, soap, detergents or degreasers!
- Do not touch the cleaned surface with bare hands, this will leave traces of grease or dirt.
- Do not apply when the metal surface temperature is below 41°F or above 95°F. (See instructions)

Aluminum - should be protected with an appropriate epoxy coating before the metal primer is applied. This is not necessary when aluminum is already protected with a factory finish (such as new stern drives). For epoxy factory finishes, sand the surface with an abrasive pad (like Scotch-Brite) or fine sandpaper (180-220 grit), removing all gloss or shine before applying Velox Metal Primer.

Stainless Steel - must have Velox Metal Primer applied immediately after sanding and cleaning with acetone the stainless steel because stainless steel will oxidize if not immediately primed after sanding.

1. Remove all existing antifouling or other coating using 80 grit sandpaper. Use either a dual action rotary sander (we suggest using a soft pad in order not to damage the propeller). We do not recommend sanding by hand, as it is very difficult to achieve the proper abraded finish without a power tool. It may be necessary to sand corners and difficult to reach places by hand. Be aggressive in these spots. Do not remove factory finish from aluminum surfaces, such as stern drives. It is ok to apply over solid base of Velox Plus Paint from the previous season. Do not use wet sandpaper. The surface must be **very rough** after sanding. See page 4 for examples of properly sanded propellers.



Removing old antifouling and sanding with power sander.



Aggressively sanding hard to reach spots with 80 grit sand paper.



Clean surface with pure acetone.

All smooth surface shine must be removed by sanding. Do not use sandpaper that is coarser than 80 grit or anything finer. Do not use worn out sandpaper. Do not use Scotch-Brite. A sandblasted profile applied by an experienced professional is an acceptable finish. ***Note for professional - Do not silicone or glass-bead blast.** Sand-blast is the most effective finish.

Is My Prop Sanded Enough?

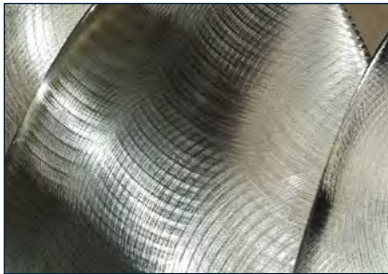
It is extremely important to remove all existing antifouling by sanding the surface down with 80 grit sand paper. The image on the left shows a prop blade not sanded thoroughly, while the image on the right depicts a prop that has been sanded down thoroughly. You should be able to feel the abraded surface when you run your fingernail across the surface.



Not sanded enough.



Red circle showing same prop sanded thoroughly using 80 grit sand paper.



A Max-Prop propeller sanded thoroughly using 80 grit sand paper.



A propeller sandblasted.

2. Wash and degrease all metallic surfaces carefully with only acetone. Use a clean rag and change it often, when a new clean rag with fresh acetone stays clean, the surface is clean. This is very important for new or folding/feathering propellers, which usually have more grease on them.



Wash and degrease all metallic surfaces with acetone.



Close up of the clean surface ready for metal primer.

Notes Before Spraying

Nozzle tip: 1.2 - 1.6mm (0.047" - 0.063")

Pressure at nozzle: 0.3 - 0.4 MPa (42 - 56 psi)

Distance from surface: 6" - 10"

We suggest using Velox Metal Primer and Velox Plus Paint as is, without thinner. However up to 5% of thinner may be used for both Velox Metal Primer and Velox Plus Paint.

If using a conventional air compressor and gun make sure to have a water separator.

Applying Velox Metal Primer

3. Velox Metal Primer is very thick, so make sure to stir the Velox Metal Primer thoroughly for three to five minutes before applying.
4. Apply one light coat of Velox Metal Primer (maximum wet film thickness 100 μm , dry film thickness 30 μm). **A light coat is desired, as applying thicker coats than recommended may result in the Velox Metal Primer not adhering properly.** Brush out any runs or drips immediately that may form after spray application of Velox Metal Primer. Carefully check the edges of the blades for runs after applying each coat. Primer must dry according to dry time chart on page 2.



Applying Metal Primer.



After applying Metal Primer.

Applying Velox Plus Paint

5. Thoroughly stir Velox Plus Paint for three to five minutes before applying.
6. Do not apply Velox Plus Paint on bare metal. Only apply Velox Plus Paint over Velox Metal Primer supplied with Velox Plus Paint. Spray one coat of Velox Plus Paint (wet film thickness 100 μm , dry film thickness 30 μm). The first coat should slightly soften the primer, showing some of its green color.



Applying first coat of Velox Plus Paint.

7. Wait at least 1.5 hours at 68°F (20°C) or refer to dry times chart on page 2, and then apply a second coat of Velox Plus Paint (wet film thickness 100 μm , dry film thickness 30 μm). A third coat of Velox Plus Paint may be applied to obtain perfect coverage or in areas where fouling growth is particularly aggressive.



Applying second coat of Velox Plus Paint.

8. Wait at least 12 hours at 68°F (20°C) before launching. See page 2 for chart launch times at other temperatures.

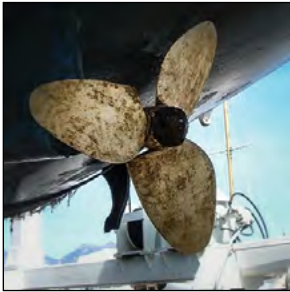


Ready for launch after dry time.

ADDITIONAL INFORMATION

- You can apply another two coats of Velox Plus Paint to the previous season of Velox Plus Paint. Refer to steps 5-6 for applying. Clean and lightly sand the surface with fine sandpaper or abrasive pad (like Scotch Brite). We suggest removing all the antifouling paint in any case at least every three years. Do not apply Velox Metal Primer or Velox Plus Paint on any other antifouling.
- For spraying Velox Plus Paint or Velox Metal Primer, it is not necessary to dilute the product.
- Brush out any runs or drips immediately that may form when applying Velox Metal Primer or Velox Plus Paint.
- Carefully check the edges of the blades for runs after applying each coat.
- Carefully read the instructions on the label and always wear suitable protective clothing, goggles, mask and gloves as prescribed.

The following pictures show some propellers treated with Velox Plus after one year service.*



* Results may vary depending on location, water temperatures and salinity. All pictures are taken in European or Australian temperate waters. In particular situations (such as tropical lagoons with brackfish waters) there may be some more growth or fouling.

Velox Plus

Advantages, Features & Benefits

- Velox Plus works because of excellent adhesion to metal below the waterline.
- Antifouling- Compare to “Non-Stick” or “Release” Coatings.
- As much as 60% Less than “Non-Stick” or “Release” Coatings.
- Single Part Primer- No rush, No Waste. Allows time to do it right. Remaining product can be used later.
- Single Part Paint- No Rush, No waste. Remaining product can be used next haul out.
- No Maximum time between coats. Budget your time as needed.
- No Maximum time before launching. Offers flexible schedule of when you paint.
- Repairable- No need to strip metal and start over each time bare metal may become exposed.
- Multi Season Coating without stripping.



VELOX PLUS

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