

Sales Range  
**FOR PRINTING,  
PAINTS, PLASTICS  
INDUSTRIES AND  
SPECIAL APPLICATIONS**



# Pigments, pigment preparations and dyes **FROM CLARIANT**

Clariant supplies pigments and dyes. These ranges, supplemented by pigment preparations and special grades, offer a wide variety of products for the printing ink, paint, plastics, rubber, office supplies, wood and detergents industries as well as for other special fields.

For the standard range of pigments we give a general overview indicating their possible technical uses in the main fields of application.

It is not appropriate to treat the special grades, pigment preparations, dyes and intermediates/chemicals in the same way as the standard ranges and therefore they appear in the brochure as separate ranges with less details of their special fields of application.

#### THE SYMBOLS MEAN:

- Main field of application
- Additional field of application
- Limited suitability
- Not recommended

We would however point out that this classification is simply a general guide that is intended to make it easier to select suitable products from our range of colorants.

Suitability e.g. for the coloration and printing of food packaging or use in cosmetic products is subject to statutory requirements which differ from country to country. It is the customers responsibility to comply with applicable laws and regulations.

#### NOTES ON DIARYL PIGMENTS

It has been known for some considerable time that diaryl pigments can release 3,3'-DCB when they are processed in polymers at temperatures above 200 °C.

The following pigments supplied by Clariant are diaryl pigments:

Pigment Yellow 12	Pigment Yellow 126
Pigment Yellow 13	Pigment Yellow 127
Pigment Yellow 14	Pigment Yellow 174
Pigment Yellow 16	Pigment Yellow 176
Pigment Yellow 17	Pigment Orange 13
Pigment Yellow 81	Pigment Orange 34
Pigment Yellow 83	Pigment Red 38

All products based on the above diaryl pigments can be found in this brochure.

These products must not be used at processing temperatures above 200 °C because of possible thermal decomposition (see safety data sheets) even if no shade change occurs at elevated processing temperatures.

# Registered TRADEMARKS

AGROCER®	HOSTAPRINT® <sup>1)</sup>
ANODAL®	HOSTASIN® <sup>1)</sup>
CARTASOL®	HOSTASOL® <sup>1)</sup>
CARTAX®	HOSTATINT™
CERIDUST®	LICOCENE®
COLANYL®	LICOWAX®
COSMENYL®	NOVOPERM®
DRIMAREN®	POLYSYNTHREN®
DUASYN®	PV FAST®
FLEXONYL®	RENOL®
FLEXOPRINT®	SANODAL®
GRAPHTOL®	SANODURE®
HANSA®	SANODYE®
HDK® <sup>2)</sup>	SANOLIN®
HOSTACOPY® <sup>1)</sup>	SAVINYL®
HOSTAFINE® <sup>1)</sup>	SOLVAPERM®
HOSTAJET® <sup>1)</sup>	TELALUX®
HOSTAPERM® <sup>1)</sup>	TELASPERSE® PVC
	VISCOFIL®

# Sales Range CONTENTS

<b>1</b>	<b>STANDARD RANGE OF PIGMENTS</b>	<b>7</b>
1.1	Hostaperm	8
1.2	Novoperm	10
1.3	Permanent	12
1.4	Hansa	14
1.5	Flexoprint	15
1.6	Cartax	15
1.7	PV Fast	16
1.8	Graphtol	18
1.9	Novotex	19
1.10	Agrocer	20
<b>2</b>	<b>SPECIAL GRADES</b>	<b>21</b>
2.1	Numerical code for alteration of standards and special grades	22
2.2	Transparent grades for effect paints	23
2.3	Opaque pigments for lead-free pigmentation	24
2.4	P grades	24
2.5	Cosmetic pigments	25
2.6	NIP products	26
2.6.1	Ink Jet pigments	26
2.6.2	Ink Jet pigment preparations	27
2.6.3	Ink Jet dyes	28
2.6.4	Toner pigments	30
2.6.5	Toner pigment preparations	31
2.6.6	Charge Control Agents	31
2.6.7	Waxes	32
2.6.8	HDK - pyrogenic silica	32
2.7	LHC - grades	33

<b>3</b>	<b>PIGMENT PREPARATIONS</b>	<b>35</b>
3.1	Colanyl 100	36
3.2	Colanyl 500	38
3.3	Hostatint 500	40
3.4	Hostatint A 100 / Hostatint A 100-ST	42
3.5	Hostatint UV	44
3.6	Hostafine	46
3.7	Renol HW 30	48
3.8	Flexonyl / Flexonyl SP	49
3.9	Flexonyl A	50
3.10	Flexonyl WF	51
3.11	Cosmenyl	52
3.12	Cosmenyl gran.	53
3.13	Viscofil	54
3.14	Agrocer disp.	55
3.15	Hostaprint	56
3.16	Hostasin	57
3.17	Telasperse PVC	58
<b>4</b>	<b>DYES</b>	<b>59</b>
4.1	Hostasol	60
4.2	Solvaperm	61
4.3	Polysynthren	62
4.4	Duasyn Acid	63
4.5	Others	64
4.6	Duasyn SF / Duasyn SF liquid / Duasynjet SF	65
4.7	Savinyl	66
4.8	Fat	67
4.9	Sanolin / Sanolin liquid / Sanolin Lave liquid	68
4.10	Aluminum dyes and chemicals	71
<b>5</b>	<b>INTERMEDIATES / CHEMICALS</b>	<b>75</b>
<b>6</b>	<b>OVERVIEW BY COLOUR INDEX DATA (GENERIC NAME)</b>	<b>77</b>
6.1	Pigments / Pigment preparations	78
6.2	Dyes	92
<b>7</b>	<b>OPTICAL BRIGHTENERS</b>	<b>97</b>
7.1	Telalux	98

# 1 STANDARD RANGES OF PIGMENTS

- 1.1 Hostaperm
- 1.2 Novoperm
- 1.3 Permanent
- 1.4 Hansa
- 1.5 Flexoprint
- 1.6 Cartax
- 1.7 PV Fast
- 1.8 Graphtol
- 1.9 Novotex
- 1.10 Agrocer

# 1.1 HOSTAPERM

The Hostaperm range comprises the pigments, which are noted for very high fastness properties. Suitable grades are listed on the basis of excellent light and weathering fastness and satisfactory migration fastness.

## LITERATURE

Pattern card PI 2013 E  
 "Decorative paints, industrial paints, automotive paints"  
 Pattern card PI 2014 ED  
 "Hostaperm, Novoperm, Permanent, Hansa -  
 Pigments for the paint industry"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PRINTING INKS				PAINTS					
			Offset printing	Publication gravure printing	Packaging printing (solvent-based)	Packaging printing (aqueous)	Automotive OEM paints	Automotive refinishing paints	Industrial paints (general)	Powder coatings	Decorative paints	Office supplies - artists' colors
HOSTAPERM OXIDE YELLOW BV 01	Pigment Yellow 184	771740	—	—	—	—	■	■	■	■	●	—
HOSTAPERM OXIDE YELLOW BV 02	Pigment Yellow 184	771740	—	—	—	—	■	■	■	■	●	—
HOSTAPERM YELLOW H6G	Pigment Yellow 175	11784	●	—	○	■	●	●	■	●	●	●
HOSTAPERM YELLOW H5G	Pigment Yellow 213	—	—	—	—	—	■	■	●	●	●	—
HOSTAPERM YELLOW HN4G <sup>Ⓞ</sup>	Pigment Yellow 150	12764	—	—	—	—	—	—	—	—	—	—
HOSTAPERM YELLOW H4G	Pigment Yellow 151	13980	—	—	—	—	○	●	■	■	—	●
HOSTAPERM YELLOW H4G 70	Pigment Yellow 151	13980	—	—	—	—	●	■	■	■	●	●
HOSTAPERM YELLOW H3G	Pigment Yellow 154	11781	●	—	○	○	■	●	●	●	●	●
HOSTAPERM YELLOW H3G 02	Pigment Yellow 154	11781	—	—	—	—	■	●	○	—	■	—
HOSTAPERM ORANGE GR	Pigment Orange 43	71105	●	—	●	○	●	●	●	●	■	●
HOSTAPERM SCARLET GO	Pigment Red 168	59300	●	—	●	●	■	■	●	●	■	●
HOSTAPERM SCARLET GO TRANSP.	Pigment Red 168	59300	—	—	—	—	■	■	●	—	—	●
HOSTAPERM RED D3G 70	Pigment Red 254	56110	■	—	●	●	●	●	■	●	●	●
HOSTAPERM RED D2G 70	Pigment Red 254	56110	—	—	—	—	■	■	■	●	●	●
HOSTAPERM RED P2GL-WD	Pigment Red 179	71130	—	—	—	—	■	●	●	—	—	—
HOSTAPERM RED E4G	Pigment Violet 19	73900	—	—	—	—	■	■	●	●	●	●
HOSTAPERM PINK E2Y	Pigment Red 122	73915	—	—	■	●	●	■	■	●	●	●
HOSTAPERM RED E2B 70	Pigment Violet 19	73900	●	—	●	●	■	●	●	—	—	●
HOSTAPERM RED E3B	Pigment Violet 19	73900	●	—	●	●	—	●	■	●	●	●
HOSTAPERM RED E5B 02	Pigment Violet 19	73900	●	—	●	●	●	○	■	●	●	●
HOSTAPERM PINK E	Pigment Red 122	73915	●	—	●	■	■	■	■	●	●	●
HOSTAPERM PINK E 11	Pigment Red 122	73915	—	—	—	—	—	○	■	—	○	—
HOSTAPERM PINK E WD 01	Pigment Red 122	73915	—	—	—	—	—	●	—	■	●	—
HOSTAPERM PINK E TRANSP. 01	Pigment Red 122	73915	—	—	—	—	■	■	●	—	—	●
HOSTAPERM PINK EB TRANSP.	Pigment Red 122	73915	—	—	—	—	■	■	●	—	—	●

Ⓞ Regarding printing application it is only recommended for decorative laminates

NAME	COLOUR INDEX	COLOUR INDEX NO.	PRINTING INKS				PAINTS					
			Offset printing	Publication gravure printing	Packaging printing (solvent-based)	Packaging printing (aqueous)	Automotive OEM paints	Automotive refinishing paints	Industrial paints (general)	Powder coatings	Decorative paints	Office supplies - artists' colors
HOSTAPERM RED VIOLET ER 02	Pigment Violet 19	73900	●	—	●	●	■	■	■	●	●	●
HOSTAPERM VIOLET BL 01	Pigment Violet 23	51319	●	—	●	■	■	■	■	●	●	—
HOSTAPERM VIOLET RL SPEC. 01	Pigment Violet 23	51319	●	—	●	■	■	■	■	●	●	●
HOSTAPERM VIOLET RL-NF	Pigment Violet 23	51319	—	—	—	—	■	■	■	—	—	—
HOSTAPERM VIOLET P-RL	Pigment Violet 23	51319	○	—	■	○	—	—	—	—	—	●
HOSTAPERM BLUE A4R	Pigment Blue 15:1	74160	—	—	—	—	●	●	■	■	●	—
HOSTAPERM BLUE BT-728-D	Pigment Blue 15:1	74160	—	—	—	—	■	■	—	—	—	—
HOSTAPERM BLUE BT-729-D	Pigment Blue 15:1	74160	—	—	—	—	■	■	—	—	—	—
HOSTAPERM BLUE BT-627-D	Pigment Blue 15:2	74160	—	—	—	—	■	■	●	—	—	—
HOSTAPERM BLUE B2G 03	Pigment Blue 15:3	74160	—	—	—	—	●	●	■	■	●	●
HOSTAPERM BLUE BT-617-D	Pigment Blue 15:4	74160	—	—	—	—	■	■	●	—	—	—
HOSTAPERM GREEN GNX	Pigment Green 7	74260	—	—	—	—	●	●	■	●	●	—
HOSTAPERM GREEN GNX 01	Pigment Green 7	74260	—	—	—	—	●	●	■	●	●	—
HOSTAPERM BROWN HFR 01	Pigment Brown 25	12510	■	—	○	○	■	■	●	●	—	●

# 1.2 NOVOPERM

Novoperm is the trade name for pigments with above-average fastness properties. These products are suitable – depending on the grade – for use in the paint and printing ink industries.

## LITERATURE

Pattern card PI 2013 E  
 “Decorative paints, industrial paints, automotive paints”  
 Pattern card PI 2014 ED  
 “Hostaperm, Novoperm, Permanent, Hansa – Pigments for the paint industry”

NAME	COLOUR INDEX	COLOUR INDEX NO.	PRINTING INKS				PAINTS					
			Offset printing	Publication gravure printing	Packaging printing (solvent-based)	Packaging printing (aqueous)	Automotive OEM paints	Automotive refinishing paints	Industrial paints (general)	Powder coatings	Decorative paints	Office supplies – artists' colors
NOVOPERM YELLOW H10G 01	Pigment Yellow 81	21127	●	—	●	●	—	—	●	—	—	●
NOVOPERM YELLOW P-HG	Pigment Yellow 180	21290	●	—	■	○	—	—	—	—	—	●
NOVOPERM YELLOW FGL	Pigment Yellow 97	11767	●	—	●	●	—	—	●	○	■	●
NOVOPERM YELLOW F2G	Pigment Yellow 194	11785	●	—	—	■	—	—	■	■	●	●
NOVOPERM YELLOW 5GD 71	Pigment Yellow 155	200310	●	—	●	●	○	●	■	■	●	●
NOVOPERM YELLOW 4G 01	Pigment Yellow 155	200310	●	—	●	●	—	—	●	●	—	—
NOVOPERM YELLOW H2G	Pigment Yellow 120	11783	●	—	—	●	—	●	■	■	—	●
NOVOPERM YELLOW H3R	Pigment Yellow 181	11777	●	—	●	■	—	—	—	—	—	—
NOVOPERM YELLOW H3R-LA	Pigment Yellow 181	11777	—	—	—	■	—	—	—	—	—	—
NOVOPERM YELLOW HR	Pigment Yellow 83	21108	●	—	●	●	—	—	●	●	●	●
NOVOPERM YELLOW HR 02	Pigment Yellow 83	21108	■	—	—	■	—	—	●	●	—	●
NOVOPERM YELLOW HR 04	Pigment Yellow 83	21108	●	—	■	●	—	—	—	—	—	●
NOVOPERM YELLOW P-HRE	Pigment Yellow 83	21108	—	—	■	—	—	—	—	—	—	—
NOVOPERM YELLOW HR 70	Pigment Yellow 83	21108	●	—	—	●	○	●	■	■	●	●
NOVOPERM YELLOW HR 72	Pigment Yellow 83	21108	—	—	—	—	○	●	■	●	○	—
NOVOPERM YELLOW M2R 70	Pigment Yellow 139	56298	—	—	—	—	●	●	■	■	—	—
NOVOPERM YELLOW P-M3R	Pigment Yellow 139	56298	●	—	■	—	—	—	○	—	—	—
NOVOPERM ORANGE H5G 70	Pigment Orange 62	11775	●	—	●	●	○	●	■	●	●	●
NOVOPERM ORANGE HL	Pigment Orange 36	11780	●	—	●	●	—	—	●	●	●	●
NOVOPERM ORANGE HL 70	Pigment Orange 36	11780	●	—	●	●	■	■	■	■	●	●
NOVOPERM ORANGE HL 71	Pigment Orange 36	11780	—	—	—	—	■	■	■	●	●	—
NOVOPERM ORANGE HL 70-NF	Pigment Orange 36	11780	—	—	—	—	■	■	●	—	—	—

NAME	COLOUR INDEX	COLOUR INDEX NO.	PRINTING INKS				PAINTS						
			Offset printing	Publication gravure printing	Packaging printing (solvent-based)	Packaging printing (aqueous)	Automotive OEM paints	Automotive refinishing paints	Industrial paints (general)	Powder coatings	Decorative paints	Office supplies – artists' colors	
NOVOPERM RED HFG	Pigment Orange 38	12367	●	—	●	●	—	—	—	—	●	—	●
NOVOPERM RED HF3S	Pigment Red 188	12467	●	—	●	●	—	—	●	●	■	●	●
NOVOPERM RED HF3S 70	Pigment Red 188	12467	—	—	—	—	●	●	■	●	●	●	●
NOVOPERM SCARLET 4RF 01	Pigment Red 242	20067	●	—	●	●	—	—	●	●	●	●	●
NOVOPERM RED F2RK 70	Pigment Red 170	12475	●	—	●	●	●	●	●	●	●	—	●
NOVOPERM RED F3RK 70	Pigment Red 170	12475	●	—	●	●	○	●	■	■	—	—	●
NOVOPERM RED F5RK	Pigment Red 170	12475	●	—	●	■	—	—	■	■	—	—	●
NOVOPERM RED HF2B 01	Pigment Red 208	12514	●	—	●	●	—	—	—	—	—	—	●
NOVOPERM CARMINE HF3C	Pigment Red 176	12515	●	—	●	●	—	—	—	—	—	—	●
NOVOPERM CARMINE HF4C	Pigment Red 185	12516	●	—	●	●	—	—	—	—	●	—	●
NOVOPERM BORDEAUX HF3R	Pigment Violet 32	12517	●	—	■	●	—	—	●	●	—	—	●

# 1.3 PERMANENT

This group comprises pigments that vary in fastness properties. Because of their high tinctorial strength, good gloss and excellent chemical resistance coupled with largely good light fastness the Permanent Yellow

and Orange pigments are of particular interest to the printing ink industry. Special grades with specific improvements for the individual printing processes were developed for this sector. The red pigments

which are listed here commonly are used in the graphic industry because of their tinctorial strength and gloss as well as important pigments for industrial and decorative paints.

