

# **IONIZZAZIONE AMBIENTALE E RICERCA MEDICA**

Bibliografia dal 1955 al 1983

*adattamento di Andrea Di Chiara, Odontoiatra  
Ortopedia Cranio-Cervico-Mandibolare e  
Terapia Ortopedica Dentale delle Disfunzioni Posturali*

*Presidente di AIPRO – Associazione Italiana per la Prevenzione della Respirazione Orale*

## **1983**

- ELECTROCULTURE OF TOMATO PLANTS IN A COMMERCIAL HYDROPONICS GREENHOUSE

F.M. Yamaguchi and A.P. Krueger  
J. Biolog. Physics, 11: pp. 5-10 (1983).

- LONG-TERM BIOLOGICAL EFFECTS OF AIR IONS AND DC ELECTRIC FIELDS ON NAMRU MICE

E.W. Kellogg III, M.G. Reed and A.P. Krueger  
Int. J. Biometeor., (1983).

## **1982**

- AIR IONS AS BIOLOGICAL AGENTS - FACTS OR FANCY? PART I

A.P. Krueger  
Immunology and Allergy Practice. Vol. IV (4): July/August: 63 (1982).

- AIR IONS AS BIOLOGICAL AGENTS - FACTS OR FANCY? PART II

A.P. Krueger  
Immunology and Allergy Practice. Vol. V (5): Sept./Oct.: 46 (1982).

## **1981**

- THE SEROTONIN STORY 1981

F.G. Sulman

- EFFECTS OF AIR IONS ON THE NEONATAL GROWTH OF LABORATORY RATS

S.M. Hinsull, D. Bellamy and E.L. Head  
Int. J. Biometeor., 1981, Vol.25.

- THE BIOLOGIC EFFECTS OF ENVIRONMENTAL ELECTROMAGNETISM

H.L. Konig and A.P. Krueger  
Topics in Environmental Physiology in Medicine. (Ed.) K.E. Schaefer. Springer-Verlag, Inc.  
New York-Berlin-Heidelberg (1981).

- PREVENTION OF POST-OPERATIVE THROMBOEMBOLISM BY NEGATIVE AIR IONIZATION IN A DOUBLE-BLIND STUDY

E. Merimsky, Y.I. Litmanovitch and F.G. Sulman  
9th International Congress Biometeorology, Osnabrueck CHP-18. Abstracts p. 82, 1981.

## **1980**

- PHYSIKALISCHE MEDIZIN UND REHABILITATION

F.G. Sulman  
PHYSIKALISCHE MEDIZIN UND REHABILITATION  
21. Jahrgang Heft. 4 April 1980  
Seite: 220-225

- UKEINE ANGST MEHR VOR DEM FÖHN

F.G. Sulman  
UMSCHAU 80 (1980) Heft 10. Pp. 291-295.

- PREVENTION OF POST-OPERATIVE THROMBOEMBOLISME BY NEGATIVE AIR IONIZATION IN A DOUBLE-BLIND STUDY

E. Merimsky, M.D., Y.I. Limanovitch, M.D. and F.G. Sulman, M.D., D.V.M.  
Preliminary communication sent to editor of Angiology  
14 pp. 3 tables, 1 Fig. July 1980.

- EFFECTS OF NEGATIVELY IONIZED AIR AND CIRCADIAN RYTH ON MAZE PERFORMANCE IN RATS

Michael M. Bernet  
Master of Arts in the Department of Psychology, Southern Connecticut State College, New Haven. May  
1980.

- THE EFFECT OF NEGATIVE AIR IONS ON VARIOUS PHYSIOLOGICAL FUNCTIONS DURING WORK IN A HOT ENVIRONMENT

O.Inbar, A. Rotstein, R. Dlin, F.G. Sulman  
Ergonomics, February 1980.

- ENVIRONMENTAL INFLUENCES ON SEROTONIN AND CYCLIC NUCLEOTIDES IN RAT CEREBRAL CORTEX

M.C. Diamond, J.R. Connor, E. Orenberg Jnr., M. Bissell, M. Yost and A.P. Krueger  
Science, Vol.210, Nov. 7: pp. 652-654 (1980).

- SUPEROXIDE INVOLVEMENT IN NEGATIVE AIR ION EFFECTS.

E.W. Kellogg III, M.G. Yost and A.P. Krueger  
Nature, Vol. 288, December 18, pp. 739-740 (1980).

- THE EFFECT OF AIR IONIZATION

F.G. Sulman  
Electric Fields, Atmospherics and other Electric Phenomena on Man and Animal.  
Monograph. Charles C. Tho

## **1979**

- SUPEROXIDE INVOLVEMENT IN THE BACTERIAL EFFECTS OF NEGATIVE AIR IONS ON STAPHYLOCOCCUS ALBUS

E.W. Kellogg III, M.G. Yost, N. Barthakur and A.P. Krueger  
Nature, Vol.281, No. 5730, pp. 400-401, October 4 1979  
Macmillan Journals Ltd, 1979.

- UPDATING THE ION CONTROVERSY

Charles Wallach  
Published by the International Bio-Environmental Foundation, Box 994, MD. 20910  
1979, pp. 1-90.

- AIR IONIZATION AND ITS EFFECTS ON WELL BEING AND STRESS AND ITS BIOLOGICAL EFFECTS. (THE THIRD WAVE.)

George W.K. King, P.E.  
The International Academy of Preventive Medicine, Fairmont Hotel, Dallas, Texas.  
March 10 1979.

- STUDIES ON THE EFFECTS OF IONIZATION ON BACTERIAL AEROSOLS IN A BURNS AND PLASTIC SURGERY UNIT

Paavo Makela, Juhani Ojajarvi, Gunnar Graeffe and Matti Lehtimaki  
0022-1724/79/0097-1978 s01. 00 1979 Cambridge University Press.

- IONIZATION OF THE AIR AND ELECTRICAL FIELD EFFECTS IN BIOLOGY

G.W.K. King, P.E.

7th Edition. Copyright 1979

G.W.K. King

American Institute of Medical Climatology (non profit).

- INFLUENCE OF SMALL ATMOSPHERIC IONS ON PATIENTS WITH BRONCHIAL ASTHMA

Bent Weeke and Ole Albrechtsen

1979, Munksgaard, Copenhagen.

- AIR IONS AND HEALTH

A.P. Krueger and D.S. Sobel

Chapter in Ways of Health (Holistic Approaches to Ancient and Contemporary Medicine)

(Ed.) David S. Sobel, Harcourt Brace Jovanovich Inc., 757 3rd Avenue, New York (1979).

- SUPEROXIDE INVOLVEMENT IN THE BACTERICIDAL EFFECTS OF NEGATIVE AIR IONS ON STAPHYLOCOCCUS ALBUS

E.W. Kellogg III, M.G. Yost, N. Barthakur and A.P. Krueger

Nature, Vol. 381, Oct. 4, pp. 400-401 (1979).

## **1978**

- ACTION OF UNIPOLAR IONIZED AIR IN RAT DURING EXPERIMENTAL MUSCULAR EXERCISE

P. Derevenco, M. Deleanu, E. Carpen, V. Papilian, G. Marin

Hygiene and Public Health Institute, Cluj-Napoca, Romania 1977, pp. 1-3.

MEDICINA TERMALE E CLIMATOLOGIA

N.34 – Aprile Giugno 1977.

- ELEKTROIONISCHES MIKROKLIMA

Dozent Ing. Miloslav Jokl Dr. Sc., Institut für Hygiene und Epideiologie, Prag.

Temperatur Technik Januar/Februar 1978. Pp. 21-23.

- ELECTRIC FIELDS, SMALL AIR IONS AND BIOLOGICAL EFFECTS

A.P. Krueger, A.E. Strube, M.G. Yost, and E.J. Reed

Int. J. Biometeor., 1978, Vol.22, number, pp. 202-212.

- CRITICAL REVIEWS IN MICROBIOLOGY

Allen I. Laskin, Ph.D.

Exxon Research and Engineering Co Linden, N.J.

Hubert Le Chevalier, Ph.D.

Institute of Microbiology Rutgers University  
New Brunswick, N.J.

