

VOUCHER REQUISITION

ACCOUNTING DEPARTMENT-GENERAL BOOKKEEPING DIVISION-ACCOUNTS PAYABLE

PLEASE MAKE VOUCHER AND CHECK AS FOLLOWS:

AMOUNT \$ 150.00

TO BE ISSUED BY (COMPANY) ALUMINUM COMPANY OF AMERICA

PAYABLE TO American Industrial Hygiene Association

ADDRESS 475 Wolf Ledges Parkway

Akron, Ohio 44311

PURPOSE Annual Organizational Membership Dues

(DATA PROCESSING)

DATE
VENDOR
NO.
REG.
NO.
CO. &
LOC.
DUE
DATE

ACCOUNTING
DISTRIBUTION

CODE 711-06

NOTE: THIS "REQUISITION" MUST BE APPROVED BY AUTHORIZED PERSONNEL.

APPROVED _____ SIGNED _____

DATE _____ DATE Thomas B. Bonney
1979 March 14

**SEND CHECK TO Loretta Neville, 732 Alcoa Building

SF-1191 Rev. 7-68 20M 1-69

**NOTE: FOR SPECIAL HANDLING ONLY.

PLAINTIFF'S
EXHIBIT
AL-1432

ARCH 19264

TBB check copy.
check mailed 3/30/79

Vendor No.	Vendor Name	Aluminum Company of America		Voucher No.
045523 02	AMERICAN INDUSTRIA			0319444
Invoice Date	Vendor's Invoice Identification	Invoice Amount	Discount	Paid Amount
1 03/14/79	0162-0323	150.00 150.00		150.00

Louella Neville
732

Detach Before Depositing
689-04 REV. 10-77

Check No. 150701



Aluminum Company of America
Headquarters Office • Pittsburgh, Pennsylvania 15219



Check No. 150701

To The
Order Of:

AMERICAN INDUSTRIAL HYGIENE
ASSOCIATION
475 WOLF LEDGES PARKWAY
AKRON OH
44311

Date

03/28/79

1-8
210

Exactly ***** 150 Dollars 00 Cents

Dollars	Cents
*****150.00	

Citibank, N.A.
399 Park Ave., New York, N.Y. 10022

C E Phillips
Authorized Signature

⑈ 150701 ⑈ ⑆0210⑈0008⑆ 744 40000347⑈ 79

ARCH 19265

MAR 9 1979

INVOICE

**AMERICAN
INDUSTRIAL
HYGIENE
ASSOCIATION**

475 Wolf Ledges Parkway, Akron, Ohio 44311, 216/762-7294

2915 JRG

INVOICE DATE

4/01/79

ALUM CO OF AMERICA
ATTN THOMAS B JONNEY
1501 ALCOA BLDG
PITTSBURG PA

15219

RETURN THIS PORTION WITH PAYMENT

QUANTITY ORDER

DESCRIPTION

AMOUNT

ANNUAL ORGANIZATIONAL MEMBERSHIP DUES
MEMBERSHIP BEGINNING 07 /01/79

\$150.00

RETAIN THIS PORTION FOR YOUR FILES

American Industrial Hygiene Association 475 Wolf Ledges Parkway, Akron, Ohio 44311

ARCH 19266

CORPORATE RETENTION: BY ACCTG. FOR 3 YRS.
DESTROY ONLY WITH TAX DEPT. APPROVAL

VOUCHER REQUISITION

ACCOUNTING DEPARTMENT-GENERAL BOOKKEEPING DIVISION-ACCOUNTS PAYABLE

PLEASE MAKE VOUCHER AND CHECK AS FOLLOWS:

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ADDRESS 475 Wolf Ledges Parkway

Akron, Ohio 44311

PURPOSE Annual Organizational Membership Dues

(DATA PROCESSING)

	DATE
	VENDOR
	NO.
	REG.
	NO.
	CO. &
	LOC.
	DUE
	DATE

ACCOUNTING
DISTRIBUTION

CODE 711-06

NOTE: THIS "REQUISITION" MUST BE APPROVED BY AUTHORIZED PERSONNEL.

APPROVED

SIGNED

Thomas B. Bonney

DATE

DATE 1979 March 14

**SEND CHECK TO Loretta Neville, 732 Alcoa Building

3F-1151 REV. 1/78

**NOTE: FOR SPECIAL HANDLING ONLY.

ARCH 19267

VOUCHER REQUISITION

ACCOUNTING DEPARTMENT-GENERAL BOOKKEEPING DIVISION-ACCOUNTS PAYABLE

PLEASE MAKE VOUCHER AND CHECK AS FOLLOWS:

AMOUNT **\$450.00**

BE ISSUED BY (COMPANY) **ALUMINUM COMPANY OF AMERICA**

PAYABLE TO **Industrial Health Foundation**

ADDRESS **5231 Centre Avenue**

Pittsburgh, Pa. 15232

PURPOSE **Ten subscriptions to Industrial Hygiene Digest @** (DATA PROCESSING)

**\$45.00 each. To be mailed out to domestic and
overseas plants.**

DATE

VENDOR

NO.

REG.

NO.

CO. &

LOC.

DUE

DATE

ACCOUNTING
DISTRIBUTION

CODE **711-08**

NOTE: THIS "REQUISITION" MUST BE APPROVED BY AUTHORIZED PERSONNEL.

PROVED

SIGNED

Thomas B. Bonney

DATE

DATE **1979 February 21**

****SEND CHECK TO Loretta Neville, 732 Alcoa Building, Pittsburgh Office**

SF-1191 Rev. 7-68 20M 1-69

****NOTE: FOR SPECIAL HANDLING ONLY.**

ARCH 19268

1979 February 13

Industrial Health Foundation
5231 Centre Avenue
Pittsburgh, Pa. 15232

Attention: Ms. Sherry Kaiser

Dear Ms. Kaiser:

Confirming our phone conversation today, enclosed is our new mailing list for 1979. There are a total of 31 subscriptions here. It is our understanding that we are entitled to 20 free subscriptions with three complementary subscriptions. Does this mean that we only owe you for 8 subscriptions at \$45.00 each?

Please advise us what we owe you for the extra subscriptions.

Very truly yours,

Loretta Neville, Secretary to
Thomas B. Bonney

In

enc.

ARCH 19269



INDUSTRIAL HYGIENE DIGEST SUBSCRIPTIONS - 1979

Page 3

(T. V. Byerley
Alcoa Conductor Products Company
P. O. Drawer 1438
Marshall, Texas 75670

O. E. Wilkinson
Aluminum Company of America
Anderson County Works
P. O. Box 558
Palestine, Texas 75801

Ms. S. Huey
Rea Magnet Wire Company, Inc.
3600 E. Pontiac Street
Fort Wayne, Indiana 46806

J. S. Wood/R. A. Williams
Wear-Ever Aluminum, Inc.
P. O. Box 459
Chillicothe, Ohio 45601

(see
ARCH 19270

(G. D. Hicks
Aluminum Company of America
P. O. Box 150
Massena, New York 13662

R. C. Hinkle
Aluminum Company of America
P. O. Box 576
Badin, Stanly County, N. C. 28009

N. Kloop/Laura Rippey
Aluminum Company of America
P. O. Box 300
Bauxite, Saline County, Arkansas 72011

Ms. Barbara Miller, R. N.
Aluminum Company of America
1570 Alcoa Building
Pittsburgh, Pa. 15219

Complimentary Copy -
Member - IHF Nursing Committee

R. L. Parsons
Aluminum Company of America
Warrick Operations
Newburgh, Warrick County, Indiana 47630

(R. E. Podhora
Aluminum Company of America
Point Comfort Operations
Box 646
Point Comfort, Texas 77978

R. J. Reitz/K. W. Williams
Aluminum Company of America
P. O. Box 3567
Davenport, Iowa 52808

L. M. Crivaro
Aluminum Company of America
Caller Box 840
Lancaster, Pa. 17604

J. V. Muncie
Aluminum Company of America
P. O. Box 458
Corona, California 91720

J. A. Thompson
Aluminum Company of America
P. O. Box 221
Wenatchee, Washington 98801

(J. C. Vergho
Aluminum Company of America
Tennessee Operations, South Plant
P. O. Box 9128
Alcoa, Tennessee 37701

ARCH 19271

INDUSTRIAL HYGIENE DIGEST SUBSCRIPTIONS - 1979

Thomas B. Bonney
Manager Industrial Hygiene
Aluminum Company of America
732 Alcoa Building
Pittsburgh, Pa. 15219

7 subscriptions for Mr. Bonney.
6 are to be re-addressed and
sent to foreign locations.

R. Andrew
Aluminum Company of America
State Drive, Box 22
R. D. #5
Lebanon, Pa. 17042

W. J. Boutreis
Aluminum Company of America
P. O. Box 2647
Mobile, Alabama 36601

A. B. Piecka
Aluminum Company of America
P. O. Box 58407
Vernon
Los Angeles, California 90058

W. D. Coker
Aluminum Company of America
P. O. Box 500
Lafayette, Indiana 47902

A. G. Clayton
Aluminum Company of America
P. O. Box 472
Rockdale, Texas 76567

D. R. Balya
Aluminum Company of America
Environmental Health Laboratory
Alcoa Technical Center
Alcoa Center, Pa. 15069

J. D. Gibbs
Aluminum Company of America
P. O. Box 488
Richmond, Indiana 47374

L. L. Grubb
Aluminum Company of America
1600 Harvard Avenue
Cleveland, Ohio 44105

L. L. Haisch
Aluminum Company of America
P. O. Box 120
Vancouver, Washington 98660

ARCH 19272

1979 February 05

Grand Hotel
Point Clear, Alabama 36564

Gentlemen:

Enclosed is my check for \$30.00 to confirm my reservation with the
Industrial Hygiene Round Table meeting beginning March 1, 1979.

