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SUGGESTIONS ON LABELLING RULES

It is agreed by all that paint should be prepared with materials that have been found to give the best results. There should be no restrictions that would discourage the adoption of new materials of merit. For this reason most manufacturers prefer to describe their products by trade names accompanied by general terms, such as White Base Paint, Paste Paint, Prepared Paint, etc., rather than by formulas. Such a practice enables a manufacturer to use appropriate materials at all times. On the other hand, if a description of the ingredients of a paint is placed on the label, it should be straightforward and clear. For instance, "Lead and Zinc Labelling Rules" of our industry were adopted in 1913, have been very generally used, and have established what might be called legal custom in the industry. Such custom has had considerable value in connection with the prosecution of cases of alleged misbranding. It is of interest to point out that the so-called "fifty-percent rule" (labelling of products containing more or less than 50% of added extender pigment*) was accepted by the Federal Trade Commission and the Circuit Court of Appeals in the matter of certain paint cases which have come before them in connection with the labelling of lead and zinc products. With the growing use of the newer pigments, it is probable that these rules should be amended to bring them up to date. For this purpose there have been prepared what might be called "Suggested Labelling Rules for Paint Products," and it is hoped that they will prove to be of service.

SUGGESTED LABELLING RULES

I. No product shall be labelled or advertised with the fol-

* Extender pigments referred to herein are those which impart little or no hiding power when ground in linseed oil, such as silica, barium sulfate, calcium carbonate, china clay, magnesium silicate, and others.

lowing terms unless the pigment content of such product consists wholly thereof, as defined in Section II.

White Lead	Red Lead
Lead White	Chrome Yellow
Zinc	Chrome Orange
Zinc Oxide	Chrome Green
White Zinc	Prussian Blue
Zinc White	Chinese Blue
Leaded Zinc	Ultramarine Blue
Zinc Lead	Lampblack
Titanium Dioxide	Carbon Black
Titanium	Bone Black
Titanium White	Para Red
Titanium-Barium Pigment	Toluidine Red
Titanium-Calcium Pigment	Organic Toner
Titanium-Magnesium Pigment	Indian Red
Zinc Sulfide	Venetian Red
Zinc Sulfide-Barium Pigment	Ochre
Zinc Sulfide-Calcium Pigment	Sienna
Zinc Sulfide-Magnesium Pigment	Umber
Lithopone	
Lithopone-Titanium Pigment	
Titanated Lithopone	

When any one of the above pigments is used in combination with one or more of the others listed above, the above terms shall not be used in labelling or advertising if the combination contains over 50% of added extender or other pigment, except that if less than 50% of added extender or other pigment is present in such mixtures, the above terms may be used, provided the description is followed by the word "compound" in letters as conspicuous as the main title.

II. When any of the above terms are used upon a label or in advertising, the pigment content of the product referred to shall be of the following designations:

WHITE PIGMENTS

White Lead shall consist entirely of white lead (either basic carbonate or basic sulfate, or a mixture thereof.)

Zinc Oxide (white zinc, zinc white) shall consist of not less than 98% of zinc oxide. The terms, "white zinc" and "zinc white," should preferably not be used.

Leaded Zinc shall consist entirely of a mixture of zinc oxide and from 5 to 50 percent of basic sulfate of lead. The term "zinc lead" should preferably not be used.

Titanium Dioxide shall consist of not less than 97% titanium dioxide. The terms "titanium," "titanium white" and "white titanium" should preferably not be used.

Titanium-Barium Pigment shall consist of not less than 24% titanium dioxide admixed with barium sulfate.

Titanium-Calcium Pigment shall consist of not less than 28% titanium dioxide admixed with calcium sulfate.

Titanium-Magnesium Pigment shall consist of not less than 28% of titanium dioxide admixed with magnesium silicate.

Zinc Sulfide shall consist of not less than 97% of zinc sulfide.

Zinc Sulfide-Barium Pigment shall consist of not less than 45% of zinc sulfide admixed with barium sulfate.

Zinc Sulfide-Calcium Pigment shall consist of not less than 45% of zinc sulfide admixed with calcium sulfate.

Zinc Sulfide-Magnesium Pigment shall consist of not less than 45% of zinc sulfide admixed with magnesium silicate.

Lithopone shall consist of not less than 26% of zinc sulfide admixed with barium sulfate.

Lithopone-Titanium Pigment (Titanated Lithopone) shall consist of not less than 15% titanium dioxide admixed with lithopone.