- ABSENCE OF HARMFUL EFFECTS OF PROTRACTED NEGATIVE AIR IONISATION

F.G. Sulman, D. Levy, L. Lunken, Y. Pfeifer and E. Tal  
Int. J. Biometeor., 1978, Vol. 22, number 1, pp. 53-58.

- WEATHER AND MORALITY

William Hodge National Climatic Centre  
EDIS September 1978.

- AEROIONTHERAPIE

F.G. Sulman, M.D. DMD.  
Reprint from Wholistic Dimensions in Healing  
A Resource Guide  
Editor: Leslie J Kaslof  
A Dolphin Book, Doubleday & Co. Inc., Garden City, N.Y. pp. 139-142, 1978.

- AIR IONS AND HUMAN PERFORMANCE

L.H. Hawkins and T. Barker  
Ergonomics, 1978, Vol. 21, No. 4, pp. 273-278.

- MOGLICHKEITEN DER KLIMAVERBSSERUNG IN HOCHHAUSERN UND EISENBETONBAUTEN

Roland Hubner  
Der Architekt (23. JG.) Heft 10/1974.

- EFFECTS OF AIR IONS ON MICROORGANISMS AND OTHER BIOLOGICAL MATERIALS

S. Kotaka  
November 1978, pp. 109-149.

- ELECTRIC FIELDS, SMALL AIR IONS AND BIOLOGICAL EFFECTS

A.P. Krueger, A.E. Strubbe, M.G. Yost and E.J. Reed  
Int. J. Biometeor., 22: pp. 202-212 (1978).

- IONS IN THE AIR

A.P. Krueger and S. Sigel  
Human Nature, July, pp. 46-52 (1978).

- BIOCLIMATOLOGY AND IONOTHERAPY. IN: ELECTRO-VIBRATORY BODY

F.G. Sulman

Ed. V.R. Beasley. University of Trees Press, Boulder Creek, California. 117-146, 1978.

### **1977**

- NEUE METHODEN ZUR BEHANDLUNG DER WETTERFUHLIGKEIT

Von F.G. Sulman, D. Levy, L. Lunkan, Y. Pfeifer und E. Tal

Sonderdruck aus FORTSCHRITTE DER MEDIZIN 95, Jg, Nr. 11, Vom. 17.3 19  
S. 746-752.

- DIESES KATCHEN SOLL NUDE AUTOFAHRER MUNTER MACHEN

ADAC – Motorwell. 3 / 77, pp. 57-58.

- THE ION EFFECT WITH LOTS OF NEGATIVE CHARGES IN THE AIR YOU'LL FEEL POSITIVE

Fred Soyka with Alan Edmonds

The Canadian Advance Copy February 26, 1977, pp. 4-9.

- HUMAN WEATHER SENSITIVITY AND ATMOSPHERIC ELECTRICITY

F.G. Sulman, Y. Pfeifer, D. Levy, E. Superstine

Bet Dagan October 1977.

- ANNUAL FLUCTUATIONS OF EXPERIMENTAL ULCER FREQUENCIES

M. Deleanu

J. Interdiscipl. Cycles Res. 1977, Vol. 8. Number 3-4, pp. 304-306.

- EFFECTS OF DRY AND HUMID CLIMATES ON EXERCISE-INDUCED ASTHMA IN CHILDREN AND PREADOLESCENTS

Oded Bar-Or, M.D., Ittai Neuman, M.D. and Raphael Dotan, M.Sc.

- HEAT AND WATER LOSS FROM THE AIRWAYS AND EXERCISE-INDUCED ASTHMA

W.Y. Chen and D.J. Horton

Respiration 34, 305-313 (1977).

- PSYCHOLOGICAL TEST PERFORMANCE OF DIFFERENT PERSONALITY TYPES ON SHAROV DAYS IN ARTIFICIAL AIR IONIZATION

Y. Rim

Int. J. Biometeor., 1977, Vol. 21, No. 4, pp. 337-340.

- ACTION OF UNIPOLAR IONIZED AIR IN RAT DURING EXPERIMENTAL MUSCULAR EXERCISE

P. Derevenco, M. Deleanu, E. Carpen, V.V. Papilian, G. Marin  
Hygiene and Public Health Institute, Cluj-Napoca, Romania

- HUMAN REACTIONS TO CLIMATIC FLUCTUATIONS

F.G. Sulman, D. Levy, L. Lunkan, Y. Pfeifer and E. Tal  
Int. Conf. On Meteorology of Semi-Arid Zones. Gvt. Meteorological Service, Tel Aviv, pp. 54-56 1977.

## **1976**

- EFFECT OF LONG-TERM IONIZED AIR TREATMENT ON PATIENTS WITH BRONCHIAL ASTHMA

D.P. Jones, S.A. O'Connor, J.V. Collins and B.W. Watson  
Departments of Medicine and Medical Electronics, St. Bartholomew's Hospital, London EC1A 7 BE.  
Thorax 1976, 31, pp. 428-432.

- SENSITIVITY TO HOT-DRY SIROCCO WINDS AND ITS TREATMENT BY AIR IONIZATION

F.G. Sulman, D. Levy, Y. Pfeifer, E. Supertine, E. Tal  
Estratto dal Vol. 29, Fasc. 1, pp. 1-15 Gennaio-Febraio 1976.

- MORBIDITATEA GENERALA SI INCIDENTA AFICTIUNILOR RENALE DERMATOLOGICE SI A TUMIROLOR LA PO[ULATIA DINTR-UN CENTRU CU INDUSTRIE DE METALURGIE NEFEROASA

M. Deleanu, I. Lenghel, M. Moldovan  
Institut de Igienea si Sanatata Publica, Cluj-Napoca Igienea Vol. xxv, Nr. 2 annual 1976, pp. 119-122.

- AIR IONS AND THEIR RELATION TO HUMAN COMFORT

C.Y. Shaw and G.T. Tamurea  
National Research Council of Canada, Division of Building Research, Ottawa, March 1976, pp. 1-16.

- METEOROLOGY AND BEHAVIOUR: THE EFFECTS OF POSITIVE AIR IONS ON HUMAN PERFORMANCE, PHYSIOLOGY, AND MOOD

Jonathan M. Charry, M.D.  
Dissertation Abstracts International. Vol. xxxvii, No. 9, 1977, 2 pp.

- THE LOUISIANA STUDY OF LEARNING POTENTIAL BY BRAIN WAVE ANALYSIS  
  
May 3, 1976, by Neural Evaluation Inc., 437 West 67th Street, Shreveport, Louisiana, 71106, pp. 1-29.
- EFFECT OF AIR IONIZATION ON BLOOD SEROTONIN IN VITRO  
  
E. Tal, Y. Pfeifer and F. G. Sulman  
*Separatum Experientia* 32, 326 (1976).
- BIOLOGICAL IMPACT OF SMALL IONS  
  
A.P. Krueger and Eddie Reed  
*Science*, September 1976, Vol. 193, p. 1213.
- BIOLOGICAL EFFECTS OF IONIZATION OF THE AIR ON ANIMALS  
  
A.P. Krueger  
*Progress on Biometeorology: The Effect of Weather and Climate on Animals*. Chapter 5, Section 1, Swets & Zeitlinger, B.V., Amsterdam, pp. 155-162 (1976).
- BIOLOGICAL IMPACT OF SMALL AIR IONS  
  
A.P. Krueger and E.J. Reed  
*Science*, 193: pp. 1209-1213 (1976).
- WETTERFUEHLIGKEFT UND IHRE BEZIEHUNG ZU SFERICS, IONEN UND ELECTROFELDERN  
  
F.G. SulMAN, d. Levy and L. Lunkan  
*Zschr. F. Physik. Medizen* 5: pp. 229-238 (1976).

## **1975**

- ARE NEGATIVE IONS GOOD FOR YOU?  
  
Dr Albert Krueger  
*New Scientist*, 14 June 1975, pp. 663-665.
- AIR ION ACTION ON BACTERIA  
  
A.P. Krueger, E.J. Reed, K.B. Brook and M.B. Day  
*Int. J. Biometeor.*, 1975, Vol.19, No. 1, pp. 65-71.
- EFFECTS OF THE SHAROV AND BORA ON URINARY NEUROHORMONE EXCRETION IN 500 WEATHER-SENSITIVE FEMALES  
  
F.G. Sulman, D. Levy, Y. Pfeifer, E. Superstine and E. Tal  
*Int. J. Biometeor.*, 1975, Vol.19, No. 3, pp. 202-209.

