

208

CORRESPONDENCE Jan. 22-31, 1955

N. WIENER MC 22

36 Nordhoff
San Francisco 12, California
January 22, 1955

Dr Norbert Wiener
Mass. Institute of Technology
Cambridge, Mass.

Dear Sir:

I have for several years been reading articles about and by you, and I am writing at last to express my admiration for your stand against those men who seem bent upon proving that they follow "the death sciences." It is a reflection upon our American education system, and a great compliment to you, that the majority of our scientists have followed expediency down the road to hell. You and Dr Sturtevant, whose statements on the genetic effect of the H-Bomb have awakened so many people, are the only scientists whom I thoroughly admire in America today. I call Oppenheimer's "not unworried" statement weak-kneed, too little, and far too late in view of the solicitors now with which he bred the A-bomb and nursed it on its way to Hiroshima.

Have you seen Dr. Vannevar Bush's statement:
 "Our simple survival is not worth so much
 that it is to be purchased at the cost of
 intellectual stultification." !!! I believe
 I would pay with the cost of stultification,
 mortification, and degradation of a great
 number of scientists including Dr. Bush
 for this "simple survival" he values so
 little!

I realize that the invidious forces of anti-
 intellectualism can be evil, but I cannot
 think American scientists are acting intel-
 lectually in cultivating for profit the
 mechanical monsters to destroy us. I feel
 a true intellectualism and humanism
 would prevent them from continuing the
 blind, insane building up of enough H-Bombs
 to destroy not only human life but the life
 of the innumerable creatures and plants in God's
 world.

My reaction against the scientists in general
 is emotional but, I hope, also intellectual.
 I enclose a letter I have been sending out

in the rather vain hope of actually having "radiological weather reporting" established. And if it were established, perhaps it is as much in vain to think it of practical value. But at least the strange reading in roentgen units might teach us there is indeed an addition to the old forces of nature man has always had to struggle with, and this new inimical element (wisely, as bomb caused) of his own creation! If you think this plan would accomplish any good end, I would appreciate your support of it.

In any case, however, I will still wish to compliment you for avoiding the "conspiracy of conformists" and to thank you for your great contribution to "intelligent intellectualism" which unlike some intellectualism does not scorn simple survival.

yours truly,

A. S. Brennan

86 Nordhoff; San Francisco 12, California
December 11, 1954

Chief, U.S. Weather Bureau
Washington 25, D.C.

and

Federal Civil Defense Administrator
Battle Creek, Michigan

Dear Sirs:

As you know, there is something new in the atmosphere these days--radioactive particles from bomb tests and atomic piles. This fact is constantly reported in the newspapers: radioactive hailstones in Washington, D.C., radioactive ash falling on Chicago, radioactive rainfall in Troy, N.Y. In fact, radioactivity in excess of normal "background radiation" caused by uranium deposits and cosmic rays is now found from time to time wherever radiation counters are used.

That this increased radioactivity is dangerous is also evident. Death and illness of people only slightly exposed at Hiroshima and Nagasaki have continued to come to light with the passage of time. The even more insidious effects on the human genes is made clear by the statement of geneticist A. H. Sturtevant: "The bombs already exploded will ultimately result in the production of numerous defective individuals--if the human race itself survives for many generations." Winston Churchill's remarks in the House of Commons that "5000 years is about the limit of the time during which the atmosphere would be affected" by nuclear explosions and that the effects are cumulative give us the dismal assurance that this is no temporary danger.

Radioactive particles are naturally most dangerous if they are breathed in or enter the body with food or water. Within the body they can more readily damage delicate tissues and also can become permanently lodged to complete their deadly work. With proper warning when radioactive rains or dust occur, we could take precautions as to our water supply and food and at least stay indoors and keep our children indoors in the hope of lessening the destructive effects.

Therefore, I request that the Weather Bureau provide a daily reading of the average count of radioactive particles in the atmosphere with the regular weather report, with immediate warning of any unusual increase in this number. I have inquired about costs and find that adequately sensitive counters with automatic recording devices can be installed for as little as \$150. These require very little attention and could be read routinely as the weathermen take their many readings so no extra labor cost would be necessary. There are, I understand, about 4000 weather stations in this country, so two counters could be provided for each station for \$1,200,000.

If the Weather Bureau has no funds for this service, I suggest that money could be provided by the Civil Defense Administration since this is a means of giving real defense from certain and present danger. The billions spent for other aspects of our national defense will be meaningless indeed if we are debilitated and the seed of our future generations irretrievably mutilated before an enemy attacks. Surely this is a small cost if it saves any of our future children from death or deformity produced by radiation-caused genetic mutation.

In view of the proposed nuclear tests in Nevada this Spring, I urge that this "radiological weather reporting" be established as soon as possible. If not feasible for the entire country, could not the nearby states in most danger from radioactive fallout be given this protection before the time of the tests?

Sincerely yours,

D. S. Brennan

Magoroh Maruyama
München 19, Landshuter Allee 25.
bei Felbinger
Germany, January 22, 1955

Prof. Norbert Wiener
Department of Mathematics
Massachusetts Institute of Technology
Cambridge 39, Massachusetts, U.S.A.

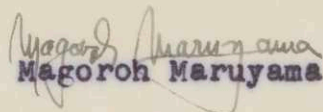
Dear Prof. Wiener,

I wish to thank you for your letter of January 13. I believe also that it is wise to avoid public lectures in Germany. However, I should think that it is safe enough to give lectures in the departments of natural sciences at German universities.

I am inclosing a draft of my short introduction to cybernetics for a discussion group. I avoided all political and social discussions. It is not clear to me which transformations of Gestalt are present (anatomically) in the visual cortex. I have shown two kinds of transformations in my writing as an illustration: $(X = kx, Y = ky)$ and $(X = x \pm ky, Y = y)$. If you find my writing unsatisfactory, I will try my best to improve it.

I am also inclosing a copy of my letter to the Univ. of Calif. suggesting academic broadcasting, a writing concerning the inadequacy of the American grammar and high school education system for bright children, and a writing about my personal experience in the degree of democratization of the daily life in Germany.

Cordially yours,


Magoroh Maruyama

Copy to Prof. N. Wiener.

Magoroh Maruyama
(U.C. graduate, math., July 1951)
München 19, Landshuter Allee 25.
bei Felbinger
Germany, January 15, 1955

President
The University of California
Berkeley 4, Calif.
U.S.A.

Dear President:

Since I came to Europe last summer as a graduate student after completing two years of active duty in the U.S. Marine Corps, I am being pleased to hear among the European scholars laudatory opinions about the University of California at Berkeley. I have visited several European universities and learned much from their different systems and programs. Though I have not yet come to a systematic conclusion, I feel that there is much the American universities can learn from the European school systems.