#### LITERATURE

Pattern card PI 2013 E  
 "Decorative paints, industrial paints, automotive paints"  
 Pattern card PI 2014 ED  
 "Hostaperm, Novoperm, Permanent, Hansa –  
 Pigments for the paint industry"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PRINTING INKS									
			Offset printing	Publication gravure printing	Packaging printing (solvent-based)	Packaging printing (aqueous)	Automotive OEM paints	Automotive refinishing paints	Industrial paints (general)	Powder coatings	Decorative paints	Office supplies – artists' colors
PERMANENT YELLOW GG 02	Pigment Yellow 17	21105	●	—	■	■	—	—	○	○	—	●
PERMANENT YELLOW DHG	Pigment Yellow 12	21090	■	—	●	●	—	—	○	—	—	●
PERMANENT YELLOW DHG N26	Pigment Yellow 12	21090	—	■	—	—	—	—	—	—	—	—
PERMANENT YELLOW DHG N22	Pigment Yellow 12	21090	—	■	—	—	—	—	—	—	—	—
PERMANENT YELLOW DGR	Pigment Yellow 126	21101	■	—	●	■	—	—	—	—	—	●
PERMANENT YELLOW G	Pigment Yellow 14	21095	■	—	■	—	—	—	—	—	—	—
PERMANENT YELLOW GR	Pigment Yellow 13	21100	■	—	●	■	—	—	○	○	—	●
PERMANENT YELLOW GR 01	Pigment Yellow 13	21100	■	—	●	■	—	—	—	—	—	●
PERMANENT YELLOW P-GRL 06	Pigment Yellow 13	21100	—	—	■	○	—	—	—	—	—	—
PERMANENT YELLOW P-GRL 07	Pigment Yellow 13	21100	—	—	■	—	—	—	—	—	—	—
PERMANENT YELLOW P-GRL 09	Pigment Yellow 13	21100	—	—	■	—	—	—	—	—	—	—
PERMANENT YELLOW GRS 80	Pigment Yellow 174	21098	■	—	—	—	—	—	—	—	—	—
PERMANENT YELLOW BHS	Pigment Yellow 174	21098	■	—	—	—	—	—	—	—	—	—
PERMANENT YELLOW GRX 83	Pigment Yellow 176	21103	■	—	—	○	—	—	—	—	—	—
PERMANENT YELLOW GRX 86	Pigment Yellow 176	21103	■	—	—	○	—	—	—	—	—	●
PERMANENT YELLOW P-G	Pigment Yellow 14	21095	■	—	■	—	—	—	—	—	—	—
PERMANENT YELLOW GSO	Pigment Yellow 14	21095	—	—	—	■	—	—	—	—	—	—
PERMANENT YELLOW GA	Pigment Yellow 14	21095	●	●	■	—	—	—	—	—	—	—
PERMANENT ORANGE G	Pigment Orange 13	21110	■	—	●	■	—	—	○	○	—	●
PERMANENT ORANGE G 02	Pigment Orange 13	21110	■	—	●	■	—	—	—	—	—	—
PERMANENT ORANGE RL 01	Pigment Orange 34	21115	■	○	●	■	—	—	○	●	—	●
PERMANENT ORANGE RL 70	Pigment Orange 34	21115	●	—	●	■	—	—	■	■	—	●

NAME	COLOUR INDEX	COLOUR INDEX NO.	PRINTING INKS										PAINTS				
			Offset printing	Publication gravure printing	Packaging printing (solvent-based)	Packaging printing (aqueous)	Automotive OEM paints	Automotive refinishing paints	Industrial paints (general)	Powder coatings	Decorative paints	Office supplies – artists' colors	Decorative paints	Industrial paints (general)	Powder coatings	Decorative paints	Office supplies – artists' colors
PERMANENT RED FRLL 01	Pigment Red 9	12460	●	—	●	●	—	—	—	—	—	—	—	—	—	—	●
PERMANENT LAKE RED LCY	Pigment Red 53:1	15585:1	■	●	●	■	—	—	—	—	—	—	—	—	—	—	—
PERMANENT LAKE RED LCLL	Pigment Red 53:1	15585:1	■	●	●	■	—	—	○	—	—	—	—	—	—	—	●
PERMANENT RED FRR	Pigment Red 2	12310	●	—	●	■	—	—	—	—	—	—	—	—	—	—	●
PERMANENT RED FGR	Pigment Red 112	12370	●	—	●	●	—	—	■	○	■	●	—	—	—	—	●
PERMANENT RED FGR 02	Pigment Red 112	12370	●	—	●	●	—	—	■	—	■	●	—	—	—	—	●
PERMANENT RED FGR 03	Pigment Red 112	12370	■	—	●	■	—	—	—	—	—	—	—	—	—	—	●
PERMANENT RED FGR 70	Pigment Red 112	12370	●	—	●	●	—	—	■	○	■	●	—	—	—	—	●
PERMANENT RED LB 01	Pigment Red 48:2	15865:2	●	—	■	○	—	—	—	—	—	—	—	—	—	—	—
PERMANENT RED P-FK	Pigment Red 210	12477	○	—	■	○	—	—	—	—	—	—	—	—	—	—	●
PERMANENT BORDEAUX FGR	Pigment Red 14	12380	●	—	●	●	—	—	●	—	■	●	—	—	—	—	●
PERMANENT CARMINE FB 01	Pigment Red 5	12490	—	—	—	—	—	—	—	—	—	—	—	—	—	—	●
PERMANENT CARMINE FBB 02	Pigment Red 146	12485	●	—	■	■	—	—	●	—	—	—	—	—	—	—	●
PERMANENT RUBINE F6B	Pigment Red 184	12487	●	—	■	■	—	—	—	—	—	—	—	—	—	—	●
PERMANENT RUBINE L4B 01	Pigment Red 57:1	15850:1	■	●	—	○	—	—	—	—	—	—	—	—	—	—	—
PERMANENT RUBINE L5B 01	Pigment Red 57:1	15850:1	■	●	—	○	—	—	—	—	—	—	—	—	—	—	—
PERMANENT RUBINE L5B 02 WD	Pigment Red 57:1	15850:1	●	—	●	■	—	—	—	—	—	—	—	—	—	—	—
PERMANENT BORDEAUX FRR	Pigment Red 12	12385	●	—	●	●	—	—	○	—	■	●	—	—	—	—	●

# 1.4 HANSA

The Hansa Yellow pigments are noted for very good light fastness. Use of the Hansa Red grades should be restricted to full-shade colorations. The Hansa pigments do not have adequate fastness to over-painting. They are standard pigments for air-drying paints. The Hansa pigments also have excellent light fastness in printing inks. But they are not fast to over-painting or resistant to stoving and sterilization. The pigments are noted for very good rheological properties.

## LITERATURE

Pattern card PI 2013 E  
 "Decorative paints, industrial paints, automotive paints"  
 Pattern card PI 2014 ED  
 "Hostaperm, Novoperm, Permanent, Hansa - Pigments for the paint industry"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PRINTING INKS				PAINTS					
			Offset printing	Publication gravure printing	Packaging printing (solvent-based)	Packaging printing (aqueous)	Automotive OEM paints	Automotive refinishing paints	Industrial paints (general)	Powder coatings	Decorative paints	Office supplies - artists' colors
HANSA YELLOW 10G	Pigment Yellow 3	11710	●	-	●	■	-	-	○	-	■	■
HANSA YELLOW 10G 41 GRAN.	Pigment Yellow 3	11710	●	-	-	■	-	-	○	-	■	●
HANSA BRILLIANT YELLOW 9GX	-	-	●	-	-	■	-	-	-	-	-	●
HANSA YELLOW 5GX 01 *	Pigment Yellow 74	11741	-	-	-	-	-	-	-	-	-	-
HANSA BRILLIANT YELLOW 5GX	Pigment Yellow 74	11741	-	-	-	-	-	○	-	■	●	-
HANSA BRILLIANT YELLOW 5GX 03	Pigment Yellow 74	11741	●	-	●	■	-	-	-	-	-	●
HANSA BRILLIANT YELLOW 4GX	Pigment Yellow 73	11738	●	-	●	■	-	-	○	-	■	●
HANSA YELLOW G 02	Pigment Yellow 1	11680	-	-	●	■	-	-	○	-	■	●
HANSA BRILLIANT YELLOW 2GX 70	Pigment Yellow 74	11741	●	-	●	■	-	-	○	-	■	●
HANSA BRILLIANT YELLOW 2GX 72-S	Pigment Yellow 74	11741	-	-	-	-	-	-	○	-	■	●
HANSA RED GG	Pigment Orange 5	12075	●	-	●	■	-	-	○	-	■	●
HANSA RED R	Pigment Red 4	12085	●	-	●	■	-	-	○	-	-	●
HANSA SCARLET RNC	Pigment Red 3	12120	●	-	●	■	-	-	●	-	●	●
HANSA RED B	Pigment Red 3	12120	●	-	●	■	-	-	●	-	●	●
HANSA RED 3B	Pigment Red 3	12120	○	-	●	■	-	-	●	-	●	●

\* Only for ○ Ink Jet and ■ Toner

# 1.5 FLEXOPRINT

Flexoprint pigments are surface-treated special pigments for aqueous gravure and flexographic printing inks. In these systems they offer the

advantages of aqueous and dry preparations without having their disadvantages.

NAME	COLOUR INDEX	PASTE INKS				LIQUID INKS									
		Sheet-fed	Heatset	Coldset	Silk screen	Metal deco	UV curing	NC alcohol	NC acetate	Water based	PVB	PA	Pub gravure	Decorative laminates	UV curing
FLEXOPRINT YELLOW HR	Pigment Yellow 83	-	-	-	-	-	-	-	-	■	-	-	-	-	-
FLEXOPRINT BLACK CB 01	Pigment Black 7	-	-	-	-	-	-	-	-	■	-	-	-	-	

# 1.6 CARTAX

UV-fluorescent pigment for marking and coding purposes (e. g. security papers etc.).

NAME	COLOUR INDEX	PASTE INKS				LIQUID INKS									
		Sheet-fed	Heatset	Coldset	Silk screen	Metal deco	UV curing	NC alcohol	NC acetate	Water based	PVB	PA	Pub gravure	Decorative laminates	UV curing
CARTAX CXDP POWDER	-	●	●	-	●	●	●	●	●	●	●	●	-	●	●
CARTAX DP LIQUID	-	-	-	-	-	-	-	-	-	●	-	-	-	-	-



# 1.7 PV FAST

Highly fast organic pigments with outstanding heat resistance, light fastness and bleeding fastness in various polymers.

## LITERATURE

Pattern card PI 3001 ED  
"Organic pigments for plastics coloration"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PLASTICS						PRIN- TING INKS	PAINT
			PVC	Polyolefins	Polystyrene	Polybutylene terephthalate*	Polycarbonate	Polyamide 6		
PV FAST YELLOW H9G	Pigment Yellow 214	—	■	■	●	—	—	—	—	●
PV FAST YELLOW H4G	Pigment Yellow 151	13980	■	■	●	—	—	—	—	—
PV FAST YELLOW H2G	Pigment Yellow 120	11783	■	■	●	—	—	●	—	—
PV FAST YELLOW HG 01	Pigment Yellow 180	21290	●	■	●	●	●	—	■	—
PV FAST YELLOW HG	Pigment Yellow 180	21290	●	■	●	●	●	—	■	●
PV FAST YELLOW H2GR	Pigment Yellow 191	18795	●	■	●	●	●	—	—	—
PV FAST YELLOW HGR	Pigment Yellow 191	18795	●	■	●	●	●	—	●	●
PV FAST YELLOW HR 02	Pigment Yellow 83	21108	■	○	—	—	—	—	—	●
PV FAST YELLOW HR	Pigment Yellow 83	21108	■	○	—	—	—	—	—	—
PV FAST YELLOW HR 03	Pigment Yellow 83	21108	■	○	—	—	—	—	—	—
PV FAST YELLOW H3R	Pigment Yellow 181	11777	●	■	●	●	—	—	■	●
PV FAST ORANGE H4GL 01	Pigment Orange 72	211095	●	■	●	—	—	—	●	●
PV FAST ORANGE H2GL	Pigment Orange 64	12760	●	■	●	○	○	—	—	—
PV FAST ORANGE GRL	Pigment Orange 43	71105	●	■	●	●	●	○	—	●
PV FAST ORANGE 6RL	Pigment Orange 68	486150	●	■	●	●	●	●	—	—
PV FAST SCARLET 4RF	Pigment Red 242	20067	■	■	●	●	●	—	—	●
PV FAST RED HGR 01	Pigment Red 285	—	●	■	○	—	○	—	—	●
PV FAST RED B	Pigment Red 149	71137	●	■	●	●	●	○	●	●
PV FAST RED D3G	Pigment Red 254	56110	■	■	○	○	—	—	■	●
PV FAST RED HB	Pigment Red 247	15915	●	■	■	●	●	—	—	●
PV FAST RED 3B	Pigment Red 144	20735	■	■	●	●	●	—	—	●
PV FAST RED BNP	Pigment Red 214	200660	■	■	●	●	●	—	●	●
PV FAST RED HF4B	Pigment Red 187	12486	■	●	●	●	●	—	—	●
PV FAST RED E4G	Pigment Violet 19	73900	●	■	●	●	●	○	—	—
PV FAST RED E3B	Pigment Violet 19	73900	●	■	●	●	●	○	—	●

\*Organic pigments can have a nucleating effect in PET, and therefore preliminary trials are necessary.

NAME	COLOUR INDEX	COLOUR INDEX NO.	PLASTICS						PRIN- TING INKS	PAINT	
			PVC	Polyolefins	Polystyrene	Polybutylene terephthalate*	Polycarbonate	Polyamide 6			
PV FAST RED E5B	Pigment Violet 19	73900	●	■	●	●	●	○	—	—	●
PV FAST PINK E	Pigment Red 122	73915	●	■	●	●	●	○	—	—	●
PV FAST PINK E 01	Pigment Red 122	73915	●	■	●	●	●	○	—	—	●
PV FAST PINK E2B	Pigment Red 122	73915	●	■	●	●	●	○	—	—	●
PV FAST VIOLET BLP	Pigment Violet 23	51319	●	■	●	—	—	○	—	—	●
PV FAST VIOLET RL	Pigment Violet 23	51319	●	■	●	—	—	○	—	—	●
PV FAST BLUE A4R	Pigment Blue 15:1	74160	■	■	●	○	○	—	—	—	●
PV FAST BLUE A2R	Pigment Blue 15:1	74160	■	■	●	○	○	○	—	●	●
PV FAST BLUE BG	Pigment Blue 15:3	74160	■	■	●	●	●	●	—	■	●
PV FAST GREEN GNX	Pigment Green 7	74260	■	■	●	●	●	○	—	—	●
PV FAST BROWN HFR	Pigment Brown 25	12510	■	●	—	—	—	—	—	—	●
PV FAST BROWN RL	Pigment Brown 41	—	■	●	●	—	—	—	—	—	●

\*Organic pigments can have a nucleating effect in PET, and therefore preliminary trials are necessary.

# 1.8 GRAPHTOL

Classic and newly developed organic pigments with good application properties and an attractive price performance ratio.

## LITERATURE

Pattern card PI 3001 ED  
"Organic pigments for plastics coloration"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PLASTICS						PAINT	
			PVC	Polyolefins	Polystyrene	Polybutylene terephthalate*	Polycarbonate	Polyamide 6	Powder coatings	Office supplies – artists' colors
GRAPHTOL YELLOW GG	Pigment Yellow 17	21105	■	○	–	–	–	–	–	●
GRAPHTOL YELLOW 3GP 01	Pigment Yellow 155	200310	●	■	●	–	–	–	○	●
GRAPHTOL YELLOW GR	Pigment Yellow 13	21100	■	○	–	–	–	–	–	●
GRAPHTOL YELLOW H2R	Pigment Yellow 139	56298	●	■	–	–	–	–	○	●
GRAPHTOL ORANGE GPS	Pigment Orange 13	21110	■	○	–	–	–	–	–	●
GRAPHTOL ORANGE RL	Pigment Orange 34	21115	■	○	–	–	–	–	–	●
GRAPHTOL RED HFG	Pigment Orange 38	12367	■	●	–	–	–	–	–	●
GRAPHTOL RED LG	Pigment Red 53:1	15585:1	■	■	●	–	●	–	–	●
GRAPHTOL RED LC	Pigment Red 53:1	15585:1	■	■	●	–	●	–	○	–
GRAPHTOL RED BB	Pigment Red 38	21120	●	○	–	–	–	–	–	–
GRAPHTOL RED F3RK 70	Pigment Red 170	12475	–	■	–	–	–	–	–	●
GRAPHTOL FIRE RED 3RLP	Pigment Red 48:3	15865:3	■	■	●	–	–	–	○	●
GRAPHTOL RED HF2B	Pigment Red 208	12514	■	○	–	–	–	–	–	●
GRAPHTOL RED F5RK	Pigment Red 170	12475	–	■	–	–	–	–	–	●
GRAPHTOL RED P2B	Pigment Red 48:2	15865:2	■	■	●	–	–	–	–	●
GRAPHTOL CARMINE HF4C	Pigment Red 185	12516	■	●	●	–	–	–	–	●
GRAPHTOL CARMINE HF3C	Pigment Red 176	12515	■	●	●	–	●	–	–	●
GRAPHTOL RUBINE L4B	Pigment Red 57:1	15850:1	■	■	○	–	–	–	○	●
GRAPHTOL BORDEAUX HF3R	Pigment Violet 32	12517	■	○	–	–	–	–	–	●
GRAPHTOL BLUE AN 01	Pigment Blue 15	74160	■	–	–	–	–	–	–	●

\* Organic pigments can have a nucleating effect in PET, and therefore preliminary trials are necessary.

# 1.9 NOVOTEX

The pigments included in the Novotex range were developed specially for use in the textile printing and agricultural sectors. The products are supplied

in powder form. The standardization is carried out in an aqueous system with wider specification limits.

NAME	COLOUR INDEX	COLOUR INDEX NO.	FIELD OF APPLICATION		
			Textile printing sector	Agricultural sector	Office supplies
NOVOTEX RED ARCY	Pigment Red 48:2	15865:2	–	■	●
NOVOTEX RED F4RK	Pigment Red 170	12475	■	–	●
NOVOTEX CARMINE FBB	Pigment Red 146	12485	■	–	●

## OEKO-TEX 100

For Oeko-Tex 100 information please contact Clariant Corporate Product Stewardship.

# 1.10 AGROCER

The pigments of the Agrocer range are specially developed for the use in agricultural applications with very high color strength and excellent fastness properties.

Agrocer pigments are highly suitable in seed treatment pesticide formulations, especially when a high solid content is desired, but also for the coloration of seed coating products.

NAME	COLOUR INDEX	COLOUR INDEX NO.	AGRICULTURAL SECTOR
AGROCER YELLOW 001	Pigment Yellow 1	11680	■
AGROCER RED 112	Pigment Red 112	12370	■
AGROCER RED 482	Pigment Red 48:2	15865:2	■
AGROCER VIOLET 023	Pigment Violet 23	51319	■
AGROCER BLUE 153	Pigment Blue 15:3	74160	■
AGROCER GREEN 007	Pigment Green 7	74260	■

# 2 SPECIAL GRADES

- 2.1 Numerical code for alteration of standards and special grades
- 2.2 Transparent grades for effect paints
- 2.3 Opaque pigments for lead-free pigmentation
- 2.4 Easily dispersible pigments
- 2.5 P grades
- 2.6 Cosmetic pigments
- 2.7 NIP products
  - 2.7.1 Ink Jet pigments
  - 2.7.2 Ink Jet pigment preparations
  - 2.7.3 Ink Jet dyes
  - 2.7.4 Toner pigments
  - 2.7.5 Toner pigment preparations
  - 2.7.6 Charge Control Agents
  - 2.7.7 Waxes
  - 2.7.8 HDK – pyrogenic silica
- 2.8 LHC-Grades

## 2.1

# NUMERICAL CODE FOR ALTERATION OF STANDARDS AND SPECIAL GRADES

In the course of improving or further developing existing pigments/pigment preparations for special fields of application or special processing methods there is a need for modified grades or special grades, which are identified by adding a two-digit number to the pigment name. Each further modification to one and the same pigment is identified by the next consecutive number.

We use the following system:

01 – 19 Alteration of standards and improvements to individual pigments (e.g. higher tinctorial strength, change in shade etc.).

20 – 29 Easily dispersible pigments for publication gravure printing inks. High tinctorial strength, very good rheological properties. N grades do not strike through.

**PERMANENT YELLOW DHG N26**  
**PERMANENT YELLOW DHG N22**

30 – 39 Alteration of standards or improvements to pigment preparations and flushed pastes with their own range name.

40 – 49 Pigments with improved dispersibility primarily for air-drying paints.

**HANSA YELLOW 10G 41 GRAN.**

---

### LITERATURE

Pattern card PI 2013 E  
“Decorative paints, industrial paints, automotive paints”

---

70 – 79 Highly opaque pigments with very good flow properties.

**HANSA BRILLIANT YELLOW 2GX 70**  
**HANSA BRILLIANT YELLOW 2GX 70-S**  
**NOVOPERM YELLOW 5GD 71**  
**HOSTAPERM YELLOW H4G**  
**HOSTAPERM YELLOW H4G 70**  
**NOVOPERM YELLOW HR 70**  
**NOVOPERM YELLOW M2R 70**  
**NOVOPERM ORANGE H5G 70**  
**NOVOPERM ORANGE HL 70**  
**PERMANENT ORANGE RL 70**  
**HOSTAPERM RED E2B 70**  
**PERMANENT RED FGR 70**  
**NOVOPERM RED HF3S 70**  
**HOSTAPERM RED D3G 70**  
**HOSTAPERM RED D2G 70**  
**NOVOPERM RED F2RK 70**  
**NOVOPERM RED F3RK 70**  
**GRAPHTOL RED F3RK 70**

---

### LITERATURE

Pattern card PI 2013 E  
“Decorative paints, industrial paints, automotive paints”

---

80 – 89 Special pigments for the efficient manufacture of sheet-fed and web offset printing inks. High gloss, low viscosity, very easily dispersible.

**PERMANENT YELLOW GRY 82**  
**PERMANENT YELLOW GRX 83**  
**PERMANENT YELLOW GRX 86**  
**PERMANENT YELLOW GRS 80**

## 2.2

# TRANSPARENT GRADES FOR EFFECT PAINTS

Special grades with very high transparency.