- PSYCHOLOGICAL TEST PERFORMANCE DURING CLIMATIC HEAT STRESS FROM DESERT WINDS

Y. Rim

Int. J. Biometeor., 1975, Vol.19, No. 1, pp. 37-40.

- SEROTONIN AS A MEDIATOR OF PSYCHOSOMATIC DISTURBANCES IN FERTILITY AND STERILITY AND ITS ELIMINATION BY IONIZING TREATMENT

F.G. Sulman, Y. Pfeifer, D. Weinstein, E. Sadovsky and W.Z. Po

The Family. 4th Congress of Psychosomatic Obstetrics and Gynaecology, Tel Aviv 1974, pp. 273-277.

- ARE AIR IONS BIOLOGICALLY ACTIVE?

Albert Paul Krueger, M.D. LL.D.

Electrostatics Society of America, June 24-26 1975.

University of Michigan, Ann Arbor, Michigan, U.S.A.

- UNIPOLARITÄTSQUOTIENT – EIN NEURER KLIMAFAKTOR?

CCI Technik

CCI 9 (1975) Nr. 9, S. 21/22.

- ELECTRONIC AIDS IN AGRICULTURE: INCREASE IN EGG FERTILITY IN TURKEY COOPS BY MEANS OF AIR IONIZATION

Isaac Hazony, Moshe Efrony, Moshe Deutsch

August 1975, pp. 1-12.

- EINSATZ VON LUFTIONISATIONSGERÄTEN: JA ODER NEIN?

Klima-Kate-Technik 9/75, pp. 186, 187, 210.

- ELECTRONISCHE BEHELFE IN DER LANDWIRTSCHAFT: STEIGERUNG DER EIFRUCHTBARKEIT IN TRUTHENNENSTALLEN DURCH LUFTIONISIERUNG

Isaac Hazony, Moshe Efrony, Moshe Deutsch

August 1975, pp. 1-13.

- A NEW AIR-CONDITIONING FACTOR?

CCI No. 9 (1975), pp. 21-22. (Germany 75-07.)

- PHYSICAL, PHYSIOLOGICAL AND THERAPEUTIC EFFECTS OF IONIZED AIR AND ELECTROAEROSOLS

AIR POLLUTION AND IONIZATION IN THE MICRO-CLIMATE OF AIR-CONDITIONED PREMISES

C.Capel-Butte

- EFFECT OF NEGATIVE AIR ION EXPOSURE ON ADAPTION TO PHYSICAL EFFORT IN YOUNG SPORTSMEN

M. Deleanu and M. Mozes-Lorincz

- EFFECTS ON SMALL IONS ON NET BLOTCH DISEASE OF BARLEY

T.M. Elkiej, R.L. Pelletier, Barthendu and N. Barthakur

- EFFECT OF NEGATIVE ELECTROAEROSOLS ON THE MICROBIAL COUNT ON THE NASOPHARYNGEAL MUCOSA

A. Jents, H. Lenzner and E. Siirde

- THE INFLUENCE OF ELECTROAEROSOL INHALATION ON THE DISEASES OF THE RESPIRATORY TRACT AND THE LUNGS

A. Karen NEW ELECTROAEROSOL GENERATORS USED IN MEDICINE

- J. Reinet and L. Visnapuu
- RESEARCH ON A POSSIBLE ACTION OF NEGATIVE OVERIONIZATION ON HEALTHY HUMANS

J.R. Rivolier, Y. Harrison and P. Zouloumian

- EFFECT OF HEATED AND COOL ELECTROAEROSOLS ON THE NASAL MUCOSA IN PATIENTS WITH ALLERGIC RHINOPATHY

S. Sibul

- EFFECT OF ELECTROAEROSOLS ON THE ISOLATED HEART OF THE FROG

E. Siirde and J. Reinet

- FAVORABLE RESULTS OF THE AERO-IONOTHERAPY IN BRONCHIAL AFFLICTIONS OF CHILDREN

M. Deleanu and G. Popescou

- DIFFERENCES OF AIR IONIZATION IN CLOSED SPACES AS A FUNCTION OF VARIOUS BUILDING MATERIALS DUE TO RADIOACTIVE EMISSIONS CYCLIC CHANGES OF THE ATMOSPHERIC AND INDOOR AIR IONIZATION

T. Tyszk

- PROCEEDINGS OF THE SEVENTH INTERNATIONAL BIOMETEOROLOGICAL CONGRESS HELD AT COLLEGE PARK, MARYLAND, U.S.A. 17-23 AUGUST 1975

BIOMETEOROLOGY – VOLUME 6, Part 1

- ARE AIR IONS BIOLOGICALLY ACTIVE?

A.P. Krueger

Presented by invitation at the Conference on Electrostatics, June 24-26. Electrostatics Society of America, at the University of Michigan, Ann Arbor, Michigan (1975).

- AIR ION ACTION OF BACTERIA

A.P. Krueger, E.F. Reed, K.B. Brook and M. B. Day

Int. J. Biometeor., 19: pp. 65-71 (1975).

- THE CASE FOR AIR IONS AS A PSYCHOSOMATIC FACTOR

A.P. Krueger

Presented by invitation at the 2nd World Congress of Psychotronics, June 30 – July 4, Monaco (1975).

- PROBLÈMES D'IONISATION ET D'AERO-IONISATION

A.P. Krueger (Ed.) G.R. Rager. Maloine S.A. Editeur, 27 rue de l'école de Médecine 75006 Paris Effects Biologiques des Ions Gazeux, 73-104 (1975).

- A STUDY OF THE BIOLOGICAL EFFECTS OF CERTAIN ELF ELECTROMAGNETIC FIELDS.

A.P. Krueger and E.J. Reed

Int. J. Biometeor., 19: pp. 194-201 (1975).

## **1974**

- SEROTONIN AS A MEDIATOR OF PSYCHOSOMATIC DISTURBANCES IN FERTILITY AND STERILITY AND ITS ELIMINATION BY IONIZING TREATMENT

F.G. Sulman, Y. Pfeifer, D. Weinstein, E. Sadovsky and W.Z. Polishuk

The Family. 4th Int. Cong. Of Psychosomatic Obstetrics and Gynaecology, Tel Aviv 1974. Pp. 273-277. (Karger, Basel 1975.)

- AIR-IONOMETRY OF HOT, DRY DESERT WINDS (SHARAV) AND TREATMENT WITH AIR IONS OF WEATHER-SENSITIVE SUBJECTS

F.G. Sulman, D. Levy, A. Levy, Y. Pfeiffer, E. Superstine and E. Tal

Int. J. Biometeor., 1974, Vol. 18, No. 4, pp. 313-318.

- IONISIERUNGS-APPARATE – FUER ODER WIDER?

F. G. Sulman

DM. Frage des Monats Maerz, 1974, pp.1-10.

- NEGATIVE IONS: IN THE AIR?

Barry Blain  
Technical Memorandum 22/74, November 1974.

- THE INFLUENCE OF AIR IONS ON A MODEL OF RESPIRATORY DISEASE

Albert Paul Krueger and Eddie James Reed  
Paris, France, July 1-5 1974, pp. 1-12.

- BIOKLIMATOLOGIE TROCKEN-HEIBER WINDE

F.G. Sulman  
Meteorologische Fortbildung 4. Jahrgang, Heft 2, 1974.

- PARTICULATE AIR POLLUTION TRENDS DEDUCED FROM ATMOSPHERIC ELECTRICAL CONDUCTIVITY MEASUREMENTS AT BET-DAGAN

Alexander Manes  
Fifth International Congress on Atmospheric Electricity, Garmisch-Partenkirchen, September 2-7, 1974, pp. 1-15.

- AIR STERILISATION: INFLUENCE OF NEGATIVE IONIZATION ON BACTERIAL COUNTS ON AGAR PLATES EXPOSED TO AIR

F.G. Sulman, Y. Pfeifer, B. Shalita and E. Tal

IRCS (Research on Biomedical Technology; Biophysics, Membrane and Cell Biology; Microbiology, Parasitology and Infectious Diseases 2, 1452 (1974).

