

LEAD INDUSTRIES ASSOCIATION

480 LEXINGTON AVENUE

NEW YORK 17, N. Y.

Pigments and Chemicals Division

October 27, 1955

SUBJECT: RED LEAD TECHNICAL
LETTER NO. 10

To Members of the Red Lead Technical Committee:

Attached for your review is a draft copy of the proposed Technical Letter containing L.I.A. Formula 3-7, the desirability of which has been agreed upon by Committee Members.

It is expected that this letter will be printed immediately after the meeting of the Red Lead Technical Committee set tentatively for Friday, November 11. If you do not expect to attend this meeting will you please forward your comments and suggestions in writing to the office of the Association. Particular attention should be paid to the titling of the letter and to the references to industrial and chemically contaminated atmospheres which are now conceived.

Very truly yours

Frank E. Long

Secretary to the Committee



DECEMBER, 1955

L.I.A. FORMULA 3-7

A RED LEAD-SYNTHETIC VEHICLE PRIMER
for
INDUSTRIAL AND MARINE ENVIRONMENTS

RED LEAD TECHNICAL COMMITTEE
LEAD INDUSTRIES ASSOCIATION
420 LEXINGTON AVENUE
NEW YORK 17, N. Y.

RED LEAD
TECHNICAL LETTER
NO. 10

N2750.01

Foreword

The red lead multiple pigment paint contained in this Technical Letter was published originally, along with ten other formulas, in Red Lead Technical Letter No. 3. It is now republished separately for two reasons. Firstly, there has been recent widespread interest in the formula, sparked, no doubt, by its adoption as a standard primer by a major oil company; and, secondly, in Technical Letter No. 3, the vehicle portion of Formula 3-7 was stated erroneously. Although copies of Technical Letter No. 3 distributed more recently have contained a correction note, many copies in the hands of users and paint manufacturers are known to be the original uncorrected version. It is hoped, then, that this separate publication of L.I.A. Formula No. 3-7 will serve to correct the outstanding copies which are in error and also to call attention to the success and popularity of this red lead paint.

Inquiries on this formulation or on specific painting problems are welcome and should be addressed to the Lead Industries Association or to the designated individuals in the cooperating companies listed below.

Cooperating Companies

L.I.A. FORMULA 3-7

A RED LEAD-SYNTHETIC VEHICLE PRIMER
FOR
INDUSTRIAL AND MARINE ENVIRONMENTS

Formula 3-7

This red lead multiple pigment paint is designed as a primer for paint systems or surfaces in chemically contaminated atmospheres or surfaces exposed to marine atmospheres such as ship superstructures, bridges and dock installations. As with other synthetic vehicle primers, applications on steel free from corrosion products and other foreign matter is essential for best performance.

FORMULA

	Percent	Pounds	Gallons
PIGMENT: Red Lead (97% Trade)	55	518	7.0
Zinc Yellow	10	94	3.3
Zinc Oxide	10	94	2.0
Iron Oxide (85% Fe_2O_3)	7	65.8	1.9
Magnesium Silicate	10	94	4.0
Diatomaceous Silica	8	75.3	3.9
	<u>100</u>		
VEHICLE: Vehicle No. 27e	75	436	54.5
Mineral Spirits	23.6	138	22.5
Driers	<u>1.4</u>	<u>8</u>	<u>0.9</u>
	100.0	1523.1	100.0

Pigment = 61.8%
Vehicle = 38.2%
Wt./Gal. = 15 lbs.
PV = 40

•Vehicle No. 27

Dehydrated Castor Oil Fatty Acids.....	31.0%
Glycerine.....	15.0
Phthalic Anhydride.....	19.0
Mineral Spirits.....	<u>25.0</u>
	100.0%

Cooking Procedure: Heat the first three items to 356°F. in 40 minutes with good agitation and under carbon dioxide gas, preferably in a closed kettle. Slowly increase the temperature to 475°F. and hold for approximately 105 minutes. Cool and reduce.

Properties: Non Volatile = 66% by weight
Viscosity = 2 (Gardner-Holdt)
Acid Number = 5-10 (on solids)
Phthalic Anhydride = 30% (on solids)