**HOSTAPERM ORANGE GR**  
**HOSTAPERM SCARLET GO**  
**HOSTAPERM SCARLET GO TRANSP.**  
**HOSTAPERM RED P2GL-WD**  
**HOSTAPERM RED E5B 02**  
**HOSTAPERM PINK E**  
**HOSTAPERM PINK E TRANSP. 01**  
**HOSTAPERM PINK EB TRANSP.**  
**HOSTAPERM RED VIOLET ER 02**  
**HOSTAPERM VIOLET BL 01**  
**HOSTAPERM VIOLET RL SPEC. 01**  
**HOSTAPERM VIOLET RL-NF**

**HOSTAPERM BLUE BT-728-D**  
**HOSTAPERM BLUE BT-729-D**  
**HOSTAPERM BLUE BT-627-D**  
**HOSTAPERM BLUE A4R**  
**HOSTAPERM BLUE BT-617-D**  
**HOSTAPERM GREEN GNX 01**  
**HOSTAPERM BROWN HFR 01**

---

### LITERATURE

Pattern card PI 2013 E  
“Decorative paints, industrial paints, automotive paints”

---

## 2.3 OPAQUE PIGMENTS FOR LEAD-FREE PIGMENTATIONS

HANSA BRILLIANT YELLOW 2GX 70  
HANSA BRILLIANT YELLOW 2GX 72-S  
NOVOPERM YELLOW 5GD 71  
HOSTAPERM YELLOW H4G  
HOSTAPERM YELLOW H4G 70  
NOVOPERM YELLOW HR 72  
NOVOPERM YELLOW M2R 70  
NOVOPERM ORANGE H5G 70  
NOVOPERM ORANGE HL 71  
NOVOPERM ORANGE HL 70-NF

PERMANENT ORANGE RL 70  
PERMANENT RED FGR 70  
NOVOPERM RED HF3S 70  
HOSTAPERM RED D2G 70  
NOVOPERM RED F2RK 70  
NOVOPERM RED F3RK 70  
HOSTAPERM RED E2B 70

## 2.4 P GRADES

Special grades for the manufacture of solvent-containing packaging gravure and flexographic printing inks.

NOVOPERM YELLOW P-HG  
PERMANENT YELLOW P-G  
PERMANENT YELLOW P-GRL 06  
PERMANENT YELLOW P-GRL 07  
PERMANENT YELLOW P-GRL 09  
NOVOPERM YELLOW P-M3R  
NOVOPERM YELLOW P-HRE  
PERMANENT RED P-FK  
PERMANENT RUBINE P-L5B 01  
HOSTAPERM VIOLET P-RL

## 2.5 COSMETIC PIGMENTS

Colorants to be used in cosmetic products and toiletries (e.g. tooth paste, soap, shampoo, or lipstick) are subject to several regulations. Main regulations are issued in the USA, the EU, and Japan. They are used as guidelines by most countries in the respective regions.

The different cosmetic regulations also define permitted use categories or application fields for colorants. In the US, colorants for food, drugs, and cosmetics are regulated by the Food and Drug Administration (FDA).

Synthetic organic colorants for food, drugs, and cosmetics intended for sale in the United States must have prior certification of the FDA. In Japan, colorants for cosmetics and drugs are regulated by the Pharmaceutical Affairs Law. The European Union defines the requirements for cosmetic colorants in the "Regulation on cosmetic products No 1223/2009".

### LITERATURE

Brochure PI 4002 E  
"Living Colors – Solutions for Home & Personal Care Products"

NAME	COLOUR INDEX	COLOUR INDEX NO.	COSMETIC LABEL NAME
COSMETIC PINK RC 01	Pigment Red 181 / Vat Red 1	73360	USA: D&C Red No. 30 EU: CI 73360 Japan: Aka 226
HOSTAPERM BLUE A4R	Pigment Blue 15:1	74160	EU: CI 74160
HOSTAPERM GREEN GNX-C	Pigment Green 7	74260	EU: CI 74260
PERMANENT CARMINE FB 01	Pigment Red 5	12490	EU: CI 12490
PV FAST BLUE BG	Pigment Blue 15:3	74160	EU: CI 74160

# 2.6 NIP PRODUCTS

## 2.6.1 INK JET PIGMENTS

Specially developed range of ink jet pigments. Additional pigments recommended for ink jet applications (Graptol, Novoperm, PV Fast, Hostaperm).

### LITERATURE

Brochure PI 6000 E  
»“Products for Non Impact Printing”

## INK JET PIGMENTS

PRODUCT	COLOUR INDEX	CHEMICAL CLASS	MAIN APPLICATION		
			Aqueous	UV	Solvent
INK JET YELLOW H4G	P.Y. 151	Benzimidazolone	—	■	■
INK JET YELLOW H2G	P.Y. 120	Benzimidazolone	—	■	■
INK JET YELLOW 4G 01	P.Y. 155	Bisacetoacetarylide	—	■	■
INK JET YELLOW 4G	P.Y. 155	Bisacetoacetarylide	■	■	■
INK JET YELLOW 4GC	P.Y. 155	Bisacetoacetarylide	■	■	■
INK JET YELLOW 5GX-W	P.Y. 74	Monoazo	■	—	—
INK JET YELLOW 5GS	P.Y. 74	Monoazo	■	—	—
INK JET MAGENTA E5B 02	P.V. 19	Quinacridone	■	■	■
INK JET MAGENTA E7B VP 3958	—	Quinacridone	■	■	■
INK JET MAGENTA E 02	P.R. 122	Quinacridone	■	■	■
INK JET MAGENTA E 02-ECO VP 6007 - NEW	P.R. 122	Quinacridone	■	■	■

## ADDITIONALLY RECOMMENDED PIGMENTS FOR INKJET APPLICATIONS

TONER YELLOW 3GP-CT VP 5152 - NEW	P.Y. 155	Bisacetoacetarylide	■	■	■
PV FAST YELLOW HG 01	P.Y. 180	Benzimidazolone	—	■	■
TONER YELLOW HG	P.Y. 180	Benzimidazolone	—	■	■
NOVOPERM YELLOW P-HG	P.Y. 180	Benzimidazolone	—	■	■
TONER YELLOW 5GXT	P.Y. 74	Monoazo	○	—	—
HANSA YELLOW 5GX 01	P.Y. 74	Monoazo	○	—	—
HANSA BRILLIANT YELLOW 5GX 03	P.Y. 74	Monoazo	○	—	—
PV FAST YELLOW HR 03 VP 5463	P.Y. 83	Diazo	—	—	■
NOVOPERM YELLOW P-M3R	P.Y. 139	Isoindoline	—	■	■
GRAPHTOL ORANGE RL	P.O. 34	Diazo	■	—	—
PV FAST ORANGE GRL	P.O. 43	Perione	■	■	○
PV FAST ORANGE H2GL	P.O. 64	Benzimidazolone	—	■	■
PV FAST RED D3G	P.R. 254	DPP	■	■	■
PERMANENT CARMINE FBB 02	P.R. 146	Monoazo	○	—	■
PERMANENT RUBINE F6B	P.R. 184	Monoazo	○	—	■
TONER MAGENTA F9B-W LV 6075 - NEW	P.R. 293	Monoazo	■	—	—
TONER MAGENTA E 02-ECO VP 6005 - NEW	P.R. 122	Quinacridone	○	○	○
TONER MAGENTA E	P.R. 122	Quinacridone	○	○	○
TONER MAGENTA E-ECO VP 6006 - NEW	P.R. 122	Quinacridone	○	○	○
PV FAST PINK E 01	P.R. 122	Quinacridone	—	■	■
HOSTAPERM VIOLET BL 01	P.V. 23	Dioxazine	■	■	■
PV FAST VIOLET RL	P.V. 23	Dioxazine	■	○	■
HOSTAPERM VIOLET P-RL	P.V. 23	Dioxazine	—	■	■
PV FAST BLUE BG-NIP	P.B. 15:3	Phthalocyanine	■	■	■
HOSTAPERM BLUE BT-617-D	P.B. 15:4	Phthalocyanine	■	■	■
HOSTAPERM GREEN GNX-C	P.G. 7	Phthalocyanine	■	■	■

■ Highly recommended ○ Optional suitable

## 2.6.2 INK JET PIGMENT PREPARATIONS

Hostajet PT grades are aqueous pigment dispersions based on polymeric dispersants and inkjet quality pigments. They can be used for all types of aqueous inkjet inks.

PRODUCT	COLOUR INDEX	CHEMICAL CLASS	PIGMENT CONTENT approx. %	PARTICLE SIZE (typical d <sub>50</sub> ) nm	LIGHT FASTNESS <sup>1</sup>	CHARACTERISTICS
HOSTAJET RED D3G-PT VP 5121	P.R. 254	DPP	20	170	6-7	High performance mid shade red
HOSTAJET MAGENTA E5B-PT VP 3565	P.V. 19	Quinacridone	20	80	7-8	High performance red shade magenta
HOSTAJET MAGENTA E7B-PT VP 5122	—	Quinacridone	20	50	6-7	High performance mid shade magenta
HOSTAJET MAGENTA E-PT	P.R. 122	Quinacridone	20	70	7-8	High performance standard magenta
HOSTAJET CYAN BG-PT	P.B. 15:3	Phthalocyanine	20	80	8	High performance standard cyan
HOSTAJET GREEN 8G-PT VP 5154	P.G. 36	Phthalocyanine	25	45	7-8	High performance yellow shade green
HOSTAJET BLACK O-PT	P.Bl. 7	Carbon Black	15	70	8	High performance standard black

1 The fastness properties were tested according to DIN ISO 12040 with an aqueous based ink jet ink containing 5% pigment applied onto plain paper.

# 2.7 NIP PRODUCTS

## 2.7.3 INK JET DYES - SOLVENT BASED

Powder grade dyes with very good solubility in alcohols, ketones and glycol esters (Savinyl, Duasyn).

### SAVINYL DYES FOR INK JET INKS

PRODUCT	COLOUR INDEX	CHEMICAL CLASS	LIGHT FASTNESS <sup>1</sup>	CHARACTERISTICS
SAVINYL YELLOW RLS	S. Y. 83:1	Azo 1:2 Cr-complex	7-8	Standard yellow with good solubility in ketones
SAVINYL RED 3BLS	S. R. 91	Azo 1:2 Co-complex	6	Magenta with good solubility in ketones
SAVINYL PINK 6BLS	S. R. 127	Azo 1:2 Cr-complex	4	Standard magenta with good solubility in appropriate ketones
SAVINYL BLUE GLS	S. B. 44	Phthalocyanine	6	Standard cyan with good solubility in alcohols and ketones
SAVINYL BLACK RLSN 01	S. Bl. 27	Azo 1:2 Cr-complex	7	Standard black with good solubility in ketones

<sup>1</sup> The fastness properties were tested according to DIN ISO 12040 on a print containing 5 % Savinyl dye in vinyl copolymer, applied at 2-3 g/m<sup>2</sup> on aluminum foil.

### DUASYN DYE FOR INK JET INKS

PRODUCT	COLOUR INDEX	CHEMICAL CLASS	LIGHT FASTNESS <sup>1</sup>	CHARACTERISTICS
DUASYN BLACK A-RG	S. Bl. 27	Azo 1:2 Cr-complex	7	Standard black with good solubility in MEK

<sup>1</sup> The fastness properties were tested according to DIN ISO 12040 on a print containing 5 % dye in vinyl copolymer, applied at 2-3 g/m<sup>2</sup> on aluminum foil.

## 2.7.3 INK JET DYES - WATER BASED

Duasyn-SF/Duasynjet-SF grades are specially designed for water based ink jet inks.

The following properties are typical for all highly salt minimized Duasyn/Duasynjet-SF grades used mainly for high performance ink jet ink systems.

### SPECIAL INK JET GRADE SF DYES

PRODUCT	COLOUR INDEX	CHEMICAL CLASS	DYE CONTENT approx. %	LIGHT FASTNESS <sup>1</sup>	CHARACTERISTICS
DUASYN ACID YELLOW XX-SF LIQ.	A. Y. 23	Azo	8	4-5	Standard red shade yellow
DUASYN YELLOW 3GF-SF LIQ.	D. Y. 132	Azo	8	4-5	High performing red shade yellow
DUASYN MAGENTA CR-SF LIQ.	—	Azo	15	4	Highly brilliant shade magenta reactive dye
DUASYN MAGENTA 2B-SF LIQ.	—	Azo	20	4-5	High performing standard shade magenta
DUASYN BRILLIANT RED F3B-SF LIQ.	R. R. 180	Azo	15	4	Standard magenta, reactive dye
DUASYNJET CYAN FRL-SF LIQ.	D. B. 199	Phthalocyanine	10	7	Standard green shade cyan
DUASYN ACID BLUE AE-SF 30 LIQ.	A. B. 9	Triarylmethane	30	2-3	Standard cyan for shading
DUASYN BLACK HEF-SF LIQ.	D. Bl. 168	Azo	19	5	Standard black

<sup>1</sup> The fastness properties were tested according to DIN ISO 12040 with an aqueous based ink jet ink containing 4 % Duasyn black dye or 2.5 % Duasyn/Duasynjet color dye applied onto plain paper.

# 2.6 NIP PRODUCTS

## 2.6.4 TONER PIGMENTS

Specially developed range of toner pigments with specified triboelectric properties (Toner).

Additional recommended pigments for toner applications (for shading, spot colors, etc.).

### TONER PIGMENTS FOR PROCESS COLORS

PRODUCT	COLOR	COLOUR INDEX	CHEMICAL CLASS	LIGHT FASTNESS <sup>1</sup> ( <sup>1</sup> /1 SD)
TONER YELLOW 5GXT	Yellow	P. Y. 74	Monoazo	5
TONER YELLOW 3GP	Yellow	P. Y. 155	Bisacetoacetarylide	7-8
TONER YELLOW 3GP-CT VP 5152 - NEW	Yellow	P. Y. 155	Bisacetoacetarylide	7-8
TONER YELLOW HG	Yellow	P. Y. 180	Benzimidazolone	6-7
TONER MAGENTA F9B-W LV 6075 - NEW	Magenta	P. R. 293	Monoazo	Under evaluation
TONER MAGENTA E 02	Magenta	P. R. 122	Quinacridone	7
TONER MAGENTA E-ECO VP 6006 - NEW	Magenta	P. R. 122	Quinacridone	7-8
TONER MAGENTA E	Magenta	P. R. 122	Quinacridone	7-8
TONER MAGENTA E 02-ECO VP 6005 - NEW	Magenta	P. R. 122	Quinacridone	7

### ADDITIONALLY RECOMMENDED PIGMENTS\* FOR TONER APPLICATIONS

HOSTAPERM YELLOW H6G	Yellow	P. Y. 175	Benzimidazolone	7
INK JET YELLOW H4G	Yellow	P. Y. 151	Benzimidazolone	7
NOVOPERM YELLOW M9G VP 6059	Yellow	P. Y. 185	Isoindoline	7-8
PV FAST YELLOW HG 01	Yellow	P. Y. 180	Benzimidazolone	7
NOVOPERM YELLOW P-HG	Yellow	P. Y. 180	Benzimidazolone	7
HOSTAPERM YELLOW K3G VP 6058	Yellow	P. Y. 93	Azo	7-8
NOVOPERM YELLOW FGL	Yellow	P. Y. 97	Monoazo	7
GRAPHTOL YELLOW GG	Yellow	P. Y. 17	Diarylide	4
INK JET YELLOW 5GX-W	Yellow	P. Y. 74	Monoazo	6
INK JET YELLOW 5GS	Yellow	P. Y. 74	Monoazo	6
HANSA YELLOW 5GX 01	Yellow	P. Y. 74	Monoazo	6
NOVOPERM YELLOW P-M3R	Yellow	P. Y. 139	Isoindoline	8
GRAPHTOL ORANGE RL	Orange	P. O. 34	Disazo	6-7
PV FAST RED D3G	Red	P. R. 254	DPP	8
GRAPHTOL CARMINE HF4C	Red	P. R. 185	Benzimidazolone	6-7
PERMANENT CARMINE FBB 02	Blue-shade red	P. R. 146	Monoazo	6
PERMANENT RUBINE F6B	Blue-shade red	P. R. 184	Monoazo	5
INK JET MAGENTA E5B 02	Magenta	P. V. 19	Quinacridones	7
PV FAST PINK E 01	Magenta	P. R. 122	Quinacridones	7-8
HOSTAPERM VIOLET P-RL	Violet	P. V. 23	Dioxazine	8
HOSTAPERM BLUE B2G 03	Cyan	P. B. 15:3	Phthalocyanine	8
PV FAST BLUE BG-NIP	Cyan	P. B. 15:3	Phthalocyanine	8
HOSTAPERM GREEN GNX-C	Green	P. G. 7	Phthalocyanine	8

\* Please note that these products are standardized in different applications like paints, etc.  
1 = The light fastness was determined in a draw down in a typical polyester toner resin.

## 2.6.5 TONER PIGMENT PREPARATIONS

Non-dusting, easy-to-disperse concentrates available as standard or tailor-made products (Hostacopy).  
Liquid dispersions are available on request.

### PIGMENT PREPARATIONS FOR TONERS

PRODUCT	COLOR	COLOUR INDEX	PIGMENT	PIGMENT CONTENT
				%
HOSTACOPY HG-Y 101	Yellow	P. Y. 180	Toner Yellow HG	40
HOSTACOPY FBB 02-M 101	Magenta	P. R. 146	Permanent Carmine FBB 02	40
HOSTACOPY E 02-M 101	Magenta	P. R. 122	Toner Magenta E 02	40
HOSTACOPY BG-C 101	Cyan	P. B. 15:3	PV Fast Blue BG	40

## 2.6.6 CHARGE CONTROL AGENTS FOR TONERS

The colorless Charge Control Agents (CCAs) are designed for multi-purpose applications, i. e., for color toners as well as for black toners. All CCAs are compatible with common toner resins like styrene-acrylic, polyester, epoxy, etc.

### CHARGE CONTROL AGENTS FOR TONERS

PRODUCT	POLARITY	COLOR	CHEMICAL CLASS
COPY CHARGE N4P	Negative	Colorless	Modified inorganic polymeric compound
COPY CHARGE N5P-01	Negative	Colorless	Modified inorganic polymeric compound



## 2.6 NIP PRODUCTS

### 2.6.7 WAXES

Clariant's waxes for toner are not only additives which perform as release agents in modern toners, but they are also designed as special products for easier dispersion of CCAs and pigments in the toner resin.

Clariant offers a wide range of waxes. Detailed information can be found in our separate brochure named "Licowax®, Ceridust®, Licolub®, Licomont®" (DA 8048 E).

### WAXES FOR TONERS

PRODUCT	COLOR	MELTING TEMPERATURE	MELT VISCOSITY
		°C	mPa·s/°C
LICOWAX E	Yellowish	- 81	~ 20 / 100
CERIDUST 2051	White	- 107	< 20 / 140
LICOWAX PE 130	White	- 130	~ 300 / 140
LICOWAX C	White	- 142	< 50 / 160
LICOCENE PP 6102	White	- 145	~ 60 / 170

### 2.6.8 HDK - PYROGENIC SILICA

Clariant offers Wacker's pyrogenic silicas for modern toners in Japan, Korea, US and Canada. For detailed information please contact our local sales representatives.

## 2.7 LHC-GRADES

The LHC-range contains high quality, low halogen controlled pigments and dyes to support industries to reduce their halogenated substances levels.