- FURTHER OBSERVATIONS ON THE EFFECT OF AIR IONS ON INFLUENZA IN THE MOUSE

A.P. Krueger, E.J. Reed, M.B. Day and K.A. Brook  
Int. J. Biometeor., 1974, Vol.18, No.1, pp. 46-56.

- SENSIBILITA DELL UOMO ALLE VARIAZIONI DEI FRONTI METEOROLOGICAL

F.G. Sulman  
Universita Ebraica-Gerusalemme (Israel). Reparto di Farmacologia Applicata-Divis, Bioclimatologica. Gazz. San Vol. 45, 1974, pp.10-1

- HEMICRANIA JOURNAL OF THE MIGRAINE TRUST

Macdonald Critchley, C.B.E., F.R.C.P., F.A.C.P.  
Vol. 6, No.1, 1974, pp. 1-17.

- EFFECT OF LONG-TERM IONIZED AIR TREATMENT ON PATIENTS WITH BRONCHIAL ASTHMA

D.P. Jones, S.A. O'Connor, J.V. Collins and B.W. Watson  
Thorax 1976, 31. pp. 428-432.

- INFLUENCE OF ARTIFICIAL AIR IONIZATION ON A HUMAN ELECTROENCEPHALOGRAPH

M. Assael, Y. Pfeifer, and F.G. Sulman  
Int. J. Biometeor., 1974, Vol. 18, No. 4, pp. 306-312.

- ATTRIBUTE DES HEIBEN WINDES

F.G. Sulman  
Euro Med, Heft 4, 14 Jahr. 19. February 1974.

- METEOROLOGICAL FRONT MOVEMENTS AND HUMAN WEATHER SENSITIVITY  
BIOLOGICAL EFFECTS OF IONIZATION OF THE AIR

A.P. Krueger  
Swets & Zeitlinger B.V., Amsterdam 1974, pp. 335-344 and 663-667.

- MOGLICHKEITEN DER KLIMAVERBESSERUNG IN HOCHHAUSERN UND EISENBETONBAUTEN

Roland Hubner  
Der Architekt (23, JG.) Heft 10/1974.

- INFLUENCE OF ARTIFICIAL IONIZATION OF AIR ON THE ELECTROENCEPHAL

F.G. Sulman, M. Assael, S. Alpern and Y. Pfeiffer  
Reprinted from Israel Journal of Medical Sciences, Vol.10, No. 5, May 1974. Printed in Israel.

- FURTHER OBSERVATIONS ON THE EFFECT OF AIR IONS ON INFLUENZA IN THE MOUSE

A.P. Krueger, E.J. Reed, M.D. Day and K.A. Brook  
Int. J. Biometeor., 18: pp. 46-56 (1974).

- THE INFLUENCE OF AIR IONS ON A MODEL OF RESPIRATORY DISEASE.

A.P. Krueger and E.J. Reed  
Presented at the 1st World Congress of Medicine and Biology of the Environment, July 1-5, Paris, France 1974.

- BIOLOGICAL EFFECTS OF IONIZATION OF THE AIR

A.P. Krueger  
In Progress in Biometeorology. (Ed.) S.W. Tromp. Swets & Zeitlinger, B.V., Amsterdam (1974).

## 1973

- ARE NEGATIVE IONS GOOD FOR YOU

Dr Albert Krueger  
New Scientist, 14 June pp. 668-670 (1973).

- AEROIONII SI NUCLEII DE CONDENSARE – INDICATORI NESPECIFI DE POLUARE A ATMOSFERI CENTRELOR INDUSTRIALE

M. Deleanu si N. Radulescu  
Igniena Vol. XXII, No. 10 anul 1973, pp. 609-613.

- EFFECT OF NEGATIVE AIR IONS UPON EMOTIONALITY AND BRAIN SEROTONIN LEVELS IN ISOLATED RATS

G.O. Gilbert  
Int. J. Biometeor., 1973, Vol. 17, No.3, pp. 267-275.

- PHYSIOLOGISCHE WIRKUNG VON LUFTIONEN UND DEREN BEDEUTUNG ALS UMWELTF

Von Dipl-Ing Andra Varga, Heidelberg  
Naturw. RDSCH. 26 Jahrgang Heft 5 1973, pp. 204-208.

- VARIATIONS IN MIGRAINE ATTACKS WITH CHANGES IN WEATHER CONDITIONS

J.D. Gomersall and Alice Stuart  
Int. J. Biometeor., 1973, Vol. 17, No. 3, pp. 285-299.

- INSTITUTE FOR ATMOSPHERIC ENVIRONMENTAL RESEARCH

Dr W. Ludwig  
Cleg 8.12. 1973, Int. J. Biometeor., 1973, Vol.17, pp.207-211.

- IONOMETRY OF HOT DRY DESERT WINDS (KHAMSIN, SHARAV) AND ITS APPLICATION TO IONIZING TREATMENT OF WEATHER – SENSITIVE PATIENTS

F. G. Sulman and Y. Pfeifer  
Reprinted from Israel Journal of Medicinal Sciences, Vol. 9, No. 5, May 1973. Printed in Israel.

- ARE NEGATIVE AIR IONS GOOD FOR YOU?

A.P. Krueger  
New Scientist, June 14, pp. 668-670 (1973).

- THE EFFECT OF AIR IONS ON PLANTS

A.P. Krueger, S. Kotaka and E.J. Reed

Presented at the International Congress, The Sun in the Service of Mankind. July 2-6. Paris, France 1973.

- PRELIMINARY CONSIDERATION OF THE BIOLOGICAL SIGNIFICANCE OF AIR IONS. THE NATURE OF HUMAN CONSCIOUSNESS

A.P. Krueger

(Ed.) Robert E. Ornstein, W.H. Freeman and Company, San Francisco, pp. 408-421 (1973).

## **1972**

- AEROIONTHERAPIE SYMPOSIUM, BUDAPEST 1972 – ABSTRACTS  
  
CYCLIC CHANGES OF THE ATMOSPHERIC AND INDOOR AIR IONIZATION  
  
Dr S. Tyczka, Poland.
- NATURAL AEROIONIZATION AND AURORA'S – I  
  
I.Budai, Hungary.
- PROBLEMS IN MEASURING ION CONCENTRATIONS  
  
C.Capel-boute, M. Ghalim, P. Vandanael, Belgium.
- COUNTER OF ATMOSPHERIC IONS AND ELECTROAEROSOLS. UT.6914  
  
J. Reinet, Soviet Union.
- MEDICOR IONIZERS  
  
E. Nagy, F. Svab, Hungary
- SENDING CAPACITY IONOMETER  
  
Dr W. Stark, Switzerland
- THE IONIZATION NEGATIVE IN INFANTILE ASTHMA  
  
Dr Marchesini, Brasil
- THE ROLE OF IONIZERS IN THE INCREASING OF TRAFFIC SECURITY  
  
G. Hay
- PRACTICAL PROBLEMS OF ION CLIMATISATION  
  
F. Svab, Hungary

- PRELIMINARY REPORT ON THE MODIFICATION OF THE QUALITATIVE PARAMETERS OF A CERTAIN PERFORMANCE TEST OF HEALTHY PEOPLE OF VARIOUS WEATHER-SENSITIVITY DEPENDING UPON ARTIFICIAL IONIZATION

M. Megger, I. Ormegni, Hungary

- EXPERIENCES WITH NEGATIVE AEROIONS IN THE DISINFECTION OF CONTAMINATED AIR

Gy Biro, J. Novak, Hungary

- GENERAL CONSIDERATIONS ON THE BIOLOGICAL AND THERAPEUTICAL EFFECT OF MODERATE CONCENTRATION AIRIONS

M. Deleanu, Romania

- A STUDY OF ATMOSPHERIC IONIZATION: MEASUREMENT OF THE ION CONDITIONS IN AN ATC LABORATORY AND A REVIEW OF THE LITERATURE OF ION EFFECTS ON PERFORMANCE

Bruce L. Rosenberg

Federal Aviation Administration. Report No. NA 72-19, May 1972.