Today I would like to communicate to you a very practical idea which, if materialized in the U.S.A., would result in multiple benefits to both the students and the community.

UNIVERSITY BROADCASTING STATIONS:-- The University of Paris is operating radio broadcasting and transmitting lectures on general subjects for the benefit of the public and the students who work at distant academic establishments, or who are sick in bed. From my experiences in the field of practical electronic works in radio transmission in the Navy, I believe that the operation and the maintenance of a small transmitting station do not involve great expenses, if the equipment is once set up.

The lamentable quality of the American commercial broadcasting is a great discredit to the American culture, when the average Europeans are getting an important portion of their cultural enlightenment and enjoyment from the radio programs. University broadcasting stations in America will provide the public with a new way of utilizing the old industry. Moreover, various Departments of the universities will find the following advantages:

Dept. of Education; practice in organizing programs for adults and children.

Dept. of Electric Engineering; practice in electronic equipment.

Dept. of Music and Dept. of Dramatic Arts; practice in performances.

Dept. of Foreign Languages; practice in teaching foreign languages, foreign language programs.

Other Depts. will be allotted certain hours for their use.

In running the station, students are utilized and the rewards for the labour can be given in either or both of the two forms: academic credits (for laboratory hours) and payment.

The University of California at Berkeley is ideally located for experimenting university broadcasting for the following reasons:

(1) The high cultural standard of the population in the Bay Area.

- (2) The availability of various Departments of the University.
- (3) The availability of abundant foreign students who may participate in round-table discussions, ~~and~~ foreign language instructions etc.

I should think that an experiment of broadcasting at the University of California at Berkeley is worth a trial, and it will contribute towards more intimate coöperation between the University and the community.

Cordially yours,

Magoroh Maruyama
Magoroh Maruyama

P.S. I am inclosing copies of some of my informal writings which may be of some interest to you.

Hold

JANUARY 22, 1955

MEMORANDUM FOR
DR. NORBERT WEINER
MASSACHUSETTS INSTITUTE
OF TECHNOLOGY

ATTACHED IS A COPY OF A DRAFT OF THE INTRODUCTION TO A BOOK THAT IS BEING PREPARED FOR PUBLICATION. I COULD THINK OF NO BETTER SHORT STATEMENT OF ITS GENERAL THEME THAN THE QUOTE FROM SOME OF YOUR WRITING, WHICH APPEARS ON PAGE ONE OF THE INTRODUCTION. I SHOULD LIKE TO HAVE YOUR PERMISSION TO USE IT.

THERE IS ANOTHER STATEMENT OF YOURS, THE SENSE OF WHICH I REMEMBER; BUT THE EXACT WORDS ESCAPE ME. YOU SAID THAT TO THE DEGREE A MAN IS PREVENTED FROM USING HIS FULL POTENTIAL, HE IS SO MUCH LESS A MAN. IF YOU HAVE THE EXACT QUOTE OF THIS AVAILABLE, I WOULD APPRECIATE RECEIVING IT; AND ANY OTHER COMMENTS OR SUGGESTIONS WHICH YOU WOULD CARE TO OFFER.

I HAVE ORGANIZED THE MORROWS CORPORATION TO ACQUIRE THE USE OF I B M'S 702 COMPUTER, AS AN ADJUNCT TO THE USE OF THE MERTON TECHNIC IN THE SOLUTION OF THE PROBLEM OF FINDING JOBS FOR THOSE WHO WILL BE DISPLACED BY AUTOMATION. WE HAVE COMPLETED OUR PRELIMINARY PROGRAMMING; AND ARE NOW AWAITING THE COMPLETION OF THE WORK OF THE RESEARCH GROUP WHO ARE PREPARING THE MANUAL FOR THE USE OF THE 702.

YOU MAY BE INTERESTED IN AN ARTICLE CONCERNING THE USE OF THE MERTON TECHNIC IN THE FIELD OF EXECUTIVE SELECTION AND DEVELOPMENT THAT APPEARED IN THE NOVEMBER 1953 ISSUE OF FORTUNE MAGAZINE ENTITLED "IS THERE AN EXECUTIVE FACE?".

H. G. Wear, Jr.
HORACE G. WEAR, JR.

200 CABRINI BOULEVARD
NEW YORK 33, NEW YORK

155 Summit Lane
Bala-Cynwyd, Pa.

January 23, 1955

Dear Norbert Wiener,

During my year's study at MIT, after graduation from Haverford College, I once chatted with you in the hallway. (A student dance-committee was displaying its door prize, a handsome turkey tethered by a red ribbon, which scene reminded you — aptly, I thought — of *la manera de mostrar los guajalotes en los mercados de México.*)

Upon this inadequate acquaintance I am presuming now to send you my only copy of a summary of a religious lecture which I find compelling in content and in part intriguingly close, metaphorically, to your approach and contributions (as I understand it) to the theory and problems of communication.

The author of the article, whom I know, is surely not aware of ^{the} statistical theory nor correlation techniques. He is a scholar and teacher of Latin, English, and religious thought. May you feel, as I do, that the genius of his approach to Truth (allow me the capital T) represents, as it were, an optimum filter for the bandwidth of the given detectors.

[Encl 2/28/55] Sincerely, David Trumper

JOHN WILEY & SONS, INC.

ESTABLISHED 1807

PUBLISHERS OF BOOKS

440 FOURTH AVENUE

NEW YORK 16, N.Y.

January 24, 1955

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Professor H. C. Kephart
Department of Psychology
Occupational Research Center
Purdue University
Lafayette, Indiana

Dear Professor Kephart:

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In respect to this method of giving credit, however, we are willing to accept the standard editorial practices of other publishers as long as the essential items above are included.

This borrowed material will be used in a manuscript you are preparing in collaboration with Dr. A. S. Strauss on brain injury in children.

Sincerely yours,

J. S. Barnes
Vice President

JSB:HD

Ashby: DESIGN FOR A BRAIN
excerpts from pp. 142-143

Brown & Campbell: PRINCIPLES OF SELF-ORGANIZATION
excerpts from p. 2

Wiener: CYBERNETICS
excerpts from pp. 15 and 32

FROM JOHN WHEAT & SONS, INC.