Very truly yours,

Y
B
O
N
E
Y

Thomas B. Bonney
Manager Industrial Hygiene
Health & Safety Department

In

enc.



ARCH 19273

1979 January 29

NIOSH Office of Technical Publications
4676 Columbia Parkway
Cincinnati, Ohio 45226

Gentlemen:

We would like to obtain a copy of the document, "Self-Evaluation of Occupational Safety and Health Programs." We understand that you are temporarily out of this. Will you please send us a copy when you get a new reprint.

Also, send us a copy of "Self-Evaluation Instrument" if you have one tailored to industrial hygiene, safety, health of the aluminum industry.

Very truly yours,

Thomas B. Bonney
Manager Industrial Hygiene

ln



ARCH 19275

check copy

Vendor No.	Vendor Name	Aluminum Company of America		Voucher No.
145971 00	BUREAU OF NATIONAL			0113586
Invoice Date	Vendor's Invoice Identification	Invoice Amount	Discount	Paid Amount
1 01/16/79	VR REQ 0162-0154	275.60 275.60		275.60

*Louella Neville
732*

Detach Before Depositing
589-06 REV. 10-78

Check No. 06 125211



Aluminum Company of America
Headquarters Office • Pittsburgh, Pennsylvania 15219

Check No.
125211

To The
Order Of: BUREAU OF NATIONAL AFFAIRS INC
1231 - 25TH STREET NW
WASHINGTON DC
20037

Date 01/18/79

Exactly *****275 Dollars 60 Cents

8-9 430	
Dollars	Cents
*****275.60	

PITTSBURGH NATIONAL BANK
28 SEVENTH AVENUE OFFICE
PITTSBURGH, PENNSYLVANIA 15222

C E Phillips
Authorized Signature

⑈ 125211 ⑈ ⑆0430⑈0009⑆ 2 006203⑈

ARCH 19276

VOUCHER REQUISITION

ACCOUNTING DEPARTMENT-GENERAL BOOKKEEPING DIVISION-ACCOUNTS PAYABLE

PLEASE MAKE VOUCHER AND CHECK AS FOLLOWS:

AMOUNT \$275.60

TO BE ISSUED BY (COMPANY) ALUMINUM COMPANY OF AMERICA

PAYABLE TO THE BUREAU OF NATIONAL AFFAIRS, INC.

ADDRESS 1231 - 25th Street, N.W.

Washington, D. C. 20037

PURPOSE OCCUPATIONAL SAFETY & HEALTH REPORTER for 1979

(DATA PROCESSING)

	DATE
	VENDOR
	NO.
	REG.
	NO.
	CO. &
	LOC.
	DUE
	DATE

ACCOUNTING
DISTRIBUTION

CODE 711-08

(E: THIS "REQUISITION" MUST BE APPROVED BY AUTHORIZED PERSONNEL.

APPROVED _____ SIGNED _____

Thomas B. Bonney

DATE 1979 January 16 DATE _____

**SEND CHECK TO Loretta Neville, 732 Alcoa Building, Pittsburgh Office

SF-1191 Rev. 7-68 20M 1-69

****NOTE: FOR SPECIAL HANDLING ONLY.**

ARCH 19277

1979 January 18

Industrial Health Foundation, Inc.
5231 Centre Avenue
Pittsburgh, Pa. 15232

Gentlemen:

Enclosed is our check for \$2,600 for 1979 dues along with
a copy of your Invoice No. 01939. Please excuse the delay,
and we trust we will not miss our January issue of the Digest.
Thank you.

Y Very truly yours,

L Thomas B. Bonney
Manager Industrial Hygiene
Health & Safety Department

Q In
U enc.

ARCH 19278



Name and Address of Organization: Industrial Health Foundation, Inc.
5231 Centre Avenue, Pittsburgh, Pa. 15232

General Purpose of Organization: To promote and support effective management of
environmental and occupational health, research, and education.

Membership Expiration Date: 1978 December 31

Dues and/or Membership Fee: \$2600

Amounts Paid Last 3 Years: 1978 \$2400 1977 \$2400 1976 \$2400

Alcoa (Corporate) Representative: Thomas B. Bonney

Meetings Attended in Past Year and Place: 2-1/2 day meeting, January 1978,
Pittsburgh -
IHF Industrial Hygiene Discussional

Other Alcoans' Involvement with Organization: Because of the relatively wide scope
of IHF activities, safety, medical, and industrial nursing personnel have also
been involved.

Value to Alcoa: Satisfactory _____
Very Important ☒ _____
Essential _____

Explanation: See benefits below.

State direct or indirect benefits which are expected to accrue to Alcoa as a result of support of the above named organization: _____

See attachment #1

Recommended: Thomas B. Bonney
Thomas B. Bonney

Approved: Bertram D. Dinman, M.D.
Bertram D. Dinman, M.D.

Legal Department Review: _____

ARCH 19279

Attachment #1

Benefits:

1. Unique literature abstract service available only to members.
2. IHF training courses in wide variety of subjects related to occupational health have and will continue to represent a valuable source of training to Alcoa's headquarters and plant personnel.
3. Provides a forum for attempted resolution of differing positions of industry and government in occupational health matters.
4. Provides vehicle for productive exchange of information with other members of industry having similar problems and responsibilities.

ARCH 19280

1979 January 09

Mr. Gerald Kaine, M.D.
Medical Consultant
Alcan Smelters and Chemicals Ltd.
1 Place Ville-Marie
Box 6090
Montreal, Quebec, Canada H3C 3H2

Dear Gerry:

In reference to your letter of December 8, 1978, I am attaching an idealized version of our industrial hygiene organization. At the present time the Administrator's job is vacant which means that our five field hygienists (we're looking for another one) report to me. With everything that is taking place today, I find our present set-up something less than ideal.

Responsibility for plant industrial hygiene programs rests with the plant. That is the reason for our dotted line relationship with plant hygienists as shown on the organization chart. The responsibility of the corporate headquarters group is to assist plants in establishing programs appropriate for their needs, and to audit the programs to assure their adequacy and consistency. The headquarters group also provides technical back-up for the plants and may conduct special studies primarily of corporate interest.

As regards meeting their industrial hygiene needs, we believe that our plants should be self sufficient insofar as their resources will allow them. Ultimately, we can envision full time hygienists in perhaps seven of our larger, more complex plants. (We're working toward this end now. The present count is one full time plant hygienist and a second one authorized.) These plants and many of our smaller plants have adequate laboratory facilities to enable them to take care of most of their routine industrial hygiene analyses. Although our corporate industrial hygiene laboratory is concerned primarily with sampling and analytical development work, it also may help our plants in doing those analyses (usually non-routine) they are unable to do.

In the medium size plants, industrial hygiene will have to be a part time responsibility. The responsible person will wear at least two hats (e.g. industrial hygiene and, most usually, laboratory, sometimes air and water pollution as well). It is essential that those doing industrial hygiene work at the plants be adequately trained. The number of problems a plant will have and the depth of training their "hygienists" have will determine how much loving care they will receive from the corporate group.

ARCH 19281

Mr. Gerald Kaine, M.D.
Alcan Smelters and Chemicals Ltd.
1979 January 09
Page 2

The small plants very seldom can afford the luxury of having in-house industrial hygiene capability. Most of their needed work will have to be done by the corporate hygienists. If need be, local personnel can be trained to do the bare minimums (e.g. handle a detector tube, hang a sampling pump on an employee, or know when to cry for help).

In the above I've tried to provide you with our over-all philosophy and a broad view of our organization. However, there are a lot of other ways to skin this cat, and I've mentioned nothing about pros and cons of any of these. There is so much that could be said about the over-all topic that any written response may very well provoke more questions than it answers. If I managed to do this to you, I think clarification might be accomplished at a face-to-face session. Should this appear attractive to you, I would welcome the opportunity.

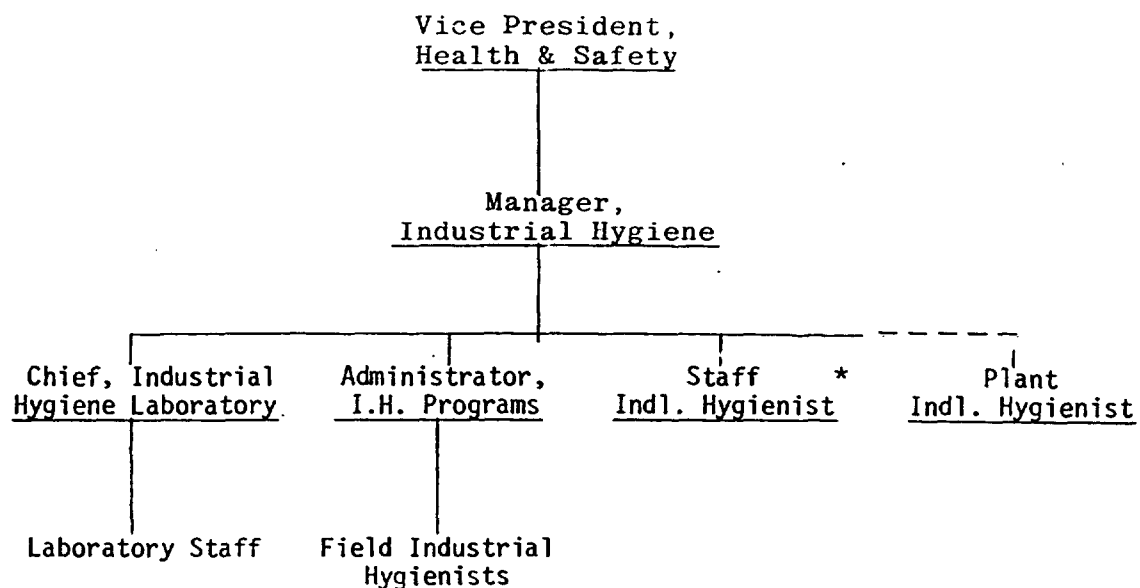
Best regards,

Thomas B. Bonney
Manager Industrial Hygiene
Health & Safety Department

TBB:lmn

Att.

