

COLOR CODE

DATE 6-27-44

NAME

"Duol" Carmine

K- 2039 (Exp)

OBJECT

To modify K-1994 by treatment with Resinous Oil X-1

BASED ON

Lab, 1098-20

BATCH SIZE-MOLS.

1.0

BATCH No. OF "K" SAMPLE

1098-20

LBs. OR GMS.	MATERIAL	100% WT.	GAL.	C. G.	MANIPULATION	NI
	<u>Diazo</u>					
42.5	Hydrated lime "as is"		180	1500	well slurried with water Add	542
187	"Lithosol" Acid RBA "as is"				Stir to solution at 75°-85°F.	175
	GU 4296 98% by nitrite				Solution should be slightly alkaline to litmus.	
					Cool to 35±3°F. with water and	
±1250	Ice		290	2400	Add	57
71	Sodium nitrite "as is"	71	50	415	dissolved, Dump in	5
	99.7%					
84	Muriatic Acid, 100%	84			Stir 5-15 minutes, (Testes: +KI-starch; +GR.) Volume of diazo at 35±3°F,	28
			390	3250	Couple	

	<u>BON-Resin</u>					
95.0	Hydrated lime "as is"		550	4700	well slurried with water, Add	542
200	"Lithosol" Acid BON				Stir 25-35 min. to a uniform white slurry, Temp. 70-80°F, Make volume to	82
			2400	20,000	Record pH (Normal pH 10.9±0.1) Add resin solution prepared as follows:	
31	(Caustic soda, 100% (K Wood Resin	31	420	3500	dissolved at a boil and boiled 30 min. to a clear solution, Stir BON-Resin slurry 10-15 min. Adjust temp. to 95°F, Couple diazo under surface into BON in 30 min. at 95±2°F, (Testes: +diazo; +BON) Stir at 86°F, to neg. diazo (±15 min.) Record pH, (Normal pH 10.2±0.2) Do not adjust Add an emulsion of resinous oil prepared as follows:	7 239
0.256	(Caustic soda, 100% 2.1 (K Wood Resin	0.256	3.1	25.7	Boiled 30 min. to a clear solution, Stir gradually into Dilute to	7 239
33.3	(Resinous Oil X-1		12	100	Stir dye-resinous oil slurry 5-10 min. Heat to 160°F. in 30-40 min. Held at 160±2°F. for 30 min. Quench to 115°F.	D-5591

PACKAGE

LBs. PER

COST GROUP

TYPE COLOR

SIGNATURE

GOAL YIELD

N37955

FORMULA SHEET

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COLOR CODE

DATE 6-27-44

NAME

"Dual" Carmine

K- 2039 (Exp)

OBJECT

BASED ON

BATCH SIZE-MOLS.

BATCH No. OF "K" SAMPLE

LBS. OR
GMS.

MATERIAL

100% WT.

GAL.

C. C.

MANIPULATION

N#

Filter, wash Cl-free. Dry at 140°F.
Grind as for RT-443-D.

Calculated Composition

Calcium salt of dye	66.5%
Calcium resinate	26.6
Resinous oil	4.1
Moisture	2.8
	<u>100.0%</u>

PACKAGE 100 LBS. PER 40 gal. drum COST GROUP 41 TYPE COLOR RT-443-D
GOAL YIELD 614. # "as is" 597# Anhydrous

SIGNATURE M.G. Taber

Notes on K-2039

K-2039 differs slightly from K-1994 in addition to the resinous oil treatment.

The pH of coupling was increased slightly to give a higher yield.

The coupling temperature was lowered 3°F, reducing steam costs without making necessary a longer coupling time.

The proportion of K-2039 can be controlled by the same variables as K-1994.

Testing method 1:2 pigment/v.d. 3 = 50 Malle
1:100 XT ZnO

M. G. TABER 6-27-44

J. E. COOPER 6-27-44

N37955.01

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