

# MORE DATA, MORE NOISE



A celebration of the 60th birthday of  
JEROME Y. LETTVIN

M.I.T.

February, 1980



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Dear Jerry,

You and I started a conversation thirty years ago and it continues. When we first worked together, you had built up a remarkable lab at Monteno State Hospital in spite of the fact that you were officially there as resident in psychiatry. You put yourself on permanent night duty so that you would have time in the day for neurophysiology. I used to sleep by the telephone and when it rang in the middle of the night, I would witness a repeated performance. You would come shuffling out, looking and acting like the original zombie of class Z science fiction movies. You would pick up the telephone and some nurse would describe to you the latest ongoing disaster among the patients of Disasterville. You would be still locked into the days problems and in your somnambulism you would say something like "Perhaps his capacitors are blown, check his fuses", put down the telephone and shuffle off. Since everyone in the hospital knew and loved you, they would give you just enough time to get back to bed and then call again. Then you would say, "Passion flower! Why didn't you call me before? I'll be right over." You are still on 24 hour duty and we still love you.

Patrick D. Wall

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Dear Jerry,

When did we first meet? It seems mists of time ago. Certainly I remember 1963 and you and Maggie stuffing me on raw hamburger, farm butter and cheese somewhere in Cambridge (Mass.). I recall we nearly broke the kitchen table arm-wrestling; you, of course, won. Years later your debate with Timothy Leary was important and so I remember you morality. Just as when you became Master of some wicked riff-raff of a house in M.I.T. I tried to find your rooms and found in fact some undergraduates. Now they were very interesting, because when they found I was looking for you they also volunteered what they thought of you both. You should be very flattered. And I guess at 60 one needs some flattery. But I don't really believe you are 60 Jerry. I think this is just an excuse for a party I can't come to. But if you really are 60, then Happy Birthday and may you long sit in your book-lined lab and stimulate us all along our intellectual ways.

Brian Boycott

P.S. Incidentally I believe it was you who pointed out my initials B.B.B. stand for Bullshit Baffles Brains. I forgive you.

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## GREETING TO DR. JEROME Y. LETTVIN

On His Sixtieth Birthday

In choosing totems for my gens  
From Fauna 'Mericana,  
The species I would reckon friends  
Include a pair from Rana,  
For I am fond of pipiens  
And more of catesbeiana,

But though I'd rather have my lens  
See frog than, say, iguana,  
Don't think my ranaphilic mens  
Is somehow less than sana  
Or that the news my vision sends  
Conduces to Nirvana

As if I saw like frogs, which spy  
Few beams that intersect 'em  
Because each feature-finding eye  
Keeps secrets from its tectum,  
Whereas my retinae descry  
Reality (I've checked 'em);  
Like photographs, they never lie,  
Since spectacles correct 'em,

And so my brain, told all, can find  
(And, having found, rejoices)  
The virtues of your heart and mind  
Among its million choices,  
So salient are they of their kind  
Despite distracting voices,

Nor do I speak with forkéd tongue,  
Though, had I one, I'd work it  
To sing the praises I've just sung,  
While granting that the circuit  
Down which this verbal urge was flung  
Is, here and there, bifurcate.

Happy Birthday!

Ted Melnechuk

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It is pleasant to have the opportunity to extend to Jerry Lettvin my best wishes at the occasion of his sixtieth birthday. My contacts with him throughout the years have always been most happy -- he has the gift of always being interesting, on whatever subject you talk to him. Lively, witty, informed, a good scientist and a fine fellow, with deep personal and social feelings. Jerry is a friend to cherish and be proud of.

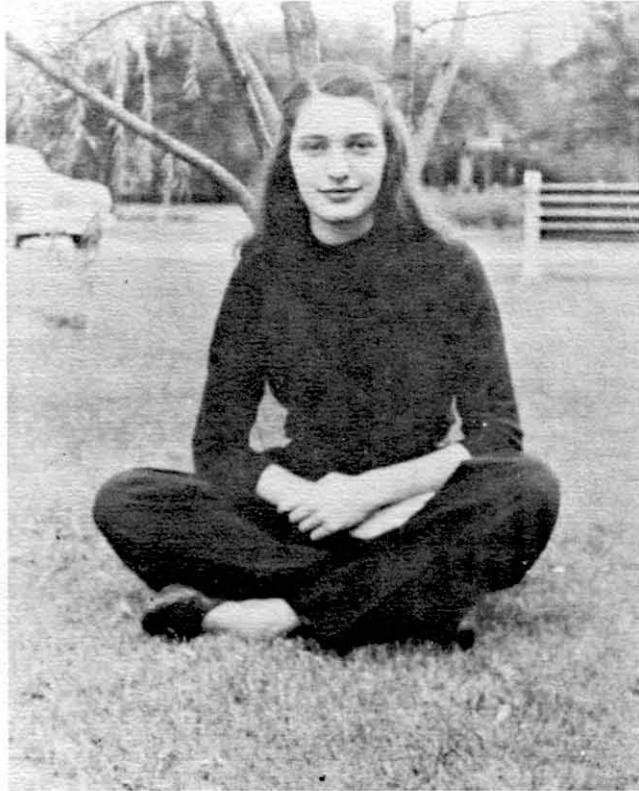
Ad multos annos, Jerry -- and your wonderful lady!