### LITERATURE

Flyer DP 6198 E  
"High performance colorants for non-halogenated plastic compounds"

### LHC-GRADES

NAME	COLOUR INDEX	COLOUR INDEX NO.	PE/PP	PS/SAN	ABS	PC	POM	PA 6	PET	PBT	PPMA
GRAPHTOL YELLOW H2R-LHC	P. Y. 139	56298	■	—	—	—	—	—	—	—	—
PV FAST YELLOW H3R-LHC	P. Y. 181	11777	■	■	■	—	■	—	—	■	●
PV FAST ORANGE H2GL-LHC	P. O. 64	12760	■	■	■	●	●	—	—	●	●
PV FAST ORANGE 6RL-LHC	P. O. 68	486150	■	■	■	■	■	■	—	■	●
PV FAST RED B-LHC	P. R. 149	71137	■	■	■	■	■	●	■	■	■
PV FAST RED HB-LHC	P. R. 247	15915	■	■	■	■	—	—	—	■	●
GRAPHTOL CARMINE HF3C-LHC	P. R. 176	12515	■	■	—	■	—	—	—	—	■
PV FAST PINK E-LHC	P. R. 122	73915	■	■	■	■	●	●	●	●	●
PV FAST BLUE A4R-LHC	P. B. 15:1	74160	■	■	■	●	●	●	●	●	■
PV FAST BLUE BG-LHC	P. B. 15:3	74160	■	■	■	■	■	■	■	■	■
POLYSYNTHREN YELLOW RL-LHC	P. Y. 192	—	—	—	—	—	—	■	●	●	—
SOLVAPERM RED 2G-LHC	S. R. 179	564150	—	■	■	■	—	■	■	■	■

# 3 PIGMENT PREPARATIONS

- 3.1 Colanyl 100
- 3.2 Colanyl 500
- 3.3 Hostatint 500
- 3.4 Hostatint A 100
- 3.5 Hostatint UV
- 3.6 Hostafine
- 3.7 Renol HW 30
- 3.8 Flexonyl / Flexonyl SP
- 3.9 Flexonyl A
- 3.10 Flexonyl WF
- 3.11 Cosmenyl
- 3.12 Cosmenyl gran.
- 3.13 Viscofil
- 3.14 Agrocyl disp.
- 3.15 Hostaprint
- 3.16 Hostasin
- 3.17 Telasperse PVC

# 3.1 COLANYL 100

Colanyl 100 is a range of aqueous, binder-free pigment preparations that is manufactured without using alkyl phenol ethoxylated (APEO) additives. The main application fields of Colanyl 100 range are dispersion paints and renderings/plaster based on aqueous polymer dispersions. They are also compatible with other binder systems, e.g. water-based industrial paints, but the maximum dosage level and compatibility of the binder-free Colanyl 100 has to be checked in the customer paint system itself. By using Colanyl 100 pigment preparations in automatic and/or manual dispensers, excellent accuracy and reliability when poured or pumped have been observed. Furthermore, Colanyl 100 pigment preparations are miscible in all proportions with each other. By adding Colanyl Extender MS 531, the color strength of the Colanyl 100 can be adjusted.

The data presented in this table is meant to provide a general indication and does not represent quality-relevant average values. The quality of our preparations is defined by the specifications of the coloristical and rheological values. The Colour Index data relate to the basic pigments.

#### LITERATURE

Pattern card PI 2020 ED  
"Colanyl 100 – Pigment preparations"

Flyer PI 2021 E  
"Colanyl 100 – Pigment preparations"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT	SOLID CONTENT	WATER	GLYCOL	DENSITY
			%	%	%	%	g/cm <sup>3</sup>
COLANYL YELLOW 10G 131	Pigment Yellow 3	11710	48	56	24	20	1.17
COLANYL YELLOW 5GX 131	Pigment Yellow 74	11741	46	54	26	20	1.14
COLANYL YELLOW FGL 133	Pigment Yellow 97	11767	38	52	30	18	1.12
COLANYL YELLOW H3G 131	Pigment Yellow 154	11781	30	40	40	20	1.14
COLANYL YELLOW 2GXD 130	Pigment Yellow 74	11741	48	57	18	25	1.19
COLANYL YELLOW G 132	Pigment Yellow 1	11680	50	56	24	20	1.17
COLANYL YELLOW HR 131	Pigment Yellow 83	21108	35	55	30	15	1.14
COLANYL YELLOW HRD 131	Pigment Yellow 83	21108	50	58	27	15	1.19
COLANYL RED GG 131	Pigment Orange 5	12075	45	56	24	20	1.20
COLANYL RED FRL 131	Pigment Red 9	12460	48	54	26	20	1.16
COLANYL SCARLET GO 131	Pigment Red 168	59300	35	51	29	20	1.22
COLANYL RED FGRG 130	Pigment Red 112	12370	47	53	21	26	1.18
COLANYL RED FGR 131	Pigment Red 112	12370	45	53	28	19	1.18
COLANYL CARMINE FB 130	Pigment Red 5	12490	40	51	29	20	1.14
COLANYL RED E3B 130	Pigment Violet 19	73900	32	47	28	25	1.13
COLANYL PINK E 130	Pigment Red 122	73915	20	36	44	20	1.12
COLANYL VIOLET RL 132	Pigment Violet 23	51319	30	45	37	18	1.14
COLANYL BLUE A2R 131	Pigment Blue 15:1	74160	40	51	31	18	1.21
COLANYL BLUE B2G 131	Pigment Blue 15:3	74160	47	54	26	20	1.23
COLANYL GREEN GG 131	Pigment Green 7	74260	50	59	26	15	1.34
COLANYL BLACK PR 130	Pigment Black 7	77266	30	38	37	25	1.18
COLANYL BLACK N 131	Pigment Black 7	77266	42	49	31	20	1.27
COLANYL OXIDE YELLOW BV 100	Pigment Yellow 184	771740	65	72	18	10	2.18
COLANYL OXIDE YELLOW CR 130	Pigment Brown 24	77310	66	80	5	15	2.18
COLANYL OXIDE YELLOW R 132	Pigment Yellow 42	77492	66	73	9	18	1.98
COLANYL OXIDE RED G 130	Pigment Red 101	77491	65	70	16	14	2.17
COLANYL OXIDE RED B 131	Pigment Red 101	77491	72	77	8	14	2.34
COLANYL OXIDE BLUE COR 100	Pigment Blue 28	77346	60	67	15	18	1.95
COLANYL OXIDE GREEN G 131	Pigment Green 17	77288	75	80	10	10	2.56
COLANYL OXIDE BLACK B 130	Pigment Black 11	77499	50	62	18	20	1.90
COLANYL WHITE R 130	Pigment White 6	77891	70	77	4	19	2.18

# 3.2 COLANYL 500

Colanyl 500 is a range of aqueous, binder-free pigment preparations that is manufactured without using alkyl phenol ethoxylated (APEO) additives. These aqueous pigment preparations are compatible with water-based low VOC decorative paints [1].

The main application fields of Colanyl 500 range are modern dispersion paints and renderings/plaster based on aqueous polymer dispersions. They are also compatible with other binder systems, e.g. water-based industrial paints, but the maximum dosage level and compatibility of the binder-free Colanyl 500 has to be checked in the customer paint system itself. By using Colanyl 500 pigment preparations in automatic and/or manual dispensers, excellent accuracy and reliability when poured or pumped have been observed. Furthermore, Colanyl 500 pigment preparations are miscible in all proportions with each other. By adding Colanyl Extender MS 531, the color strength of Colanyl 500 can be adjusted.

The data presented in this table is meant to have a general indication and does not represent quality-relevant average values. The quality of our preparations is defined by the specifications of the coloristical and rheological values. The Colour Index data relate to the basic pigments.

#### LITERATURE

Pattern card PI 2011 ED  
"Colanyl 500, Hostatint 500 - For decorative paints and coatings"

Flyer PI 2005 E  
"Colanyl 500, Hostatint 500 - For decorative paints and coatings"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT	SOLID CONTENT	WATER	DENSITY
			%	%	%	g/cm <sup>3</sup>
COLANYL YELLOW 5GX 530	Pigment Yellow 74	11741	40	58	42	1.14
COLANYL YELLOW FGL 531	Pigment Yellow 97	11767	38	65	35	1.15
COLANYL YELLOW H3G 530	Pigment Yellow 154	11781	30	47	53	1.13
COLANYL YELLOW 2GXD 530	Pigment Yellow 74	11741	41	61	39	1.19
COLANYL YELLOW G 530	Pigment Yellow 1	11680	50	64	36	1.17
COLANYL YELLOW HRD 530	Pigment Yellow 83	21108	50	69	31	1.18
COLANYL RED GG 530	Pigment Orange 5	12075	45	67	33	1.24
COLANYL SCARLET GO 532	Pigment Red 168	59300	36	62	38	1.24
COLANYL RED D3GD 531	Pigment Red 254	56110	50	66	34	1.24
COLANYL RED HF3S 500	Pigment Red 188	12467	40	60	40	1.16
COLANYL RED FGRD 500	Pigment Red 112	12370	45	61	39	1.17
COLANYL RED FGR 530	Pigment Red 112	12370	47	70	30	1.20
COLANYL RED E3B 531	Pigment Violet 19	73900	30	59	41	1.14
COLANYL PINK E-WD 530	Pigment Red 122	73915	32	57	43	1.14
COLANYL PINK E 532	Pigment Red 122	73915	20	44	56	1.08
COLANYL VIOLET RL 531	Pigment Violet 23	51319	30	63	37	1.12
COLANYL BLUE A2R 530	Pigment Blue 15:1	74160	40	62	38	1.20
COLANYL BLUE B2G 530	Pigment Blue 15:3	74160	45	61	39	1.23
COLANYL GREEN GG 531	Pigment Green 7	74260	50	71	29	1.34
COLANYL BLACK N 530	Pigment Black 7	77266	43	63	37	1.28
COLANYL OXIDE YELLOW BV 53	Pigment Yellow 184	771740	65	80	20	2.22
COLANYL OXIDE YELLOW CR 531	Pigment Brown 24	77310	65	78	22	2.19
COLANYL OXIDE YELLOW R 532	Pigment Yellow 42	77492	64	78	22	2.00
COLANYL OXIDE RED G 531	Pigment Red 101	77491	65	79	21	2.16
COLANYL OXIDE RED B 531	Pigment Red 101	77491	70	83	17	2.34
COLANYL OXIDE BLUE COR 531	Pigment Blue 28	77346	62	79	21	1.96
COLANYL OXIDE GREEN G 531	Pigment Green 17	77288	75	87	13	2.59
COLANYL OXIDE BLACK B 533	Pigment Black 11	77499	53	71	29	1.80
COLANYL OXIDE BLACK IR 530	Pigment Green 17	77288	70	84	16	2.38
COLANYL WHITE R 530	Pigment White 6	77891	65	82	18	2.04
COLANYL EXTENDER MS 531	—	—	60	78	22	1.63

[1] As defined in EU directive 2004/42/EC, annex II, phase II. Colanyl Blue B2G 530 and Colanyl Violet RL 531 include up to approx. 2200 ppm VOC (Volatile Organic Compounds). All other Colanyl 500 preparations include up to approx. 800 ppm VOC (VOC-test method DIN EN ISO 17895). VOC standards and regulations vary by location. Product specific VOC information is available to customers upon request. It is the responsibility of the coatings manufacturer to determine standard compliance and appropriate claim for their products.

# 3.3 HOSTATINT 500

Hostatint 500 is a range of aqueous, binder-free pigment preparations that is manufactured without using alkyl phenol ethoxylated (APEO) additives. These multipurpose pigment preparations are compatible with water-based and solvent-based decorative coatings, especially low VOC decorative coatings [1]. They are also compatible with some other binder systems, e. g. water-based or solvent-based industrial paints, but the maximum dosage level and compatibility of the binder-free Hostatint 500 has to be checked in the customer paint system itself. By using Hostatint 500 pigment preparations in automatic and/or manual dispensers, excellent accuracy and reliability when poured or pumped have been observed.

Furthermore Hostatint 500 pigment preparations are miscible in all proportions with each other. By adding Hostatint Extender MS 532 or Hostatint Extender CC 531, the color strength of Hostatint 500 can be adjusted.

The data presented in this table is meant to provide a general indication and do not represent quality-relevant average values. The quality of our preparations is defined by the specifications of the coloristical and rheological values. The Colour Index data relate to the basic pigments.

#### LITERATURE

Pattern card PI 2011 ED  
"Colanyl 500, Hostatint 500 - For decorative paints and coatings"

Flyer PI 2005 E  
"Colanyl 500, Hostatint 500 - For decorative paints and coatings"

[1] As defined in EU directive 2004/42/EC, annex II, phase II. VOC standards and regulations vary by location. Product specific VOC information is available to customers upon request. It is the responsibility of the coatings manufacturer to determine standard compliance and appropriate claim for their products.

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT	SOLID CONTENT	WATER	DENSITY
			%	%	%	g/cm <sup>3</sup>
HOSTATINT YELLOW 12G 531	Pigment Yellow 3	11710	40	63	37	1.18
HOSTATINT YELLOW 4GX 531	Pigment Yellow 73	11738	38	63	37	1.16
HOSTATINT YELLOW FGL 532	Pigment Yellow 97	11767	40	61	29	1.14
HOSTATINT YELLOW 2GXD 531	Pigment Yellow 74	11741	40	65	35	1.15
HOSTATINT YELLOW HR 533	Pigment Yellow 83	21108	15	57	43	1.09
HOSTATINT ORANGE GR 500	Pigment Orange 43	71105	22	54	46	1.10
HOSTATINT ORANGE HLD 533	Pigment Orange 36	11780	20	60	40	1.13
HOSTATINT SCARLET GO 531	Pigment Red 168	59300	35	61	39	1.24
HOSTATINT RED FGR 531	Pigment Red 112	12370	21	51	49	1.13
HOSTATINT RED D3GD 532	Pigment Red 254	56110	30	61	39	1.15
HOSTATINT PINK E 532	Pigment Red 122	73915	20	44	56	1.10
HOSTATINT VIOLET RL 533	Pigment Violet 23	51319	15	59	41	1.11
HOSTATINT BLUE B2G 531	Pigment Blue 15:3	74160	30	57	43	1.14
HOSTATINT GREEN GG 531	Pigment Green 7	74260	30	61	39	1.18
HOSTATINT BLACK GR 532	Pigment Black 7	77266	20	54	46	1.13
HOSTATINT OXIDE YELLOW BV 531	Pigment Yellow 184	771740	65	85	15	2.07
HOSTATINT OXIDE YELLOW R 532	Pigment Yellow 42	77492	60	81	19	1.87
HOSTATINT OXIDE ORANGE Z 530	Pigment Yellow 216	—	60	82	18	2.27
HOSTATINT OXIDE RED B 532	Pigment Red 101	77491	68	85	15	2.24
HOSTATINT UMBER KT 532	Mixture	—	65	96	4	2.03
HOSTATINT OXIDE BLUE COR 531	Pigment Blue 28	77346	65	85	15	2.05
HOSTATINT OXIDE GREEN CO 532	Pigment Green 50	77377	65	89	11	2.06
HOSTATINT OXIDE GREEN G 532	Pigment Green 17	77288	60	79	21	2.16
HOSTATINT OXIDE BLACK B 532	Pigment Black 26	77537	70	92	8	2.34
HOSTATINT WHITE R 530	Pigment White 6	77891	70	89	11	2.17
HOSTATINT EXTENDER MS 532	—	—	55	78	22	1.59
HOSTATINT EXTENDER CC 531	—	—	30	61	39	1.28

# 3.4

## HOSTATINT A 100 HOSTATINT A 100-ST

The Hostatint A 100 pastes are solvent-containing pigment preparations based on a carrier resin (aldehyde resin) that was developed specially for industrial paint applications. The pastes are produced within narrow tolerances of shade and color strength allowing highly consistent paint production path with manual and automatic dispensers. The solvent and additives are carefully selected to avoid hazardous labeling or special storage requirements associated with their flammability. Hostatint A 100 shows good compatibility and can be added in the usual amounts to virtually all types of solvent-based industrial paint systems.

Hostatint A 100-ST grades are super-transparent organic pigment preparations to enhance metallic and mineral effect shades getting more popular in industrial applications. Hostatint A 100-ST have a color intensity similar to dyes, while having very high light and weather fastness with no migration and bleeding.

The Colour Index data relate to the basic pigment. The data given in the table may vary slightly because these pigment preparations are standardized in respect to tinctorial strength.

### LITERATURE

Pattern card PI 2008 E  
"Hostatint A 100 – Pigment preparations"

Flyer PI 2004 E  
"Hostatint A 100 – Pigment preparations"

Flyer PI 2007 E  
"Hostatint A 100-ST"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT CONTENT %	SOLID CONTENT %	SOLVENT CONTENT %	DENSITY g/cm <sup>3</sup>
HOSTATINT YELLOW A-F2G 100	Pigment Yellow 194	11785	36	59	41	1.19
HOSTATINT YELLOW A-H3G 100	Pigment Yellow 154	11781	42	65	35	1.23
HOSTATINT YELLOW A-HRD 100	Pigment Yellow 83	21108	28	52	48	1.16
HOSTATINT ORANGE A-HLD 100	Pigment Orange 36	11780	43	60	40	1.25
HOSTATINT RED A-D3GD 130	Pigment Red 254	56110	35	63	37	1.22
HOSTATINT PINK A-E 130	Pigment Red 122	73915	19	45	55	1.13
HOSTATINT RED VIOLET A-ER 130	Pigment Violet 19	73900	19	49	51	1.13
HOSTATINT VIOLET A-RL 100	Pigment Violet 23	51319	12	40	60	1.12
HOSTATINT BLUE A-BG 100	Pigment Blue 15:3	74160	24	60	40	1.17
HOSTATINT GREEN A-GNX 130	Pigment Green 7	74260	24	51	49	1.22
HOSTATINT BLACK A-N 100	Pigment Black 7	77266	21	55	45	1.17
HOSTATINT OXIDE YELLOW A-BV 100	Pigment Yellow 184	771740	64	80	20	2.27
HOSTATINT OXIDE YELLOW A-CR 100	Pigment Brown 24	77310	64	82	18	2.11
HOSTATINT OXIDE YELLOW A-R 100	Pigment Yellow 42	77492	50	68	32	1.68
HOSTATINT OXIDE RED A-B 100	Pigment Red 101	77491	62	78	22	2.06
HOSTATINT TRANSOXIDE YELLOW A-2R 100	Pigment Yellow 42	77492	36	67	33	1.48
HOSTATINT TRANSOXIDE RED A-G 100	Pigment Red 101	77491	44	68	32	1.59
HOSTATINT WHITE A-R 100	Pigment White 6	77891	59	79	21	1.90
HOSTATINT YELLOW A-N4G 100-ST	Pigment Yellow 150	12764	15	38	62	1.16
HOSTATINT RED A-P2Y 100-ST	Pigment Red 179	71130	15	30	70	1.15
HOSTATINT PINK A-EB 100-ST	Pigment Red 122	73915	7	27	73	1.13
HOSTATINT BLUE A-BTR 100-ST	Pigment Blue 15:1	74160	7	41	59	1.12
HOSTATINT BLUE A-BTG 100-ST	Pigment Blue 15:4	74160	15	36	64	1.15
HOSTATINT GREEN A-GMB 100-ST	Mixture	n. a.	15	37	63	1.15
HOSTATINT GREEN A-GMY 100-ST	Mixture	n. a.	15	37	63	1.15
HOSTATINT BLACK A-NB 100-ST	Pigment Black 7	77266	25	45	55	1.20
HOSTATINT BLACK A-NY 100-ST	Pigment Black 7	77266	15	30	70	1.16

# 3.5 HOSTATINT™ UV

Hostatint UV is a range of pigment preparations, which do not contain water or solvents. They are designed to work best in 100% UV systems, but are also suitable for solvent-borne UV systems. Both, the binder and the diluent (HDDA) contained in the preparations, crosslink into the coating film under UV curing conditions.

## LITERATURE

Flyer PI 2025 E  
"Colorants for radiation curing - Hostatint UV pigment preparations"

NAME	COLOUR INDEX PIGMENT	COLOUR INDEX NO.	PIGMENT	BINDER
			%	%
HOSTATINT UV YELLOW H3G	Yellow 154	11781	42	24
HOSTATINT UV YELLOW GR	Yellow 13	21100	15	18
HOSTATINT UV RED D3GD	Red 254	56110	35	29
HOSTATINT UV RED F5RK	Red 170	12475	18	10
HOSTATINT UV PINK E	Red 122	73915	19	20
HOSTATINT UV VIOLET RL	Violet 23	51319	15	25
HOSTATINT UV BLUE BG	Blue 15:3	74160	24	25
HOSTATINT UV GREEN GNX	Green 7	74560	24	25
HOSTATINT UV WHITE R	White 6	77891	62	19
HOSTATINT UV BLACK N 30	Black 7	77266	21	40
HOSTATINT UV OXIDE YELLOW BV	Yellow 184	771740	35	32
HOSTATINT UV OXIDE YELLOW R	Yellow 42	77492	43	20
HOSTATINT UV TRANS OXIDE YELLOW 2R	Yellow 42	77492	64	17
HOSTATINT UV OXIDE RED B	Red 101	77491	50	25
HOSTATINT UV TRANS OXIDE RED 2B	Red 101	77491	62	20

# 3.6 HOSTAFINE

Hostafine is a range of aqueous, binder-free pigment preparations based on non-ionic wetting agents and is manufactured without using alkyl phenol ethoxylated (APEO) additives. They are ultra fine pigment preparations with 95% of the pigment particle size below 0.5 µm and with no pigment particle size above 1 µm. These preparations show high tinting strength with high transparency and brilliance. Viscosity is low and stability against settling and skinning is excellent. Hostafine pigment preparations are especially suitable for water-based transparent wood stains. They can also be used for other applications such as aqueous emulsion paints, glass paints, water-colors, latex and water resistant inks, inks for fiber-tip fine liner and roller-tip pens. A final evaluation in the customer system is necessary.