ARCH 19282



*Responsibilities primarily include F&DA, Toxic Substances Act, labeling of hazardous materials, safety data sheets, ergonomics, toxicology, etc rather than classical industrial hygiene activities.

PREFACE
CHEMICAL CONTAMINANTS

Threshold limit values refer to airborne concentrations of substances and represent conditions under which it is believed that nearly all workers may be repeatedly exposed day after day without adverse effect. Because of wide variation in individual susceptibility, however, a small percentage of workers may experience discomfort from some substances at concentrations at or below the threshold limit; a smaller percentage may be affected more seriously by aggravation of a pre-existing condition or by development of an occupational illness.

Tests are available (J. Occup. Med. 15: 564, 1973; Ann. N.Y. Acad. Sci., 157, Art. 2: 968, 1968) that may be used to detect those individuals hypersusceptible to a variety of industrial chemicals (respiratory irritants, hemolytic chemicals, organic isocyanates, carbon disulfide).

Three categories of Threshold Limit Values (TLVs) are specified herein, as follows:

a) Threshold Limit Value-Time Weighted Average (TLV-TWA) — the time-weighted average concentration for a normal 8-hour workday or 40-hour workweek, to which nearly all workers may be repeatedly exposed, day after day, without adverse effect.

b) Threshold Limit Value-Short Term Exposure Limit (TLV-STEL) — the maximal concentration to which workers can be exposed for a period up to 15 minutes continuously without suffering from 1) irritation, 2) chronic or irreversible tissue change, or 3) narcosis of sufficient degree to increase accident proneness, impair self-rescue, or materially reduce work efficiency, provided that no more than four excursions per day are permitted, with at least 60 minutes between exposure periods, and provided that the daily TLV-TWA also is not exceeded. The STEL should be considered a maximal allowable concentration, or ceiling, not to be exceeded at any time during the 15-minute excursion period. STELs are based on one or more of the following criteria: (1) Adopted TLVs including those with a "C" or "ceiling" limit. (2) TLV-TWA Excursion Factors listed in Appendix D. (3) Pennsylvania Short-Term Limits for Exposure to Air-

2

borne Contaminants (Penna. Dept. of Hlth., Chapter 4, Art. 432, Rev. Jan. 25, 1968). (4) OSHA Occupational Safety and Health Standards, 40 FR 23073, May 28, 1975. (5) NIOSH criteria for recommended standards for occupational exposure to specific substances. The TWA-STEL should not be used as engineering design criterion or considered as an emergency exposure level (EEL).

c) Threshold Limit Value-Ceiling (TLV-C) — the concentration that should not be exceeded even instantaneously.

For some substances, e.g., irritant gases, only one category, the TLV-Ceiling, may be relevant. For other substances, either two or three categories may be relevant, depending upon their physiologic action. It is important to observe that if any one of these three TLVs is exceeded, a potential hazard from that substance is presumed to exist.

The TLV-TWA should be used as guides in the control of health hazards and should not be used as fine lines between safe and dangerous concentrations.

Time-weighted averages permit excursions above the limit provided they are compensated by equivalent excursions below the limit during the workday. In some instances it may be permissible to calculate the average concentration for a workweek rather than for a workday. The degree of permissible excursion is related to the magnitude of the threshold limit value of a particular substance as given in Appendix D. The relationship between threshold limit and permissible excursion is a rule of thumb and in certain cases may not apply. The amount by which threshold limits may be exceeded for short periods without injury to health depends upon a number of factors such as the nature of the contaminant, whether very high concentrations — even for short periods — produce acute poisoning, whether the effects are cumulative, the frequency with which high concentrations occur, and the duration of such periods. All factors must be taken into consideration in arriving at a decision as to whether a hazardous condition exists.

Threshold limits are based on the best available information from industrial experience, from experimental human and animal studies, and, when possible, from a combination of the three. The basis on which the values are established may differ from substance to substance, protection against impairment of health may be a guiding factor for some, whereas reasonable freedom from

3

irritation, narcosis, nuisance or other forms of stress may form the basis for others.

The amount and nature of the information available for establishing a TLV varies from substance to substance; consequently, the precision of the estimated TLV is also subject to variation and the latest Documentation should be consulted in order to assess the extent of the data available for a given substance.

The committee holds to the opinion that limits based on physical irritation should be considered no less binding than those based on physical impairment. There is increasing evidence that physical irritation may initiate, promote or accelerate physical impairment through interaction with other chemical or biologic agents.

In spite of the fact that serious injury is not believed likely as a result of exposure to the threshold limit concentrations, the best practice is to maintain concentrations of all atmospheric contaminants as low as is practical.

These limits are intended for use in the practice of industrial hygiene and should be interpreted and applied only by a person trained in this discipline. They are not intended for use, or for modification for use, (1) as a relative index of hazard or toxicity, (2) in the evaluation or control of community air pollution nuisances, (3) in estimating the toxic potential of continuous, uninterrupted exposures or other extended work periods, (4) as proof or disproof of an existing disease or physical condition, or (5) for adoption by countries whose working conditions differ from those in the United States of America and where substances and processes differ.

Ceiling vs Time-Weighted Average Limits. Although the time-weighted average concentration provides the most satisfactory, practical way of monitoring airborne agents for compliance with the limits, there are certain substances for which it is inappropriate. In the latter group are substances which are predominantly fast acting and whose threshold limit is more appropriately based on this particular response. Substances with this type of response are best controlled by a ceiling "C" limit that should not be exceeded. It is implicit in these definitions that the manner of sampling to determine noncompliance with the limits for each group must differ: a single brief sample, that is applicable to a "C" limit, is not appropriate to the time-weighted limit; here,

4

a sufficient number of samples are needed to permit a time-weighted average concentration throughout a complete cycle of operations or throughout the work shift.

Whereas the ceiling limit places a definite boundary which concentrations should not be permitted to exceed, the time-weighted average limit requires an explicit limit to the excursions that are permissible above the listed values. The magnitude of these excursions may be pegged to the magnitude of the threshold limit by an appropriate factor shown in Appendix D. It should be noted that the same factors are used by the Committee in determining the magnitude of the value of the STELs, or whether to include or exclude a substance for a "C" listing.

"Skin" Notation. Listed substances followed by the designation "Skin" refer to the potential contribution to the overall exposure by the cutaneous route including mucous membranes and eye, either by airborne, or more particularly, by direct contact with the substance. Vehicles can alter skin absorption. This attention-calling designation is intended to suggest appropriate measures for the prevention of cutaneous absorption so that the threshold limit is not invalidated.

Mixtures. Special consideration should be given also to the application of the TLVs in assessing the health hazards which may be associated with exposure to mixtures of two or more substances. A brief discussion of basic considerations involved in developing threshold limit values for mixtures, and methods for their development, amplified by specific examples are given in Appendix C.

Nuisance Particulates. In contrast to fibrogenic dusts which cause scar tissue to be formed in lungs when inhaled in excessive amounts, so-called "nuisance" dusts have a long history of little adverse effect on lungs and do not produce significant organic disease or toxic effect when exposures are kept under reasonable control. The nuisance dusts have also been called (biologically) "inert" dusts, but the latter term is inappropriate to the extent that there is no dust which does not evoke some cellular response in the lung when inhaled in sufficient amount. However, the lung-tissue reaction caused by inhalation of nuisance dusts has the following characteristics. (1) The architecture of the air spaces remains intact. (2) Collagen (scar tissue) is not formed to a

5

significant extent (3) The tissue reaction is potentially reversible.

Excessive concentrations of nuisance dusts in the workroom air may seriously reduce visibility, may cause unpleasant deposits in the eyes, ears and nasal passages (Portland Cement dust), or cause injury to the skin or mucous membranes by chemical or mechanical action per se or by the rigorous skin cleansing procedures necessary for their removal.

A threshold limit of 10 mg/m³, or 30 mppcd, of total dust < 1% quartz, or 5 mg/m³ respirable dust is recommended for substances in these categories and for which no specific threshold limits have been assigned. This limit, for a normal workday, does not apply to brief exposures at higher concentrations. Neither does it apply to those substances which may cause physiologic impairment at lower concentrations but for which a threshold limit has not yet been adopted. Some nuisance particulates are given in Appendix E.

Simple Asphyxiants — "Inert" Gases or Vapors. A number of gases and vapors, when present in high concentrations in air, act primarily as simple asphyxiants without other significant physiologic effects. A TLV may not be recommended for each simple asphyxiant because the limiting factor is the available oxygen. The minimal oxygen content should be 18 percent by volume under normal atmospheric pressure (equivalent to a partial pressure, pO₂ of 135 mm Hg). Atmospheres deficient in O₂ do not provide adequate warning and most simple asphyxiants are odorless. Several simple asphyxiants present an explosion hazard. Account should be taken of this factor in limiting the concentration of the asphyxiant. Specific examples are listed in Appendix F.