Dirk Struik

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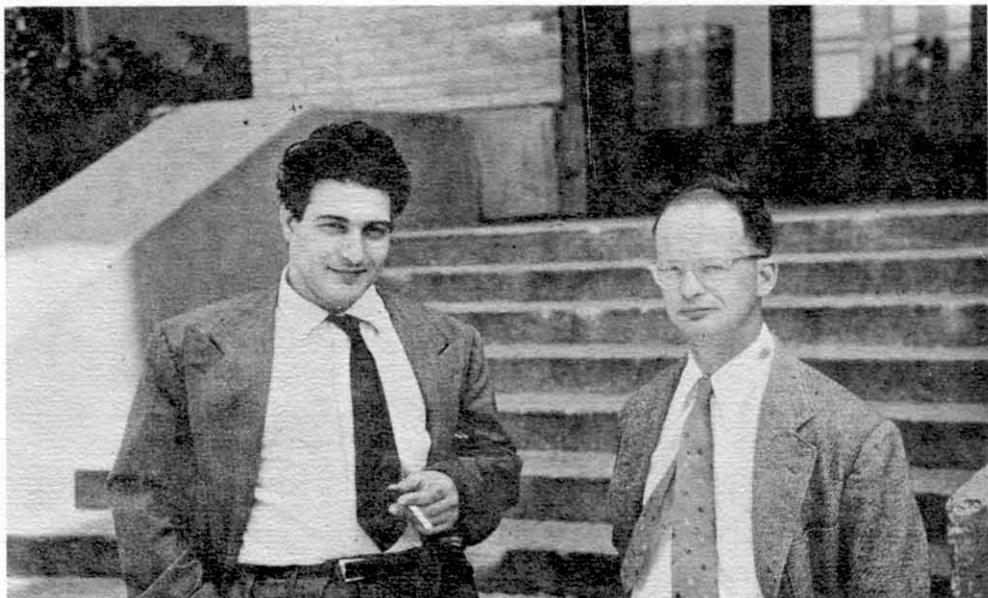
Lettvin -- the zoot-suited intern. Boston, 1942.



Maggie at 21. Manteno, Illinois, 1948.



Neurological Unit, Boston City Hospital, 1942. Drs. Harry Kozol, Herbert Barry, Alexandra Adler, Frederick Gibbs, Sidney Carter, Wilfred Bloomberg, H. Houston Merritt, Thomas Farmer, Madeline Brown, Charles Brenner, Donald Munro, Fred Woodson, Derek Denny-Brown, John Perry, Mark Wentworth, Edwin Cole, Walter Wegner, John Abbot, Paul Jossman, Samuel H. Epstein, William G. Lennox, Avery Weisman, Jerome Lettvin, Raymond Adams.



Jerry and Walter Pitts. ~1947.

My first meeting with Jerry was to talk about my working as a post-doc in his lab. I roamed around M.I.T. looking for a place with the unlikely name of 20C-007. To my untutored eye, M.I.T. looked bleak and at the same time M.I.T. people looked very smart.

Lettvin's lab/office was in a cave-like room in a makeshift building that looked like a slightly sedentary version of an IRT subway train. Penny, the secretary, had her desk right next to the door. It was pretty dark in her area of the room, the windows were far away and the only light on was a small lamp on her desk. The room was bare; they had moved into 007 only a few months before. Behind a partition were a few students working at a large wooden table covered with books, papers, old mail and empty coffee cups.

Penny invited me to sit down and wait for Jerry. I actually had an appointment! Ten minutes later in sauntered Jerry. He was wearing what I soon learned was his standard uniform -- a wrinkled, coffee-stained short-sleeved white shirt, black pants, and blue canvas shoes. I stood up to introduce myself but the phone rang. I stood there in limbo while Jerry talked to his publisher about a manuscript he hadn't yet finished (what else is new?). I finally introduced myself and without any preliminaries Jerry said let's sit down and talk. We moved over to a corner of the large table. He took his arm and swept it across the table clearing a space for us. That's what I remember most about the day, that immense ham of an arm sweeping across the table (other people are mesmerized by his dirty elbows). I told him about my work and when I got to a part that he found interesting he lit up like a hyperactive pinball machine. He fired questions at me and listened with an intensity that knocked me over. He told me of similar work he had done which he hadn't published. He asked me several questions I couldn't answer and others I hadn't even thought about. He never introduced me to anybody at the table although at one point he shouted over to a fellow reading at another table "Hey Shin-Ho you may find this interesting." Shin-Ho nodded, observed the proceedings out of the corner of his eye and continued reading.