The data presented in the table is meant to provide a general indication and do not represent quality-relevant average values. The quality of our preparations is defined by the specifications of the coloristical and rheological values. The Colour Index relate to the basic pigments.

#### LITERATURE

Pattern card DP 7075 E  
"Hostafine pigment preparations –  
Wood stain shade library"

Flyer PI 2026 E  
"Hostafine – Pigment preparations"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT	GLYCOL	DENSITY
			%	%	g/cm <sup>3</sup>
<b>HOSTAFINE YELLOW GR 31</b>	Pigment Yellow 13	21100	40	10	1.13
<b>HOSTAFINE YELLOW HR 31</b>	Pigment Yellow 83	21108	35	15	1.13
<b>HOSTAFINE RED HF3S 30</b>	Pigment Red 188	12467	40	10	1.14
<b>HOSTAFINE RED FGR 30</b>	Pigment Red 112	12370	45	10	1.15
<b>HOSTAFINE RED P2GL 30</b>	Pigment Red 179	71130	25	10	1.12
<b>HOSTAFINE RED F5RK 30</b>	Pigment Red 170	12475	35	10	1.11
<b>HOSTAFINE RUBINE F6B 31</b>	Pigment Red 184	12487	40	10	1.11
<b>HOSTAFINE MAGENTA E 30</b>	Pigment Red 122	73915	20	10	1.09
<b>HOSTAFINE VIOLET RL 30</b>	Pigment Violet 23	51319	30	10	1.12
<b>HOSTAFINE BLUE B2G 30</b>	Pigment Blue 15:3	74160	40	10	1.18
<b>HOSTAFINE GREEN GN 30</b>	Pigment Green 7	74260	40	10	1.28
<b>HOSTAFINE BLACK T 31</b>	Pigment Black 7	77266	30	10	1.18
<b>HOSTAFINE BLACK TS 30</b>	Pigment Black 7	77266	33	–	1.22
<b>HOSTAFINE TRANSOXIDE YELLOW R 33 [1]</b>	Pigment Yellow 42	77492	35	–	1.37
<b>HOSTAFINE TRANSOXIDE RED B 33 [1]</b>	Pigment Red 101	77491	35	–	1.37

[1] Hostafine Transoxide Yellow R 33 and Hostafine Transoxide Red B 33 are multipurpose pigment preparations, similar to Hostatint 500, and compatible with water-based and solvent-based low VOC decorative coatings as defined EU directive 2004/42/EC, annex II, phase II. VOC standards vary by location. Product specific VOC information is available to customers upon request. It is the responsibility of the coatings manufacturer to determine standard compliance and appropriate claim for their products.



## 3.7 RENOL® HW 30

Renol HW 30 is a range of solid pigment preparations based on polyvinyl butyral as carrier material. It is suitable for use in alcohol containing systems, esters and glycols can be used as additional solvents. Main fields of application are highly transparent solvent-based wood stains and marker inks. Furthermore, they can be used in gravure and flexographic printing inks based on nitrocellulose and for coating aluminum foils.

### LITERATURE

Pattern card PI 2012 E  
"Renol HW 30 – Pigment preparations"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT %	LIGHT FASTNESS	PARTICLE SIZE DISTRIBUTION
					d <sub>50</sub> (nm)
RENOL YELLOW HR-HW 30	Yellow 83	21108	50	6-7	≤ 75
RENOL RED HF2B-HW 30	Red 208	12514	50	6-7	≤ 75
RENOL RED F5RK-HW 30	Red 170	12475	50	6	< 250
RENOL CARMINE FBB-HW 30	Red 146	12485	50	5-6	< 150
RENOL BLUE B2G-HW 30	Blue 15:3	74160	50	8	< 100
RENOL GREEN GG-HW 30	Green 7	74260	50	8	≤ 75
RENOL BROWN HFR-HW 30	Brown 25	12510	50	8	≤ 75
RENOL BLACK R-HW 30	Black 7	77266	40	8	≤ 75
RENOL WHITE T-HW 30	White 6	77891	70	8	< 250

## 3.8 FLEXONYL / FLEXONYL SP

Flexonyl are flow-able and pump-able pigment preparations specially developed for tinting aqueous systems. The high concentrated pigment preparations are based on nonionic dispersing and wetting agents. The products are suitable for office requisites, school supplies, wood finishes, shoe polishes and detergent formulations.

Flexonyl SP is a newly developed range of pigment preparations which covers most of the current regulation (1) relevant for the following application fields:

- Selected toys
- Writing instruments; children paint's and creative material
- Detergents; especially powder detergent speckles
- Latex balloons
- Wood stains

They could be delivered with microbiological specification on request.

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT %	WATER %	GLYCERIN %	PROPYLENE GLYCOL %	ETHYLENE GLYCOL %
FLEXONYL ORANGE G	Pigment Orange 13	21110	45	27	10	—	—
FLEXONYL RED SP-FGR	Pigment Red 112	12370	48	28	20	—	—
FLEXONYL CARMINE SP-FBB	Pigment Red 146	12485	40	30	20	—	—
FLEXONYL BLACK PR 100	Pigment Black 7	77266	30	37	—	25	—
FLEXONYL WHITE R 130	Pigment White 6	77891	55	23	—	15	—
FLEXONYL WHITE RL 130	Pigment White 6	77891	65	11	—	18	—
FLEXONYL WHITE RS	Pigment White 6	77891	65	30	—	—	—

(1) More information you can find in our brochure DP 5524 E  
"Colorants for the coloration of consumer goods, food packaging and toys".

## 3.9 FLEXONYL A

This pigment preparation can be used too for the straight forward production of aqueous-alcoholic flexographic printing inks, whose varnishes can obtain alcohol without entailing the otherwise possible problems such as flocculation and associated printing problems.

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT	SOLIDS CONTENT	WATER	ETHYLENE GLYCOL	OTHER GLYCOLS
			%	%	%	%	%
<b>FLEXONYL BLACK A-CB</b>	Pigment Black 7	77266	41	48	42	—	10

## 3.10 FLEXONYL WF

Flexonyl WF grades are aqueous pigment preparations. They contain a small amount of an acrylic resin as a stabilizer and are neutralized with amine. Particularly recommended for the manufacture of aqueous flexographic printing inks. Flexonyl WF do not contain any organic solvents.

The Colour Index data relate to the basic pigments. The data given in the table may vary because these pigment preparations are standardized in respect to tinctorial strength.

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT	SOLIDS CONTENT	WATER
			%	%	%
<b>FLEXONYL YELLOW WF 074</b>	Pigment Yellow 74	11741	45	55	45
<b>FLEXONYL ORANGE WF 131</b>	Pigment Orange 13	21110	38	50	50
<b>FLEXONYL BLUE WF 153</b>	Pigment Blue 15:3	74160	37	53	47
<b>FLEXONYL BLACK WF 007</b>	Pigment Black 7	77266	36	48	52

## 3.11 COSMENYL

These pigment preparations are readily pump-able and flow-able aqueous dispersions for the coloration of cosmetic products (e.g. tooth paste, soap, or mascara), laundry powders, finger paints and other consumer products. The basic pigments of the preparations listed below comply with the requirements for cosmetic colorants defined by the European Union Regulation No. 1223/2009. This directive is valid for all countries of the European Union, and it is used as guideline by many other countries.

This regulation defines in annex IV "List of colorants allowed in cosmetic products" in column "Product type, body parts" the use of the respective colorant.

- 1 = No use restrictions
- 2 = Not to be used in eye products
- 3 = Not to be used in products applied on mucous membranes
- 4 = Rinse-off products

#### LITERATURE

Brochure PI 4002 E  
"Living Colors – Solutions for Home & Personal Care Products"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT	SOLIDS CONTENT	WATER	GLYCERIN	EU COSMETICS APPLICATION FIELD
<b>COSMENYL YELLOW 10G</b>	Pigment Yellow 3	11710	45	50	27	23	3
<b>COSMENYL YELLOW G 30</b>	Pigment Yellow 1	11680	46	51	24	25	3
<b>COSMENYL CARMINE FB 01</b>	Pigment Red 5	12490	40	45	30	25	1
<b>COSMENYL VIOLET RL</b>	Pigment Violet 23	51319	30	37	33	30	4
<b>COSMENYL BLUE A4R</b>	Pigment Blue 15:1	74160	38	45	30	25	1
<b>COSMENYL GREEN GG</b>	Pigment Green 7	74260	48	54	21	25	2
<b>COSMENYL BLACK N VP 6104</b>	Pigment Black 7	77266	19	26	44	30	1
<b>COSMENYL OXIDE YELLOW R</b>	Pigment Yellow 42	77492	58	64	20	16	1

## 3.12 COSMENYL GRAN.

These pigment preparations are supplied in granular form. They show high flow capability, and are suitable for aqueous systems.

Cosmenyl gran. preparations are used for the coloration of cosmetic products (e.g. soap, or mascara), laundry powders, finger paints and other consumer products. The basic pigments of the preparations listed below comply with the requirements for cosmetic colorants defined by the European Union Regulation No. 1223/2009. This regulation is valid for all countries of the European Union, and it is used as guideline by many other countries.

This regulation defines in annex IV "List of colorants allowed in cosmetic products" in column "Product type, body parts" the use of the respective colorant.

- 1 = No use restrictions
- 2 = Not to be used in eye products
- 3 = Not to be used in products applied on mucous membranes
- 4 = Rinse-off products

#### LITERATURE

Brochure PI 4002 E  
"Living Colors – Solutions for Home & Personal Care Products"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT	EU COSMETICS APPLICATION FIELD
<b>COSMENYL YELLOW GLS GRAN.</b>	Pigment Yellow 1	11680	38	3
<b>COSMENYL RED BLS GRAN.</b>	Pigment Red 5	12490	36	1
<b>COSMENYL BLUE BLS 30 GRAN. VP 6215</b>	Pigment Blue 15:1	74160	38	1
<b>COSMENYL GREEN 2GLS GRAN.</b>	Pigment Green 7	74260	40	2

## 3.13 VISCOFIL

Aqueous preparations, specially developed for spin dyeing of viscose, containing pigments that are resistant to the stresses occurring in this process.

The Viscofil grades are noted for high dispersion stability in viscose. Excellent color yield leads to economic processing of Viscofil for the viscose spin dyeing industry.

The Colour Index data relate to the basic pigments. The data given in the table may vary because these pigment preparations are standardized in respect to tinctorial strength.

### LITERATURE

Pattern card DP 5027 E  
"Viscose Spin Dyeing Industry –  
Economic processing by use of Viscofil"

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT	SOLID CONTENT	WATER	PROPYLENE GLYCOL
			%	%	%	%
VISCOFIL YELLOW A2GN	Pigment Yellow 14	21095	23	30	60	10
VISCOFIL YELLOW AGX	Pigment Yellow 74	11741	24	29	61	10
VISCOFIL YELLOW 2GLL	Pigment Yellow 155	200310	20	28	72	—
VISCOFIL YELLOW GGVD	Pigment Yellow 17	21105	25	38	52	10
VISCOFIL GOLDEN RVD	Pigment Yellow 13	21100	32	45	45	10
VISCOFIL GOLDEN YELLOW RRVND	Mixture	—	35	43	47	10
VISCOFIL ORANGE GG 30 VP 3525	Pigment Orange 13	21110	20	27	73	—
VISCOFIL ORANGE GRVD	Pigment Orange 4	12459	32	45	45	10
VISCOFIL ORANGE RL 30 VP 3930	Pigment Orange 34	21115	45	59	41	—
VISCOFIL RED AGN	Pigment Red 2	12310	33	38	52	10
VISCOFIL RED GVD	Pigment Red 2	12310	32	48	42	10
VISCOFIL RED BL	Pigment Red 5	12490	25	37	58	5
VISCOFIL RED F5RK 30 VP 3501	Pigment Red 170	12475	30	35	65	—
VISCOFIL RUBINE BFVD	Pigment Red 32	12320	30	44	46	10
VISCOFIL BORDEAUX BB 30	Pigment Violet 32	12517	20	29	71	—
VISCOFIL VIOLET BLNL	Pigment Violet 23	51319	30	41	59	—
VISCOFIL BLUE ARN	Pigment Blue 15	74160	33	41	49	10
VISCOFIL BLUE BL 500	Pigment Blue 15	74160	27	38	62	—
VISCOFIL BLUE FRVD	Pigment Blue 15	74160	33	45	45	10
VISCOFIL BLUE B2G 30 VP 3494	Pigment Blue 15:3	74160	33	45	45	10
VISCOFIL GREEN A-GNS	Pigment Green 7	74260	40	52	38	10
VISCOFIL GREEN GVDN 20	Mixture	—	25	33	57	10
VISCOFIL BROWN HFR 30	Pigment Brown 25	12510	20	25	75	—
VISCOFIL BLACK 2BLN	Pigment Black 7	77266	26	30	70	—
VISCOFIL BLACK VBC	Pigment Black 7	77266	27	30	60	10
VISCOFIL WHITE A-RCL 30	Pigment White 6	77891	63	75	15	10

## 3.14 AGROCER DISP.

Agrocer disp. are aqueous pigment dispersion recommended for the coloration of seeds. The pigment dispersions are easy to handle, readily pump-able for simple dosing and mixing and facilitate the cleaning of production equipment.

Due to their composition Agrocer pigment dispersions are compatible with all common seed treatment pesticide formulations as well as seed coating products.

NAME	COLOUR INDEX	COLOUR INDEX NO.	PIGMENT	WATER	POLYPRO- PYLENE GLYCOL	GLYCERINE
			%	%	%	%
AGROCER YELLOW 001 DISP.	Pigment Yellow 1	11680	46	24	—	25
AGROCER RED 112 DISP.	Pigment Red 112	12370	40	42	—	10
AGROCER RED 482 DISP.	Pigment Red 48:2	15865:2	35	53	8	—
AGROCER VIOLET 023 DISP.	Pigment Violet 23	51319	30	33	—	30
AGROCER BLUE 153 DISP.	Pigment Blue 15:3	74160	33	35	10	—
AGROCER GREEN 007 DISP.	Pigment Green 7	74260	40	38	10	—
AGROCER WHITE 006 DISP.	Pigment White 6	77831	55	21	10	—

## 3.15 HOSTAPRINT

The Hostaprint grades are finely dispersed non-dusting pigment preparations with a vinyl chloride/vinyl acetate copolymer as carrier material. They contain about 50 % pigment. The special manufacturing method ensures very good dispersion of the pigment preparations.

The Hostaprint grades are standardized in PVC mass coloration.

The Colour Index data relate to the basic pigments.

### LITERATURE

Pattern card PI 3006 ED  
"Hostaprint pigment preparations for the PVC industry"

NAME	COLOUR INDEX	COLOUR INDEX NO.
HOSTAPRINT YELLOW GG 34	Pigment Yellow 17	21105
HOSTAPRINT YELLOW H4G 34	Pigment Yellow 151	13980
HOSTAPRINT YELLOW HG 34	Pigment Yellow 180	21290
HOSTAPRINT YELLOW HR 34	Pigment Yellow 83	21108
HOSTAPRINT YELLOW HGR 34	Pigment Yellow 191	18795
HOSTAPRINT YELLOW H2R 34	Pigment Yellow 139	56298
HOSTAPRINT ORANGE H4GL 34	Pigment Orange 72	211095
HOSTAPRINT RED HFG 34	Pigment Orange 38	12367
HOSTAPRINT RED B 34	Pigment Red 149	71137
HOSTAPRINT RED D3G 34	Pigment Red 254	56110
HOSTAPRINT RED HF2B 34	Pigment Red 208	12514
HOSTAPRINT CARMINE HF4C 34	Pigment Red 185	12516
HOSTAPRINT RED E5B 34	Pigment Violet 19	73900
HOSTAPRINT PINK E 34	Pigment Red 122	73915
HOSTAPRINT VIOLET RL 34	Pigment Violet 23	51319
HOSTAPRINT BLUE A2R 34	Pigment Blue 15:1	74160
HOSTAPRINT BLUE B2G 34	Pigment Blue 15:3	74160
HOSTAPRINT GREEN GG 34	Pigment Green 7	74260
HOSTAPRINT BROWN RL 34	Pigment Braun 41	—
HOSTAPRINT BROWN HFR 34	Pigment Brown 25	12510
HOSTAPRINT BLACK L 34	Pigment Black 7	77266

## 3.16 HOSTASIN

Concentrated, about 50-60 % pigment preparations in granular form for the rubber industry. Since the pigments in the Hostasin preparations are already in very finely dispersed form, relatively little mechanical effort or only a brief mixing time is needed to obtain the full tinctorial strength. A further advantage is their ease of handling, because being granules, they are free-flowing and easily metered. They do not smear or dust and thus make for clean lossless processing.

The carrier material is an oxidation-resistant polyolefin copolymer that is compatible with natural rubber and the common synthetic rubbers.

The Colour Index data relate to the basic pigments.

### LITERATURE

Pattern card PI 3005 ED  
"Hostasin pigment preparations for the rubber industry"

NAME	COLOUR INDEX	COLOUR INDEX NO.
HOSTASIN YELLOW GR 30	Pigment Yellow 13	21100
HOSTASIN YELLOW HR 30	Pigment Yellow 83	21108
HOSTASIN ORANGE G 30	Pigment Orange 13	21110
HOSTASIN RED LC 30	Pigment Red 53:1	15585:1
HOSTASIN RED B 30	Pigment Red 38	21120
HOSTASIN RED HF2B 30	Pigment Red 208	12514
HOSTASIN BLUE A2R 30	Pigment Blue 15:1	74160
HOSTASIN GREEN GG 30	Pigment Green 7	74260

# 3.17 TELASPERSE PVC

Telasperse PVC is a phthalate-free preparation containing approximately 40–50% of pigment. It has been developed for the coloration of plasticized and non-plasticized PVC.

The Colour Index data relate to the basic pigments.

The current range of Telasperse PVC comprises the following grades: The range will be updated regularly and specific colors can be produced with a minimum quantity depending on the pigment.

## LITERATURE

Flyer PI 3007 E  
"Easy and efficient coloration of soft and rigid PVC – Telasperse PVC"

PRODUCT NAME	COLOUR INDEX	PIGMENT CONTENT [approx. %]	APPLICATIONS PVC-P			PVC-U	
			Film	Flooring	Cable	Film	Profiles
TELASPERSE PVC YELLOW GG	P. Y. 17	40	■	■	■	●	●
TELASPERSE PVC YELLOW H4G	P. Y. 151	40	■	■	■	●	●
TELASPERSE PVC YELLOW HR	P. Y. 83	40	■	■	■	●	●
TELASPERSE PVC YELLOW 3RL	P. Y. 110	50	■	■	■	●	●
TELASPERSE PVC RED D3G	P. R. 254	40	■	■	■	●	●
TELASPERSE PVC RED P2B	P. R. 48:2	40	■	■	■	●	●
TELASPERSE PVC RUBINE L4B	P. R. 57:1	40	■	■	■	●	●
TELASPERSE PVC BLUE A4R	P. B. 15:1	40	■	■	■	●	●

■ Suitable

● Limited suitability

# 4 DYES

- 4.1 Hostasol
- 4.2 Solvaperm
- 4.3 Polysynthren
- 4.4 Duasyn Acid
- 4.5 Other
- 4.6 Duasyn SF / Duasyn SF liquid / Duasynjet SF
- 4.7 Savinyl
- 4.8 Fat
- 4.9 Sanolin / Sanolin liquid / Sanolin Lave liquid
- 4.10 Aluminum dyes and chemicals

# 4.1 HOSTASOL

The Hostasol grades are fluorescent dyes that are used in polystyrene (PS), styrene-acrylonitrile (SAN), acrylonitrile-butadiene-styrene (ABS), polycarbonate (PC), polyester (PET/PBT), polymethyl methacrylate (PMMA) and unplasticized PVC.