EXAMPLES

There are given below certain examples and descriptions which may be used on labels, provided the manufacturer desires to describe the contents other than by trade name.

COMPOSITION		DESCRIPTIONS TO USE
Basic carbonate of lead	100%	a. White Lead
Basic carbonate of lead	51%	a. White Lead Compound
Barium sulfate	49%	b. White Lead Base
Basic carbonate of lead	90%	a. White Lead Compound
Barium sulfate	10%	b. White Lead Base
Basic carbonate of lead	90%	a. Lead and Zinc
Zinc oxide	10%	
Basic carbonate of lead	45%	a. Lead and Zinc
Zinc oxide	55%	
Basic carbonate of lead	60%	a. Lead, Zinc and Extender
Zinc oxide	30%	b. White Lead Compound
Magnesium silicate	10%	
Basic carbonate of lead	51%	a. Lead, Zinc, Titanium Oxide and Extender
Zinc oxide	20%	
Titanium oxide	20%	b. White Lead Compound
Magnesium silicate	9%	
Basic carbonate of lead	49%	a. White Base
Zinc oxide	41%	b. White Compound
Magnesium silicate	10%	c. Lead, Zinc and Extender

COMPOSITION		DESCRIPTION TO USE
Basic carbonate of lead.....	24%	a. White Base
Zinc oxide	24%	b. White Compound
Barium sulfate	52%	c. Lead, Zinc and Extender
Basic carbonate of lead.....	40%	a. White Base
Zinc oxide	40%	b. White Compound
Titanium oxide	20%	c. Lead and Zinc Compound
		d. Lead, Zinc and Titanium Oxide
Basic carbonate of lead.....	55%	a. White Lead Compound
Zinc oxide	30%	b. Lead, Zinc and Titanium Oxide
Titanium oxide	15%	c. Lead and Zinc Compound
Leaded zinc	80%	a. Leaded Zinc and Titanium Oxide
Titanium oxide	20%	b. Leaded Zinc Compound
Leaded zinc	80%	a. Leaded Zinc Compound
Magnesium silicate	20%	
Titanium oxide	40%	a. Titanium Oxide, Leaded Zinc
Leaded zinc	40%	and White Lead
Basic carbonate of lead.....	20%	b. White Compound
		c. White Base
Titanium-barium pigment ..	40%	a. Titanium-Barium, Leaded Zinc
Leaded zinc	40%	and Lead
Basic carbonate of lead.....	20%	b. White Compound
		c. White Base
Titanium-barium pigment ..	55%	a. Titanium-Barium Pigment
Basic carbonate of lead.....	45%	Compound
		b. Titanium-Barium and Lead
Titanium oxide	24%	a. Titanium-Barium Pigment
Blanc fixe	76%	b. White Base
		c. White Compound
Titanium oxide	12%	a. Titanium-Barium and Lead
Blanc fixe	38%	b. White Base
Basic carbonate of lead.....	50%	
Lithopone	40%	a. White Base
Leaded zinc	45%	b. White Compound
Asbestine	15%	c. Lithopone, Leaded-Zinc, and Ex-
		tender
		d. Lithopone and Leaded Zinc Com-
		pound
Titanium-magnesium pigment	40%	a. White Base
Leaded zinc	40%	b. White Compound
Asbestine	20%	c. Titanium-Magnesium, Leaded
		Zinc and Extender
		d. Titanium-Magnesium and Lead-
		ed Zinc Compound
Titanium oxide	12%	a. White Base
Leaded zinc	44%	b. White Compound
Asbestine	44%	c. Titanium Oxide and Leaded Zinc
		Compound
Lithopone	60%	a. Lithopone Compound
Zinc oxide	20%	
Asbestine	20%	

COMPOSITION		DESCRIPTION TO USE
Titanated lithopone	80%	n. Titanated Lithopone Base
Blanc fixe	20%	
Zinc sulfide	30%	a. White Compound
Blanc fixe	70%	
Zinc sulfide	45%	a. White Compound
Blanc fixe	55%	
High strength lithopone ...	100%	a. High Strength Lithopone b. Cryptone c. Superlith d. Krebolith, etc.
Titanium-calcium pigment .	50%	a. White Compound
Titanium oxide	30%	b. Titanium-Calcium, Titanium Oxide Compound
Calcium carbonate	20%	c. Titanium-Calcium, Titanium Oxide and Extender
Titanium oxide	44%	a. Titanium Oxide and Extender
Calcium sulfate	36%	b. White Compound
Calcium carbonate	20%	

COLOR PIGMENTS

Red Lead shall consist entirely of true red lead (Pb_3O_4) and lead monoxide (PbO).