Physical Factors. It is recognized that such physical factors as heat, ultraviolet and ionizing radiation, humidity, abnormal pressure (altitude) and the like may place added stress on the body so that the effects from exposure at a threshold limit may be altered. Most of these stresses act adversely to increase the toxic response of a substance. Although most threshold limits have built-in safety factors to guard against adverse effects to moderate deviations from normal environments, the safety factors of most substances are not of such a magnitude as to take care of gross deviations. For example, continuous work at temperatures above 90°F, or overtime extending the workweek more than 25%, might be consid-

6

NUISANCE PARTICULATES
(see Appendix E)

30 mppcd or 10 mg/m³
of total dust < 1% quartz, or 5 mg/m³ respirable dust.

Conversion factors:
mppcd x 35.3 = Million particles per cubic meter
= particles per cc

APPENDIX E

Some Nuisance Particulates*

TLV, 30 mppcd or 10mg/m³ of total
dust < 1% quartz, or 5 mg/m³
respirable dust

Aluminum (Al ₂ O ₃)	Limestone
Calcium carbonate	Magnesium
Calcium silicate	Marble
Cellulose (paper fiber)	Mineral Wool Fiber
Portland Cement	Pentaerythritol
Corundum (Al ₂ O ₃)	Plaster of Paris
Emery	Rouge
Glycerin Mist	Silicon
Graphite (synthetic)	Silicon Carbide
Gypsum	Starch
Vegetable oil mists	Sucrose
(except castor, cashew nut, or similar irritant oils)	Tin Oxide
Kaolin	Titanium Dioxide
	Zinc Stearate
	Zinc oxide dust

p) When toxic impurities are not present, e.g. quartz < 1%.

ARCH 19284

ALUMINUM COMPANY OF AMERICA

ALCOA BUILDING, PITTSBURGH, PENNSYLVANIA 15219



1980 June 27

Mr. Jeffrey Wenger, Accounting Department
Organization Resources Counselors, Inc.
2111 Avenue of the Americas
New York, NY 10036

Dear Mr. Wenger:

Enclosed please find Alcoa's Check #218032 in the amount of \$7,500. This will cover annual membership dues in the ORC Occupational Safety and Health Group for the year beginning 1980 June 01.

Very truly yours,

Thomas B. Bonney/eds

Thomas B. Bonney
Technical Manager
Industrial Hygiene

TBB/eds
Enclosure



Aluminum Company of America
Headquarters Office • Pittsburgh, Pennsylvania 15219

Check No.

218032

1-23
210

To The
Order Of:

ORGANIZATION RESOURCES
COUNSELORS INC
1211 AVE OF THE AMERICAS
NEW YORK NY
10036

Date

06/26/80

Exactly *****7500 Dollars 00 Cents

Dollars	Cents
*****7,500	.00

Morgan Guaranty Trust Company
New York, N.Y. 10015

CE [Signature]
Authorized Signature

⑈00218032⑈ ⑆0210⑈0023⑆ 001 11 236⑈

ARCH 19285

SODERBERG POTROOMS

EMPLOYEE EXPOSURES TO TOTAL DUST*

(GEOMETRIC MEAN VALUES - MG/M³)

	<u>POINT COMFORT</u>		<u>POCOS DE CALDAS</u>	<u>PARANAM</u>
	<u>1977</u>	<u>1980</u>	<u>1977</u>	<u>1978</u>
POTMAN	24.6	35.5	13.0	10.4
SPIKE SETTER	6.2	33.2	18.2	13.1
CRANE OPERATOR	--	6.5	3.2	10.1
TAPPER	--	12.8	--	--

*PERMISSIBLE EXPOSURE LIMIT: 15 MG/M³

ARCH 19286

T. B. BONNEY
1980 JUNE 23/EDS

D R A F T

FROM T. B. BONNEY

TO M E M O R A N D U M

PITTSBURGH OFFICE - 7

1980 June 16

RE: RESPONSIBILITIES OF INDUSTRIAL HYGIENISTS
EMPLOYED BY INDUSTRY

1. Primary responsibility is to protect the health of the employee.
This responsibility cannot be compromised.
2. The hygienist also has a responsibility to protect and serve the interests of his employer. Contrary to some popular thinking, we believe that these two responsibilities are completely compatible. Where incompatibilities do, in fact, exist, we believe they are due to unenlightenment or unethical practices on the part of the Industrial Hygienist and/or his company.
3. The Industrial Hygienist must carry out his responsibilities in a moral, legal, ethical, and objective manner.

Specific responsibilities to the employer are:

1. See that employees are properly protected.
2. See that the company is operating within the requirements of the law.
3. The hygienists' recommendations must consider the economic health of the company. (This is the greatest challenge of an Industrial Hygienist employed by industry. He, in cooperation with Operating personnel, must not only achieve a healthy



(MORE)

ARCH 19287

SF-4563

working environment... but must achieve it by the most economical means. If he is successful at this, he has helped the company to also achieve a competitive edge. This aspect of Industrial Hygiene is unique to industry. Industrial Hygienists from government or from consulting organizations need not be concerned about the economic impact of their findings or recommendations.)

4. The hygienist is obliged to carry out his responsibilities according to the highest moral and ethical principles.
5. All of his recommendations must be objectively based on the best available information. He must consciously attempt to prevent subjectivity from shading his judgment. If unsuccessful at this, he risks the chance of losing his credibility should his subjective reasoning prove to be wrong.

Policy -- For Each Plant

1. All workplace contaminants will be kept to the lowest levels practicable.
2. Employee exposures to workplace contaminants shall not exceed the legally established limits, or those established by Alcoa's Industrial Hygiene Division. Where the applicable legal and Alcoa limits differ, the lower limit will apply.

M E M O R A N D U M
1980 June 16
Page 3

3. (Include statements regarding priorities relative to methods of control. Should also reemphasize that Operating personnel must follow the spirit -- rather than the letter -- of the law when attempting to control exposures to meet established limits. The lowest practicable levels of exposure must be sought. Target design must be well below established limits unless this goal is beyond the realm of feasibility.)

4. Nuisance and discomfort?

T. B. BONNEY

TBB/eds

ARCH 19289

TO: J. A. KNIGHT, JR.
PITTSBURGH OFFICE - 7 ✓

MEMBERSHIP/CONTRIBUTION REQUEST FORM 1980 June 06

Charge to Budget Item #708-06

Rockefeller Center
1211 Avenue of the Americas
New York, New York 10036
212-575-7500

Cable Address: ORESCON
Telex Number: 12-6544



May 1, 1980

Aluminum Company of America
1501 Alcoa Building
Pittsburgh, Pennsylvania 15219

Annual Membership in the ORC OCCUPATIONAL SAFETY
AND HEALTH GROUP for year beginning June 1, 1980

\$7,500.00

Approved
May 9, 1980
#708
[Signature]

Please remit check to: Jeffrey Wenger, Accounting Department
Organization Resources Counselors, Inc.
1211 Avenue of the Americas
New York, New York 10036

ARCH 19291

ORC Occupational Safety and Health Group

Primary Objectives

1. Provide a means to assist member companies to keep informed about Federal safety and health regulatory matters and trends.
2. Assist member companies, as requested, to anticipate and cope with OSHA and related regulatory activity pertaining to their operations.
3. Seek to improve the safety and health regulatory process by ---
 - providing a meaningful two-way communication channel between the regulators and the business community;
 - seeking to minimize or counteract the politicization of Federal safety and health regulation;
 - articulating a multi-industry perspective on occupational safety and health needs and regulatory actions relating to them.
4. Remain alert to unreasonable or unwarranted health and safety regulatory actions and assure strong and constructive responses to them, while at the same time, avoiding undue confrontation or excessive adversarial activity.
5. Help to crystallize and communicate industry viewpoint concerning the occupational safety and health regulatory process.
6. Provide effective liaison with certain other interest groups, such as safety and health staff within the labor movement and with industry/trade associations, recognizing that various companies and industries may have different problems and priorities relative to regulatory matters.
7. Assist member companies to develop a broad understanding of the interrelationships between the various Federal safety and health regulatory processes, including OSHA, NIOSH, MSHA, and TSCA.
8. Provide opportunities for interchange of information and viewpoint among safety and health staffs of member companies.
9. Identify important related legislative or litigation needs and refer to appropriate organizations for consideration.
10. Facilitate and encourage policies and practices consistent with maintaining safe and healthful workplaces within member companies and industry generally.

JWM/shb
8/79



Organization Resources
Counselors, Inc.

H & S
Industrial Hygiene

EDD
EER
TBB
RMJ
HGS
PHS
MJV
MAY 5 1980
MLF
JD
CCD
DB
LMA
EDS

May 1, 1980

T. B. Bonney
Chief
Industrial Hygiene
Aluminum Company of America
1501 Alcoa Building
Pittsburgh, Pennsylvania 15219

Dear Tom:

Enclosed is an invoice for your membership in the ORC Occupational Safety and Health Group for this year. As was mentioned at the August meeting, the annual fee for 1980 is \$7500.00

This is a very important year and an exciting one, both for ORC and the entire occupational safety and health field. Areas of particular importance include the examination of the various carcinogen policies, the OSHA access to medical records regulation, the pending Supreme Court decision on the Benzene Standard, the increased emphasis in the area of civil and criminal liability, employment discrimination, reproductive hazards, and the increased use of the general duty clause for compliance purposes. I anticipate that there will be even more for business to deal with in the coming years.