TO Professor H. C. Egbert

FOLIO 2

DATE 1/24/55

Robb: THE ORGANIZATION OF BEHAVIOR
excerpts from pp 2 and 33

Stevens: HANDBOOK OF EXPERIMENTAL PSYCHOLOGY
pp. 209-231, excerpts from p. 209 (Dunpey)
excerpts from p. 913 (Graham)
pp. 730-757, excerpts from p. 753 (Leeper)
excerpts from pp. 1068-1069 (Licklider & Miller)
excerpts from p. 784

Jeffries: GENERAL MECHANISMS IN BEHAVIOR
excerpts from p. 100 (McCulloch)

Jeffries: BRAIN MECHANISMS AND INTELLIGENCE
excerpts from pp. 112, 129, and 131 (Lashley)

Carrichael: MANUAL OF CHILD PSYCHOLOGY, 2nd Ed.
excerpts from p. 665, pp. 631-696 (Jones)

From the Desk of

JOHN W. M. BUNKER

Ted:

Perhaps you will take over on
this matter and decide if
you do or do not wish to
rec. appointment as visiting fellow
(if indeed Barbara is "destructive")
or guest (if full Professor) or
otherwise.

[Signature]

24 Jan 55

TEL: 54071-2-3-4
FROM THE VICE-CHANCELLOR
D. G. JAMES, M.A.



THE UNIVERSITY
SOUTHAMPTON

AIR MAIL

24th January, 1955.

Dear Professor Wiener,

I write to invite you to deliver the second Fawley Foundation Lecture at this University, during the summer term of the present session. I am enclosing a copy of the first Fawley Lecture which was delivered in May last year by Sir Harold Hartley; and you will see, on the inside of the cover, a statement of the nature and aims of the Foundation. I need not say that we gladly leave you free to choose your subject - within the terms and scope required by the Founders.

May I say how deeply I hope you will accept this invitation? Your doing so would give both the University and the Founders the greatest pleasure. I should explain that eminent representatives of universities and of industry in this country are invited to the lecture which will, as last year, be presided over by the Chancellor, the Duke of Wellington. In the evening, after the lecture, a dinner is held at which the lecturer is the chief guest and at which, again, the universities and industry are widely represented.

The cost of your journey (whether by air or sea) and expenses incurred by you during your stay in this country would, of course, be met from the funds of the Foundation. The fee for the lecture is 100 guineas. Any day chosen from either the week beginning May 9th or the week beginning May 23rd would be convenient to us. We should, however, prefer to avoid Fridays of either week; we would also prefer to avoid Monday, May 9th.

Should you be able to come, my wife and I would be delighted to have you as our guest during your stay in Southampton; and we should hope that you would be able to stay for at least a few days in order that you might see something of the University.

Yours very sincerely,

D. G. James

Professor Robert Wiener,
Massachusetts Institute of Technology,
Cambridge 39,
Massachusetts,
U.S.A.

Perry Universalist Church

A LIBERAL FELLOWSHIP

Philip J. Mayer, Minister

PARSONAGE: 36 SOUTH CENTER ST., TELEPHONE 733

Perry, New York

January 24, 1955

Dear Dr. Wiener:

I think we should encourage the Asian and African statesmen, who are meeting in April, to dream the dreams of which mankind is in need. If we could devise a letter expressing the concensus of a number of people it would offer less confusing counsel and could receive more attention than individual formulations. I enclose a draft of such a letter.

I would appreciate your advice.

Sincerely yours



PJM

Philip Mayer

P.S. Lewis Mumford says that to revise the letter would be laborious and diluting. He will sign it as it is if ten others will do likewise. Would you prefer that?

I have a son Rollin working on the ^{MIT} electronic calculator near Concord.

[ans 2/28/55]

(D R A F T)

(36 S. Center St., Perry, N.Y.)
March 1, 1955

(To the Presidents and Ministers
of Asia and Africa)

Dear _____

We hope your prospective meeting with other Asian and African leaders will fulfill your highest expectations. Many people in the world are in desperate need, many are full of fear, many are zealous for partisan causes. Amid the pressures and perplexities of this situation we write to urge upon you not caution but fearlessness, not calculation but wisdom, not effusion but discipline, not a partisan program but the development of universal ideals.

We shall be watching you, because any solution you discover should help us all. The world is tired of oppression, dogma, and war. It is tired of the efforts of various governments to dominate, or to build defensive associations. We count upon you to develop independent solutions; to enunciate the principles of a new society.

Deeper than the need for bread among starving people is the need for a new confidence in man,— the confidence upon which democratic institutions can be established, the confidence upon which liberating philosophies can be developed, the confidence upon which men can aspire toward economic brotherhood.

Because of great wealth our own country continues in ancient superstitions which you can no longer afford to tolerate. You are aware of our weaknesses;—our people in large measure still adhere to political, religious, and economic institutions based upon survival interests, rather than upon fulfillment. Survival is important, but survival is not growth. Survival effort breeds conflict, division, and stagnation. In contrast, evolution and progress depend primarily upon a capacity of energy to integrate and harmonize; to fulfill potentials.

The way of Caesar, of grasping for survival strength, is failing in Moscow and Washington as it has in Rome. We have need that you shall be the Asokas to reintegrate our world into a community of love, a matrix in which people of understanding, of technical skill, and of artistic genius may mature.

Sincerely yours

January 24, 1955

Mr. Raymond Ayoub
Mathematics Department
The Pennsylvania State College
State College, Pennsylvania

Dear Mr. Ayoub:

Unfortunately, I must decline your friendly invitation to participate in the hundredth anniversary celebration of the Pennsylvania State College.

I find myself swamped with almost an indefinite number of obligations to fulfill before I leave for Europe, Israel, and India early this summer, and I must cut down my lecturing and visiting as much as possible if I am to retain my health.

Sincerely yours,

Norbert Wiener

NW:gf

[ca. Jan. 24, 1955]

Professor Stanley M. Jacks
Division of Social Studies
Simmons College
Boston 15, Massachusetts

Dear Professor Jacks:

Thank you so much for your invitation to address the Simmons College Chapter of the American Association of University Professors.

Under ordinary circumstances I should be glad to do so, but the circumstances are not ordinary. In the first place, I have a second volume of my autobiography to finish and another book on scientific method to write before I leave this summer for Europe, Israel, and India.

I am very tired from accumulation of past work, and I am under medical orders to avoid every new addition to my schedule that can be avoided at all. The result is that no matter how tempting an invitation may be, my wife and my doctor join in ordering me to turn it down.

Sincerely and regrettably yours,

Norbert Wiener

NW:gf

UNIVERSITY OF CALIFORNIA

DEPARTMENT OF MATHEMATICS
STATISTICAL LABORATORY
BERKELEY 4, CALIFORNIA

January 25, 1955

Professor Norbert Wiener
Department of Mathematics
Massachusetts Institute of Technology
Cambridge 39, Massachusetts

Dear Wiener:

Thank you for your kind note. The first letter should, however, have been mine - to thank you for the opportunity of speaking with you at length. I hope such occasions will arise again and again in the future.

I shall look forward to seeing you in California in 1956.

Our very best to Mrs. Wiener.