Chrome Yellow and Chrome Orange shall consist of at least 97% of chemical precipitates of normal or basic lead chromates or mixtures of these and other insoluble lead compounds. If a reduced type is used, the percentage of color and of extender shall be given.

Chrome Green shall consist of at least 97% of a precipitated mixture of lead chromate and iron ferro- and ferricyanide blue, and other insoluble compounds of lead. If a reduced color is used, the percentage of color and of extender shall be given.

Prussian Blue (Iron Blue, Chinese Blue, etc.) shall consist entirely of the blue product formed by the reaction of solutions of iron salts with ferro- or ferricyanide solutions.

Ultramarine Blue shall consist entirely of a manufactured material, the composition of which approximates that of natural lapis lazuli.

Lampblack shall consist entirely of the carbonaceous or sooty product obtained by the burning of oils or tars.

Carbon Black shall consist entirely of the carbonaceous product obtained by the burning of natural gas.

Bone Black shall consist entirely of the carbonaceous product obtained by the calcination of bones. There shall be pres-

ent not more than 88% of ash, of which not more than 1% shall be insoluble in acids.

Organic Toners (Para Red, Toluidine Red, etc.) shall consist entirely of the type of toner named. If a reduced toner is used, the percentage of toner and extender shall be given.

Iron Oxide Pigments. These pigments vary so widely in their iron oxide content that it is difficult to assign definite requirements therefor. However, it is suggested that the manufacturer, when labelling products containing iron pigments, bear in mind the following:

Synthetic Iron Oxides, Black, Red and Yellow are prepared by precipitation of iron liquors, and usually contain not less than 97% of mixed oxides of iron.

Indian Red consists of natural red iron oxide and siliceous material. There is usually present from 98 to 99 percent of iron oxide.

Venetian Red consists of a mixture of red iron oxide, calcium sulphate, and accompanying minerals, and usually contains from 20 to 40 percent of iron oxide.

Ochre consists entirely of a hydrated oxide of iron permeating a siliceous base, and usually contains from 18 to 22 percent of iron oxide.

Sienna consists entirely of a hydrated oxide of iron permeating a siliceous base, and usually contains from 50 to 70 percent of iron oxide.

Umber consists entirely of hydrated oxide of iron and hydrated oxide of manganese permeating a siliceous base, and usually contains from 45 to 55 percent of iron oxide and from 10 to 20 percent of manganese oxide.

Colors-in-Oil. The pigment portion of a color-in-oil shall consist entirely of the pigment named. If the kind of oil is named, it shall consist entirely of that oil.

OILS AND LIQUIDS

When describing oils, thinners and resins, it is suggested that the following designations be used only when they aptly apply to the product as in the descriptions below.

Raw Linseed Oil shall consist entirely of the oil obtained from flaxseed, either by expression or solvent extraction. It shall contain no added metallic compounds.

Boiled Linseed Oil shall consist entirely of oil obtained from flaxseed, either by expression or solvent extraction, which will

give upon analysis not more than 0.5 percent ash from lead and manganese compounds that have been incorporated in the oil.

Raw Tung Oil (Chinese Wood Oil) shall consist entirely of the oil obtained from the nut of the *Aleurites fordii* or *A. montana* tree, either by expression or solvent extraction.

Turpentine shall consist entirely of the products known as gum spirits of turpentine, steam distilled wood turpentine, destructively distilled wood turpentine, or sulfate wood turpentine.

Mineral Spirits (Petroleum Spirits, Oleum Spirits) shall consist entirely of the product obtained by the fractionation of petroleum.

RESINS

Synthetic Oil or Synthetic Resin. These terms shall not be used unless accompanied with further descriptive data, giving information either regarding the chemical composition or trade name. When the trade name is given, the resin in the varnish shall consist entirely of the resin named.

Shellac shall consist entirely of the secretion of the lac insect.

Phenolic Resin shall consist entirely of the resin obtained by the reaction of phenolic compounds with aldehydic compounds.

Modified Phenolic Resins shall consist entirely of a mixture of phenolic resins and other resins, such as ester gum, rosin, copals, etc.

Alkyd Resins shall consist entirely of the reaction product of polyhydric alcohols with polybasic organic acids, alone, or in the presence of fatty acids.

Ester Gum shall consist entirely of the reaction product of glycerol and rosin.