I am enclosing a list of the primary objectives of the ORC Occupational Safety and Health Group for your review and any comments which you may wish to make. It is extremely important to me to have your input and suggestions in order to make our efforts as responsive as possible to your needs.

We appreciate your input and involvement with ORC in the past and look forward to a continuing, cooperative effort in the future.

Sincerely,

Rich
Richard F. Boggs, Ph.D.
Director, Occupational
Safety and Health

RFB:jt

Enclosure

*Sorry-we're going to
miss you at the May
meeting. Hope Florida
was "A.O.K!"*

FROM: THOMAS B. BONNEY
PITTSBURGH OFFICE - 7

TO: J. A. KNIGHT, JR.
PITTSBURGH OFFICE - 7 ✓

1980 June 05

MEMBERSHIP/CONTRIBUTION REQUEST FORM

This is a request for approval of: XX Membership Contribution

Name and Address of Organization: AMERICAN INDUSTRIAL HYGIENE ASSOCIATION
475 Wolf Ledges Parkway
Akron, OH 44311

General Purpose of Organization: (SEE ATTACHMENT)

Is Alcoa now a member? XX YES NO

If Yes give Expiration Date: 80/06/30

~~Contribution~~ Membership Fee requested: \$ 150

Amounts Paid Last 3 Years: 1979 - \$150 1978 - \$150 1977 - \$100

Alcoa (Corporate) Representative: THOMAS B. BONNEY

Other Alcoans Involved with Organization: Individual memberships held by most members of Corporate Ind. Hygiene Staff, as well as some plant personnel.

Describe and explain value to Alcoa; including indirect benefits: Services provided by AIHA are unique and greatly surpass those of any similar organization in the world. Alcoa's membership supports the existence of AIHA which provides an important source of educational material and provides a worldwide forum enabling the exchange of information that assists us in discharging our... (Please attach any pertinent documents, including list of officers and directors.)

...responsibility to protect the health of our employees.

Recommended: THOMAS B. BONNEY

Approved: E. E. RUMBERGER

For Pittsburgh office requests only

Charge to Budget Item #711

ARCH 19294

**AMERICAN
INDUSTRIAL
HYGIENE
ASSOCIATION**

475 Wolf Ledges Parkway, Akron, Ohio 44311, 216/762-7294

INVOICE

2945 ORG

INVOICE DATE

05/01/80

ALUM CO OF AMERICA
ATTN THOMAS B BONNEY
1501 ALCOA BLDG
PITTSBURGH, PA

45219

RETURN THIS PORTION WITH PAYMENT

QUANTITY ORDER	DESCRIPTION	AMOUNT
	* * SECOND NOTICE * *	
	ANNUAL ORGANIZATIONAL MEMBERSHIP DUES	150.00
	MEMBERSHIP BEGINNING 07/01/80	

RETAIN THIS PORTION FOR YOUR FILES
American Industrial Hygiene Association 475 Wolf Ledges Parkway, Akron, Ohio 44311

ARCH 19295

MEMBERSHIP/CONTRIBUTION REQUEST FORM

ATTACHMENT

GENERAL PURPOSE OF ORGANIZATION:

1. To promote the study, evaluation, and control of environmental stresses arising in or from the workplace or its products in relation to the health or well-being of workers and the public.
2. To increase the knowledge of industrial and environmental health through interchange and dissemination of information and to bring together persons interested in the various phases of industrial and environmental health.
3. To promote the profession through the encouragement of interest within and cooperation with governmental, industrial, educational, and other professional bodies.

1980 June 05/eds

ARCH 19296

Written Program

Every plant having need for Industrial Hygiene activity must have a written program.

The program must clearly describe:

1. The policy and objectives of the program
2. The areas in the plant that have potential health problems
3. The specific Industrial Hygiene activities required to accomplish the program objectives

There are several reasons why the program should be in writing:

- A plant manager is responsible for knowing all activities being carried out in his plant... and keeping them in balance. A written program satisfies this "need to know".
- A written program also provides concrete evidence that employee health is of concern to Alcoa. Such evidence is of use and interest to managers, employees, the union, the public, and the government.
- Put in writing, it assists the hygienist to optimize his cost effectiveness in that a periodic review of the document requires that he adjust his priorities in accord with changes in plant activities or outside stimuli (e.g., new regulations, revelation of previously unknown hazards, etc.). The written document also prevents the hygienist from overlooking plant activities that should be carried out.

- Finally -- and of great importance -- a written program provides continuity that can otherwise be lost when there are changes in personnel.

The contents of a typical written program are shown in Table 1.1.

VOUCHER REQUISITION

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PLEASE MAKE VOUCHER AND CHECK AS FOLLOWS:

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335 EAST 45th STREET

NEW YORK, NY 10017

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(DATA PROCESSING)

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	CO. &
	LOC.
	DUE
	DATE

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DISTRIBUTION

CODE #711

NOTE: THIS "REQUISITION" MUST BE APPROVED BY AUTHORIZED PERSONNEL.

APPROVED

E. E. Rumberger
E. E. RUMBERGER

SIGNED

T. B. Bonney
T. B. BONNEY

DATE

1980 MAY 27

DATE

1980 MAY 27

**SEND CHECK TO ELLE SASINOSKI - ROOM 736 ALCOA BUILDING

SP-1101 REV. 3/78

**NOTE: FOR SPECIAL HANDLING ONLY.



ARCH 19299

Send me ___copy(s) of the Cumulative Author and Subject Index to the 1974-1978 issues of *The Journal of the Acoustical Society of America* (Volumes 55-64) at \$60.00 per copy.

☐ I am a member of the Acoustical Society of America
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36-44 (Vol. 1)	1964-1968	485	10.00
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ARCH 19300



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ARCH 19301



71215

IPAI

NOTE: RESPIRATORY PROTECTION IN PRIMARY ALUMINUM PRODUCTION

This note has been prepared by a Panel of the Health Committee of the International Primary Aluminum Institute under the authority of the Board of Directors of the Institute. It is intended to provide guidance regarding the selection of respiratory protection for our members involved in primary aluminum production.

Primary aluminum production, utilizing the Soderberg process, employs a self-baking anode immersed in a cryolite bath. Volatile resinous materials, particulate polycyclic organic matter (PPOM), are released into the potroom during this self-baking process from the coal tar pitch binder used in the anode mix. This hydrocarbon release does not generally hold true, however, for the pre-bake potrooms, since these hydrocarbons are removed in the carbon plant during the anode baking cycle. Hydrocarbon emissions in the pre-bake potrooms do occur during cathode bake-out, but this operation is quite limited.

A number of epidemiological studies has shown an association between exposures to PPOM and cancer in the workplace. (1,2,3,4,5,6) As a result, consideration has been given to the use of respiratory protection in potroom and carbon plant operations where hydrocarbon exposures occur in order to minimize employee exposure.

Since there are no current governmental approvals for respiratory protection against PPOM, several investigations concerning respirator efficiency have been carried out by member companies. (7,8) Results appear in the attached tables.

(MORE)

ARCH 19302

NOTE: RESPIRATORY PROTECTION IN PRIMARY ALUMINUM PRODUCTION

As can be seen from the data, most of the respirators tested achieved collection efficiencies of at least 90 percent (protection factor of 10). Accordingly, employees wearing any of these respirators will be protected against elevated PPOM exposures of up to 10 times the current Standard. Respirators with lower collection efficiencies will, of course, provide correspondingly lower protection factors.

In addition, other studies were carried out to determine the collection of efficiency of the 3M #8706 respirator for volatile organic matter, sulfur dioxide, and fluoride. (9) Results of this effort indicate collection efficiencies of 41 and 51 percent for volatile hydrocarbons and sulfur dioxide. Collection efficiencies for gaseous fluoride were 96-100 percent and particulate fluoride 93-99 percent, thereby providing an overall collection efficiency of 95-99 percent for total fluoride. While exposures to these irritants are generally quite low, the #8706 respirator can be used to provide added comfort and protection.

HMC

ARCH 19303

FROM T. B. BONNEY - PITTSBURGH OFFICE
R. C. GEIGER - ALCOA TECHNICAL
CENTER

TO MR. F. P. BERGERON - ROCKDALE WORKS
MR. C. L. GREEN - ROCKDALE WORKS

1980 March 24

RE: RADIATION SURVEY - ROCKDALE WORKS

Enclosed is the radiation survey report from Applied Health Physics, Inc., Bethel Park, PA, relating to the release of naturally occurring radioactive materials from the lignite mining and power generation operations at the Rockdale Works.

The survey showed that radioactive contamination was low... well below established allowable limits. The findings were consistent with those of a number of recent studies showing that releases of radioactive material from power plants fired by similar fossil fuels were well within the limits of radiation protection guides set forth by the Federal Radiation Council, the International Commission on Radiological Protection, and Part 20 of Title 10 of the Code of Federal Regulations.

The report contained two recommendations for further study which we feel are not supported by the technical issues involved. One referred to the collection of additional ambient air quality data. The other referred to an evaluation of the distribution and uses of ash that is sold. Although the ambient air sampling study was of limited duration (17 days), the findings were consistent with rather extensive and conclusive studies of similar operations. We have no evidence to indicate that the Rockdale operation is uniquely different than those studied in depth.