- IONOMETRIE OF CHANGING WEATHER AND ITS APPLICATION TO IONISING TREATMENT OF WEATHER-SENSITIVITY PATIENTS (ABSTRACT)

F. G. Sulman, D. Levy and Y. Pfeifer

26 October 1972.

- AIR ION EFFECTS ON RNAse ACTIVITY IN GREEN BARLEY LEAVES

S. Kotaka and A.P. Krueger

Int. J. Biometeor., Vol.16, No. 1, pp.1-11. (1972)

- AGEING AND ADRENAL-MEDRULA EXHAUSTION DUE TO LACK OF MONOAMINES AND RAISED MONOAMINE-OXIDASE LEVELS

Dr Robinson

The Lancet, September 23, 1972, pp.663.

- ARE AIR IONS BIOLOGICALLY SIGNIFICANT?

A REVIEW OF A CONTROVERSIAL SUBJECT\*\*\*\*

A.P. Krueger

Int. J. Biometeor., 1972, Vol.16, No. 4 pp. 313-322.

- RAUMKLIMA UND LUFTELEKTRIZITÄT

Von Ing. Helmut Furchner V.D.I.

Sonderdruck aus "CCI, CLIMA COMMERCE INTERNATIONAL" 6.9. 1972.

- URINALYSIS AND TREATMENT OF PATIENTS SUFFERING FROM CLIMATIC HEAT STRESS

F.G. Sulman

Urinary Thyroxine. Lancet 1.1291.pp.xxvi-xxviii.

- AIR ION EFFECTS ON RNase ACTIVITY IN GREEN BARLEY LEAVES

S. Kotaka and A.P. Krueger

Int. J. Biometeor., 16: pp. 1-11 (1972).

- EFFECT OF THE AIR ION ENVIRONMENT ON INFLUENZA IN THE MOUSE

A.P. Krueger and E.J. Reed

Int. J. Biometeor., 16: pp. 209-232 (1972).

- ARE AIR IONS BIOLOGICALLY SIGNIFICANT? A REVIEW OF A CONTROVERSIAL SUBJECT

A.P. Krueger

Int. J. Biometeor., 16: pp. 313-322 (1972).

## **1971**

- THE ROLE OF SEROTONIN IN GYNAECOLOGY AND OBSTETRICS

E. Sadvovsky, K. Fuchs and W.Z. Polishuk, Y. Pfeifer and F. G. Sulman

Reprint from "The Hebrew Pharmacist" (Harokeach Haivri) (Scientific Edition), Vol. 14(5): 231-244, 1971.

- EFFECT OF THE PRESENCE OF MAN ON THE AIR ION DENSITY IN AN OFFICE ROOM

S. Maczynski, S. Tyczka, B. Marecki and Gora

Int. J. Biometeor., 1971, Vol. 15, No. 1, pp. 11-21.

- METEORLOGISCHE FRONTVERSCHIEBUNG UND WETTERFUHLIGKEIT

F.G. Sulman

XXIII Jahrgang Nr. 17 (Seiten 998/999) Vom. 27, Februar 1971.

- SERETONIN MIGRAINE IN CLIMATIC HEAT STRESS, ITS PROPHYLAXIS AND TREATMENT

F. G. Sulman

Proceedings of the International Headache Symposium, Elsinore, Denmark, 16th to 18th May 1971.

- PREVENTION OF PSYCHOGENIC SEROTONIN ABORTION

W.Z. Polishuk, E. Sadowsky, Y. Pfeifer and F.G. Sulman

Psychosomatic Medicine in Obstetrics and Gynaecology 3rd Int. Cong., London 1971, pp. 189-191 (Karger Basel 1972).

- THE COURSE OF EXPERIMENTAL INFLUENZA IN MICE MAINTAINED IN HIGH CONCENTRATIONS OF SMALL NEGATIVE AIR IONS

A.P. Krueger, S. Kotaka and E.J. Reed

Int. J. Biometeor., 15: pp. 5-10 (1971).

## **1970**

- THE EFFECT OF AIR IONS ON BACTERIAL AND VIRAL PNEUMONIA IN MICE

A.P. Krueger, S. Kotaka, E.J. Reed and S. Turner

Int. J. Biometeor., 14: pp. 247-260 (1970).

- THE RELATION OF HOSPITAL EMERGENCY WARD VISITS TO AIR POLLUTION AND WEATHER

William E. Belanger, P.E. Igho Kornbleuh, Robert Wassall

## **1969**

- THE EFFECT OF AIR IONS ON BRAIN LEVELS OF SERETONIN IN MICE

A.P. Krueger and S. Kotaka

Int. J. Biometeor., 1969, Vol.13, No. 1, pp. 25-38.

- SOME OBSERVATIONS ON THE BLEACHING EFFECT OF ETHYLENEDIAMINETETRAACETIC ACID ON GREEN BARLEY LEAVES

Sadao Kotaka and A.P. Krueger

Reprinted from Plant Physiology, Vol. 44, June 1969, pp. 809-815 (Printed in U.S.A.).

- BAUSTOFFBEDINGTE EINFLUSSE AUF DIE LUFTELEKTRIZITAT IN DEN RAUMEN UND AUF DAS BEHAGLICHKEITSEMP FINDEN DES MENSCHEN

Von Ing. Helmut Furchner V.D.I.

Sonderdruck aus "Heizung – Luftung – Haustechnik" Bd. 19 (1968) Nr. S. 165/69.

- ETUDE PRELIMINAIRE DE LA SIGNIFICATION BIOLOGIQUE DES IONS ATMOSPHERIQUES

A.P. Krueger

Extrait de Scientia Septembre – Octobre 1969, Vol. CIV, No. DCLXXXIX-DCXC.

- THE EFFECT OF AIR IONS ON BACTERIAL AND VIRAL PNEUMONIA IN MICE

A.P. Krueger, S. Kotaka, E.J. Reed and S. Turner

Int. J. Biometeor., 1970, Vol. 14, No. 3, pp. 247-260.

(Missing Hebrew Reference)

- THE RELATION OF EMERGENCY WARD VISITS TO AIR POLLUTION AND WEATHER

William E. Belanger, P.E. Igho Kornbleuh, Robert Wassall

- ATMOSPHERIC IONS AND AEROSOLS

A.P. Krueger, S. Kotaka and P.C. Andriese

An introduction to Experimental Aerobiology, edited by R.L. Dimmick and A.B. Akers, Wiley-Interscience, 100-102 (1969).

- SOME OBSERVATIONS ON THE BLEACHING EFFECT OF EDTA ON GREEN BARLEY LEAVES

S. Kotaka and A.P. Krueger

Plant Physiol., 44: pp. 809-815 (1969).

- THE EFFECT OF AIR IONS ON THE BRAIN LEVEL OF SEROTONIN IN MICE

A.P. Krueger and S. Kotaka

Int. J. Biometeor., 13: pp. 61-73 (1969).

- PRELIMINARY CONSIDERATIONS OF THE BIOLOGICAL SIGNIFICANCE OF AIR IONS

A.P. Krueger

Scientia, Sept. – Oct., pp. 1-17 (1969).

## **1968**

- TRAITMENT DE L'ASTHME BRONCHIQUE PAR L'AEROIONISATION NEGATIVE

P.C. Boulatov

Ler Institut de Medecine de Leningrad Pavlov Leningrad, U.R.S.S.

Bioclimatology, Biometeorology and Aeroionotherapy

Carlo Erba Foundation, Milan 1968, pp. 104-109.