I said I'd like to come to work as a post-doc. He told me the lab was crowded and there was not much money. I said I would apply for a fellowship if I could use his lab as the sponsoring institution. He gave me a lukewarm affirmation. What did he think I should work on? Oh people can work on anything. He told me to see some other people in a few related labs and that's the last I saw of Jerry until I arrived in the lab almost a year later.

Ed Gruberg

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In Jerry's lab, there is always equal time for the excitement of ideas and for the personal problems of all comers. One day, a destitute artist walked into 20C-025 and spent a day or two talking with Jerry (and anyone else who showed up). He had been an artist-in-residence at a small school somewhere in the northeast, but was now without a job and feeling quite discouraged. People were not ready

for his sculpture, which was experimental. The artist carried a wallet full of snapshots of his work; an embalmed cat in a transparent rectangular plastic box is the one I remember best. The artist thought that since sculpting was a risky way to earn a living, he might go into the field of mental health.

Jerry promptly obtained a job for the artist at one of the local hospitals. In gratitude, the artist suspended one of his most impressive sculptures from the ceiling in 20C-025.

The sculpture did not go unnoticed. It hung directly above the table, leaving a clearance of perhaps 20-40 cm, and its length and breadth were only a little less than the dimensions of the table. It was constructed of a used inner tube from a large jet plane by inflating generously and then constricting with wire to form an interesting shape. The leader from the binding wire was used as the suspensor, permitting the whole affair to respond to air currents in lively fashion.

For quite a few days, we who sat around the table hunched down in our chairs and peered under this black floating object whenever we desired to extend our conversation across the table. We shifted nervously as the object swayed in the draft which swept in from the hall whenever the lab door was opened.

Then, one morning the sculpture was gone. So were the canaries. Also not evident at first sight were many of the books and papers which had lined the walls and accumulated on all the level surfaces of the room. Closer examination, however, made clear that there had been no theft -- the floor was covered with debris, including bits of black rubber.

Brad Howland appeared to explain what had happened. In the middle of the night, his lucubrations in 20C-025 were interrupted by a loud explosion. The over-inflated tire had disintegrated into shreds, and flying objects were everywhere. The canary cage and its inhabitants were smashed, bookshelves toppled, coffee cups were tossed against the walls, a bronze frog bounced, and the room was instantaneously in shambles. Marvelously, Brad escaped injury.

Jerry's kindness had repercussions in many lives, but fortunately no others were quite as loud as this one!

Barbara G. Pickard

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On one memorable day, Dr. Claude Shannon, newly arrived at MIT, was walking down the hall with Dr. Peter Elias. He asked Elias who was the top circuit authority in the Electrical Engineering Department, since he had an idea he wanted to try out. Elias told him that the man to see was an ex-psychiatrist named Lettvin who was out in the old radar lab.

Bob Gesteland

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I had once heard a Jerry story that seemed outlandish even for Jerry. I later repeated the story to him to find out if there was any truth to it:

There were some people out on the west coast who had read the Frog's Eye paper and tried to duplicate some of the tectal results but couldn't get good recordings. Out of desperation they called Jerry and asked him out, all expenses paid, to demonstrate various techniques. Jerry agreed and flew out. He found their experimental set-up appalling. It was actually neat: everything was arranged carefully; the frogs were well fed; and the surgical instruments were laid out with almost military precision. In an environment such as this how could one not record magnificent units? Well they couldn't. Jerry decided to show them a completely new approach. First he made up a plating solution for his electrodes and then proceeded to spit into the solution. Instead of more conventional surgical methods he removed the skull with a can opener. He insisted on not using a microscope while lowering the electrode, seemingly at random, into the brain. Much to the chagrin of the people in the lab he recorded units that were ineffably beautiful.

After I repeated the story to Jerry I asked him if it was true.