The possibility that the sale of the ash would be a source of potential liability to Alcoa is likewise remote. In order to estimate the degree of risk to which users of the ash could be subjected, we calculated the radiation level that would be in a heavy dust cloud of 15 mg/M^3 (this is the highest level of workroom contamination permitted by OSHA). The dust cloud was assumed to consist solely of fly ash, the material having the highest radiation level -- 8.91 pCi of uranium per gram. A 15 mg/M^3 dust cloud of the fly ash will result in a radiation level of $1.34 \times 10^{-13} \text{ } \mu\text{Ci/cc}$. This concentration is only 2.8% of the NRC permissible limit for natural uranium -- $5 \times 10^{-12} \text{ } \mu\text{Ci/cc}$. Or, from another viewpoint, an intolerably heavy dust cloud of 560 mg/M^3 , greatly in excess of OSHA's nuisance dust limit, would be required before the NRC radiation limit would be reached. We believe the likelihood of workers being regularly exposed to dust clouds of this magnitude is extremely remote.

T. B. BONNEY
Chairman - Radiation Safety Committee

R. C. GEIGER
Radiation Safety Officer

cc: See Reverse Side

TBB:RCG/eds
Enclosure
 ALCOA

ARCH 19304

Chen copy

check
mailed
1980 March 05

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Aluminum Company of America
Headquarters Office • Pittsburgh, Pennsylvania 15219

Check No.

366129

8-26
430

To The
Order Of:

AMERICAN CONFERENCE OF
GOVERNMENTAL IND'L HYGIENISTS
P O BOX 1937
CINCINNATI
45201

OH

Date

03/04/80

Exactly *****24 Dollars 00 Cents

Dollars	Cents
*****24	00

Mellon Bank N.A.
Pittsburgh, Pennsylvania 15230

C E Pfeiffer
Authorized Signature

⑈366129⑈ ⑆0430⑈0026⑆ 000⑈1089⑈

ARCH 19306

VOUCHER REQUISITION

chr

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TO BE ISSUED BY (COMPANY) ALUMINUM COMPANY OF AMERICA

PAYABLE TO American Conference of Governmental Industrial Hygienists (ACGIH)

ADDRESS P. O. Box 1937

Cincinnati, Ohio 45201

PURPOSE 12 copies of 1979 Threshold Limit Values @ \$2.00 each.

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Invoice No. 90931-18 dated 9-24-79

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LOC.

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E: THIS "REQUISITION" MUST BE APPROVED BY AUTHORIZED PERSONNEL.

APPROVED

SIGNED

E. E. Rumberger

T. B. Bonney

DATE

DATE

1980 February 25

**SEND CHECK TO Loretta Neville, 732 Alcoa Building, Pittsburgh Office

ARCH 19307



American Conference of Governmental Industrial Hygienists

Post Office Box 1937
CINCINNATI, OHIO 45201
Phone: 513 - 825-0312

Invoice No. 90931-18

DATE: 9-24-79

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Aluminum Company of America
1501 Alcoa Bldg.
Pittsburgh Pennsylvania 15219

Attn: Mr. Robert P. Carter

Your Order No. Standing Order
ph. 11-1-77

Date Shipped 9-25-79

Terms: Net 30 Days - U.S. Funds Only

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IN REMITTING PLEASE REFER TO INVOICE NUMBER ABOVE

ARCH 19308

1980 February 21

National Institute for Occupational Safety & Health
Division of Training and Manpower Development
4676 Columbia Parkway
Cincinnati, Ohio 45226

Attention: Training Registrar

Gentlemen:

In accord with my recent phone conversation, I am enclosing Mr. Evangelista's application for training and a check for tuition applicable to NIOSH Course No. 550. As you will note, Mr. Evangelista is a chemist with Alcoa's affiliate, Alcominas, in Brazil. He is to assume responsibility for their industrial hygiene program and is therefore seeking the training that will enable him to be effective in this area.

Should you have any need for a stateside contact, please feel free to write me at the above address, or phone (412) 553-2231.

Sincerely yours,

Thomas B. Bonney
Technical Manager - Industrial Hygiene

TBB:lmn

Enclosure

Y
E
P
C
U



ARCH 19309

Vendor No	Vendor Name	Aluminum Company of America	Voucher No.
623697 00	NATIONAL INSTITUTE		0214426
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1 02/07/80	0162-0215	720.00 720.00	
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689-04 REV 10-77

Check No. 197147



Aluminum Company of America
Headquarters Office • Pittsburgh, Pennsylvania 15219



Check No. 197147

Date

02/20/80

1-8
210

To The
Order Of:

NATIONAL INSTITUTE FOR
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399 Park Ave., New York, N.Y. 10022

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Authorized Signature

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ARCH 19310

VOUCHER REQUISITION

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PAYABLE TO National Institute for Occupational Safety & Health (NIOSH)
Division of Training and Manpower Development
ADDRESS 4676 Columbia Parkway
Cincinnati, Ohio 45226
Attention: Training Registrar

PURPOSE NIOSH Training Course #550, Industrial Hygiene (DATA PROCESSING)
Measurements, for Mr. Clovis Pinto Evangelista,
Alcominas, Pocos de Caldas.

DATE
VENDOR
NO.
REG.
NO.
CO. &
LOC.
DUE
DATE

ACCOUNTING DISTRIBUTION Charge to Alcominas

E: THIS "REQUISITION" MUST BE APPROVED BY AUTHORIZED PERSONNEL. *9 15 80*

APPROVED E. E. Rumberger SIGNED Thomas B. Bonney
DATE 1980 February 07

**SEND CHECK TO Loretta Neville, 732 Alcoa Building, Pittsburgh Office

DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE
PUBLIC HEALTH SERVICE
CENTER FOR DISEASE CONTROL
NATIONAL INSTITUTE FOR OCCUPATIONAL SAFETY AND HEALTH

APPLICATION FOR TRAINING

FORM APPROVED
OMB NO. 68-R1232

1. NAME AND ADDRESS OF APPLICANT (Please Type or Print):

Dr. ☒ Mr. (Last) (First) (Middle Initial)
Ms. or Miss Evangelista Clóvis Pinto

Home (or office) Address

Cia. Mineira de Alumínio - Alcominas

Caixa Postal, 128

City/State

Poços de Caldas - Minas Gerais

Zip Code
or County

37 700

2. COURSE DESIRED: No. 550 Date Aug. 4-14, 1980

Title Industrial Hygiene Measurements,
NIOSH, Cincinnati

Location

3. PREVIOUS RELATED COURSES (List Most Recent First):

Date	Title	Institution

4. EMPLOYER: ☐ Federal ☐ State ☐ Local Government ☒ Other

Organization

Cia. Mineira de Alumínio - Alcominas

Division/Unit

Laboratory

Local Address

Km 10 rodovia Poços/Andradas

City/State or County

Poços de Caldas - Minas Gerais - Brasil

ZIP Code 37 700

Applicant's Office Phone (035) 721 3577

(Area Code & No.)

5. PROFESSIONAL STATUS:

Occupation

Chemist

Position Title

Chief Chemist

Brief Description of Present (or Expected) Position

Chief Chemist of the process control laboratory
in an Aluminum extraction plant (refining and smelting).
In the near future, will also be responsible for the
emission control program in the smelting-potroom
area.

Length of Time in Position 6 months, & in Profession 4 years

6. EDUCATION ☐ High School

Name of College(s)	No. Yrs. Completed	Date (Yr.) Completed	Degree
Faculdade de Filo- sofia Ciências e Letras de Arara- quara	4	1975	Chemist Bachelor (College Level degree)

Other Training (Including Certification)


(Signature of Applicant)

January 24/80
(Date)

(Name & Title of Approving Supervisor)

(Date)

CDC 0.759B
REVISED

No applicant may be accepted for training unless a completed
application form is received. (42 U.S.C. 243).

- ☐ Tuition enclosed
 - ☐ Tuition will be received by your office at least four weeks prior to the opening date of the course to hold my reservation.
- Make checks payable to sponsoring organization specified by the applica-
tion code and mail to corresponding address.

PRIVACY ACT INFORMATION—The information requested on this form is collected
under the authority of 5 U.S.C. 1302. The requested information is used
only to process and evaluate your application for training, and may be
disclosed (for verification purposes) to your employer, educational
institution, etc., as necessary. Furnishing the information requested on
this form is voluntary.

ARCH 19312

EDISON DANIEL DA SILVA
ALCOMINAS, BRAZIL

T.B.BONNEY
PITTSBURGH OFFICE

1980 January 24
REF-006/80

RECEIVED
FEB 5 1980

REF : NIOSH COURSE "INDUSTRIAL HYGIENE MEASUREMENTS"

8720

The Financial Department informed me that the payment for courses in the U.S. is normally made by Alcoa and then Alcoa charges Alcominas through the routine channels. So I am sending you Clóvis Evangelista's application to be sent to Niosh.

Thank you for your cooperation.


EDISON DANIEL DA SILVA
/nwrc

cc: R.E.Williams
T.I.S.Boak Jr.

ARCH 19313

750 Check

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Louella New...

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Aluminum Company of America
Headquarters Office • Pittsburgh, Pennsylvania 15219

 Check No. 198054

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5231 CENTRE AVENUE
PITTSBURGH PA 15232

Date 02/27/80

1-8 210	
Dollars	Cents
Exactly *****715 Dollars 00 Cents *****715.00	

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399 Park Ave., New York, N.Y. 10022

[Signature]
Authorized Signature

⑈198054⑈ ⑆0210⑈0008⑆ 744 40000347⑈ 79

check mailed 1/27/80 Feb. 29

ARCH 19314

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TO BE ISSUED BY (COMPANY) ALUMINUM COMPANY OF AMERICA

PAYABLE TO INDUSTRIAL HEALTH FOUNDATION

ADDRESS 5231 Centre Avenue

Pittsburgh, Pa. 15232

PURPOSE 11 additional subscriptions to Industrial Hygiene Digest

(DATA PROCESSING)

at \$65.00 each. Invoice No. 03121 dated February 13, 1980.