Sincerely,



Edward W. Barankin

EWB:dmo



THE WORCESTER FOUNDATION FOR EXPERIMENTAL BIOLOGY

Shrewsbury, Massachusetts

January 25, 1955

Dr. Norbert Wiener
Massachusetts Institute of Technology
Cambridge 39, Massachusetts

Dear Norbert:

Thanks for your good letter of January 19th and also for returning the remaining copy I have of my paper.

I am very much interested in your comments. The remarkable locked frequency with a more diffuse fringe is certainly a new and exciting idea and would not be predicted by my statistical treatment of the alpha rhythm. I wonder, however, if this locked frequency may not be a sign of a specific underlying chemical pacemaker which involves a low energy of activation, only 8000 calories, but which nevertheless is of great importance in regulating events in the brain. You may recall that I found that the human time sense as judged from the estimation of short intervals gives an activation energy of 24,000 calories which is quite different from that of the alpha rhythm. This has led me to believe that the alpha rhythm per se is not the clock against which our judgments of time are based since by clock I had in mind the kinetics of some specific underlying chemical system. The judgment of time cannot, it seems to me, depend upon the alpha rhythm per se because each has a different chemical pacemaker regulating it. In short, the alpha rhythm may not be the basis for our psychological judgment of duration although it certainly can very readily be of great significance in the ^{integration} interaction of ^{the} nervous system and in processes of perception. This appears to be all the more true in view of the findings that you and your group have tuned up.

Pr rather its underlying clock

I certainly am going to try to learn something about your process of autocorrelation. I feel dreadfully ignorant in even having the temerity to write in reply to your good letter.

In any case, thanks ever so much.

Sincerely yours,

Hudson Hoagland

HH:B

[ans 4/28/55]

Tokyo Institute of Technology
Oh-okayama, Meguroku
Tokyo, Japan

January 25, 1955

Professor Norbert Wiener
Massachusetts Institute of Technology
Cambridge 39, Mass., U.S.A.

Dear Professor Wiener:

It is indeed a good news to receive in the first month of the new year that you and Mrs. Wiener are considering a possibility of stopping in Japan on your way home from India in spring, 1956.

In the first place I assure you both of a very hospitable welcome to Japan. Immediately after receiving your letter I started to get in contact with various societies so that you would enjoy your second visit and that we would, at the same time, profit a great deal by your lectures and discussions.

The groups with which I have made tentative plans read as follows: the Mathematical Society of Japan (Prof. Shokichi Iyanaga, Tokyo), the Physical Society of Japan (Prof. Masao Kotani, Tokyo), the Telegraph and Telephone Corporation of Japan (Mr. Zen-ichi Kiyasu of its Research Laboratory), Research Institute for Fundamental Physics (Dr. Hideki Yukawa, Director, Kyoto), some universities, Osaka (Dr. Kenjiro Shoda, President) , Kyoto (Professor Akizuki) and others.

For the main financial backing, however, we have to rely upon some large concerns such as the Asahi Newspaper (which published your photograph last time) and the Iwanami Publishing Company, each being the best in the field. It is of course expected to receive favorable support from this group. As soon as more definitive arrangements are made, I shall get in touch with you. In the meantime it is our hope that you and Mrs. Wiener will write down the itinerary, which includes Japan.

With our best wishes to Mrs. Wiener and the young families at Murray Hill,

Sincerely yours,

S. Ikehara
Shikao Ikehara

[ans 1/31/55]

UNIVERSITY OF MINNESOTA
COLLEGE OF SCIENCE, LITERATURE, AND THE ARTS
MINNEAPOLIS 14

PROGRAM IN AMERICAN STUDIES

January 25, 1955

Mr. Norbert Wiener
Massachusetts Institute of Technology
Cambridge, Massachusetts

Dear Mr. Wiener:

We can understand how your many interests and varied obligations make it impossible for you to be with us next year. If our research project continues beyond 1955-1956, perhaps you can be with us for a brief time, if not for a full year.

We shall be grateful if you can suggest possible participants, in particular men who already have an interest in the significance of science and technology in American civilization.

I am very much interested in the desire of various people at M.I.T. to relate the sciences and humanities more closely, and I shall hope to visit your campus to learn more concerning your procedures.

Cordially yours,

Tremaine McDowell

Tremaine McDowell
Chairman

TMcD:pb

[ans 2/28/55]

REPUBBLICA ITALIANA

ISTITUTO NAZIONALE PER LE APPLICAZIONI DEL CALCOLO
ROMA - PIAZZALE DELLE SCIENZE 7

January 25, 1955

IL DIRETTORE

Professor
Norbert Wiener
53 Cedar Rd.
Belmont 78, Mass.
U.S.A.

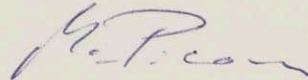
Dear Professor Wiener:

This Institute has not failed to send you its publications periodically, but no acknowledgement of them has ever reached us.

Would you please be so kind as to let us know if the contents of our publications are of interest to you. If they are, we will continue to send them at the usual intervals. We shall consider an absence of reply as being in the negative.

In the meantime, we have arranged for our publications from No.401 to No.410 to be sent to you. This consignment will be the last, unless we hear from you that they are of use.

Yours faithfully,



Mauro Picone

c/t

{ano 2/28/55}

January 25, 1955
San Diego 52, Calif.

Professor Norbert Wiener
Department of Mathematics
Massachusetts Institute of Technology
Cambridge 39, Mass.

Dear Professor Wiener:

The scientific discovery stated in your letter of January 19 suggests the question whether the "psychophysical clock" is based on the same central alpha rhythm with all individuals. Or is it a characteristic associated with a concrete person only?

If there is a universally valid time unit for all psychophysical clocks, its origin would have to be attributed to the electromagnetic field, (unless one invokes Leibnitz's "preestablished harmony", *Cybernetics* pp. 52-53). One would arrive at a universal constant. If the central alpha rhythm is a characteristic of the person, it might be processed internally by a stochastic mechanism.

Taking it for granted that your central alpha rhythm does not drift, it may serve as a master-clock conveying the basic rhythm of the macro-time flow in the surrounding universe. On the basis of such fundamental information, the peripheral neural mechanisms may process their own local system-time in the stochastic way, through Poisson distributions of nerve discharges. If this is the case, continuous time-drift in the micro-time domain and pronounced relativistic effects should be expected. One could look also into the possibilities of neural time-expansion and time compression due to deceleration or acceleration of the local clocks.

The present dead point in Psychophysics may be attributable to the fact that the time reference used is Newtonian and not Bergsonian. (*Cybernetics*, pp. 40-56). I feel that Psychophysics would greatly gain if you would enter the mathematical analysis of micro-time flow, and derive the consequences on running power spectrum and auto-correlation.

I have approached Prof. R. Fano in connection with with my auto-correlational hypothesis of the diatonic musical intervals.