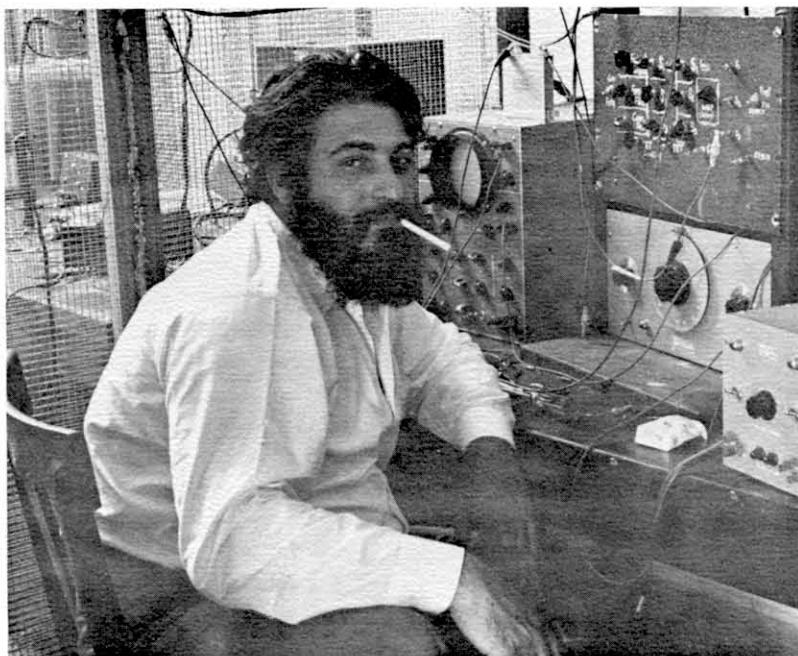
"Absolutely not."

"Good. It was a bit excessive. So there was no truth to it?"

"Of course not. I didn't use a can opener, I used a toe nail clipper."

Ed Gruberg

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20C-028. M.I.T., ~1952.



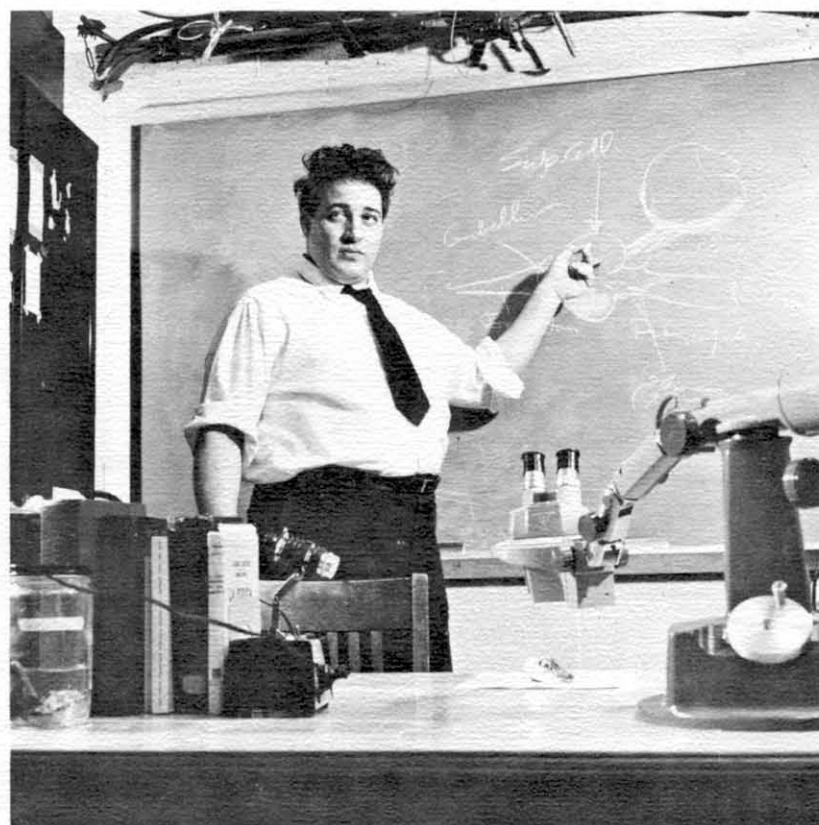
Alex Andrew, 1950's.



Jerry with unknown head of R.L.E. 1950's.



Warren McCulloch and Jerry. Old Lyme, ~1952.



Jerry with head of unknown species (under microscope).  
M.I.T., 1950's.



Warren, Jerry and ? M.I.T., ~1960.



This photo came with attached note, "Jerome -- we don't know who this is but thought the picture was so good that our friends would like a copy. David and Torsten"



Jerry, Maggie, Ruth, Jonathan, David and friends. Naples, 1961.



ABOVE: Giorgio de Santillana. Naples, 1961. LEFT: Maggie's 1<sup>st</sup> exercise class. Naples, 1966.