- THE EFFECT OF AIR IONS ON LIGHT – INDUCED SWELLING AND DARK-INDUCED SHRINKING OF ISOLATED CHLOROPLASTS  
  
S. Kotaka, A.P. Krueger and P.C. Andriese  
Int. J. Biometeor., 1968, Vol. 12, pp. 85-92.
- BAUSTOFFREDFINGTE EINFLÜSSE AUF DIE LUFTELEKTRIZITÄT IN DEN RAUMEN UND AUF DAS BEHAGLICHKEITSEMPFINDEN DES MENSCHEN  
  
Von Ing. Helmut Furchner V.D.I.  
Sonderdruck aus "Heizung – Lüftung – Haustechnik" BD. 19 (1968) Nr. 5, 165/69.
- AIR ION ON EDTA – INDUCED BLEACHING IN GREEN BARLEY LEAVES  
  
S. Kotaka and A.P. Krueger  
Int. J. Biometeor., 1968, Vol. 12, pp. 331-342.
- CILAMSIN THERAPIE GEGEN WÜSTENWIND  
  
F.G. Sulman  
Euromed 8:1060, 1968.
- THE INFLUENCE OF IONIZATION ON ENDOCRINE GLANDS  
  
R. Guatierotti  
Bioclimatology Biometeorology and Aeroiontherapy  
Carlo Erba Foundation, Milan 1968, pp.5.
- SMALL AIR IONS: THEIR EFFECT ON BLOOD LEVELS OF SEROTONIN IN TERMS OF MODERN PHYSICAL THEORY  
  
A.P. Krueger, P.C. Andriese and S. Kotaka  
Int. J. Biometeor., Vol. 12, No. 3, pp. 225-239. (1968)
- THE EFFECT OF AIR IONS ON LIQUID EVAPORATION RATES  
  
F.X. Hart and Ch. H. Bachman  
Int. J. Biometeor., Vol. 12, pp. 251-261.
- THE EFFECTS OF AIR IONS ON LIGHT-INDUCED SWELLING AND DARK-INDUCED SHRINKING OF ISOLATED CHLOROPLASTS  
  
S. Kotaka, A.P. Krueger and P.C. Andriese  
Int. J. Biometeor., 12: pp. 85-92 (1968).
- SMALL AIR IONS: THEIR EFFECT ON BLOOD LEVELS OF SEROTONIN IN TERMS OF MODERN PHYSICAL THEORY  
  
A.P. Krueger, P.C. Andriese and S. Kotaka  
Int. J. Biometeor., 12: pp. 225-239 (1968).

- AIR ION EFFECTS ON EDTA-INDUCED BLEACHING IN GREEN BARLEY LEAVES

S. Kotaka and A.P. Krueger

Int. J. Biometeor., 12: pp. 331-342 (1968).

- SECTION ON THE BIOLOGICAL EFFECTS OF GASEOUS IONS IN BIOCLIMATOLOGY AND AEROIONOTHERAPY

A.P. Krueger

(Eds.) R. Gualtierotti, I.H. Kornbleuh and C. Sirtori. Carlo Erba Foundation, Milan, Italy (1968).

## **1967**

- THE EFFECT OF UNIPOLAR POSITIVELY IONIZED AIR ON THE COURSE OF COCCIDIOIDOMYCOSIS IN MICE

A.P. Krueger and H.B. Levine

Int. J. Biometeor., Vol. 10 pp. 279-288. (1967) THE CHANGING PATTERN OF CHRONIC DISEASE DEATH RATES IN PENNSYLVANIA

- H. Barrett Bock

Volume 1, 1967.

- STUDIES ON THE AIR-ION-INDUCED GROWTH INCREASE IN HIGHER PLANTS

S. Kotaka and A.P. Krueger

Advancing Frontiers of Plant Sciences, 20: pp. 115-208 (1967).

- AIR ION EFFECTS ON THE GROWTH OF THE SILKWORM (BOMBYX MORI L.)

A.P. Krueger, S. Kotaka, K. Nishizawa, Y. Kogure, M. Takenobu and P.C. Andriese

Int. J. Biometeor., Vol. 10: pp. 29-38 (1967). THE EFFECT OF ATMOSPHERIC IONS ON THE RESPIRATORY SYSTEM OF INFANTS

- Yoram Palti, M.Sc., M.D., Elchana de Nour M.D., and Abraham Abrahamov M.D.

Pediatrics, Vol. 38, No. 3, September 1966.

## **1966**

- THEORY AND PRACTICE OF IONIZED AIR THERAPY

L.L. Vasile'yev

6 January 1966, pp. 1-139.

- BIOLOGICAL EFFECTS OF GASEOUS IONS

A.P. Krueger

Environmental Biology, Ed. P.L. Altman and D.S. Dittmer. Federation of American Societies for Experimental Biology, pp. 320-325 (1966).

- STUDIES ON THE BIOLOGICAL EFFECTS OF GASEOUS IONS – A REVIEW

A.P. Krueger, S. Kotaka and P.C. Andriese

Special Monograph Series, Volume 1. Biometeorological Research Centre, Leiden (1966).

- THE EFFECTS OF INHALING NON-IONIZED OR POSITIVELY IONIZED AIR CONTAINING 2-4% VOLUME CO<sub>2</sub> ON THE BLOOD LEVELS OF 5-HYDROXYTRYPTAMINE IN MICE

A.P. Krueger, P.C. Andriese and S. Kotaka

Int. J. Biometeor., Vol. 10: pp. 17-28 (1966).

- THE EFFECT OF UNIPOLAR POSITIVELY IONIZED AIR ON THE COURSE OF COCCIDIOMYCOSIS IN MICE

A.P. Krueger and H.B. Levine

Int. J. Biometeor., 11: pp. 279-288 (1966).

## **1965**

- ATMOSPHERIC ELECTRICITY AND THE WATERFALLS OF YOSEMITE VALLEY

E.T. Pierce and A.L. Whitson

Stanford Research Institute, Menlo Park, California

Reprinted from Journal of the Atmospheric Sciences, Vol. 22, No. 3, May 1965, pp. 314-319, U.S.A.

- THE EFFECT OF ABNORMALLY LOW CONCENTRATIONS OF AIR IONS ON THE GROWTH OF HORDEUM VULGARIS

A.P. Krueger, S. Kotaka and P.C. Andriese, with the technical assistance of S.M. Lamprecht and E.J. Reed

Int. Journal of Biometer., 1965, Vol. 9, No. 3, pp. 201-209.

- AIR ION EFFECTS ON THE OXYGEN CONSUMPTION OF BARLEY SEEDLINGS

Barley Seedlings

Reprinted from Nature, Vol. 208, No. 5015. Pp. 1112-1113, December 1965.

- EFFECT OF AIR IONS ON IAA CONTENT OF BARLEY SEEDLINGS

S.Kotaka and A.P. Krueger and P.C. Andriese

Plant and Cell Physiol., 6 pp 711-719 (1965).

- A SURVEY OF HUMAN BIOMETEROLOGY: "THE INFLUENCE OF AIR IONS ON PHYSIOLOGICAL FUNCTION"

A.P. Krueger

Ed. F. Sargent and S.W. Tromp. World Meteorological Organization, No. 160TP78, pp. 32-35 (1965).

- SOME OBSERVATIONS ON AIR-ION-ENHANCED IRON CHLOROSIS IN BARLEY (HORDEUM VULGARIS) SEEDLINGS

S. Kotaka, A.P. Krueger and P.C. Andriese

Plant and Cell Physiol., 6: pp. 233-234 (1965).

- THE EFFECT OF ABNORMALLY LOW CONCENTRATIONS OF AIR IONS ON THE GROWTH OF (HORDEUM VULGARIS)

A.P. Krueger, S. Kotaka and P.C. Andriese

Int. J. Biometeor., 9: pp. 201-209 (1965).

- AIR ION EFFECTS ON THE OXYGEN CONSUMPTION OF BARLEY SEEDLINGS

S. Kotaka, A.P. Krueger, K. Nishizawa, T. Ohuchi, M. Takenobu, Y. Kogure and P.C. Andriese

Nature, 208: pp. 1112-1113 (1965).

- AIR ION EFFECTS ON THE IRON METABOLISM OF BARLEY (HORDEUM VULGARIS) SEEDLINGS

S. Kotaka, A.P. Krueger, K. Nishizawa, T. Ohuchi, M. Takenobu, Y. Kogure

Proc. Bot. Soc., Japan, C21: 43.

- EFFECT OF AIR IONS ON IAA CONTENT OF BARLEY SEEDLINGS

S. Kotaka, A.P. Krueger and P.C. Andriese

Plant and Cell Physiol., 6: pp. 711-719 (1965).

## **1964**

- STUDIES ON AIR-ION-ENHANCED IRON CHLOROSIS. I. ACTIVE AND RESIDUAL IRON

A.P. Krueger, S. Kotaka and P.C. Andriese

Int. J. Biometeor., 8: pp. 5-16 (1964).