Thanking you for for the privilege, I am

Sincerely yours,

Anthony, P. Allen

(Code 2920/f)

U.S. Navy Electronics Lab.
San Diego 52, Calif.

[ms 2/28/55]

first priority

MASSACHUSETTS INSTITUTE OF TECHNOLOGY

Recommendation for Appointment

Mathematics

Name of Department

January 26, 1955

Date

I desire to recommend the * appointment of
 Mr. Antonio Motta de Souza Barbosa
 as Visiting Fellow
 beginning March 1, 1955 for four year(months),
 at a salary of \$ _____ per _____ to be charged
 to † _____.

This appointee is a candidate for the _____
 degree and will receive a staff scholarship in the amount of \$ _____. His tuition
 rate per term is _____. He receives support from the G.I. Bill
 in the amount of \$ _____ per month for subsistence and \$ _____
 per term for tuition. He shall receive a vacation of _____ weeks per calendar year.

Brief remarks as to qualifications, reasons for making recommendations, terms in
 which salary is to be paid, and other pertinent information.

Dr. Barbosa is Assistant Professor of Pathology at the Medical School,
 University of Recife, Brazil and according to Dr. Rolla B. Hill of the
 Rockefeller Foundation, Dr. Barbosa has been awarded a Fellowship in the
 Division of Medicine and Public Health. He wishes to come to M.I.T. to study
 Cybernetics as applied to Biology. Dr. Hill has written Professor Wiener about
 this possibility and Professor Wiener has agreed to devote some time to Dr.
 Barbosa until the end of June when Professor Wiener leaves for Europe, India and
 elsewhere.

NOTE: In case of promotion or replacement, please add the following information:

Present title _____

Present salary \$ _____

Present incumbent _____ Salary \$ _____

 Signature Head of Department

 Dean's Approval

 President's Approval

(This blank is supplementary or
 additional to budget recommen-
 dations previously approved.)

* State whether Appointment, Promotion,
 Increase of Salary, Leave of Absence.

† Salary Account, DIC Project or Special Fund.

Indiana University
Bloomington , Indiana

Graduate Institute for
Mathematics and Mechanics

January 26, 1955

Dear Professor Wiener :

Perhaps you remember when I was in India sometime ago I had sent you a letter along with the reports of the examiners of my thesis for the Ph.D degree (Prof. Titschmarch and Prof. Bailey) and had expressed my great desire to come to United States and to do some research on Fourier Integrals and Transforms under you. You had been very kind to send me its reply dated April 12, 1954 .

I am glad to inform you that since October last I have been working with Prof. Truesdell as a Post Doctoral Research Fellow in the Department of Mathematics in this University. My contract with the University is till June 1955 .

As I had written to you before I am very much interested in Transform theory and would feel it an honor to work with you . I have written 14 research papers containing the results of my investigations, out of these 8 have been published and others are under publication. The reviews of the papers are quite encouraging.

Herewith I am sending you the reprint of one of my earlier papers. Perhaps you would get some idea of the nature of my work. I am sorry I have not got here the reprints of other papers. I have written to India for them.

Now I wish to know if any such Fellowship is available at M.I.T from June or September 1955 so that I may get an opportunity to do research under your guidance.

Sincerely yours,

K P Bhatnagar

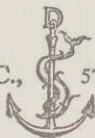
K. P. Bhatnagar

~~Encl.~~

Reprint of ~~a~~ paper.

[ms 2/28/55]

DOUBLEDAY & COMPANY, INC., 575 MADISON AVENUE, NEW YORK 22



MURRAY HILL 8-5300

January 26, 1955

Dear Professor Wiener:

February 3rd will be fine for lunch, and I look forward to seeing you here in the office. I will have more chapters for you then. I hope that the work goes well, and in the meantime I look forward to seeing you.

Yours,

A handwritten signature in blue ink that reads "Jason Epstein". The signature is fluid and cursive, with a long horizontal stroke extending to the right.

Jason Epstein

Professor Norbert Wiener
Department of Mathematics
Massachusetts Institute of Technology
Cambridge, Massachusetts

JE:nr

HARVARD COLLEGE OBSERVATORY

CAMBRIDGE 38, MASSACHUSETTS

January 26, 1955

Professor Norbert Wiener
Massachusetts Institute of Technology
Mathematics Department
Cambridge 39, Massachusetts

Dear Norbert:

You may possibly have seen a short paper that I wrote more than twenty years ago, entitled "Directions to Authors of Scientific Papers." After a number of revisions, this paper is now out of print. Professor Howard Mumford Jones, of Harvard University, and I are planning to revise and amplify this study, to cover a number of different fields. We should like to have your advice.

In particular, we should like to have examples or references of technical articles in your field that strike you as being either excellent or as very bad, say two of each kind. I should greatly appreciate it if you would give us, in duplicate, such references and any other suggestions that may occur to you concerning your views on scientific writing in your field. Our chief concern is with the technical paper rather than with books, popular or scientific.

With many thanks, I am

Very truly yours,

Donald H. Menzel

Donald H. Menzel
Director *pa*

DHM/va
cc: Prof. Jones

[ans 1/28/55]



Jan 26

Dear Professor Wiener,

The spectacular success of Monday night's Alumni Council meeting prompts me to follow-up my verbal comments by this letter. Many thought it the best of all our Council meetings. Several called the office Tues AM to tell how much they enjoyed it. And some who were not there told of having heard from others how informative and inspiring the evening had been.

None were more pleased than Hugh Ferguson, president of the Association, and I. Again many thanks — and good luck in New York on Wednesday.

Sincerely,

Dodd Lawrence

MASSACHUSETTS INSTITUTE OF TECHNOLOGY

.....19.....

Memo to.....Room.....

Alumni Council Dinner and
Talk, February 2

Lv. Boston 1 p.m. Feb. 2, arr. New York 5 p.m.
Dinner and cocktails (Longchamps) 6 p.m.
Feb. 3, Lunch, Jason Epstein--575 Madison Avenue
445--Advanced Merchants Limited
8:40--arr. South Station

from.....Room.....

January 26, 1955

Dear Jason:

I am sending you the revised 4th and 5th chapters, according to my new numbering. I have followed your advice in cutting both chapters, although you may feel that I have not gone far enough in that direction. Still after such full detail as I gave in the first three chapters, it is a little difficult to adopt a completely different scale of approach in the fourth.

I have eased up on the Courant matter in Chapter 5, and I have come nearly to the limit. It was an important episode in my life, and I must tell it as an unpleasant one even if I must confine myself to the minimum of recrimination. This I think I have done.

It is my opinion that I have put as much work into the rewriting of the two chapters I send you as into the earlier three chapters. The next two chapters, which I have with me, I will do in short order and have in your hands by the weekend. I shall welcome any more chapters you can send me, as this is the period of my best working time. From now on in the book, there will be no or practically no extension of material, and I am quite ready to make considerable cuts.