It must have been about 1968 when Jerry came out to Ted Bullock's laboratory to help Dave Lange and me learn to set up an Octopus retina/optic lobe preparation. Dave and I had gotten interested in learning whether there were crab detectors in the visual brain of those enigmatic cephalopods, and Jerry was the world's authority on recording from the relatively intact octopus. Besides, it was the golden age of Science, and grants still had a non-archaic section of their budget page called "consultant costs". And Jerry hadn't been out to Ted's lab for a few years. Ted said he needed Jerry to come out occasionally to spread some outrageous, inspirational ideas, so Dave's and my intended project provided the ideal excuse.

I had several telephone conversations with Jerry, in which he explained about the exciting, complicated recognition neurons he had recorded in Naples. Yes, one could record from the lobe in an almost-intact animal. One class responded best to rotation of a bar (and remember, Werblin's windmill stimulus for amacrine cells was not yet published). No, it wasn't difficult. [ed. note: so long as you are Jerry.] Besides, he would be delighted to hand the project over to us, with blessings and much help. The electrodes are tricky, though. But a defined procedure works. Everything is standard, except the platinum chloride solution, which must have one drop of solution B added. Solution B: Let a Blue Chromis, which is a beautiful salt-water tropical fish, swim in distilled water of 50 ml volume for one minute (yes, it will last that long, but produces mucus and other goodies in the water). Distill the water under vacuum until one drop is left. That's Solution B. I may have missed a few details. All of this was conveyed over the telephone, along with very precise and excellent instructions for the dissection, which Dave and I were to practice so that we wouldn't waste time when Jerry came out.

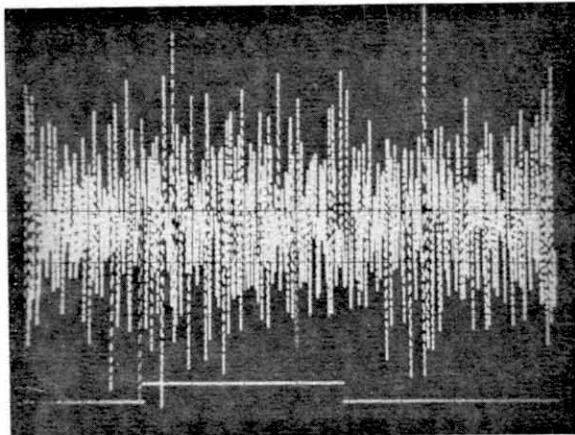
Jerry arrived. It was February, as I recall, and a beautiful clear, beach day in the upper 60's or lower 70's. How about a walk on the beach before getting to work? No, Jerry would rather get right to work, so anxious was he to re-establish his old Naples vibration with the wiley octopus.

His first letdown was the amplifier. Dave and I had a few of the then new Grass P-15's, much to Jerry's horror. This was no good at all. Well, I had an old Lettvin Mark 0.42.71, which we only had to find seven batteries for, if he would prefer. (It was a great amplifier, and I have three spare PC boards and most of the parts for one more, if anyone wants to become a collector.) Anyway, Jerry agreed that getting batteries would take too much time, so he would limp along on the hunk of compromised tin junk put out by Grass.

The next bad surprise was the micromanipulator. "These Balsa wood and toothpick pieces of junk by Narishigi?" he queried, incredulous. "Well, it's what we use. What do you need?" we responded. "My god, what am I going to rest my hands on? These things will wave around like willows in the wind if we just breathe! When I tap the table to nudge up to a crab detector, the electrode will vibrate and penetrate clear into the optic peduncle!" Of course all of this may have taken a few days of false starts and so forth. Anyhow, we finally persuaded

him to give it a try. He engulfed the chair in front of the prep, examined the prep, and exclaimed, as he positioned the electrode, "Say, this is a great dissection. How did you learn to do it? It's just like the one I developed!" We resisted the temptation to take credit, and instead asked if he would like to hear his hour-long phone instructions from our cassette.