- THE EFFECT OF AIR CONTAINING O<sub>2</sub><sup>-</sup>, O<sub>2</sub><sup>+</sup>, CO<sub>2</sub><sup>-</sup> AND CO<sub>2</sub><sup>+</sup> ON THE GROWTH OF SEEDLINGS OF HORDEUM VULGARIS

A.P. Krueger, S. Kotaka and P.C. Andriese

Int. J. Biometeor., 8: pp. 17-25 (1964).

- CATALASE ACTIVITY OF CRUDE ENZYME PREPARATION FROM IRON-CHLOROTIC BARLEY (HORDEUM VULGARIS) SEEDLINGS

S. Kotaka, A.P. Krueger and P.C. Andriese  
Nature, 204: pp. 1198-1199 (1964).

### **1963**

- IONIZATION OF THE AIR AS POTENTIAL HEALTH FACTOR

I.H. Kornbleuh  
ESTRATTO DAL "Xo Convegno della Salute"  
Ferrara 25-26 Maggio 1963.

- TECHNICAL AND CLINICAL ASPECTS OF ELECTRO-AEROSOLS IN INHALATION THERAPY

A.P. Wehner, D.M.D.  
Copyright 1963. All Rights Reserved by the San Diego Symposium for Biomedical Engineering, 8484 La Jolla Shores Drive, La Jolla, California, pp. 32-38.

- PRELIMINARY RESULTS WITH ELECTRO-AEROSOL THERAPY IN RESPIRATORY CASES

Dr. Alfred P. Ehner  
Biometrics Instrument Corporation, Plano, Texas, U.S.A.  
Presented at the Third International Biometeorological Congress,  
September 1-7, 1963, Pau, France.

- MEDICAL BIOMETEOROLOGY

S.W. Tromp  
1963, pp. 351-369.

- REVIEW OF SCIENTIFIC INFORMATION ON THE EFFECTS OF IONIZED AIR ON HUMANS, BEINGS AND ANIMALS

Joseph B. Davis, M.D.  
1963, pp. 351-369.

- THE PLACE OF AERONIZATION IN MEDICAL THERAPEUTICS

Igho Hart Kornbleuh  
Estrato da "Archives of Medical Hydrology"  
Pisa (Italy), -XXIII (1963) No. 4.

- THE CLINICAL EFFECTS OF AERONIZATION

L.H. Kornbleuh and F.P. Speicher

- EFFECTS OF ELECTRIC FIELDS AND NEGATIVE ION CONCENTRATIONS ON TEST PILOTS

C.I. Barron, M.D. and J.J. Dreher, Ph.D.  
Aerospace Medicine, January 1964.

- CATALASE ACTIVITY OF A CRUDE ENZYME PREPARATION FROM IRON - CHLOROTIC BARLEY (HORDEUM VULGARIS) SEEDLINGS

Fischer Knight & Co., St Albans.  
Reprinted from Nature, Vol. 204, No. 4964, pp. 1198-1199, December 19, 1964.

- INFLUENCE OF AIR IONS ON CERTAIN PHYSIOLOGICAL FUNCTIONS

A.P. Krueger, W.W. Hicks and J.C. Beckett  
Chapter in Medical Biometeorology – Weather, Climate and the Living Organism. Ed. S.W. Tromp. Elsevier Publ. Comp., Amsterdam, London and New York, pp. 351-369 (1963).

- THE BIOLOGICAL MECHANISM OF AIR ION ACTION: THE EFFECT OF CO<sub>2</sub> + IN INHALED AIR ON THE BLOOD LEVEL OF 5-HYDROXYTRYPTAMINE IN MICE

A.P. Krueger, P.C. Andriese and S. Kotaka  
Int. J. Biometeor., 7: pp. 3-16 (1963).

- A STUDY OF THE MECHANISM OF AIR ION-INDUCED GROWTH STIMULATION IN HORDEUM VULGARIS

A.P. Krueger, S. Kotaka and P.C. Andriese  
Int. J. Biometeor., 7: pp. 17-25 (1963).

- GASEOUS-ION-INDUCED STIMULATION OF CYTOCHROME C BIOSYNTHESIS

A.P. Krueger, S. Kotaka and P.C. Andriese  
Nature, 200: pp. 707-708 (1963).

## **1962**

- IONIZATION OF THE AIR SEDATING EFFECT OF POLARIZED AIR\*

T.H.A. David, J.V. Derau, I. H. Hornbleuh, F.C.J. McGurk and J.R. Minehart  
\*Reprinted from "Biometeorology"  
Pergamon Press, Oxford – London, New York, Paris 1962 pp. 484-489.

- AIR IONS AND PHYSIOLOGICAL FUNCTIONS

A.P. Krueger  
The Journal of General Physiology March 1962.  
Vol.5 No. 4, Part 2. Supplement, pp. 233-241 U.S.A.

- SA NATURE

A.Langevin  
October 1962.

- AIR IONS AND PHYSIOLOGICAL FUNCTION

A.P. Krueger  
J. Gen. Physiol. (Commemorative Vol. For J.H. Northrop), Part 2, Supplement, March, 45:  
pp. 233-241.

- STUDIES ON THE EFFECTS OF GASEOUS IONS ON PLANT GROWTH. I. THE INFLUENCE OF POSITIVE AND NEGATIVE AIR IONS ON THE GROWTH OF AVENA SATIVA

A.P. Krueger, A.P. Kotaka and P.C. Andriese  
J. Gen. Physiol., 45: pp. 879-895. (1962)

- STUDIES ON THE EFFECTS OF GASEOUS IONS ON PLANT GROWTH. II. THE CONSTRUCTION AND OPERATION OF AN AIR PURIFICATION UNIT FOR USE IN STUDIES ON THE BIOLOGICAL EFFECTS OF GASEOUS IONS

A.P. Krueger, J.C. Beckett, P.C. Andriese and S. Kotaka  
J. Gen. Physiol., 45: pp. 897-904 (1962).

- SOME OBSERVATIONS ON THE PHYSIOLOGICAL EFFECTS OF GASEOUS IONS

A.P. Krueger, S. Kotaka and P.C. Andriese  
Int. J. Biometeor., 6: pp. 33-48 (1962).SOME OBSERVATIONS ON THE PHYSIOLOGICAL EFFECTS OF GASEOUS IONS

- Biometeorology, edited by S.W. Tromp Pergamon press. pp. 498-506 (1962)
- THE BIOLOGICAL PROPERTIES OF GASEOUS IONS

A.P. Krueger  
Prepared for the Encyclopedia of Science and Technology. McGraw-Hill. (1962.)

## **1961**

- THE CLINICAL SCIENTIFIC AND TECHNICAL DEVELOPMENT OF ELECTRO-AEROSOLOGY

Dr A.P. Wehner

- STATISTICAL EVALUATION IN THE INFLUENCE OF ATMOSPHERIC IONS ON THE SIMPLE REACTION TIME AND THE OPTICAL MOMENT

John Heinstein

- AN EXPERIMENTAL EVALUATION OF MAN'S REACTION TO AN IONIZED AIR ENVIRONMENT

Lawrance Slote

- THE FUTURE OF ARTIFICIAL IONIZATION OF THE AIR

ATMOSPHERIC ELECTRICITY AND IONIZATION

W.F.G. Swan

- ROUNDTABLE DISCUSSION

POST CONFERENCE COMMENT BY THE GENERAL CHAIRMAN

Dr Clarence W. Hansell

- LIST OF PARTICIPANTS

SOME TOPICS CONCERNING EXPERIMENTAL INVESTIGATION OF AIR IONS

R. Siksna

- THE DECAY OF UNIPOLAR SMALL IONS AND HOMOGENEOUS AEROSOLS IN CLOSED SPACES AND FLOW SYSTEMS

Kenneth T. Whitby and A.R. McFarland

- THE CHANGE OF THE SMALL ION DENSITY DUE TO CONDENSATION NUCLEI AND THE RELATION TO THE EXTINCTION COEFFICIENT OF LIGHT

Lothar H. Ruhnke

- NATURE OF AIR IONS GENERATED BY DIFFERENTED METHODS

Rudolph Nagy

- AIR ION MEASUREMENT

John C. Beckett

- THE NATURE OF CHARGES FOUND IN AUTOMOBILE EXHAUST GASES

Ralph W. Burhans and John V. Derau

- ATMOSPHERIC IONS AND HUMAN BEHAVIOUR

Richard A. Duffee and Howard G. Schutz

- IONIZATION OF THE AIR HYGIENIC FACTOR

A.A. Minch

Journal of Hygiene, Epidemiology, Microbiology and Immunology 1961. V-479-493

- STUDIES ON THE EFFECTS OF GASEOUS IONS ON THE MAMMALIAN TRACHEA

A.P. Krueger and R.F. Smith

Presented at London meeting of Int. Soc. Bioclimatology, September 1960.