I would very much appreciate ~~it~~ if you would okay for me the arrangements my secretary has made with you for lunch together on the 3rd. I can give as much time as you wish to working together then.

Sincerely yours,

Norbert Wiener

Mr. Jason Epstein
Doubleday and Co.
575 Madison Avenue
New York 22, New York

N.W./gf

Enclosure

Richard W. Carlisle, P.E. *
One Hunters Lane, Elmsford, N.Y.
January 27, 1955

Professor Norbert Wiener
M.I.T., Cambridge, Mass.
Dear Prof. Weiner:

The writer expects to see you at the New York M.I.T. club dinner Feb. 2.

This will renew an acquaintance of approximately thirty years ago, when I attended mathematical lectures of yours. These were more notable for your clear thinking than for my ability at following details.

Your clear thinking has by this time become a by-word in many fields. In one field I have put in my two-cent's worth: that of planning cities for atomic war. I have been an ardent reader of the "Life" article of Dec. 18, 1950, in which radial and peripheral highways and other projects were recommended; prior to that I had made analogous suggestions to Civil Defense authorities applying to New York City; and recently I have visited with federal C.D. authorities and city planners. I belong to the Civil Defense Research Association, which I recommend as a group of enlightened thinkers; and to the Regional Plan Association of New York, which shuns the subject!

The administration of plans of the magnitude you and your associates recommended is so nicely divided between federal, state and city authorities that each can completely disclaim any responsibility for action. The most reactionary of all are the suburban authorities, who are reluctant to open up their neighborhoods to city people in case of an attack, because of the fear of rowdy actions by undesirable elements of the population.

The principal hope for action appears to be in help from the federal roads bureau of the Dept. of Commerce, acting under guidance from the Federal Civil Defense Administration. However Congress has turned down any specific deal. General Lucius Clay is acting as advisor on highways to President Eisenhower, and I fail to note in his recommendations (as published) any emphasis on better highways for evacuating urban personnel.

I commend to your attention the idea that special courses in the sociological approach to this problem should be set up, not only at M.I.T. but in the other principal target cities. To be effective, these courses must enlist the cultural support of city planning and budget authorities.

I shall appreciate it if you can give me a few words of wisdom on this subject after dinner- as well as on the subject of automation!

Respectfully yours,

R. W. Carlisle

Course VI-C Class of 1926

* Industrial Acoustical Designer, Dictograph Products, Inc., Jamaica, N.Y.

January 26, 1955

Professor Erwin Schrödinger
Dublin Institute for Advanced Studies
School of Theoretical Physics
64-65 Merrion Square
Dublin, Ireland

Dear Professor Schrödinger:

Thank you very much for your helpful letter regarding our paper on the differential space theory of quantum systems.

May I comment on some of your remarks:

1. You say, in effect, that it seems unnatural to take the smallest of the ratios of equation 14 in determining the eigenvalue of the operator R. In our earlier paper, a reprint of which is enclosed, we did present an alternative method which to some extent would appear to satisfy your wish to have the eigenvalue satisfy a maximum rather than a minimum criterion. This is the so-called dichotomic method and is given in section IV. However, it has the substantial disadvantage that it does not give the eigenvalue by a simultaneous multiple choice, but by an infinite sequence of binary choices.

2. Regarding your remark that our points in differential space for which the choice of R is indeterminate, this was an inadvertent omission on our part, and we have corrected the paper accordingly.

3. Concerning your suggestion that a quantum system of many degrees of freedom is reducible to one of one degree of freedom, shortly after writing this paper and committing it to the dittoed form, a formal device occurred to us which incorporates exactly your suggestion. In the paper that ultimately will be published this device will be incorporated.

4. Your objection to the fact that, in effect, the eigenvalue associated with a given differential space point is indifferently sensitive to the location of the differential space point and to the wave function itself; although this is certainly true, nevertheless the statistical distribution of eigenvalues remains, of course, smooth, and in it this sensitivity is, of course, ironed out. We believe that this feature of our theory is closely associated with the small and smoothly varying probability for big quantum jumps that appears in ordinary quantum mechanics.

5. Your point about the unclarity of the first paragraph, section IV, p. 12, is well taken, and we have incorporated your suggestion.

6. We grant that the salient feature of our theory is its acceptance of the discontinuity of physical processes which the classical quantum mechanics introduced.

HOUSE OFFICERS' ASSOCIATION

**NEW ENGLAND MEDICAL CENTER
HARRISON AVENUE AND BENNET STREET
BOSTON 11, MASSACHUSETTS**

January 27, 1955

Norbert Wiener, Ph.D.
Professor of Mathematics
Massachusetts Institute of Technology
Room 2-155
77 Massachusetts Avenue
Cambridge, Massachusetts

Dear Professor Wiener:

The House Officers' Association of the New England Medical Center takes pleasure in inviting you to deliver one in the annual series of the Posner Lectures.

It is customary for the Educational Committee to invite outstanding personalities in all fields of scientific endeavor to appear as guest speakers.

We feel that a resume of your advances in the comparison of cerebral mechanism vs. human cerebral function would contribute greatly to our program.

We hope, therefore, that you will find it convenient to appear on a Wednesday or Thursday in either May or June of this year, at 7:30 P.M.

Cordially yours,

Stephen R. Fromm, MD

Stephen R. Fromm, M. D.
James H. O'Connor, M. D.
William S. Curran, M. D.
Harrison Reeves, M. D.
EDUCATIONAL COMMITTEE

SRF:ss

[ama 2/4/55]

NATIONAL SCIENCE FOUNDATION
WASHINGTON 25, D. C.

January 27, 1955

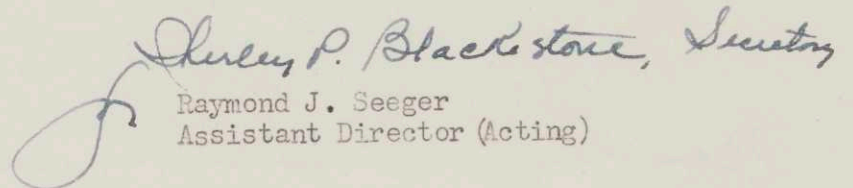
Professor Norbert Wiener
Department of Mathematics
Massachusetts Institute of Technology
Cambridge 39, Massachusetts

Dear Professor Wiener:

It was with sincere regret that I learned that you will be unable to be with us on February 2d. I am even more concerned about your health. Accordingly, I believe that we had better postpone making any further arrangements for your visit until some future time.

Again may I thank you for your interest in visiting us.