DATE

VENDOR

NO.

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LOC.

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NOTE: THIS "REQUISITION" MUST BE APPROVED BY AUTHORIZED PERSONNEL.

APPROVED

E. E. Rumberger

SIGNED

Thomas B. Bonney

DATE

DATE

1980 February 15

**SEND CHECK TO Loretta Neville, 732 Alcoa Building, Pittsburgh Office

SP-1101 REV. 3/78

****NOTE: FOR SPECIAL HANDLING ONLY.**

ARCH 19315

INDUSTRIAL HEALTH FOUNDATION, INC.

5231 CENTRE AVENUE

Aluminum Co. of America
Alcoa Building
Pittsburgh, Pa. 15219

PITTSBURGH, PA. 15232

February 13, 1980

INVOICE NO. 03121

Ref. letter dated Jan. 28, 1980

Attn: Mr. Thomas B. Bonney

Terms: Due Upon Receipt

11 Additional subscriptions to Industrial Hygiene Digest at
\$65.00 each

\$715 00

INDUSTRIAL HEALTH FOUNDATION, INC.

5231 Centre Avenue • Pittsburgh, Pa. 15232

PLEASE RETURN ONE

Memorandum

FOR Loretta Neville

DATE 2/13/80

Thank you for Alcoa's updated mailing list for the Industrial Hygiene Digest which shows a total of 31 subscriptions.

Alcoa is entitled to 20 free subscriptions as a part of their membership in IHF. An invoice for the additional 11 subscriptions is enclosed.

Sherry Kaiser

Sherry Kaiser
Administrative Secretary

ARCH 19316

THOMAS B. BONNEY

MEMORANDUM

PITTSBURGH OFFICE

1980 February 11

RE: ALCOA PERMISSIBLE EXPOSURE LIMITS

In the United States there exist at least four lists of numbers relating to concentrations of environmental contaminants that are considered "safe" levels of employee exposures. These are:

Permissible Exposure Limits	OSHA
Threshold Limit Values.	ACGIH
Recommended Concentrations.	NIOSH
Acceptable Concentrations	ANSI

For any given material, it is conceivable that each of the four organizations could provide us with a different number. This can be a source of distraction to the professional industrial hygienist. To those in our plants who are less informed about industrial hygiene it can be completely bewildering. Therefore, if any of us in our correspondence have occasion to cite any two or more limits to plant personnel, we must tell them which limit they must observe. On the other hand, unless it is absolutely essential, we should resist the temptation to quote more than one limit.

Within Alcoa, we will adhere to the OSHA PEL's. There are two exceptions to this:

- (1) When no OSHA limit exists for a contaminant, or
- (2) When we believe the OSHA limit is too high.

In the case of these exceptions, it is essential that all of us recommend the same limits to our plants. Whenever you feel that we should observe a limit other than OSHA's, first consult with Bob James. He will be the person responsible for making exceptions.

Should there be a sufficient number of exceptions, it is prudent for us to generate a list and distribute it to our plants. These exceptions should consist only of those materials that are found in our operations (i.e., there is no need for us to critique the complete list of PEL's). If you have candidates for a list of exceptions, please submit them to Bob James, who will coordinate this activity.

Tom
THOMAS B. BONNEY

TBB:lmn

(See over)

ARCH 19317

THOMAS B. BONNEY

PITTSBURGH, 7AB

C. DIXON, PGH. 6AB
H. G. SAKOIAN, PGH. 7AB
P. H. SCOTT, PGH. 6AB
M. J. VAUDREUIL, PGH. 6AB

1980 January 31

RE: POTENTIAL EXPOSURES DURING POT SHELL REPAIR

Hourly employees of the Point Henry Operations described two potential exposures encountered during pot repair of which I was not previously aware. They stated that they frequently encountered tarry material in the bottom of the pot shell. This causes them concern since welding of the shell is a common occurrence in pot repair operations. If true, this means that during pot use the volatiles are not completely baked out of the cathode.

They also wondered about the composition of corrosive material that also is found in the shell. Their complaint is that it is "irritating, eats steel, and puts holes in their clothing."

Are you aware of the existence of either of these potential problem areas? If not, would you check with your plants to determine if they have encountered these problems? It may even be worthwhile to check with pot repair personnel when you next visit your smelters. Should we confirm either of these situations, we would be well advised to develop a set of recommended precautionary procedures applicable to all of our smelters.

Tom
THOMAS B. BONNEY

TBB:lmn

ARCH 19319



ALCOA

SF-4563

1980 January 28

Mrs. D. F. Pedicone
Membership Secretary
Industrial Health Foundation, Inc.
5231 Centre Avenue
Pittsburgh, Pa. 15232

Dear Mrs. Pedicone:

With reference to your letter of December 7, 1979, enclosed is our new mailing list for 1980. Please bill us for the additional subscriptions.

Very truly yours,

Loretta Neville
Secretary to Thomas B. Bonney

In

Enc.

ARCH 19320



INDUSTRIAL HYGIENE DIGEST SUBSCRIPTIONS - 1980

Thomas B. Bonney
Technical Mgr Industrial Hygiene
Aluminum Company of America
732 Alcoa Building
Pittsburgh, Pa. 15219

7 subscriptions for Mr. Bonney.
6 are to be re-addressed and
sent to foreign locations

R. Andrew
Aluminum Company of America
3000 State Drive
Lebanon, Pa. 17042

D. R. Balya
Aluminum Company of America
Environmental Health Laboratory
Alcoa Technical Center
Alcoa Center, Pa. 15069

T. V. Byerly
Alcoa Conductor Products Company
P. O. Drawer 1438
Marshall, Texas 75670

A. G. Clayton
Aluminum Company of America
P. O. Box 472
Rockdale, Texas 76567

W. D. Coker
Aluminum Company of America
P. O. Box 500
Lafayette, Indiana 47902

L. M. Crivaro
Aluminum Company of America
Caller Box 3840
Lancaster, Pa. 17604

J. D. Gibbs
Aluminum Company of America
P. O. Box 488
Richmond, Indiana 47374

L. L. Grubb
Aluminum Company of America
1600 Harvard Avenue
Cleveland, Ohio 44105

G. D. Hicks
Aluminum Company of America
P. O. Box 150
Massena, New York 13662

ARCH 19321

R. C. Hinkle
Aluminum Company of America
P. O. Box 576
Badin, Stanly County, N. C. 28009

N. Kloap/ J. F. Dey
Aluminum Company of America
P. O. Box 300
Bauxite, Saline County, Ark. 72011

J. V. Muncie
Aluminum Company of America
P. O. Box 458
Corona, Cal. 91720

K. P. Karsten
Aluminum Company of America
Newburgh
Warrick County, Ind. 47630

A. B. Piecka
Aluminum Company of America
P. O. Box 58407
Vernon, Cal. 90058

R. E. Podhora
Aluminum Company of America
Box 646
Point Comfort, Texas 77978

O. E. Wilkinson
Aluminum Company of America
Anderson County Works
P. O. Box 558
Palestine, Texas 75801

W. J. Boutreis
Aluminum Company of America
P. O. Box 2647
Mobile, Alabama 36601

L. L. Haisch
Aluminum Company of America
P. O. Box 120
Vancouver, Washington 98666

S. R. Huey
Rea Magnet Wire Co., Inc.
3600 E. Pontiac Street
Fort Wayne, Indiana 46896

INDUSTRIAL HYGIENE DIGEST SUBSCRIPTIONS - 1980

Page 3

K. W. Williams
Aluminum Company of America
P. O. Box 3567
Davenport, Iowa 52808

J. A. Thompson
Aluminum Company of America
P. O. Box 221
Wenatchee, Washington 98801

J. C. Verghe
Aluminum Company of America
Tennessee Operations
South Plant
P. O. Box 9128
Alcoa, Tennessee 37701

R. A. Williams
Wear-Ever Aluminum, Inc.
P. O. Box 459
Chillicothe, Ohio 45601

J. Damiano
Aluminum Company of America
Alcoa Technical Center
Alcoa Center, Pa. 15069

cf.

1980 January 21

Superintendent of Documents
U. S. Government Printing Office
Washington, D. C. 20402

Gentlemen:

Enclosed is our check No. 193374 dated January 18, 1980
for \$4.00. Please send me one copy of the following:



Criteria Document for a Recommended Standard for
Occupational Exposure to Polychlorinated Biphenyls

Stock No. 017-033-00265-7



Send to:

Thomas B. Bonney, Room 732
Aluminum Company of America
1501 Alcoa Building
Pittsburgh, Pa. 15219



Thanks.



Very truly yours,

Thomas B. Bonney

TBB:lmn

Enclosure

ARCH 19324



Vendor No	Vendor Name	Aluminum Company of America		Voucher No
916670 00	SUPERINTENDENT OF			0142126
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Authorized Signature

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ARCH 19325

THOMAS B. BONNEY
ALUMINUM COMPANY OF AMERICA
PITTSBURGH OFFICE

MR. EDISON DANIEL DA SILVA
COMPANHIA MINEIRA DE ALUMINIO
POCOS DE CALDAS, BRAZIL

1980 January 17

cc: Mr. R. E. Williams, Alcominas, Pocos de Caldas
Mr. T. I. S. Boak, Jr., Pittsburgh 14AB

RE: NIOSH COURSE, "INDUSTRIAL HYGIENE MEASUREMENTS"

As mentioned in my telex, I am enclosing an application for the captioned. Also enclosed is some general information about the course. Application and tuition should be submitted to the address shown on the descriptive literature:

National Institute for Occupational Safety and Health
Division of Training and Manpower Development
4676 Columbia Parkway
Cincinnati, Ohio 45226, U.S.A.