The big moment arrived; Jerry plunged the devillish, coated tungsten electrode (or was it indium-filled glass...it changed so frequently I can never remember the formulation from one month to the next) into the optic lobe. The electrode was lovingly plated first with some gold to butter the tip, and then with platinum to allow Maxwell's demon a spot to sit on and beckon to nerve impulses. Jerry advanced it, tapped, waved, advanced, and so on. Nothing. "Damned amplifier," he grumbled, turning the filter to 10 kHz...as wide a band-pass as provided by Albert's elves. Several tracks later, maybe days, since it wasn't the time I remembered, but the presence...several tracks later, there might have been a faint hint of swish. Jerry got very intent and excited, eyes glued to the oscilloscope screen, gently thumping the table, advancing the magic needle. Then he exclaimed, "There it is! Listen!" We listened, vainly eager to hear the octopus speak of crabs...We heard nothing. And again, Jerry: "There! See, it's only when I rotate my hand about the wrist, like so. It's a rotating bar detector. I recorded hundreds of them in Naples, but all the data were lost with that damned trunk on the way home." Dave and I strove harder to hear, to experience, to eavesdrop on this intimate exchange of information between the soul of the Octopus and Jerry. To no avail. We requested "once more," and Jerry always complied, finally commanding us to fetch the camera. "Now, when I say 'go', start the sweep, and I'll rotate my hand." All was made ready, "GO", and the magic bright spot traced the measure of the soul of octopus, to be imprisoned on silver grains forever...but even more so on the sands of our thirsting minds, so long seeking the grail of truth about the cephalopod mind's eye. "Thank you!" said Jerry, grateful that the octopus' brain and eye had once again performed. And, dear readers, the photograph is published herein. As Jerry explained it to us after the interminable 60 seconds of Polaroidian miracle...(Yes, students, it used to take 60 seconds to develop a Polaroid shot. But then again, it didn't cost so much per photo, either)...as Jerry explained, the lower beam showed the beginning of the hand rotation, and the response at the outset of the stimulus was obvious. But, he warned, "Don't be fooled by the obvious artifact following



the stimulus, which was the microphonic response of the electrode to my 'Thank you'." (My personal feeling is that the artifact was the gold buttered platinum seat of Maxwell, acknowledging Jerry's thank you).

It was some days later that Dave and I fully recovered from the mesmerizing effect of Jerry's communion with the octopus. Jerry, of course, had left, back to the frozen East, where ascetic scholars can probe for truth untempted by the golden California beaches. We tried as best we know how, to recapture the voice of the octopus brain, but never could get the right wavelength. Eventually the project evolved into a much more pedestrian attempt to understand the ERG, and the optic nerve responses of squid, which even Dave and I could reliably record. However, we shall ever fondly remember Jerry's generosity in showing the secret life of the octopus to us, even though the knowledge of it has gradually sunk beneath the waves of our consciousness, like Atlantis, leaving scarcely a trace, as this story is...a dim reflection of reality lost...to be contemplated by a knowledge-thirsty world.

Peter Hartline

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In the summer of 1960 I was heading back to Boston after a sabbatical year in Pisa. My wife and I were sailing from Naples, and, most graciously, our neighbors during our stay in Pisa had come to Naples to see us off.

These neighbors, a couple, were our most elegant friends in Pisa. He was a promising member of the classics faculty of the University, a Greek scholar. She was quite intelligent and seemed mostly occupied with two small children. Both were thin and always well dressed.

One day at our apartment he was leafing through the November, 1959 Proceedings of the I.R.E., when he came to, "What the frog's eye tells the frog's brain," by Lettvin, Maturana et al. He was fascinated, enthralled. He told me it was one of the most interesting things he had read, a work of genius.

So in Naples that summer I knew my friend must meet his hero. To the Stazione Zoologica we went, where we led this elegant couple through room after room of bubbling octopus tanks. Finally, in a darkened room we found the Maestro. Dressed no more or less sloppily than usual, leaning over a microelectrode which was in an octopus optic nerve -- with octopus attached, and giving forth loud, short, Anglo-Saxon curse words. There was no thought of interrupting him or disturbing him in his quest. I looked at the Italian couple for a reaction, but they were completely composed.

Later I asked, "Well, there he was, author of 'What the frog's eye tells the frog's brain.' What did you think?"

"Splendid, magnificent. I was delighted."

And so in Naples at that time, a long time ago, there was at least briefly, a bridge between the two cultures.

Moise Goldstein

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About the time we were doing our experiments on the response of axolemma to various unphysiological cations, Jerry arranged for us to give a joint seminar to the Department of Biology. Part One was supposed to be conceptual background and Part Two experimental results. Naturally, no rehearsals were held beforehand. And, as I recollect, we decided who would give which half with a coin toss shortly before going to the seminar. We arrived at the last possible moment to find the room totally packed with no seats remaining and all logical standing room filled. Jerry ambled up to the front and sat down on the floor, with his back against the board, while I proceeded to give the first part. As it happened, I was at the time suffering from the newly born delusion of a conceptual breakthrough which neatly codified and formalized our hitherto intuitive and handwaving notions; a delusion with which Jerry was totally unfamiliar as I had been unable to catch him since its recent onset. Nor was the presentation that much help to him since he could not see the board which I rapidly filled with esoteric diagrams. Aside from flashing me an occasional raised eyebrow, Jerry sat through my portion happily beaming at the audience. When I had concluded by announcing that Jerry would now show how this formal structure led directly to experimentally verifiable (and verified) predictions, Jerry took the floor while I sat back to see what he would do with a new structure so rigid and formal as to be totally alien to him. He began by praising (effusively) the power and scope of the formalism, then became philosophical by asking if this or that formal concept could not intuitively be approximated by a vaguer but more compelling physical picture such as..., and in no time flat had, without a noticeable change of direction, turned the presentation 180° and was happily handwaving his way to an explanation of our experimental results. So compelling was his presentation that even I, who was watching for something of the sort, scarcely noticed the shift.