In low concentrations, transparent colored material exhibits strong edge fluorescence; brilliant shades are also obtained in reductions.

The Hostasol dyes have excellent resistance to heat and migration in the recommended polymers and good light fastness in transparent colorations.

#### LITERATURE

Pattern card PI 3004 ED  
 "Solvaperm, Hostasol, Polysynthren, Special Colors"  
 Flyer DP 6247 E  
 "Polymer-soluble dyes for Plastics applications"

NAME	COLOUR INDEX	COLOUR INDEX NO.	POLYMER							
			PS	SAN	ABS	PC	PET PBT	PMMA	PA	PVC-U
HOSTASOL YELLOW 3G	Solvent Yellow 98	56238	●	●	●	●	●	●	○	●
HOSTASOL RED GG	Solvent Orange 63	68550	●	●	●	●	●	●	○	●
HOSTASOL RED 5B	Vat Red 41	73300	●	○	○	●	○	●	—	●

# 4.2 SOLVAPERM

The Solvaperm dyes are high-quality polymer-soluble dyes that were developed for coloring polystyrene (PS) and the plastics derived from it, e.g. styrene-acrylonitrile (SAN) and acrylonitrile-butadiene-styrene (ABS). However, they are also suitable for unplasticized PVC (PVC-U), polymethyl methacrylate (PMMA), polyester (PET/PBT), polycarbonate (PC) and to some extent for polyamide (PA). They are standardized in PS. They give brilliant transparent colors in PS and other glass-clear plastics. Opaque formulations can be produced

by adding white pigments such as titanium dioxide or zinc sulfide. In combination with organic and inorganic pigments they give colorations of higher tinctorial strength and greater brilliance. Solvaperm dyes can be used together with fluorescent Hostasol dyes to produce brilliant shades.

#### LITERATURE

Pattern card PI 3004 ED "Solvaperm, Hostasol, Polysynthren, Special Colors"  
 Flyer DP 6247 E "Polymer-soluble dyes for Plastics applications"

NAME	COLOUR INDEX	COLOUR INDEX NO.	POLYMER							
			PS	SAN	ABS	PC	PET PBT	PMMA	PA	PVC-U
SOLVAPERM YELLOW 6G	Disperse Yellow 201 Solvent Yellow 179	—	●	●	●	●	●	●	—	●
SOLVAPERM YELLOW 3G	Solvent Yellow 93	48160	●	●	—	●	—	●	—	●
SOLVAPERM YELLOW 2G	Solvent Yellow 114	47020	●	●	●	●	●	●	—	●
SOLVAPERM ORANGE 3G	Solvent Orange 60	564100	●	●	●	●	●	●	○	●
SOLVAPERM ORANGE R	Disperse Orange 47 Solvent Orange 107	—	●	●	●	●	●	●	—	●
SOLVAPERM RED 2G	Solvent Red 179	564150	●	●	●	●	●	●	●	●
SOLVAPERM RED G	Solvent Red 135	564120	●	●	●	●	●	●	○	●
SOLVAPERM RED PFS	Solvent Red 111	60505	●	●	●	●	●	●	○	●
SOLVAPERM RED BB	Solvent Red 195	—	●	●	●	●	●	●	—	●
SOLVAPERM RED VIOLET R	Disperse Violet 26 Solvent Violet 59	62025	●	●	●	●	○	●	○	●
SOLVAPERM VIOLET RSB	Solvent Violet 13	60725	●	●	●	●	●	●	—	●
SOLVAPERM BLUE 2B	Solvent Blue 104	61568	●	●	●	●	●	●	○	●
SOLVAPERM BLUE GN	Solvent Blue 67	—	●	●	●	●	●	●	—	●
SOLVAPERM GREEN GSB	Solvent Green 3	61565	●	●	●	●	●	●	—	●
SOLVAPERM GREEN G	Solvent Green 28	625580	●	●	●	●	●	●	—	●

## 4.3 POLYSYNTHREN

The Polysynthren dyes are polymer-soluble dyes developed specially for coloring polyester. They give brilliant, highly transparent colorings of high tinctorial strength and excellent fastness properties. Because of their good solubility in this polymer these dyes are suitable primarily for the spin dyeing of polyester fibers and filaments. The filter and nozzle service lives of the processing machines are not adversely affected. Polysynthren dyes do not have a nucleating effect on polyester.

Some of the grades have therefore proved ideal for the coloration of PET bottles.

Besides polyester, the Polysynthren dyes can be used in a number of other engineering plastics.

### LITERATURE

Pattern card PI 3004 ED "Solvaperm, Hostasol, Polysynthren, Special Colors"  
Flyer DP 6247 E "Polymer-soluble dyes for Plastics applications"

NAME	COLOUR INDEX	COLOUR INDEX NO.	POLYMER						
			PS	SAN	ABS	PC	PET PBT	PMMA	PA
<b>POLYSYNTHREN YELLOW GG</b>	Solvent Yellow 133	48580	—	—	—	●	●	○	—
<b>POLYSYNTHREN YELLOW NG</b>	Pigment Yellow 147	60645	○	○	○	●	●	○	—
<b>POLYSYNTHREN YELLOW RL</b>	Pigment Yellow 192	—	—	—	—	—	○	—	●
<b>POLYSYNTHREN RED GG</b>	Solvent Red 212	—	—	—	—	●	●	—	—
<b>POLYSYNTHREN RED GFP</b>	Solvent Red 135	564120	●	●	●	●	●	●	○
<b>POLYSYNTHREN VIOLET G</b>	Solvent Violet 49	48520	○	○	○	●	●	●	—
<b>POLYSYNTHREN BLUE R</b>	Solvent Blue 122	60744	●	●	●	●	●	●	—
<b>POLYSYNTHREN BLUE RLS</b>	Solvent Blue 45	—	●	●	●	●	●	●	—
<b>POLYSYNTHREN BROWN 3RL</b>	Pigment Orange 70	—	○	○	○	●	●	○	—
<b>POLYSYNTHREN BROWN R</b>	Solvent Brown 53	48525	●	●	●	●	●	●	—
<b>POLYSYNTHREN BLACK H</b>	Solvent Black 27	—	●	○	○	●	○	●	●

## 4.4 DUASYN ACID

The Duasyn Acid dyes are used primarily for coloring writing inks, drawing inks, stamping inks, detergents, fertilizers and crop protection products.

NAME	COLOUR INDEX	COLOUR INDEX NO.	OFFICE SUPPLIES			DETERGENTS (e. g. cleaners)
			Writing inks	Fiber-tip pen inks	Stamping inks	
<b>DUASYN INK BLUE SLK</b>	Acid Blue 93	42780	■	■	■	●
<b>DUASYN ACID BLUE AE 03</b>	Acid Blue 9	42090	●	●	●	■
<b>DUASYN ACID BLUE AE LIQUID</b>	Acid Blue 9	42090	■	■	—	■



## 4.5 OTHERS

These dyes are standardized anionic dyes with good light fastness, high surface tension and brilliancy and low salt content. Liquid types have the advantage over powder grades of being non-dusting and they do not need to be dissolved.

### LITERATURE

Brochure PI 6000 E  
"Products for Non Impact Printing"

NAME	COLOUR INDEX	COLOUR INDEX NO.	OFFICE SUPPLIES							
			Ink Jet Inks	Writing Inks	Fiber-tip pen inks	Stamping inks	Soap/Cosmetics	Detergents/Polishes	Wood stains	Woods preservatives
<b>DUASYN</b>										
DUASYN MAGENTA CR LIQUID	—	—	■	■	■	●	—	—	—	—
<b>CARTASOL</b>										
CARTASOL YELLOW 3GF LIQUID	Direct Yellow 132	—	—	■	■	●	—	●	—	—
<b>SANOLIN</b>										
SANOLIN RHODAMINE B O2°	Acid Red 52	45100	■	■	■	●	●	■	—	—

° = Powder form

## 4.6 DUASYN SF DUASYN SF LIQUID DUASYNJET SF

These practically salt-free, water-soluble dyes are noted for high purity (no insoluble components) and high surface tension.

### LITERATURE

PI 6000 E  
"Products for Non Impact Printing"

The products are ideally suitable for ink jet and special inks and other special uses where high-purity dyes are required.

NAME	COLOUR INDEX	COLOUR INDEX NO.	OFFICE SUPPLIES	
			Ink Jet Inks	Writing Inks
<b>DUASYN</b>				
DUASYN ACID YELLOW XX-SF LIQUID	Acid Yellow 23	19140	■	—
DUASYN YELLOW 3GF-SF LIQUID	Direct Yellow 132	—	■	●
DUASYN BRILLIANT RED F3B-SF LIQUID	Reactive Red 180	181055	■	●
DUASYN MAGENTA 2B-SF LIQUID	—	—	■	—
DUASYN ACID BLUE AE-SF 30 LIQUID	Acid Blue 9	42090	■	●
DUASYN BLACK HEF-SF LIQUID	Direct Black 168	—	■	●
<b>DUASYNJET</b>				
DUASYNJET CYAN FRL-SF LIQUID	Direct Blue 199	74190	■	●

# 4.7 SAVINYL

Savinyl powder dyes are solvent soluble metal complex dyes, with excellent solubilities in polar organic solvents like alcohols, ketones and glycol ethers, as well as good overall fastness properties.

They are suitable for coloration of writing inks, wood stains, leather finish, flexographic and gravure inks and paints based on polar solvents.

NAME	COLOUR INDEX	COLOUR INDEX NO.								Ink Jet inks
			Office supplies	Wood stains	Leather finishes	Industrial paints	Powder coatings	Solvent containing gravure and flexographic printing inks		
SAVINYL YELLOW 2GLS 01	Solvent Yellow 79	—	●	■	■	●	○	●	—	
SAVINYL YELLOW RLS	Solvent Yellow 83:1	—	●	■	■	●	○	●	●	
SAVINYL YELLOW RLSN	Solvent Yellow 83	—	●	■	■	○ <sup>◇</sup>	○	●	—	
SAVINYL YELLOW 2RLS	Solvent Yellow 62	—	●	■	■	●	○	●	—	
SAVINYL ORANGE RLS	Solvent Orange 41	—	●	■	■	●	○	●	—	
SAVINYL ORANGE RLSE	Solvent Orange 62	—	●	■	■	○ <sup>◇</sup>	○	●	—	
SAVINYL FIRE RED 3GLS	Solvent Red 124	—	●	●	○	○ <sup>◇</sup>	○	●	—	
SAVINYL RED 3BLS	Solvent Red 91	—	●	■	■	●	○	●	●	
SAVINYL PINK 6BLS	Solvent Red 127	—	—	●	○	○ <sup>◇</sup>	○	●	●	
SAVINYL DARK VIOLET R	Acid Violet 66	—	●	■	■	●	○	●	—	
SAVINYL BLUE RS	Solvent Blue 45	—	●	■	●	○ <sup>◇</sup>	○	●	—	
SAVINYL BLUE GLS	Solvent Blue 44	—	●	■	■	●	○	●	●	
SAVINYL GREEN 2GLS 01	Mixture	—	●	■	■	○ <sup>◇</sup>	○	●	—	
SAVINYL BROWN GLS	Mixture	—	●	■	■	●	○	●	—	
SAVINYL BLACK RLSN 01	Mixture	—	●	■	■	●	○	●	●	

◇ = Limited fastness to over-painting

# 4.8 FAT

The Fat dyes are in principle soluble in almost all organic solvents. Their solubility in aliphatic and aromatic hydrocarbons, oils and waxes makes them suitable for coloring shoe creams, floor polishing compounds, 2-phase-cleaners, candles, lubricating greases, gasoline etc. In general, the Fat dyes have a wide variety of applications.

Some grades are used in phenolics. They can also be used in unsaturated polyester casting resins, methacrylate and in the manufacture of colored smoke signals.

NAME	COLOUR INDEX	COLOUR INDEX NO.					
			Mineral oil	Consumer goods	Detergents/shoe polish	Candles	Food packaging materials
FAT YELLOW 3G	Solvent Yellow 16	12700	■	—	—	—	—
FAT ORANGE R 01	Solvent Yellow 14	12055	■	—	—	—	—
FAT BLUE B 01	Solvent Blue 35	61554	■	—	—	—	—

# 4.9

## SANOLIN

### SANOLIN LIQUID

### SANOLIN LAVE LIQUID

The Sanolin dyes are especially used for the coloration of home and fabric care products in liquid, paste or powder form (e.g. hard surface cleaners, dish wash tabs). They are easily dissolvable in water. Selected grades are also suitable for the coloration of cosmetics

(e.g. shower gel). The Sanolin powder grades are exposed to low dose ionizing radiation and therefore meet high microbiological purity requirements of customers active in the home & personal care industry.

The liquid grades offer convenient handling and dosing. They also meet high microbiological purity requirements of customers active in the home & personal care industry.

#### LITERATURE

Brochure PI 4002 E  
 "Living Colors – Solutions for Home & Personal Care Products"

NAME	COLOUR INDEX	COLOUR INDEX NO.										
			Soap/ Cosmetics	Granule coloration (speckles)	Laundry powder detergents	Laundry liquid and heavy-duty detergents	Fabric softener	Dish washing detergents/Tabs	Household cleaners	Wood stains	Office supplies	
SANOLIN QUINOLINE YELLOW 70	Acid Y. 3 / Food Y. 13	47005	■	●	—	●	—	○	■	●	●	
SANOLIN TARTRAZINE X 90	Acid Y. 23 / Food Y. 4	19140	■	—	●	●	●	●	■	●	●	
SANOLIN YELLOW BG 30	Direct Yellow 28	19555	—	■	●	—	—	●	■	—	—	
SANOLIN ORANGE RGL 90	Food Yellow 3	15985	●	—	—	●	●	○	■	●	●	
SANOLIN PONCEAU 4RC 82	Acid R. 18 / Food R. 7	16255	●	—	—	●	●	●	■	●	●	
SANOLIN RED NBG	Acid Red 249	—	—	■	—	—	—	■	■	—	●	
SANOLIN RHODAMINE B O2	Acid Red 52	45100	■	■	■	■	■	■	■	—	●	
SANOLIN RED N-6B	Acid Violet 54	—	—	●	—	■	■	●	■	—	—	
SANOLIN VIOLET E2R	Acid Violet 126	—	—	■	●	■	■	■	■	—	—	
SANOLIN VIOLET FBL	Acid Violet 48	—	—	■	●	■	■	■	■	—	—	
SANOLIN BLUE EHRL	Acid Blue 182	—	—	■	■	■	■	■	■	—	—	
SANOLIN BLUE NBL	Acid Blue 80	61585	■	■	■	■	■	■	■	—	—	
SANOLIN PATENT BLUE V 85 O1	Food Blue 5:2	42051:2	●	—	—	●	●	○	■	●	—	
SANOLIN BLUE AE 90	Acid B. 9 / Food B. 2	42090	●	—	—	●	●	○	■	●	—	
SANOLIN TURQUOISE BLUE FBL	Direct Blue 199	74190	—	■	●	●	●	●	■	—	—	
SANOLIN GREEN R-3GL	Reactive Green 12	—	—	●	●	●	●	●	■	—	—	

NAME	COLOUR INDEX	COLOUR INDEX NO.										
			Soap/ Cosmetics	Granule coloration (speckles)	Laundry powder detergents	Laundry liquid and heavy-duty detergents	Fabric softener	Dish washing detergents/Tabs	Household cleaners	Wood stains	Office supplies	
SANOLIN VIOLET AS-SP LIQUID	Direct Violet 66	29120	—	●	●	■	●	●	■	—	—	
SANOLIN VIOLET AS-E2R LIQUID	Acid Violet 126	—	—	●	●	■	■	■	■	—	—	
SANOLIN BLUE EHRL LIQUID	Acid Blue 182	—	—	■	■	■	■	■	■	—	—	
SANOLIN GREEN R-3GL LIQUID	Reactive Green 12	—	—	●	●	■	●	■	■	—	—	

# 4.9

## SANOLIN

### SANOLIN LIQUID

### SANOLIN LAVE LIQUID

Water based liquid colorants for fabric & home care, and stationery applications. The Sanolin Lave liquid range provides both – bright & brilliant shades combined with easy rinse ability from skin and fabrics. All colorants are suitable for the coloration of fabric & home care products, which can be labeled with well-recognized Ecolabels such as the EU Ecolabel or the Nordic Swan.

They are suitable for stationery applications as well. All products fulfill the criteria as laid down e.g. for primary aromatic amines in the EN 71-9. Loadings up to 5% in the end-articles will lead to observation of the stringent heavy metal limits as laid down in the revised EN 71-3 – although a final confirmation can be only obtained by testing the end-article.

- Improved non-staining behavior on textiles and skin
- High tinting strength
- Excellent transparency and brilliancy
- Microbiological purity is specified and tightly controlled
- Colorimetrically standardized in aqueous solution
- Easy handling, dosing and cleaning of equipment

#### LITERATURE

Flyer PI 4011 E  
 “Non-staining colorants – Sanolin Lave liquid”

#### NAME

**SANOLIN LAVE YELLOW A LIQUID**  
**SANOLIN LAVE YELLOW GX LIQUID**  
**SANOLIN LAVE ORANGE R LIQUID**  
**SANOLIN LAVE RED B LIQUID**  
**SANOLIN LAVE PINK B LIQUID**  
**SANOLIN LAVE VIOLET B LIQUID**  
**SANOLIN LAVE BLUE A LIQUID**  
**SANOLIN LAVE BLUE R LIQUID**  
**SANOLIN LAVE BLUE T LIQUID**  
**SANOLIN LAVE GREEN G LIQUID**  
**SANOLIN LAVE BLACK U LIQUID**

# 4.10

## ALUMINUM DYES AND CHEMICALS

Clariant offers a comprehensive range of products for anodizing of aluminum. The products comprise dyes, colorants for screen printing, process chemicals and additives.

Dyes of the Sanodal, Sanodure and Sanodye ranges are especially developed water soluble dyes for the adsorptive coloration of anodized aluminum oxide layers. With these three dye ranges Clariant covers almost every customer's need.

#### SANODAL

The dyes in this range show excellent light- and weather fastness properties and are correspondingly recommended not only for indoor but also for outdoor use. The Sanodal dyes can be used alone or in combination with an electrolytic dyeing process. One of the major application areas is the architectural sector, e.g. colored aluminum façades, window frames, etc.

#### LITERATURE

Pattern card PI 4001 E  
 “Sanodal, Sanodure and Sanodye Dyes – For the dyeing of anodized aluminum”

NAME	SUPPLY FORM	OUTDOOR	INDOOR
<b>SANODAL GOLD 4N</b>	Powder	✓	✓
<b>SANODAL ORANGE 3LW LIQ.</b>	Liquid	✓	✓
<b>SANODAL RED B3LW</b>	Granules	✓	✓
<b>SANODAL TURQUOISE PLW LIQ.</b>	Liquid	✓	✓
<b>SANODAL GREEN BLW</b>	Granules	✓	✓
<b>SANODAL BLACK GL</b>	Paste	✓	✓
<b>SANODAL BLACK 2LW</b>	Granules	✓	✓
<b>SANODAL DEEP BLACK H3LW</b>	Paste	✓	✓
<b>SANODAL DEEP BLACK HBL LIQ.</b>	Paste	✓	✓
<b>SANODAL DEEP BLACK MLW</b>	Powder	✓	✓
	Granules	✓	✓

# 4.10 ALUMINUM DYES AND CHEMICALS

## SANODURE

This range covers virtually all coloristic needs. Sanodure dyes have overall good fade resistance properties, but often limited weather fastness. Sanodure dyes are recommended for all kind of indoor applications.

### LITERATURE

Pattern card PI 4001 E  
"Sanodal, Sanodure and Sanodye Dyes –  
For the dyeing of anodized aluminum"

NAME	SUPPLY FORM	OUTDOOR	INDOOR
SANODURE FAST GOLD L	Granules		✓
SANODURE ORANGE G	Granules		✓
SANODURE ORANGE RL	Granules		✓
SANODURE FIERY RED ML	Granules		✓
SANODURE BORDEAUX RL	Granules		✓
SANODURE VIOLET CLW	Granules		✓
SANODURE GREEN LWN	Granules		✓
SANODURE FAST BRONZE L	Granules		✓
SANODURE BRONZE 2LW	Granules		✓
SANODURE BRONZE G	Granules		✓
SANODURE YELLOW BROWN 2G	Granules		✓
SANODURE BROWN GSL	Granules		✓
SANODURE OLIVE BROWN 2R	Granules		✓
SANODURE GREY HLN LIQ.	Liquid		✓
SANODURE GREY NL LIQ.	Liquid		✓
SANODURE BLACK CRO	Powder		✓

## SANODYE

While most dyes used for aluminum coloring are based on heavy metals, the Sanodye range only consists of dyes with heavy metal free structures. With this range Clariant accommodates the market demand in sensitive application fields with stringent heavy metal limits.