Cordially,


Raymond J. Seeger
Assistant Director (Acting)

January 29, 1955

Professor Jerzy Neyman
Statistical Laboratory
University of California
Berkeley 4, California

Dear Neyman:

I enclose the statistical article which I promised to give you. It will form one chapter in the book I am writing on the grammar of the semi-exact sciences.

I request the permission to publish it there either as it stands or with the necessary changes to adapt it to the larger structure of the book.

Sincerely yours,

Norbert Wiener

NW:gf

Enclosure

[ms 2/17/55]

January 30, 1955

Professor M. S. Sundaram
Educational and Cultural Counsellor
Embassy of India
2107 Massachusetts Avenue, N. W.
Washington 8, D. C.

Dear Professor Sundaram:

I regret very much to hear of the death of Dr. Bhatnagar. He certainly contributed enormously to the rapidly rising scientific prestige of India, both by his own work and his wide sympathies. He is a man who you can ill afford to have lost. Luckily there is a rising generation of scientists in India to continue his work.

I am writing to Dr. Mahalanobis in accordance with your suggestion. I am enclosing a copy of the letter I am sending to him.

Margaret and I are counting very much on our trip to India, and I am actively engaged in learning a few words of Hindi.

Thank you for your courtesy and interest.

Sincerely yours,

Norbert Wiener

NW:gf

Enclosure

Dornach, Haus Siebeneck

30. Januar 1955

Sehr geehrter Herr Wiener,

mit bestem Dank bestätige ich den Empfang Ihres freundlichen Schreibens vom 19.1.55. Haben Sie besonders auch Dank für die Mitteilung, daß Sie im August voraussichtlich kurze Zeit in der Schweiz verbringen werden.

Inzwischen habe ich Pläne gemacht, um auf jeden Fall die Zeit zwischen dem 19.4.55 (Britannic an New York 16.4.55) und etwa Mitte Oktober in den Vereinigten Staaten zu Studienzwecken zu verbringen, und habe deshalb die - gleichzeitig mit Ihrem Brief eingetroffene - Bitte von Mr. W.T. Martin, um nähere Information über meine Ausbildung und Pläne beantwortet.

Ich hoffe nun sehr, daß es möglich sein wird, daß ich die fünf Wochen bis zum Semesterschluß, oder bis Juni Studien am MIT beginnen kann.

Inzwischen gebe ich der Hoffnung Ausdruck, Sie dann kennenzulernen und begrüße Sie bestens

Ihr sehr ergebener

Georg Unger

31 January 1955.

Dear Dr. Wiener,

I am glad to receive your letter of 20 January 1955 and to learn that there is a good possibility of your coming to India again.

I am not clear about one important point. In the first paragraph of your letter you mention about your visit "in the course of this coming year". I presume it means the present year, that is, 1955-56 (and not 1956-57). I should like you kindly to confirm that you expect to arrive in India by early September of this year (1955) and staying in India until April 1956 or perhaps longer.

I am assuming that you would spend a part of your time in the Indian Statistical Institute. I am also making enquiries about other institutions which may like to have you for a part of your time in India. I shall write to you again after I hear from you and from the heads of the Institutions to whom I am writing.

I greatly appreciate your kind reference to Dr. S.S. Bhatnagar. His sudden death was a great loss for India.

I am glad to know that your daughter's wedding went off quite well and that everything is well with Mrs. Wiener and you and the whole family.

Looking forward to welcome Mrs. Wiener and you before long and with best wishes from Rani and myself,

Yours sincerely,

P. C. Mahalanobis

Dr. Norbert Wiener,
Massachusetts Institute of Technology,
Department of Mathematics,
Cambridge 39, Mass.
U.S.A.

January 31, 1955

Dr. S. Ikehara
Department of Mathematics
Tokyo Institute of Technology
Oh-okayama, Meguro-Ku, Tokyo
Japan

Dear Ikehara:

I am almost certainly going to Japan a year from April, that is, April 1956. My schedule for the entire trip will probably be something like the following. I shall go over to England this coming May to give an invited lecture at the University of Southampton. I should spend the summer in Europe, where I shall give occasional lectures. In the late summer I shall go to Israel and from there to India, where I shall stay till April. Then I shall come to Japan either by air or by sea. I shall stay there several weeks, according to fit whatever plans you make for me, and then I shall return by way of California, where I shall spend the summer of 1956.

I am delighted to have a chance to see Japan again. I should like to ask of you, however, the following favor concerning my schedule. I am not as young as I was in the days in which you were my student, and my year's schedule will be a pretty grueling one. May I then ask you if my schedule can be arranged for me to give not more than an average of two lectures a week, and in any case, never more than three.

My work is coming along very well. I am doing a new book on the grammar of the semi-exact sciences, and I am finishing my autobiography. I am also engaged in what looks to me like very important work on brain waves. This is a subject in which I should very much like to lecture in Japan, because I think we have something very important there.

Margaret and I are well, and if we are a little older, we are taking the years very easily. Peggy and Barbara are married, both to electrical engineers at the Bell Telephone Laboratories. Barbara has two very dear young children, a boy and a girl. Peggy is herself helping the family earnings by research work in biochemistry. She is working with a pharmaceutical house on the hormones. Barbara already has a house near Morristown, New Jersey, and Peggy and her husband are having one built in the neighborhood.

Margaret and all my Tech friends join in sending you our best regards.

Sincerely yours,

NW:gf

Norbert Wiener

January 31, 1955

Professor M. S. Sundaram,
Educational and Cultural Counsellor,
Embassy of India,
2107 Massachusetts Avenue, N.W.,
Washington 8, D. C.

Dear Professor Sundaram:

I have just received a request to give the second Fawley Foundation lecture at the University of Southampton in late May. Besides an honorarium, they are offering to pay my transportation to England and back. I am negotiating with them to find out if it will not be possible for me to transfer the part of my fare that would have been devoted to return to the United States to cover my wife's passage to England. Under these circumstances, I cancel my request for transportation from the United States to Europe.

The situation has also changed at the other end of my trip. I have an invitation to lecture in Japan after I leave India in the spring of 1956. I know nothing of the ease with which you can find transportation for me from India to Japan and with which you can cover this with Indian funds rather than foreign exchange. I think it is equitable to suggest that you convert to this purpose the amount of money which I am saving you by starting my Indian trip in Europe rather than in the United States. It is even possible, but not at present certain, that I may persuade the Israeli government to furnish our expenses from a European port to Cairo by way of Israeli; and if this should prove to be feasible, I should also like any savings that we make to be put to our disposal in the same way. This matter is however not yet certain, and I am writing to Israel to inquire.

As I shall have plenty of time, I shall be quite content if the transportation found for me to Japan be by sea and not by air. This is however a matter for the future. I have already written to Mahalanobis as you suggested, and I am passing on to him a copy of this letter for his information.