I suppose the moral is that Jerry has an unparalleled and unperturbable ability to think on his feet; and, having thought, to mesmerize an audience with his conclusions.

William F. Pickard

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Ted Quist, one of the cooler heads to inhabit the Building 20 lab in the 1950's suggested one day that the cage ground system was not all that it ought to be. Jerry was incensed -- it was his personal cage and it was during the time when he was literally living in it. It took only a Simpson meter to demonstrate that the entire cage was 110 volts above the grounded water pipe in the sink which was a foot away from the cage entrance. I guess that we were lucky that none of us happened to lean against the cage when we were pissing in the sink.

Bob Gesteland

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In 1973 the American Physiological Society and IFAC sponsored a symposium on the theme of engineering contributions to physiology. I appeared on a panel with Jerry to discuss on-line computer analysis of single unit recordings. Another member and I extolled the efficiency and expediency of white noise analysis for rapid characterisation of units. Jerry was appalled by the notion of removing the neurophysiologist from the pleasure of more direct contact and stimulus control, not to mention the loss of serendipity. He told us more about himself than about the field when he concluded, "Larry, if I told you that I had invented a machine which would enable you to make love efficiently in three seconds, would you buy it?"

Laurence R. Young

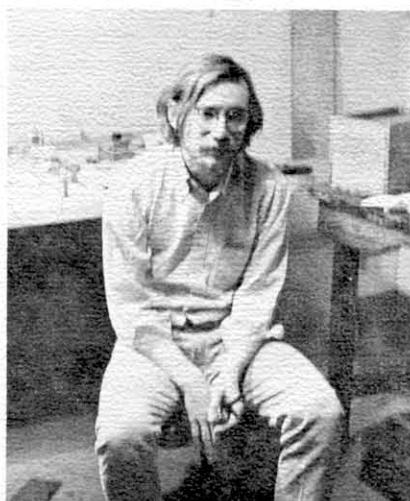
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Jerry participating with the "Living Theatre". Kresge Auditorium, November, 1968.



Mark Lurie, 1972.



Rick Greenblatt, 1969.



Shin-Ho Chung, 1969.



Wedding reception for Bob and Jean  
Gesteland with Walter, Jerry and Parge.  
M.I.T. Faculty Club, June 9, 1961.



Jerry and Maggie with Doc Edgerton at  
E.E. Steer Roast. 1960's.

In a delightful afternoon of discussing the research program at Boston Psychopathic Hospital, Jerry showed them how to overcome the immense problems of reducing the shelves of data on Offner paper which they were accumulating. The solution was particularly appropriate and consisted of touching a lighted match to the paper as it rolled from the Dynograph.

Bob Gesteland

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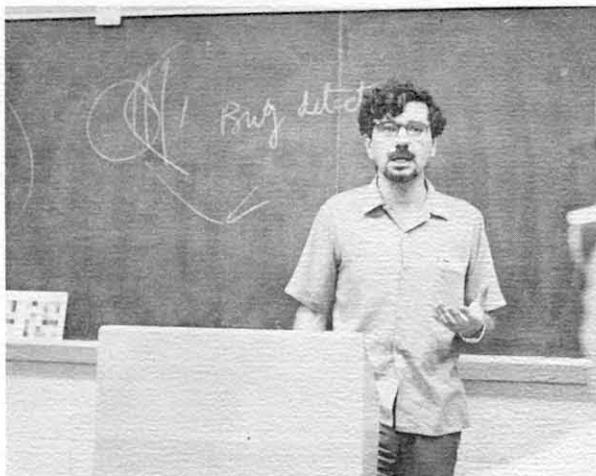
Bill Saidel, 1969.



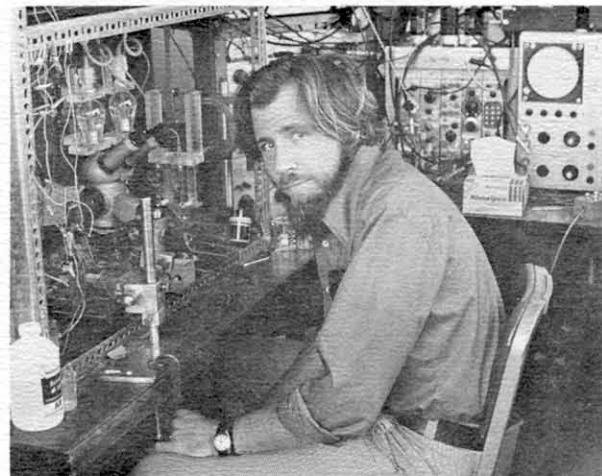
Ed Gruberg, 1969.