The recommended application fields vary from indoor to outdoor as indicated in our technical data sheets.

### LITERATURE

Pattern card PI 4001 E  
"Sanodal, Sanodure and Sanodye Dyes –  
For the dyeing of anodized aluminum"

NAME	SUPPLY FORM	OUTDOOR	INDOOR	HEAVY METAL FREE STRUCTURE
SANODYE YELLOW 3GL	Granules	✓	✓	✓
SANODYE GOLDEN ORANGE RLW	Granules		✓	✓
SANODYE ORANGE 2B	Powder		✓	✓
SANODYE RED GLW	Granules		✓	✓
SANODYE RED RLW	Granules		✓	✓
SANODYE VIOLET MRB NEW	Powder		✓	✓
SANODYE BLUE 2LW	Granules	✓	✓	✓
SANODYE BLUE G	Granules	✓	✓	✓
SANODYE BROWN R	Granules		✓	✓
SANODYE BLACK OA	Granules	✓	✓	✓

# 4.10 ALUMINUM DYES AND CHEMICALS

## ANODAL

Under the trade name Anodal Clariant offers a complete range of process chemicals for all production steps of anodizing aluminum from degreasing, etching, anodizing, electrolytic coloring, sealing to waste water treatment of used up dye baths. The Anodal chemicals help to increase productivity, efficiency and minimize environmental impact.

Anodal chemicals are tailored to the special needs of our Sanodal, Sanodure and Sanodye ranges for optimized results.

### LITERATURE

Brochure PI 4005 E  
"Aluminum finishing - Special color solutions"

NAME	SUPPLY FORM	PROCESS STEP	DESCRIPTION
<b>ANODAL EC-2</b>	Liquid	Etching	Long term etching additive, complexing and leveling additive for high aluminum containing etching tanks (> 150 g/L), specially developed for matt finishing (E6), additionally suitable for zinc containing alloys, no silicate and chlorate added.
<b>ANODAL EE</b>	Liquid	Anodizing	Surface leveling, burning prevention, reduced refrigerating temperature, hard coating
<b>ANODAL SUAC</b>	Liquid	Anodizing	Additive for the integral coloring process
<b>ANODAL COLOR S-2</b>	Liquid	Electrolytic coloring	Metal free structure stabilizer for tin sulfate coloring, throwing power trigger; leveling agent
<b>ANODAL SH-1</b>	Liquid	Sealing	Anti-smutting, hot water sealing additive (> 96 °C)
<b>ANODAL SH-2</b>	Liquid	Sealing	Anti-smutting, mid-temperature sealing additive (82-90 °C)
<b>ANODAL ASL</b>	Liquid	Sealing	Anti-smutting, hot nickel sealing additive (> 96 °C)
<b>ANODAL MS-1</b>	Liquid	Sealing	Anti-smutting, nickel containing sealing additive; mid-temperature nickel sealing (75-85 °C)
<b>ANODAL WT-1</b>	Liquid	Waste water	Flocking additive for waster water treatment; removal of dissolved dyestuff

## ALUPRINT

Aluprint stands for our range of screen printing inks for printing on anodized aluminum. Printing and dip-dyeing can be combined for attractive designs.

Aluprint screen inks are solvent based and recommended for indoor use.

### LITERATURE

Brochure PI 4005 E  
"Aluminum finishing - Special color solutions"

### NAME

**ALUPRINT YELLOW 3R**

**ALUPRINT RED 3R**

**ALUPRINT TURQUOISE 3R**

**ALUPRINT BLUE 3R**

**ALUPRINT BLACK 3R**

**ALUPRINT DILUENT LIQUID**

**ALUPRINT REDUCER 3R**

# 5 INTERMEDIATES / CHEMICALS

NAME	CAS-NUMBER	APPLICATION
<b>AMIDES</b>		
<b>ACETOACETAMIDE TECHNICAL 50% SOLN</b>	5977-14-0	Agrochemical, Pharma
<b>ARYLIDES</b>		
<b>BIS-ACETOACETIC-P-PHENYLENEDIAMINE</b>	24731-73-5	Pigment
<b>ACETOACET-2,5-DIMETHOXY-4-CHLOROANILIDE</b>	4433-79-8	Pigment
<b>5-ACETOACETYLAMINO BENZIMIDAZOLONE</b>	26576-46-5	Pigment
<b>ACETACET-2-METHOXYANILINE-5-SULFONIC ACID SOLUTION</b>	68030-79-5	Paper dye
<b>ACETOACETANILIDE</b>	102-01-2	Pigment
<b>ACETOACET-O-ANISIDIDE</b>	92-15-9	Pigment
<b>ACETOACET-O-TOLUIDIDE</b>	93-68-5	Pigment
<b>ACETOACET-M-XYLIDIDE</b>	97-36-9	Pigment
<b>ACETOACET-O-CHLORANILIDE</b>	93-70-9	Pigment
<b>ESTER</b>		
<b>ACETOACETIC ACID METHYLESTER</b>	105-45-3	Pharma, Vitamin E
<b>OTHERS</b>		
<b>TETRACHLORO-BENZOQUINONE</b>	118-75-2	Pigment, Dye, Pharma
<b>PHENYL-3-CARBETHOXYPIRAZOL-5-ONE</b>	89-33-8	Pigment
<b>(3-SULPHOPHENYL)-3-METHYLPYRAZOL-5-ONE</b>	119-17-5	Pigment, Dye, Pharma

# 6 OVERVIEW BY COLOUR INDEX DATA (GENERIC NAME)

- 6.1 Pigments
  - Pigment preparations
- 6.2 Dyes

# 6.1 PIGMENT YELLOW

The following overview lists our products already published in the Colour Index, arranged by their generic name. If only the generic name but not the Colour Index No. is given, the product was published without details of its constitution. We would like to point out that identical generic names simply indicate identical chemical composition.

The application properties of colorants are however influenced to a greater or lesser extent not only by their chemical composition but also by numerous other factors such as particle size distribution, crystallinity, surface treatment, impurities etc. For this reason products having identical compositions and identical generic names may differ completely in their application properties.

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Yellow 1	11680	HANSA YELLOW G 02	AGROCER YELLOW 001 AGROCER YELLOW 001 DISP. COLANYL YELLOW G 132 COLANYL YELLOW G 530 COSMENYL YELLOW G 30 COSMENYL YELLOW GLS GRAN.
Pigment Yellow 3	11710	HANSA YELLOW 10G HANSA YELLOW 10G 41 GRAN.	COLANYL YELLOW 10G 131 COSMENYL YELLOW 10G HOSTATINT YELLOW 12G 531
Pigment Yellow 12	21090	PERMANENT YELLOW DHG PERMANENT YELLOW DHG N22 PERMANENT YELLOW DHG N26 PERMANENT YELLOW 2050G	
Pigment Yellow 13	21100	GRAPHTOL YELLOW GR PERMANENT YELLOW G PERMANENT YELLOW GR PERMANENT YELLOW GR 01 PERMANENT YELLOW P-GRL 06 PERMANENT YELLOW P-GRL 07 PERMANENT YELLOW P-GRL 09	HOSTAFINE YELLOW GR 31 HOSTATINT UV YELLOW GR HOSTASIN YELLOW GR 30 VISCOFIL GOLDEN RVD
Pigment Yellow 14	21095	PERMANENT YELLOW P-G PERMANENT YELLOW G50 PERMANENT YELLOW GA	VISCOFIL YELLOW A2GN
Pigment Yellow 16	20040	PERMANENT YELLOW NCG	
Pigment Yellow 17	21105	GRAPHTOL YELLOW GG PERMANENT YELLOW GG 02	HOSTAPRINT YELLOW GG 34 VISCOFIL YELLOW GGVD

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Yellow 42	77492		COLANYL OXIDE OLIVE GS 130 COLANYL OXIDE YELLOW R 132 COLANYL OXIDE YELLOW R 532 COSMENYL OXIDE YELLOW R HOSTAFINE TRANSOXIDE YELLOW R 33 HOSTATINT UV OXIDE YELLOW 4R HOSTATINT UV TRANSOXIDE YELLOW 2R HOSTATINT OXIDE YELLOW R 532 HOSTATINT OXIDE YELLOW A-R 100 HOSTATINT TRANSOXIDE YELLOW A-2R 130
Pigment Yellow 73	11738	HANSA BRILLIANT YELLOW 4GX	HOSTATINT YELLOW 4GX 531
Pigment Yellow 74	11741	HANSA BRILLIANT YELLOW 5GX HANSA BRILLIANT YELLOW 5GX 03 HANSA BRILLIANT YELLOW 2GX 70 HANSA BRILLIANT YELLOW 2GX 70-S HANSA BRILLIANT YELLOW 2GX 72-S HANSA YELLOW 5GX 01 INK JET YELLOW 5GX-W VP 5163 TONER YELLOW 5GXT INK JET YELLOW 5GS	COLANYL YELLOW 5GX 131 COLANYL YELLOW 5GX 530 COLANYL YELLOW 2GXD 130 COLANYL YELLOW 2GXD 500 FLEXONYL YELLOW WF 074 HOSTATINT YELLOW 2GXD 531 VISCOFIL YELLOW AGX
Pigment Yellow 81	21127	NOVOPERM YELLOW H10G 01	
Pigment Yellow 83	21108	HOSTAPERM YELLOW K3G VP 6058 NOVOPERM YELLOW HR NOVOPERM YELLOW HR 02 NOVOPERM YELLOW HR 04 NOVOPERM YELLOW HR 70 NOVOPERM YELLOW HR 72 NOVOPERM YELLOW P-HRE PV FAST YELLOW HR PV FAST YELLOW HR 02 PV FAST YELLOW HR 03	COLANYL YELLOW HR 131 COLANYL YELLOW HRD 131 COLANYL YELLOW HRD 500 FLEXOPRINT YELLOW HR HOSTAFINE YELLOW HR 31 HOSTAPRINT YELLOW HR 34 HOSTASIN YELLOW HR 30 HOSTATINT YELLOW HR 533 HOSTATINT YELLOW A-HRD 100 RENOL YELLOW HR-HW 30



# 6.1 PIGMENT YELLOW

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Yellow 97	11767	NOVOPERM YELLOW FGL	COLANYL YELLOW FGL 133 COLANYL YELLOW FGL 531 HOSTATINT YELLOW FGL 532
Pigment Yellow 120	11783	INK JET YELLOW H2G NOVOPERM YELLOW H2G PV FAST YELLOW H2G	
Pigment Yellow 126	21101	PERMANENT YELLOW DGR	FLEXONYL YELLOW DGR-LA
Pigment Yellow 139	56298	GRAPHTOL YELLOW H2R GRAPHTOL YELLOW H2R-LHC NOVOPERM YELLOW M2R 70 NOVOPERM YELLOW P-M3R	HOSTAPRINT YELLOW H2R 34
Pigment Yellow 147	60645	POLYSYNTHREN YELLOW NG	
Pigment Yellow 150	12764	HOSTAPERM YELLOW HN4G	HOSTAPERM YELLOW A-N4G 100-ST
Pigment Yellow 151	13980	HOSTAPERM YELLOW H4G HOSTAPERM YELLOW H4G 70 INK JET YELLOW H4G VP 3853 PV FAST YELLOW H4G	HOSTAPRINT YELLOW H4G 34
Pigment Yellow 154	11781	HOSTAPERM YELLOW H3G HOSTAPERM YELLOW H3G 02	COLANYL YELLOW H3G 131 COLANYL YELLOW H3G 530 HOSTATINT YELLOW A-H3G 100
Pigment Yellow 155	200310	GRAPHTOL YELLOW 3GP 01 INK JET YELLOW 4G INK JET YELLOW 4GC NOVOPERM YELLOW 4G 01 NOVOPERM YELLOW 5GD 71 TONER YELLOW 3GP TONER YELLOW 3GP-CT VP 5152	HOSTAJET YELLOW 4G-PT VP 2669 VISCOFIL YELLOW 2GLL

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Yellow 174	21098	PERMANENT YELLOW GRS 80 PERMANENT YELLOW BHS	
Pigment Yellow 175	11784	HOSTAPERM YELLOW H6G	
Pigment Yellow 176	21103	PERMANENT YELLOW GRX 83 PERMANENT YELLOW GRX 86	
Pigment Yellow 180	21290	NOVOPERM YELLOW P-HG PV FAST YELLOW HG PV FAST YELLOW HG 01 TONER YELLOW HG	HOSTACOPY HG-Y 101 HOSTAPRINT YELLOW HG 34
Pigment Yellow 181	11777	NOVOPERM YELLOW H3R NOVOPERM YELLOW H3R-LA PV FAST YELLOW H3R PV FAST YELLOW H3R-LHC	
Pigment Yellow 184	771740	HOSTAPERM OXIDE YELLOW BV 01 HOSTAPERM OXIDE YELLOW BV 02	COLANYL OXIDE YELLOW BV 100 COLANYL OXIDE YELLOW BV 531 HOSTATINT OXIDE YELLOW BV 531 HOSTATINT OXIDE YELLOW A-BV 100
Pigment Yellow 185	56290	NOVOPERM YELLOW M9G VP 6059	
Pigment Yellow 191	18795	PV FAST YELLOW HGR PV FAST YELLOW H2GR	HOSTAPRINT YELLOW HGR 34
Pigment Yellow 192	—	POLYSYNTHREN YELLOW RL POLYSYNTHREN YELLOW RL-LHC	
Pigment Yellow 194	11785	NOVOPERM YELLOW F2G	HOSTATINT YELLOW A-F2G 100
Pigment Yellow 213	—	HOSTAPERM YELLOW H5G	
Pigment Yellow 214	—	PV FAST YELLOW H9G	
Pigment Yellow 216	—		HOSTATINT OXIDE ORANGE Z 530

# 6.1 PIGMENT ORANGE

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Orange 4	12459		VISCOFIL ORANGE GRVD
Pigment Orange 5	12075	HANSA RED GG	COLANYL RED GG 131 COLANYL RED GG 530
Pigment Orange 13	21110	GRAPHTOL ORANGE GPS PERMANENT ORANGE G PERMANENT ORANGE G 02	FLEXONYL ORANGE G FLEXONYL ORANGE WF 131 HOSTASIN ORANGE G 30 VISCOFIL ORANGE GG 30 VP 3525
Pigment Orange 34	21115	GRAPHTOL ORANGE RL PERMANENT ORANGE RL 01 PERMANENT ORANGE RL 70	VISCOFIL ORANGE RL 30 VP 3930
Pigment Orange 36	11780	NOVOPERM ORANGE HL NOVOPERM ORANGE HL 70 NOVOPERM ORANGE HL 71 NOVOPERM ORANGE HL 70-NF	HOSTATINT ORANGE HLD 533 HOSTATINT ORANGE A-HLD 100
Pigment Orange 38	12367	GRAPHTOL RED HFG NOVOPERM RED HFG	HOSTAPRINT RED HFG 34
Pigment Orange 43	71105	HOSTAPERM ORANGE GR PV FAST ORANGE GRL	HOSTATINT ORANGE GR 500
Pigment Orange 62	11775	NOVOPERM ORANGE H5G 70	
Pigment Orange 64	12760	PV FAST ORANGE H2GL PV FAST ORANGE H2GL-LHC	
Pigment Orange 68	486150	PV FAST ORANGE 6RL PV FAST ORANGE 6RL-LHC	
Pigment Orange 70	—	POLYSYNTHREN BROWN 3RL	
Pigment Orange 72	211095	PV FAST ORANGE H4GL 01	HOSTAPRINT ORANGE H4GL 34

# 6.1 PIGMENT RED

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Red 2	12310	PERMANENT RED FRR	VISCOFIL RED AGN VISCOFIL RED GVD
Pigment Red 3	12120	HANSA SCARLET RNC HANSA RED B HANSA RED 3B	
Pigment Red 4	12085	HANSA RED R	
Pigment Red 5	12490	PERMANENT CARMINE FB 01	COLANYL CARMINE FB 130 COSMENYL CARMINE FB 01 COSMENYL RED BLS GRAN. VISCOFIL RED BL
Pigment Red 9	12460	PERMANENT RED FRLL 01	COLANYL RED FRLL 131
Pigment Red 12	13385	PERMANENT BORDEAUX FRR	
Pigment Red 14	12380	PERMANENT BORDEAUX FGR	
Pigment Red 32	12320		VISCOFIL RUBINE BFVD
Pigment Red 38	21120	GRAPHTOL RED BB	HOSTASIN RED B 30
Pigment Red 48:2	15865:2	GRAPHTOL RED P2B NOVOTEX RED ARCY PERMANENT RED LB 01	AGROCER 482 AGROCER 482 DISP.
Pigment Red 48:3	15865:3	GRAPHTOL FIRE RED 3RLP	
Pigment Red 52:1	15860:1	PERMANENT RUBINE PBC 06	
Pigment Red 53:1	15585:1	GRAPHTOL RED LC GRAPHTOL RED LG PERMANENT LAKE RED LCLL PERMANENT LAKE RED LCY PERMANENT LAKE RED LCYT	HOSTASIN RED LC 30

# 6.1 PIGMENT RED

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Red 57:1	15850:1	<b>COSMETIC RED 3B</b> GRAPHTOL RUBINE L4B PERMANENT RUBINE L4B 01 PERMANENT RUBINE L5B 01 PERMANENT RUBINE P-L5B 01 PERMANENT RUBINE L5B 02 WD	
Pigment Red 101	77491		COLANYL OXIDE RED B 131 COLANYL OXIDE RED B 531 COLANYL OXIDE RED G 130 COLANYL OXIDE RED G 531 HOSTAFINE TRANSOXIDE RED B 33 HOSTATINT OXIDE RED B 532 HOSTATINT OXIDE RED A-B 100 HOSTATINT UV OXIDE RED B HOSTATINT UV TRANSOXIDE RED 2B HOSTATINT TRANSOXIDE RED A-G 130
Pigment Red 112	12370	PERMANENT RED FGR PERMANENT RED FGR 02 PERMANENT RED FGR 03 PERMANENT RED FGR 70	AGROCER RED 112 AGROCER RED 112 DISP. COLANYL RED FGR 131 COLANYL RED FGR 530 COLANYL RED FGRD 500 COLANYL RED FGRG 130 FLEXONYL RED SP-FGR HOSTAFINE RED FGR 30 HOSTATINT RED FGR 531

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Red 122	73915	HOSTAPERM PINK E HOSTAPERM PINK E 24 HOSTAPERM PINK E TRANSP. 01 HOSTAPERM PINK E WD 01 HOSTAPERM PINK EB TRANSP. INK JET MAGENTA E 02 PV FAST PINK E PV FAST PINK E-LHC PV FAST PINK E 01 PV FAST PINK E2B TONER MAGENTA E TONER MAGENTA E 02 TONER MAGENTA E-ECO VP 6006 TONER MAGENTA E 02-ECO VP 6005 INK JET MAGENTA E 02-ECO VP 6007	COLANYL PINK E 130 COLANYL PINK E 532 COLANYL PINK E-WD 530 HOSTACOPY E 02-M 101 HOSTAFINE MAGENTA E 30 HOSTAJET MAGENTA E-PT HOSTAPRINT PINK E 34 HOSTATINT PINK E 532 HOSTATINT PINK A-E 130 HOSTATINT PINK A-EB 100-ST HOSTATINT UV PINK E
Pigment Red 146	12485	NOVOTEX CARMINE FBB PERMANENT CARMINE FBB 02	FLEXONYL CARMINE SP-FBB HOSTACOPY FBB 02-M 101 RENOL CARMINE FBB-HW 30
Pigment Red 147	12433	PERMANENT PINK F3B 01	
Pigment Red 149	71137	PV FAST RED B PV FAST RED B-LHC	HOSTAPRINT RED B 34
Pigment Red 168	59300	HOSTAPERM SCARLET GO HOSTAPERM SCARLET GO TRANSP.	COLANYL SCARLET GO 131 COLANYL SCARLET GO 532 HOSTATINT SCARLET GO 531
Pigment Red 170	12475	GRAPHTOL RED F3RK 70 GRAPHTOL RED F5RK NOVOPERM RED F2RK 70 NOVOPERM RED F3RK 70 NOVOPERM RED F5RK NOVOTEX RED F4RK	HOSTAFINE RED F5RK 30 HOSTATINT UV RED F5RK RENOL RED F5RK-HW 30 VISCOFIL RED F5RK 30 VP 3501
Pigment Red 176	12515	GRAPHTOL CARMINE HF3C GRAPHTOL CARMINE HF3C-LHC NOVOPERM CARMINE HF3C	

