

ALGAE PROBLEMS

Algae are single-celled plants that live in water. Following are conditions that contribute to algae growth:

- High pH (over 7.8)
- Low Free Chlorine levels
- High stabilizer levels (over 150 ppm)
- Poor water circulation
- Short filter cycles
- High nitrates or phosphates (over 20 ppm)
- High bather load

PROBLEM	CHARACTERISTICS	SOLUTIONS
Green Algae	<ul style="list-style-type: none"> • Most common type of algae • Has gelatinous sheath protecting it from most chemical attacks • Floats freely in water; does not attach itself to walls • Causes “pea soup” green water 	<p>Adjust pH to 7.2-7.8. Shock the pool with enough SUN Booster or SUN-Burn to bring Free Chlorine level to at least 10 ppm that lasts overnight. There are two successful products for controlling green algae:</p> <p>a) Add an initial dose of SUN Copper Algacide OR</p> <p>b) Add an initial dose of SUN NF Algacide Concentrate</p> <p>Use a brush on affected areas. Run filter continuously for 24 hours or until water clears. Try to direct the returns toward the problem areas. Repeat as necessary. Add SUN Tru-Blue to help clear the water of dead algae and debris. Thereafter, make sure that the pH is 7.2-7.8 and that the Free Chlorine is maintained at 1-3 ppm.</p>
Black Algae	<ul style="list-style-type: none"> • Dark black color; appear as sporadically scattered black splotches • Sometimes appears as tar-like deposits on bottom • Can be difficult to remove with scraping; attaches itself to pool walls (primarily plaster) and sends roots deep into the finish 	<p>Adjust pH to 7.2-7.8. Shock the pool with enough SUN Booster or SUN-Burn to bring Free Chlorine level to at least 10 ppm that lasts overnight. Add an initial dose of SUN Algacide 60 and an initial dose of SUN Algae Preventor (acts as a wetting agent). Use a brush on affected areas. Run filter continuously for 24 hours or until water clears. Try to direct the returns toward the problem areas. Repeat as necessary. Localized spots of black algae IN GUNITE POOLS ONLY can be treated by applying SUN Black Algacide; follow directions carefully. Add SUN Tru-Blue to help clear the water of dead algae and debris. Thereafter, make sure that the pH is 7.2-7.8 and that the Free Chlorine is maintained at 1-3 ppm.</p>
Yellow-Mustard Algae	<ul style="list-style-type: none"> • Yellow to yellowish-green to brown in color; appears light and buoyant; powder-like appearance (almost like pollen) • Appears on walls and in shaded areas of pool; can grow very quickly • Brushes very easily, however, use caution because it can flocculate and spread throughout the pool. • Common in biguanide maintained pools, which may be indicative that the organism has become biguanide-resistant. 	<p>Adjust pH to 7.2-7.8. Shock the pool with enough SUN Booster or SUN-Burn to bring Free Chlorine level to at least 10 ppm that lasts overnight. There are two successful products for controlling mustard algae:</p> <p>a) Add an initial dose of SUN Copper Algacide OR</p> <p>b) Add SUN Yellow Clear as directed.</p> <p>Use a brush on affected areas. Run filter continuously for 24 hours or until water clears. Try to direct the returns toward the problem areas. Repeat as necessary. Add SUN Tru-Blue to help clear the water of dead algae and debris. Thereafter, make sure that the pH is 7.2-7.8 and that the Free Chlorine is maintained at 1-3 ppm.</p> <p>Biguanide-maintained pools may have to convert to chlorine to treat the problem, otherwise the problem will return. See Miscellaneous Problems for biguanide conversion.</p>

ALGAE PROBLEMS (continued)

PROBLEM	CHARACTERISTICS	SOLUTIONS:
Red Algae	<ul style="list-style-type: none"> • Reddish color in appearance • Slippery feel 	<p>Adjust pH to 7.2-7.8. Shock the pool with enough SUN Booster or SUN-Burn to bring Free Chlorine level to at least 10 ppm that lasts overnight. There are two successful products for controlling red algae:</p> <p>a) Add an initial dose of SUN Algacide 60 OR</p> <p>b) Add SUN Yellow Clear as directed.</p> <p>Use a brush on affected areas. Run filter continuously for 24 hours or until water clears. Try to direct the returns toward the problem areas. Repeat as necessary. Add SUN Tru-Blue to help clear the water of dead algae and debris. Thereafter, make sure that the pH is 7.2-7.8 and that the Free Chlorine is maintained at 1-3 ppm.</p>
Pink Slime	<ul style="list-style-type: none"> • Pinkish color in appearance • Slippery feel • Is most likely a bacterial slime rather than an algae • Usually shows up at waterline or around underwater lights, ladders and other fixtures • Common in biguanide maintained pools, which may be indicative that the organism has become biguanide-resistant. 	<p>Adjust pH to 7.2-7.8. Shock the pool with enough SUN Booster or SUN-Burn to bring Free Chlorine level to at least 10 ppm that lasts overnight. Add SUN Yellow Clear as directed. Use a brush on affected areas. Run filter continuously for 24 hours or until water clears. Try to direct the returns toward the problem areas. Repeat as necessary. Add SUN Tru-Blue to help clear the water of dead algae and debris. Thereafter, make sure that the pH is 7.2-7.8 and that the Free Chlorine is maintained at 1-3 ppm.</p> <p>Biguanide-maintained pools may have to convert to chlorine to treat the problem, otherwise the problem will return. See Miscellaneous Problems for biguanide conversion.</p>
Water Mold	<ul style="list-style-type: none"> • Colorless to white in appearance • Very common in biguanide maintained pools, which may be indicative that the organism has become biguanide-resistant. 	<p>Adjust pH to 7.2-7.8. Shock the pool with enough SUN Booster or SUN-Burn to bring Free Chlorine level to at least 10 ppm that lasts overnight. There are two successful products for controlling water mold:</p> <p>a) Add an initial dose of SUN Algacide 60 OR</p> <p>b) Add SUN Yellow Clear as directed.</p> <p>Use a brush on affected areas. Run filter continuously for 24 hours or until water clears. Try to direct the returns toward the problem areas. Repeat as necessary. Add SUN Tru-Blue to help clear the water of dead algae and debris. Thereafter, make sure that the pH is 7.2-7.8 and that the Free Chlorine is maintained at 1-3 ppm.</p> <p>Biguanide-maintained pools may have to convert to chlorine to treat the problem, otherwise the problem will return. See Miscellaneous Problems for biguanide conversion.</p>
Hints/Preventive Maintenance:	<p>Maintain proper sanitizer and water balance levels, and make sure the filter is operating properly. During periods of high bather loads, high temperatures, after heavy rainfalls or at the first signs of deteriorating water quality, shock your pool in order to help keep the Free Chlorine in the optimum range. Keep the pool bottom free of leaves and other debris. Regular use of economical SUN Summer Algae Protector and SUN Phosphate Eliminator is recommended as a safeguard against algae getting started.</p>	

PROPER RANGES FOR POOL/SPA WATER

pH:	7.2 - 7.8 (ideal 7.2 - 7.6)
Total Alkalinity:	80 - 150 ppm
Free Chlorine:	1.0 - 3.0 ppm
Combined Chlorine:	less than 1.0 ppm above Free Chlorine
Bromine:	3 - 5 ppm
Calcium Hardness:	200 - 400 ppm
Cyanuric Acid (Stabilizer):	20 - 40 ppm in northern areas; 40 - 60 in sunbelt areas
Total Dissolved Solids:	maximum level 3,000 ppm
Iron:	0 ppm
Copper:	0 ppm