Respectfully yours,

Norbert Wiener

NV:gf

P. S. It is not 100 per cent certain yet whether I shall come back from India by the eastern or the western route. If I were to come back by the eastern route, I am thol that the fare from

Calcutta to San Francisco is about 700.00 (Tourist Class), while the fare from Boston to Bombay is 635.00. Beyond San Francisco I should have no claim on your people as I have an invitation to lecture in San Francisco in the summer of 1956. I realize that the expenses to San Francisco are slightly greater than those to Boston, and also that it may not be possible for you to ship me any part of the distance back to San Francisco either by your own lines or by those with which you have especially favorable exchange relations. However, I should like to know whether you can make arrangements for me to speak in Japan and how far you will be willing to go in paying our expenses.

It is not necessary that we come to a sharp decision of the details of this in the immediate future, but it is very important for me to find out as soon as possible whether I can return by Japan.

M.S.

I have an invitation to lecture in San Francisco in the summer of 1956. I realize that the expenses to San Francisco are slightly greater than those to Boston, and also that it may not be possible for you to ship me any part of the distance back to San Francisco either by your own lines or by those with which you have especially favorable exchange relations. However, I should like to know whether you can make arrangements for me to speak in Japan and how far you will be willing to go in paying our expenses.

It is not necessary that we come to a sharp decision of the details of this in the immediate future, but it is very important for me to find out as soon as possible whether I can return by Japan.

I have an invitation to lecture in San Francisco in the summer of 1956. I realize that the expenses to San Francisco are slightly greater than those to Boston, and also that it may not be possible for you to ship me any part of the distance back to San Francisco either by your own lines or by those with which you have especially favorable exchange relations. However, I should like to know whether you can make arrangements for me to speak in Japan and how far you will be willing to go in paying our expenses.

January 31, 1955

Professor Mahalanobis
Indian Institute of Statistics
Barrackpore
Trunk Road
Calcutta, India

Dear Professor Mahalanobis:

The enclosed letter which I am sending to Mr. Sundaram at the Indian Embassy in Washington is self-explanatory. I am sending it to you for your information.

As you see, I am proposing nothing that will add to the expense the Indian government has already proposed to take on my behalf.

With best wishes from house to house and in contemplation of the pleasure we shall have in seeing you soon, I remain,

Sincerely yours,

Norbert Wiener

NW:gf

Enclosure

January 31, 1955

Professor Arnold Metzger
St. Paulsplatz 9
Munich, Germany

Dear Professor Metzger:

I have been receiving letters recently from a gentleman by the name of Magoroh Maruyama. While Mr. Maruyama does not suggest to me in so many terms not to come to Germany, he has pointed out to me what you have also pointed out, that I shall be treading on a great many toes if I give a public lecture in Germany, and frankly I think that this is neither necessary nor desirable. In the first place, there is a strong attitude in Germany that the classical German metaphysical tradition is the only valid philosophical tradition, and that an American giving philosophical lectures in Germany will be bringing coals to Newcastle. This, according to my informer, and to a certain extent according to yourself, is closely tied up with every shade of nationalism in Germany, from the mild supporters of the regime before the First World War to the most irreconcilable Nazis.

From what I hear there has been a considerable measure of controversy concerning cybernetics, and this controversy has not been unmixed with a political coloring. Under the circumstances, I fear that a public lecture of mine on this subject might arouse bitter controversy.

May I therefore ask you in all humility to cancel my lecture? I shall very possibly be in Germany this summer, and if I am, I intend to look you up. I shall have no hesitation to talk of my ideas and work with you as an individual or with any other individuals of good will,

January 31, 1955

Professor Jerzy Neyman
Statistical Laboratory
University of California
Berkeley 4, California

Dear Neyman:

I am now far enough along in my plans for my trip to India to be able to say something definite about them. I am leaving this coming May for England, where I have an invited lecture at the University of Southampton. After a summer in Europe, I shall go to Israel for a lecture, and from there to India, where I shall stay from September until April. From there, in all probability, I shall come back by way of Japan; and after a brief stop in Hawaii, turn up early in the summer in California. Does your offer to me for me to spend a summer at your institute still hold good? If so, I am ready to take it up for the summer of 1956.

I am developing my work on the grammar of the semi-exact sciences. Within the last day or two I have seen my way clear to something I have been trying for for a long time. This is the precise definition of a large class of non-linear stochastic processes which I can reduce to functionals of a Brownian motion. The importance of this is that it just about closes the reduction of stochastic processes of a very general type to Markoff chains.

The work on brain waves is going remarkably and will unquestionably turn out to be one of the best fields for the applications of time series.

With best wishes to all my California friends and yourself from Margaret as well as me.

Sincerely yours,

Norbert Wiener

NW:gf

P. S. As my plans have to integrate together from American to America, please let me know as soon as possible by air mail, what you think of the practicability of my spending the summer of 1956 in California. N.W.

I have checked on the connections between southern Europe and Israel. There are ships leaving Naples for Haifa approximately 3 times a month. The fare for this trip ranges from 84.00 to 210.00 (ZIM line).

January 31, 1955

Professor C. L. Pekeris
Department of Applied Mathematics
Weizmann Institute of Sciences
Rehovoth, Israel

Dear Professor Pekeris:

My plans for my trip to India and Israel are taking shape. I have a lot of good new material to present to you, and I should particularly like to discuss the applications of auto-correlation methods to the study of brain waves. I have new results in this field which seem extremely promising in neurophysiology and psychiatry.

As to my travel to Israel and my expenses; while I am delighted to take the trip, I do not wish to be put to any out-of-pocket expenses whatever, nor to an excessive amount of inconvenience in making my way to India through the Arab countries. I therefore suggest the following terms. These will involve my leaving Europe some time in August and my departure for India at the beginning of September.

(1) I understand as you have offered, that all my expenses in Israel as well as those of my wife will be covered by the Weizmann Institute.

(2) The very least that I shall have to do to go to Israel is to interrupt my trip by Air India at Cairo, to find transportation from Cairo to Israel, and back again. These expenses will be incurred on your behalf, and I do not find myself in a position where I am able to make them out of my pocket.

(3) In view of the strained relations between Israel and the Arab countries I should like to find some way to make the trip from Cairo to Israel and back again in such a manner that the Israel visum does not cause me trouble in getting back to Cairo. I may say that it is essential that I go by Air India from Europe or Cairo to India in view of the difficulty of the Indian government in finding foreign exchange.

(4) I suggest however that this latter problem can be made easier without any great extra expense to you, by securing for us sea transportation to Israel from a south European port, perhaps an Italian one. Our expenses in Europe will of course be taken care of by ourselves, without any further load being placed upon Israeli sources.

Sincerely yours,

Norbert Wiener

N.W:gf

P. S. Please let us know by air mail at the earliest possible moment so that we can make definitive plans.