

# Pigment Dispersions for Solvent-Based Coatings

Color Solutions

## Chroma-Chem® 641

CHROMA-CHEM® 641 colorants are designed specifically for use in all non-aqueous, industrial and maintenance coatings. The colorants are exceptional for universal tinting of solvent-based industrial coatings.

### General Information

#### Key benefits

The various pigments utilized in this colorant line are dispersed in an aldehyde resin vehicle. This vehicle provides excellent wetting and dispersing properties. The colorants are formulated with Propylene Glycol Monomethyl Ether (PM) Acetate and Rule 66 Mineral Spirits as the primary solvents.

Each colorant contains a carefully selected and unique blend of vehicle and pigment to provide compatibility in a wide range of non-aqueous coatings applications. The individual CHROMA-CHEM® 641 colorant formulations are designed for use in dispenser tinting or as an in-plant system for tinting or full pigmentation.

This line of colorants provides exceptional value when cost is balanced with performance. These colorants provide a good option when the cost of an acrylic-based colorant system exceeds the performance requirements of a medium-duty industrial coating.

#### Properties

The CHROMA-CHEM® 641 line is designed to color most industrial coatings systems. They are formulated with optimal levels of pigment, resin, additives and solvent to ensure each colorant has excellent pigment development and exhibits rheological characteristics that contribute to extraordinary stability of the colorant whether in-can or in-canister.

The CHROMA-CHEM® 641 Colorants are controlled to a tinting strength tolerance of  $\pm 2\%$  by volume and  $\Delta E < 0.5$ . Rheological properties of the colorants are also controlled to allow for excellent performance in volumetric or gravimetric tinting equipment. The tight control allows for accurate reproduction of color through in-plant or dispenser tinting.

## Applications

The CHROMA-CHEM® 641 colorants are formulated for use in most non-aqueous industrial coatings including, but not limited to, aerosols, concrete stains, general industrial finishes, general OEM, industrial maintenance, light industrial, and other protective coatings.

## Compatibility

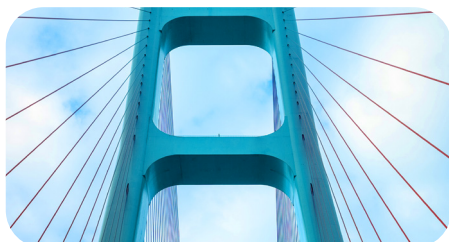
These colorants have been evaluated in a multiple maintenance and industrial coating types at 2 to 15 percent loading. Testing indicates excellent compatibility in multiple coating types. Base formulations will have a impact on individual results. Thorough testing is recommended.

Results are consistent with our other industrial colorant systems and good results are expected in a wide variety of coatings applications based on acrylic, polyester, cellulosic lacquer, vinyl lacquer, chlorinated rubber, alkyd, epoxy, polyurethane coatings. This line is also compatible with most aliphatic and aromatic hydrocarbons, esters, ethers, ketones, and reactive diluents.

## Shelf Life

Proper handling is essential to maintain good quality. It is recommended that the colorants be mixed prior to use. Containers should be tightly sealed when not in use. Repacking the colorant into a smaller container should be considered if the colorant level in the container is less than 20% of the original amount and will be stored for an extended period of time.

Shelf life on the CHROMA-CHEM® 641 colorants is 3 years for most colorants and 2 years for white and oxide colorants from the date of manufacture in unopened containers.



INDUSTRIAL MAINTENANCE



PROTECTIVE



GENERAL INDUSTRIAL FINISHES

Product Code	Description	Canister Code	CI Name	% Pigment		% Non-Volatiles		% Volatiles		Specific Gravity	VOC <sup>a</sup> g/L	Pigment Lightfastness		Pigment Resistance	
				X Wt.	X Vol.	X Wt.	X Vol.	X Wt.	X Vol.			Mass	Tint	Acid	Alkali
641-0061	Titanium Dioxide	TW	White 6	67.6	33.5	12.8	23.1	19.6	43.4	1.98	388	N	N	N	N
641-0451	Quinacridone Red	QR	Violet 19	199	12.7	24.7	22.4	55.4	64.9	1.02	566	S	S	N	N
641-0550	Mono Azo Red		Red 170	33.9	26.4	31.8	34.0	34.3	39.6	1.11	381	N*	S*	N	N
641-0715	Organic Red	RX	Red 254	41.9	30.2	17.0	17.9	41.1	51.9	1.15	472	N	**	N	N
641-0982	Lead Free Orange	UO	Orange 34/36	22.6	15.6	25.8	23.6	51.6	60.8	1.04	536	S	A	A	A
641-1054	Trans Red Oxide		Red 101	32.1	9.6	40.4	52.1	27.5	38.3	1.36	374	N	N	N	N
641-1063	Red Oxide	RO	Red 101	63.0	24.9	15.3	27.0	21.7	48.1	1.97	430	N	N	N	N
641-1352	Burnt Umber	BU	Brown 7	41.4	15.2	21.7	28.6	36.9	56.2	1.47	543	N	N	N	N
641-1388	Burnt Umber	BU	Brown 7	42.4	15.6	19.8	26.6	37.8	57.8	1.47	558	N	N	N	N
641-1852	Trans Yellow Oxide		Yellow 42	38.5	12.1	30.6	41.7	30.9	46.2	1.43	442	N	N	N	N
641-1863	Yellow Oxide	YO	Yellow 42	52.8	21.6	16.1	24.3	31.1	54.1	1.68	522	N	N	N	N
641-2075	Raw Umber		Brown 7	38.6	16.3	21.0	31.8	40.4	51.9	1.32	474	N	N	N	N
641-2555	Medium Yellow	MY	Yellow 83/151	37.4	21.6	16.9	17.4	45.7	61.0	1.16	531	N	S	N	A
641-2852	Organic Yellow	OY	Yellow 175	29.1	20.2	26.4	25.6	44.5	54.2	1.10	491	S	S	A	A
641-5558	Phthalo Green	PG	Green 7	21.1	11.2	25.0	24.8	53.9	64.0	1.09	589	N	N	N	N
641-7262	Phthalo Blue IS	PB	Blue 15:2	17.7	10.8	32.9	30.8	49.4	58.4	1.04	515	N	N	N	N
641-9451	Quinacridone Violet	QV	Violet 19	19.8	13.5	24.7	22.7	55.5	63.8	1.01	563	S	S	N	N
641-9955	Lamp Black	LB	Black 7	22.4	13.3	31.5	29.9	46.1	56.8	1.06	490	N	N	N	N

<sup>a</sup>Typical values based on ASTM 6886

#### Lightfastness and Resistance Key

N no bleed/discoloration \* no Florida data, only Fadeometer

S slight \*\* no data

A appreciable

Lightfastness and Resistance information is provide for guidance purposes only.  
 Source: NPRI Raw Materials Data Handbook Volume 4 (© 2000)

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