Published in the Proc. Of the Soc. (1961), Biometeorology. Edited by S.W. Tromp. Pergamon Press, pp. 498-506 (1962).

- EXPERIMENTS WITH AIR IONS ON THE TRACHEA

J.C. Beckett and A.P. Krueger

Trans. Amer. Inst. Elect. Engineer, 79: pp. 695-699 (1961).

- ABNORMAL PHYSIOLOGY AND ITS PROBLEMS.

A.P. Krueger

Section in The Air We Breathe. Edited by Farber & Wilson. Published by Chas. C. Thomas.

- SOME OBSERVATIONS ON THE BIOLOGICAL EFFECTS OF GASEOUS IONS.

A.P. Krueger

Presented at the First Int. Conf. On Atmospheric Ionization, Philadelphia, Pennsylvania, October 17, 1961. The Proc. Int. Conf on Air Ionization (1961), 2: pp. 1-6.

## **1960**

- THE BIOLOGICAL MECHANISMS OF AIR ION ACTION

A.P. Krueger and R. F. Smith.

Reprinted from the Journal of General Physiology, January, 1960  
Vol. 43, No. 3, pp. 533-540 (U.S.A.).

- POLARIZED AIR AS AN ADJUNCT ON THE TREATMENT OF BURNS

Theodore A. David, D.D.S. M.D. D.Sc. John R. Minehart, M.D., and Igho H. Kornbleuh, M.D.

Reprinted from American Journal of Physical Medicine  
Vol. 39, No. 3, June, 1960. Printed in U.S.A.

- THE BIOLOGICAL MECHANISMS OF AIR ION ACTION. I. 5-HYDROXYTRYPTAMINE AS THE ENDOGENOUS MEDIATOR OF POSITIVE AIR ION EFFECTS ON THE MAMMALIAN TRACHEA

A.P. Krueger and R.F. Smith

J. Gen. Physiol., 43: pp. 533-540 (1960).

- SOME BIOLOGIC PROPERTIES OF GASEOUS IONS

A.P. Krueger

J. Albert Einstein Medical Center, 8: pp. 79-89 (1960).

- THE BIOLOGICAL MECHANISMS OF AIR ION ACTION. II. NEGATIVE AIR ION EFFECTS ON THE CONCENTRATION AND METABOLISM OF 5-HYDROXYTRYPTAMINE IN THE MAMMALIAN RESPIRATORY TRACT

A.P. Krueger and R.F. Smith  
J. Gen. Physiol., 44: pp. 269-276 (1960).

## **1959**

- THE PHYSIOLOGICAL SIGNIFICANCE OF POSITIVE AND NEGATIVE IONIZATION OF THE ATMOSPHERE

A.P. Krueger and R.F. Smith  
J. Royal Soc. of Health, 79: pp. 642-648 (1959).

- FURTHER STUDIES OF GASEOUS ION ACTION ON TRACHEA

A.P. Krueger, R.F. Smith, G.J. Hildebrand and C.E. Meyers  
Proc. Soc. Exptl. Biol. Med., 102: pp. 355-357 (1959)

- AN ENZYMATIC BASIS FOR THE ACCELERATION OF CILIARY ACTIVITY BY NEGATIVE AIR IONS

A.P. Krueger and R.F. Smith  
Nature, 183: pp. 1322-1333 (1959)

- PARAMETERS OF GASEOUS ION EFFECTS ON THE MAMMALIAN TRACHEA

A.P. Krueger and R.F. Smith  
J. Gen. Physiol., 42: pp. 959-969 (1959).

- EFFECTS OF AIR IONS ON TRACHEA OF PRIMATES

A.P. Krueger, R.F. Smith and J.W. Millar  
Proc. Soc. Exptl. Biol. Med., 101: pp. 506-507 (1959).

- FURTHER STUDIES ON THE BIOLOGICAL EFFECTS OF AIR IONS AND THEIR IMPLICATIONS WITH RESPECT TO THE PHYSICAL ASPECTS OF AIR IONIZATION – PART 1

A.P. Krueger  
Report on Research Program Conducted During 1957 – 1959. Printed as a public service by the sponsor of some of the studies, Wesix Foundation (1959).

## **1958**

- RELIEF FROM POLLINOSIS IN NEGATIVELY IONIZED ROOMS

Igho H. Kornbleuh, M.D., George M. Piersol, M.D. and Forest P. Speicher, M.A.  
AM. Journal of Physical Medicine 37:1958.

- EFFECTS OF UNIPOLAR AIR IONS ON MICROORGANISMS AND ON EVAPORATION

A.P. Krueger, W.W. Hicks and J.C. Beckett  
J. Franklin Institute, 266: pp. 9-19 (1958).

- THE EFFECTS OF AIR IONS ON THE LIVING MAMMALIAN TRACHEA

A.P. Krueger and R.F. Smith  
J. Gen. Physiol., 42: pp. 69-82 (1958).

- EFFECTS OF GASEOUS IONS ON TRACHEAL CILIARY RATE

A.P. Krueger and R.F. Smith  
Proc. Soc. Exptl. Biol. Med., 98: pp. 412-414 (1958).

- THE PHYSIOLOGICAL SIGNIFICANCE OF POSITIVE AND NEGATIVE IONIZATION OF THE ATMOSPHERE. IN MANS DEPENDENCE ON THE EARTHLY ATMOSPHERE

A.P. Krueger and R.F. Smith

Proceedings of the First International Symposium on Submarine and Space Medicine.

Edited by Karl E. Schaefer, 1958, The MacMillan Company, pp. 356-369.

## **1957**

- PROTECTIVE AND LETHAL EFFECTS OF UNIPOLAR AIR IONS ON MICROORGANISMS

- Dr A.P. Krueger, Mr W. Wesley Hicks and Mr J.C. Beckett (U.S.A.)

"International Society of Bioclimatology and Biometeorology"

First Bioclimatological Congress

Vienna, 23-27 September 1957

- IONIZATION AND THE EEG. A PRELIMINARY REPORT.

Daniel Silverman and Igo H. Kornbleuh.

EEG Clin. Neurophysiol., 1957, 9: 180.

- EFFECT OF ARTIFICIAL IONIZATION OF THE AIR OF THE ELECTROENCEPHALOGRAM

Daniel Silverman, M.D. and Igho H. Kornbleuh, M.D. T. Sannit, B.S., and S. Piwoz, B.A.  
Reprinted American Journal of Physical Medicine  
Vol. 36, No 6. December 1957. Printed in U.S.A.

- EFFECTS OF AIR IONS ON ISOLATED RABBIT TRACHEA

A.P. Krueger and Richard F. Smith  
Received October 1, 1957, V96.

- THE CONTROL OF AIR IONIZATION AND ITS BIOLOGICAL EFFECTS

W. Wesley Hicks and John Beckett  
Transactions Paper February 6, 1957, pp.7.

- THE ACTION OF AIR IONS ON BACTERIA - I. PROTECTIVE AND LETHAL EFFECTS ON SUSPENSIONS ON STAPHYLOCOCCI IN DROPLETS

A.P. Krueger, R.F. Smith and Ing Gan Go  
J. Gen. Physiol., 41: pp. 359-381 (1957).

- EFFECTS OF AIR IONS ON ISOLATED RABBIT TRACHEA

A.P. Krueger and R.F. Smith  
Proc. Soc. Exptl. Biol. Med., 96: pp. 807-809 (1957).

## **1955**

- CONTINUOUS RECORD OF ATMOSPHERIC CONDENSATION NUCLEI AND OF THEIR PRETENTION IN THE RESPIRATORY TRACT.

F. Verzar  
Reprinted from the review Geofisica Pura E Applicata - Milano Vol. 31, pp. 183-190 (1955)