Phone (513) 771-2490

When Mr. Evangelista submits his application, I would suggest that he attach to it a note containing my name, business address, and phone number (412) 553-2231, so that NIOSH will have a stateside contact should they have any need for it.

THOMAS B. BONNEY

TBB:lmn

Enclosure

ARCH 19326



NIOSH Training Course
Industrial Hygiene Measurements (550)

August 4-14, 1981

This course provides the trainee with an understanding of the routine sampling and measurement techniques associated with chemical agents and physical agents such as noise, light, lasers, etc. Approximately 50 percent of the course consists of lectures which acquaint the trainee with various instruments and the standards which govern their use. The remainder of the time is spent in laboratory sessions in the calibration and use of these sampling measurement instruments.

Prerequisites:

None

Objectives:

The trainee will be able to:

- Select the appropriate instrument and evaluate the degree of hazard present from any of the agents discussed.
- Use the instruments and apply the procedures in a manner that will produce a valid sample.

Course Topics Include:

The TLV Concept
Principles of the Evaluation of the Environment
Instrument Calibration
Electromagnetic Spectrum — Microwave, Laser,
Ultra-Violet, Ionizing Radiation, Illumination
Air Sampling Techniques
Chemical Detector Tubes
Direct Reading Instruments
Particulate Sampling
Ventilation Measurements
Temperature and Humidity Measurements
Noise Measurements
Safety Topics

Who Should Attend:

Those who have direct responsibility for air sampling, ventilation and routine measurement of physical agents such as noise, vibration, light, microwaves, lasers, heat, etc., but have had little or no experience in the calibration and use of the instruments.

Course Duration:

Nine (9) Days

Tuition and Fees:

~~\$600.00~~ *\$720.00*

ARCH 19327

FOR INFORMATION CONTACT: *National Institute for Occupational Safety and Health*
Division of Training and Manpower Development
4676 Columbia Parkway
Cincinnati, Ohio 45226
Phone (513) 771-2490

DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE
PUBLIC HEALTH SERVICE
CENTER FOR DISEASE CONTROL
NATIONAL INSTITUTE FOR OCCUPATIONAL SAFETY AND HEALTH

APPLICATION FOR TRAINING

FORM APPROVED
OMB NO. 68-R1232

1. NAME AND ADDRESS OF APPLICANT (Please Type or Print):

Dr Mr Mrs (Last) (First) (Middle Initial)
Ms or Miss

Home (or office) Address

City/State

Zip Code
or County

2. COURSE DESIRED: No. 550 Date Aug. 4-14, 1980

Title
Industrial Hygiene Measurements,
NIOSH, Cincinnati

Location

3. PREVIOUS RELATED COURSES (List Most Recent First):

Date	Title	Institution

4. EMPLOYER: ☐ Federal ☐ State ☐ Local Government ☐ Other

Organization

Division/Unit

Local Address

City/State or County

ZIP Code Applicant's Office Phone

(Area Code & No.)

5. PROFESSIONAL STATUS:

Occupation

Position Title

Brief Description of Present (or Expected) Position

Length of Time in Position , & in Profession

6. EDUCATION ☐ High School

Name of College(s)	No. Yrs. Completed	Date (Yr.) Completed	Degree

Other Training (Including Certification)

(Signature of Applicant)

(Date)

(Name & Title of Approving Supervisor)

(Date)

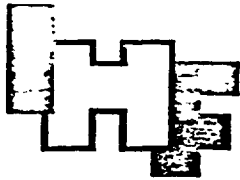
CDC 0.759B
REVISED

No applicant may be accepted for training unless a completed application form is received. (42 U.S.C. 243).

- ☐ Tuition enclosed
☐ Tuition will be received by your office at least four weeks prior to the opening date of the course to hold my reservation.
Make checks payable to sponsoring organization specified by the application code and mail to corresponding address.

PRIVACY ACT INFORMATION—The information requested on this form is collected under the authority of 5 U.S.C. 1302. The requested information is used only to process and evaluate your application for training, and may be disclosed (for verification purposes) to your employer, educational institution, etc., as necessary. Furnishing the information requested on this form is voluntary.

ARCH 19328



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Pittsburgh, Pennsylvania 15232

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PA 6% Sales Tax	<u>1.31</u>
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Thomas B. Bonney, Technical Manager - Industrial Hygiene
Name Title

ALUMINUM COMPANY OF AMERICA

Company
1501 Alcoa Building

Address
Pittsburgh, Pa. 15219

Zip Code

ARCH 19329

LW
the
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mailed out
1980 Feb. 25

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Headquarters Office • Pittsburgh, Pennsylvania 15219

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PA

Date

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ARCH 19330

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APPROVED

SIGNED

E. E. Rumberger

T. B. Bonney

DATE

DATE

1980 January 09

**SEND CHECK TO Loretta Neville, 732 Alcoa Building, Pittsburgh Office

**NOTE: FOR SPECIAL HANDLING ONLY.



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\$3.00 — Others

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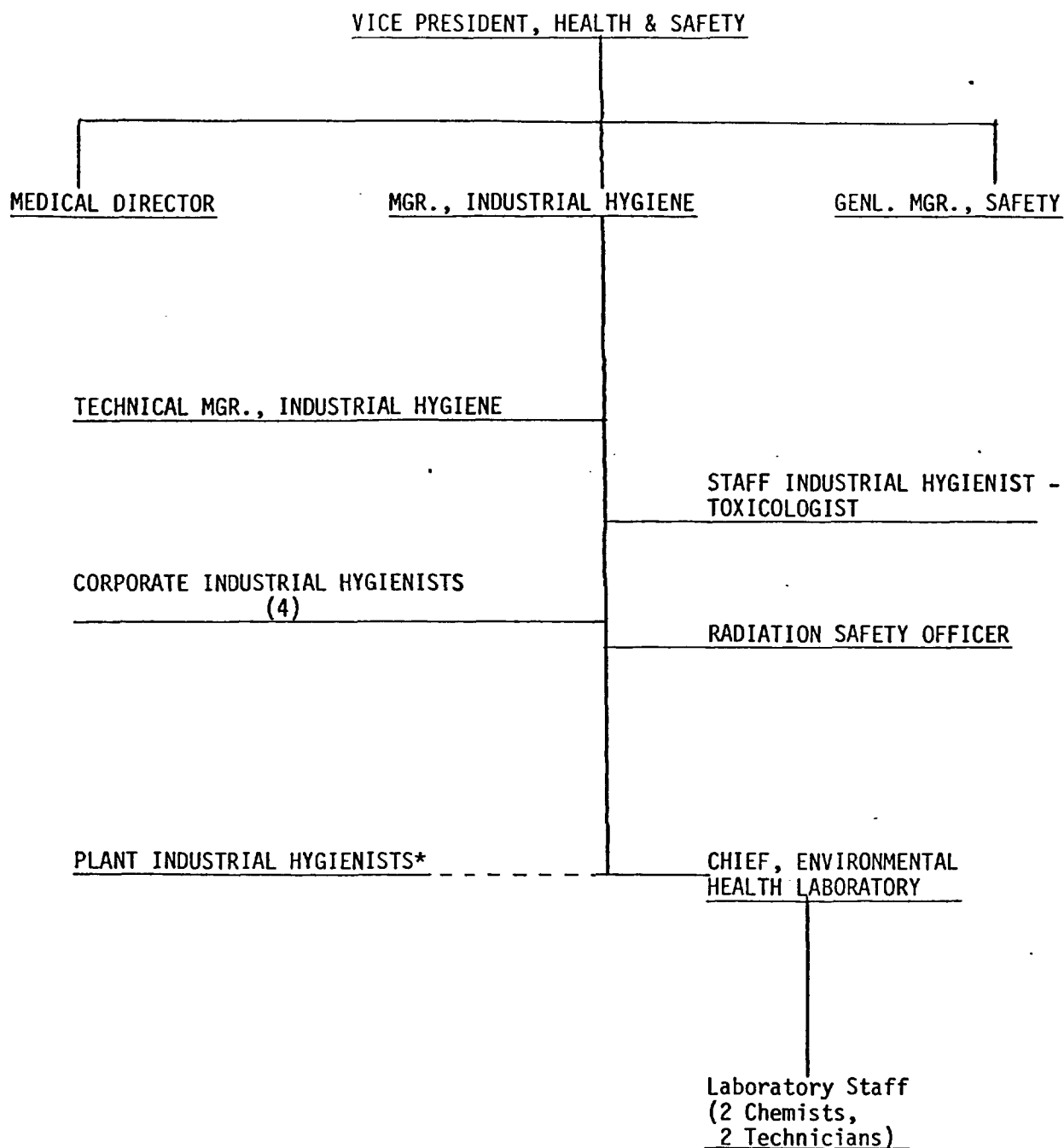
Company

Address

Zip Code

ARCH 19332

JAN 7 1980



*As of January 1980, 4 full-time hygienists.
In other plants industrial hygiene is a part-time activity, normally carried out by plant laboratory personnel.

ARCH 19333