



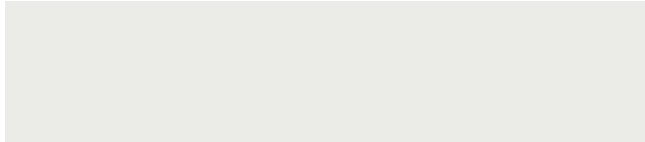
**STEEL BUILDINGS**  
A NUCOR Company

# COOL

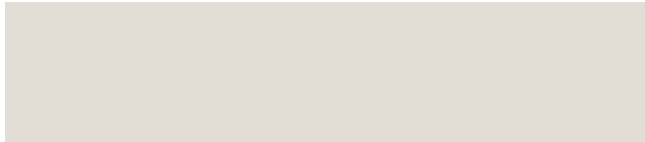
**PVDF COLOR COATINGS**

**MORE THAN JUST A COLOR COATING...**

CBC "COOL" colors are vivid, fade-resistant with incredible durability and an environmentally friendly "COOL" technology. CBC offers you the highest quality materials to help you meet your requirements while maximizing efficiency and cost savings.



**REGAL WHITE\***



**WARM WHITE**



**LIGHT STONE**



**TAUPE SAND**



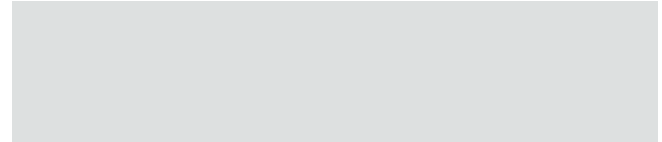
**SURREY BEIGE**



**LIGHT BRONZE**



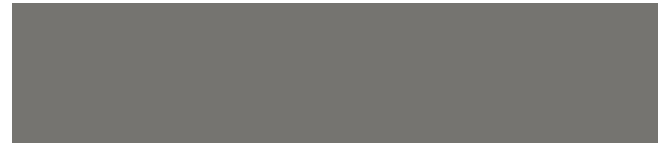
**DARK BRONZE\***



**REFLECTIVE WHITE**



**PEARL GRAY**



**SLATE GRAY**



**ROYAL BLUE**



**EVERGREEN\***



**HEMLOCK GREEN**



**TERRA COTTA**

Colors shown closely approximate actual coating colors.

These premium coatings are manufactured by PPG.

These colors utilize "COOL" Coating Technology and are compliant with the Energy Star specification of 25% minimum reflectance.

\* SS-24 and MS-24 Standing Seam Panels are available in these standard colors

## SOLAR REFLECTANCE

In order for our colors to be considered “COOL” they must have a solar reflectance of at least 25%. Solar reflectance is the measure of a panel’s ability to not absorb certain wavelengths of the sun. Cool metal roofs coated with the PVDF-based resin in our CBC “COOL” colors can achieve a solar reflectance of over 25% and can reduce energy consumption by up to 40% as part of a total system design.

## THERMAL EMITTANCE

Another important factor is thermal emittance, which is the measure of a panels ability to release heat that it has absorbed.

## SOLAR REFLECTANCE INDEX (SRI)

The Solar Reflectance Index (SRI) is the combination of both Solar Reflectance and Thermal Emittance. The SRI is calculated by using the values of solar reflectance, thermal emittance and a medium wind coefficient. The higher the SRI value, the lower its surface temperature and consequently, the heat gain into the building. Cool Metal Roofs that are coated with a “COOL” pigmented PVDF resin achieve an SRI of 25-88, depending on the color.

Roof panels with both high reflectance and high emittance can reduce the surface temperature by as much as 30-50% based on color and geographic location, which will result in a reduced heat gain to the building; therefore, reducing the energy demand.

### “COOL” PANEL COLORS

COLOR	SOLAR REFLECTANCE (IR)	THERMAL EMITTANCE (IE)	SOLAR REFLECTIVE INDEX (SRI)
REGAL WHITE	.72	.85	88
REFLECTIVE WHITE	.63	.86	76
WARM WHITE	.64	.85	76
LIGHT STONE	.57	.86	67
TAUPE SAND	.54	.85	63
PEARL GRAY	.47	.86	54
SURREY BEIGE	.50	.85	56
LIGHT BRONZE	.42	.86	47
SLATE GRAY	.38	.85	40
HEMLOCK GREEN	.36	.85	37
TERRA COTTA	.36	.85	31
EVERGREEN	.31	.85	33
DARK BRONZE	.32	.86	33
ROYAL BLUE	.30	.85	30

### BARE GALVALUME

Initial	.77	.08	72
3 Years	.51	.19	26

TEST	TEST METHOD	PERFORMANCE
Dry Film Thickness	ASTM D5796 Primer ASTM D1005	0.3 mils minimum Topcoat 1.0 mils minimum (+/- .05) Backer 0.5 mils minimum, total (+/- .05)
Specular Gloss	ASTM D523	Low gloss, 5-12% @ 60
Dry Film Hardness	ASTM D3633	HB minimum
Film Adhesion (Dry, wet, boiling water)	ASTM D3359	Excellent, no removal
Direct Impact, Flexibility	ASTM D2794	Excellent, no removal
Reverse Impact, Flexibility	ASTM D2794	Excellent, no removal
Formability	ASTM D4145	2 T Blend - no removal
Abrasion Resistance - Falling Sand - Garner Scratch - Taber Abrasion	ASTM D968 ASTM D2197 ASTM D4060	Exceeds 65 liters/mil 250-300 grams load C.S. 10 wheels / 20mg loss per 100 cycles
Chemical & Detergent Resistance	ASTM D1308	Excellent - no attack
Salt Spray Resistance	ASTM B117	Passes 1,000 hours, Galvalume
Humidity Resistance	ASTM D2247	Passes 1,000 hours, HDG/Galvalume
South Florida Weathering - Color Retention - Chalk Resistance	ASTM D2244 ASTM D4214	< 5dE change after 35 years > 8 chalk rating

† All tests are performed according to the latest ASTM revision.

**These premium coatings have an optional 35-year paint finish warranty.  
Contact CBC Steel Buildings for more information.**