# 6.1 PIGMENT RED

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Red 179	71130	HOSTAPERM RED P2GL-WD	HOSTAFINE RED P2GL 30 HOSTATINT RED A-P2Y 100-ST
Pigment Red 181/ Vat Red 1	73360	COSMETIC PINK RC 01	
Pigment Red 184	12487	PERMANENT RUBINE F6B	HOSTAFINE RUBINE F6B 31
Pigment Red 185	12516	GRAPHTOL CARMINE HF4C NOVOPERM CARMINE HF4C	HOSTAPRINT CARMINE HF4C 34
Pigment Red 187	12486	NOVOPERM RED HF4B PV FAST RED HF4B	
Pigment Red 188	12467	NOVOPERM RED HF3S NOVOPERM RED HF3S 70	COLANYL RED HF3S 500 HOSTAFINE RED HF3S
Pigment Red 208	12514	GRAPHTOL RED HF2B NOVOPERM RED HF2B 01	HOSTAPRINT RED HF2B 34 HOSTASIN RED HF2B 30 RENOL RED HF2B-HW 30
Pigment Red 210	12477	PERMANENT RED P-FK	
Pigment Red 214	200660	NOVOPERM RED BN PV FAST RED BNP	
Pigment Red 242	20067	NOVOPERM SCARLET 4RF 01 PV FAST SCARLET 4RF	
Pigment Red 247	15915	PV FAST RED HB PV FAST RED HB-LHC	
Pigment Red 254	56110	HOSTAPERM RED D2G 70 HOSTAPERM RED D3G 70 HOSTAPERM RED D3G 70 01 PV FAST RED D3G	COLANYL RED D3GD 531 HOSTAJET RED D3G-PT VP 5121 HOSTAPRINT RED D3G 34 HOSTATINT RED D3GD 530 HOSTATINT RED A-D3GD 130
Pigment Red 285	—	PV FAST RED HGR 01	
Pigment Red 293	—	TONER MAGENTA F9B-W LV 6075	

# 6.1 PIGMENT VIOLET

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Violet 19	73900	HOSTAPERM RED E4G HOSTAPERM RED E2B 70 HOSTAPERM RED E3B HOSTAPERM RED E5B 02 HOSTAPERM RED VIOLET ER 02 INK JET MAGENTA E5B 02 PV FAST RED E3B PV FAST RED E5B PV FAST RED E4G	COLANYL RED E3B 130 COLANYL RED E3B 531 HOSTAJET MAGENTA E5B-PT VP 3565 HOSTAPRINT RED E5B 34 HOSTATINT RED VIOLET A-ER 130
Pigment Violet 23	51319	HOSTAPERM VIOLET BL 01 HOSTAPERM VIOLET RL SPEC. 01 HOSTAPERM VIOLET RL-NF HOSTAPERM VIOLET P-RL PV FAST VIOLET BLP PV FAST VIOLET RL	AGROCER VIOLET 023 AGROCER VIOLET 023 DISP. COLANYL VIOLET RL 132 COLANYL VIOLET RL 531 COSMENYL VIOLET RL HOSTAFINE VIOLET RL 30 HOSTAPRINT VIOLET RL 34 HOSTATINT UV VIOLET RL HOSTATINT VIOLET RL 533 HOSTATINT VIOLET A-RL 100 VISCOFIL VIOLET BLNL
Pigment Violet 32	12517	GRAPHTOL BORDEAUX HF3R NOVOPERM BORDEAUX HF3R	VISCOFIL BORDEAUX BB 30

# 6.1 PIGMENT BLUE

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Blue 15	74160	<b>GRAPHTOL BLUE AN 01</b>	<b>VISCOFIL BLUE ARN</b> <b>VISCOFIL BLUE BL 500</b> <b>VISCOFIL BLUE FRVD</b>
Pigment Blue 15:1	74160	<b>HOSTAPERM BLUE A4R</b> <b>HOSTAPERM BLUE BT-728-D</b> <b>HOSTAPERM BLUE BT-729-D</b> <b>PV FAST BLUE A2R</b> <b>PV FAST BLUE A4R</b> <b>PV FAST BLUE A4R-LHC</b>	<b>COLANYL BLUE A2R 131</b> <b>COLANYL BLUE A2R 531</b> <b>COSMENYL BLUE A4R</b> <b>HOSTAPRINT BLUE A2R 34</b> <b>HOSTASIN BLUE A2R 30</b> <b>COSMENYL BLUE BLS 30 GRAN. VP 6125</b> <b>HOSTATINT BLUE A-BTR 100-ST</b>
Pigment Blue 15:2	74160	<b>HOSTAPERM BLUE BT-627-D</b>	
Pigment Blue 15:3	74160	<b>HOSTAPERM BLUE B2G 03</b> <b>PV FAST BLUE BG</b> <b>PV FAST BLUE BG-NIP</b> <b>PV FAST BLUE BG-LHC</b>	<b>AGROCER BLUE 153</b> <b>AGROCER BLUE 153 DISP.</b> <b>COLANYL BLUE B2G 131</b> <b>COLANYL BLUE B2G 530</b> <b>FLEXONYL BLUE WF 153</b> <b>HOSTACOPY BG-C 101</b> <b>HOSTAFINE BLUE B2G 30</b> <b>HOSTAJET CYAN BG-PT</b> <b>HOSTAPRINT BLUE B2G 34</b> <b>HOSTATINT BLUE B2G 531</b> <b>HOSTATINT BLUE A-BG 100</b> <b>HOSTATINT UV BLUE BG</b> <b>RENOL BLUE B2G-HW 30</b> <b>VISCOFIL BLUE B2G 30 VP 3494</b>
Pigment Blue 15:4	74160	<b>HOSTAPERM BLUE BT-617-D</b>	<b>HOSTATINT BLUE A-BTG 100-ST</b>
Pigment Blue 28	77346		<b>COLANYL OXIDE BLUE COR 100</b> <b>COLANYL OXIDE BLUE COR 531</b> <b>HOSTATINT OXIDE BLUE COR 531</b>

# 6.1 PIGMENT GREEN

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Green 7	74260	<b>HOSTAPERM GREEN GNX</b> <b>HOSTAPERM GREEN GNX 01</b> <b>HOSTAPERM GREEN GNX-C</b> <b>PV FAST GREEN GNX</b>	<b>AGROCER GREEN 007</b> <b>AGROCER GREEN 007 DISP.</b> <b>COLANYL GREEN GG 131</b> <b>COLANYL GREEN GG 531</b> <b>COSMENYL GREEN GG</b> <b>COSMENYL GREEN 2GLS GRAN.</b> <b>HOSTAFINE GREEN GN 30</b> <b>HOSTAPRINT GREEN GG 34</b> <b>HOSTASIN GREEN GG 30</b> <b>HOSTATINT GREEN GG 530</b> <b>HOSTATINT GREEN A-GNX 130</b> <b>HOSTATINT UV GREEN GNX</b> <b>RENOL GREEN GG-HW 30</b> <b>VISCOFIL GREEN A-GNS</b>
Pigment Green 17	77288		<b>COLANYL OXIDE GREEN G 131</b> <b>COLANYL OXIDE GREEN G 531</b> <b>HOSTATINT OXIDE GREEN G 532</b>
Pigment Green 36	74265		<b>HOSTAJET GREEN 8G-PT VP 5154</b>
Pigment Green 50	77377		<b>HOSTATINT OXIDE GREEN CO 532</b>

# 6.1 PIGMENT BROWN PIGMENT BLACK

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment Brown 24	77310		COLANYL OXIDE YELLOW CR 130 COLANYL OXIDE YELLOW CR 530 HOSTATINT OXIDE YELLOW A-CR 100
Pigment Brown 25	12510	HOSTAPERM BROWN HFR 01 PV FAST BROWN HFR	HOSTAPRINT BROWN HFR 34 RENOL BROWN HFR-HW 30 VISCOFIL BROWN HFR 30
Pigment Brown 41	—	PV FAST BROWN RL	HOSTAPRINT BROWN RL 34
Pigment Black 7	77266		COLANYL BLACK N 131 COLANYL BLACK N 530 COLANYL BLACK PR 130 COSMENYL BLACK N VP 6104 FLEXONYL BLACK A-CB FLEXONYL BLACK PR 100 FLEXONYL BLACK WF 007 FLEXOPRINT BLACK CB 01 HOSTAFINE BLACK T 31 HOSTAFINE BLACK TS 31 HOSTAJET BLACK O-PT HOSTAPRINT BLACK L 34 HOSTATINT BLACK GR 531 HOSTATINT BLACK A-N 100 HOSTATINT BLACK A-NB 100-ST HOSTATINT BLACK A-NY 100-ST HOSTATINT UV BLACK N 30 RENOL BLACK R-HW 30 VISCOFIL BLACK AV VISCOFIL BLACK 2BLN VISCOFIL BLACK VBC
Pigment Black 11	77499		COLANYL OXIDE BLACK B 130 COLANYL OXIDE BLACK B 533
Pigment Black 26	77537		HOSTATINT OXIDE BLACK B 532

# 6.1 PIGMENT WHITE

COLOUR INDEX GENERIC NAME	NO.	STANDARD RANGES AND OTHER GRADES	PREPARATIONS
<b>PIGMENTS</b>			
Pigment White 6	77891		COLANYL WHITE R 130 COLANYL WHITE R 500 FLEXONYL WHITE R 130 FLEXONYL WHITE RL 130 FLEXONYL WHITE RS HOSTATINT WHITE R 530 HOSTATINT WHITE A-R 100 HOSTATINT UV WHITE R RENOL WHITE T-HW 30 VISCOFIL WHITE A-RCL 30 AGROCER WHITE 006 DISP.

# 6.2 DYES

COLOUR INDEX GENERIC NAME	NO.	DYE RANGES
<b>DYES</b>		
Acid Yellow 3 (Food Yellow 13)	47005	<b>SANOLIN QUINOLINE YELLOW 70</b>
Acid Yellow 23 (Food Yellow 4)	19140	<b>DUASYN ACID YELLOW XX-SF LIQUID</b> <b>SANOLIN TARTRAZINE X 90</b>
Acid Red 18 (Food Red 7)	16255	<b>SANOLIN PONCEAU 4RC 82</b>
Acid Red 52	45100	<b>SANOLIN RHODAMINE B 02</b>
Acid Red 249	18134	<b>SANOLIN RED NBG</b>
Acid Violet 48	—	<b>SANOLIN VIOLET FBL</b>
Acid Violet 54	—	<b>SANOLIN RED N-6B</b>
Acid Violet 66	—	<b>SAVINYL DARK VIOLET R</b>
Acid Violet 126	—	<b>SANOLIN VIOLET E2R</b> <b>SANOLIN VIOLET AS-E2R LIQUID</b>
Acid Blue 9 (Food Blue 2)	42090	<b>DUASYN ACID BLUE AE LIQUID</b> <b>DUASYN ACID BLUE AE-SF 30 LIQUID</b> <b>DUASYN ACID BLUE AE 03</b> <b>SANOLIN BLUE AE 90</b>
Acid Blue 80	61585	<b>SANOLIN BLUE NBL</b>
Acid Blue 93	42780	<b>DUASYN INK BLUE SLK</b>
Acid Blue 182	—	<b>SANOLIN BLUE EHRL</b> <b>SANOLIN BLUE EHRL LIQUID</b>

COLOUR INDEX GENERIC NAME	NO.	DYE RANGES
<b>DYES</b>		
Direct Yellow 28	19555	<b>SANOLIN YELLOW BG 30</b>
Direct Yellow 132	—	<b>CARTASOL YELLOW 3GF LIQUID</b> <b>DUASYN YELLOW 3GF-SF LIQUID</b>
Direct Violet 66	29120	<b>SANOLIN VIOLET AS-SP LIQUID</b>
Direct Blue 199	74190	<b>DUASYNJET CYAN FRL-SF LIQUID</b> <b>SANOLIN TURQUOISE BLUE FBL</b>
Direct Black 168	—	<b>DUASYN BLACK HEF-SF LIQUID</b>
Disperse Yellow 201 (Solvent Yellow 179)	—	<b>SOLVAPERM YELLOW 6G</b>
Disperse Orange 47 (Solvent Orange 107)	—	<b>SOLVAPERM ORANGE R</b>
Disperse Violet 26 (Solvent Violet 59)	62025	<b>SOLVAPERM RED VIOLET R</b>
Food Yellow 3	15985	<b>SANOLIN ORANGE RGL 90</b>
Food Blue 5:2	42051:2	<b>SANOLIN PATENT BLUE V 85 01</b>
Reactive Red 180	181055	<b>DUASYN BRILLIANT RED F3B-SF LIQUID</b>
Reactive Green 12	—	<b>SANOLIN GREEN R-3GL</b> <b>SANOLIN GREEN R-3GL LIQUID</b>

# 6.2 DYES

COLOUR INDEX GENERIC NAME	NO.	DYE RANGES
<b>DYES</b>		
Solvent Yellow 14	12055	FAT ORANGE R 01
Solvent Yellow 16	12700	FAT YELLOW 3G
Solvent Yellow 62	—	SAVINYL YELLOW 2RLS
Solvent Yellow 79	—	SAVINYL YELLOW 2GLS 01
Solvent Yellow 83	—	SAVINYL YELLOW RLSN
Solvent Yellow 83:1	—	SAVINYL YELLOW RLS
Solvent Yellow 93	48160	SOLVAPERM YELLOW 3G
Solvent Yellow 98	56238	HOSTASOL YELLOW 3G
Solvent Yellow 114	47020	SOLVAPERM YELLOW 2G
Solvent Yellow 133	48580	POLYSYNTHREN YELLOW GG
Solvent Yellow 179	—	SOLVAPERM YELLOW 6G
(Disperse Yellow 201)		
Solvent Orange 41	—	SAVINYL ORANGE RLS
Solvent Orange 60	564100	SOLVAPERM ORANGE 3G
Solvent Orange 62	—	SAVINYL ORANGE RLSE
Solvent Orange 63	68550	HOSTASOL RED GG
Solvent Orange 107	—	SOLVAPERM ORANGE R
(Disperse Orange 47)		
Solvent Red 91	—	SAVINYL RED 3BLS
Solvent Red 111	60505	SOLVAPERM RED PFS
Solvent Red 124	—	SAVINYL FIRE RED 3GLS
Solvent Red 127	—	SAVINYL PINK 6BLS
Solvent Red 135	564120	SOLVAPERM RED G POLYSYNTHREN RED GFP
Solvent Red 179	564150	SOLVAPERM RED 2G SOLVAPERM RED 2G-LHC
Solvent Red 195	—	SOLVAPERM RED BB
Solvent Red 212	—	POLYSYNTHREN RED GG

COLOUR INDEX GENERIC NAME	NO.	DYE RANGES
<b>DYES</b>		
Solvent Violet 13	60725	SOLVAPERM VIOLET RSB
Solvent Violet 49	48520	POLYSYNTHREN VIOLET G
Solvent Violet 59	62025	SOLVAPERM RED VIOLET R
(Disperse Violet 26)		
Solvent Blue 35	61554	FAT BLUE B 01
Solvent Blue 44	—	SAVINYL BLUE GLS
Solvent Blue 45	—	POLYSYNTHREN BLUE RLS SAVINYL BLUE RS
Solvent Blue 67	—	SOLVAPERM BLUE GN
Solvent Blue 104	61568	SOLVAPERM BLUE 2B
Solvent Blue 122	60744	POLYSYNTHREN BLUE R
Solvent Green 3	61565	SOLVAPERM GREEN GSB
Solvent Green 28	625580	SOLVAPERM GREEN G
Solvent Brown 53	48525	POLYSYNTHREN BROWN R
Solvent Black 27	—	POLYSYNTHREN BLACK H
Vat Red 1/ Pigment Red 181	73360	COSMETIC PINK RC 01
Vat Red 41	73300	HOSTASOL RED 5B



# 7 OPTICAL BRIGHTENERS

7.1 Telalux

# 7.1 TELALUX

The Telalux grades are fluorescent whitening agents that were developed for brightening (whitening) of white plastics. They are suitable for all plastics and fibers. Plastics are polystyrene (PS), styrene-acrylonitrile (SAN), acrylonitrile-butadiene-styrene (ABS), as well as polyester (PET/PBT), polyethylene (LDPE/LLDPE/HDPE), polypropylene (PP), polyamide (PA), polymethylmethacrylate (PMMA), polycarbonate (PC), plasticized PVC and unplasticized PVC and in some extend polyethylene vinyl acetate (EVA).

The optical brighteners give brilliant transparent effects in glass-clear plastics. In pigmented white plastics they give brilliant, high white effects with different shades depending on the nature of their structure.

The Telalux optical brighteners have excellent resistance to heat and migration in recommended polymers and concentrations as well as good light fastness and weather resistance.

#### LITERATURE

Flyer PI 3015 E  
"Optical Brighteners – for plastics applications"

PRODUCT	PET/PBT	PE	PP	PS	SAN	ABS	PC	PMMA	PA	PVC-U	PVC-P	EVA
KCB p	●	●	●	●	●	●	●	●	●	■	■	■
KS p	■	■	■	■	■	■	■	■	■	●	○	–
KSB p	■	■	■	■	■	■	■	■	■	●	○	–
KSB3 p	■	–	–	■	■	■	■	■	■	–	–	–
KSN p	■	■	■	■	■	■	■	■	■	●	○	–
KSC p	–	–	–	–	–	–	–	–	–	■	■	–
KS1B p	■	–	–	■	●	●	–	–	■	–	–	–
KS1 p	■	–	–	■	●	●	–	–	■	–	–	–
NSM p*	–	–	–	–	–	–	–	–	–	–	–	–
OB	■	■	■	■	●	■	■	●	■	■	■	●
OB1	■	–	–	■	●	●	–	–	■	–	–	–
OB1A	■	–	–	■	●	●	–	–	■	–	–	–

\* = Only for PAN dry spinning ■



COLORANTS INTERNATIONAL LTD

Business Unit Pigments

Rothausstrasse 61

4132 Muttenz

Switzerland

MARKETING AND SALES COATINGS

Phone + 49 (0) 6196 757 79 81

CLARIANT.COM/COATINGS

CLARIANT.COM

This information corresponds to the present state of our knowledge and is intended as a general description of our products and their possible applications. Clariant makes no warranties, express or implied, as to the information's accuracy, adequacy, sufficiency or freedom from defect and assumes no liability in connection with any use of this information. Any user of this product is responsible for determining the suitability of Clariant's products for its particular application. \* Nothing included in this information waives any of Clariant's General Terms and Conditions of Sale, which control unless it agrees otherwise in writing. Any existing intellectual/industrial property rights must be observed. Due to possible changes in our products and applicable national and international regulations and laws, the status of our products could change. Material Safety Data Sheets providing safety precautions, that should be observed when handling or storing Clariant products, are available upon request and are provided in compliance with applicable law. You should obtain and review the applicable Material Safety Data Sheet information before handling any of these products. For additional information, please contact Clariant.

\* For sales to customers located within the United States and Canada the following applies in addition:  
NO EXPRESS OR IMPLIED WARRANTY IS MADE OF THE MERCHANTABILITY, SUITABILITY,  
FITNESS FOR A PARTICULAR PURPOSE OR OTHERWISE OF ANY PRODUCT OR SERVICE.

™ Trademark

®<sup>1</sup> Registered trademark

® Trademark of Clariant registered in many countries

© 2020 Colorants International Ltd



PI 1000 E | 03.2020