Brad Howland, 1969.



Humberto Maturana, 1969.



Steve Raymond, 1978.

Jerry is a fine travelling companion. Placed in a moving vehicle, he becomes especially mellow and full of ideas. Three of us were once on a plane together and he wanted to demonstrate a vestibular effect. When the plane banked, he told us that if we moved our heads rapidly back and forth, we would be able to detect true vertical. As the plane turned, the three of us simultaneously started bobbing our heads as if we were in some odd religious sect.

Ed Gruberg

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## The Leary-Lettvin Debate

Jerry debated Timothy Leary in May of 1967 on the subject of LSD. The following is the transcript of Jerry's speech which followed Leary's opening address:

Tim, you're an Irish American; I'm a Jewish American. I can't see you as anything but sitting Shiva.

Your argument is exceedingly seductive, and in the main I must admit that I find the press of middle-age and middle-class, enormously powerful here in Cambridge, irritating as all hell. The horrid part is that I, too, sit in front of the TV set, slumping, and pay the taxes. I, too, find myself coming to middle-age, and I say middle-class, feeling impotent in the face of this mounting war and the government by senility that we have here in this country. Let me agree with you therefore that the world is an abominable place and has been so as long as we've known it, for all of these many generations that men have been here.

In fact, just for the hell of it, let me give you an anecdote that I'm sure you will delight in. When Lowry Field was the center of pot distribution in the West, for you must understand that the Air Force during World War II existed mainly on pot, it used to come in by the truckload to Lowry Field. There was an officer's training camp there that suddenly dissolved before the fellows became officers. Suddenly about two weeks before they were to graduate, the fellows all took to pot on the fundamental thesis -- which one of them told me at the time and I was delighted -- "they can march the body but I'm getting out of here."

It's a very real thing. One can only sympathize with people who, looking at TV and at the TV culture, want to get out. But the problem is whether the navel really replaces TV. I mean, sitting there in front of your navel you strike me as being in a sense very little better off than the first. Let's put it this way: no surprises are likely to come about and you aren't even beguiled by good commercials. Nevertheless, I think that you have made your thesis extremely serious, and I would not do you the dishonor of attacking you on scientific grounds because the question, it has been very obvious, is not scientific but moral. Therefore, I would like to confine my remarks strictly to the eschatological questions involved. By that I mean simply questions of what constitutes good and evil. Why not? It's a new experience for me. I'd like to try it.

Let's consider. I walk into a state hospital, and am there confronted by a man who sits with a beatific smile on his face, in tremendous ecstasy, and he sits, and he sits, and he is, in a sense, in that curious frame once poemed by George Sylvester Farquhar, "unendurable pleasure indefinitely prolonged." And I ask myself, would I trade places with this man? And here at this point comes an interesting and fundamental question: from all the external signs that I perthink from him, he is in a continued ecstasy. Certainly, if I can get through and ask him, "Say somethin for us," he says,

"It's wonderful." All right, fine, let us continue. Then at this point, I ask, "Do I want to trade places with him?" Something deters me -- and what is it? Is it a love for the real world, however monstrous it is? Partly that. Is it the notion that my ego will be destroyed? Partly that. That somebody is here to test. Is it the notion that experience is henceforth denied me and all I have is something inside? Just inside me, no outside world. Partly that.

But I feel somehow or another that this man is in the hands of the devil. That is to say he is in a private hell of a curious and somewhat Sartrian divine. That is, having made his pact with the devil, this is what he asks for and that is what he gets. For I confess, then, in making these pacts, very much like the ones that we have all had, that what we get, we get literally and what we lose, we lose rather much of. So look at this man, sitting there with a smile, this supremal smile, an ecstatic smile. I fell sick. I don't feel that I'm on the trail; I feel sick for him. And I ask of you, how many would trade? He assures you he is in the utmost ecstasy, when you can get with him. Otherwise he's in that ecstasy. Why would not any of you trade?

Let us take another trade that has been offered in the past. You and I lived through the theory of the lobotomy. You walk into the office, "I don't like my mamma." They lift your eyes up; you go flash-flash; and you go on. It doesn't matter. You have traded for "it doesn't matter" a hunk of brain. But, hell, you're losing so much of it, what's a little bit more? It doesn't matter. No. Here, you trade. How many of you can take a lobotomy? It isn't a guarantee that they're asking. You don't care. You come in saying, "I don't want to care. Everything is bothering the hell out of me. Everything. I want to stop caring; I want to be happy." And so he takes -- you know -- bang, bang.

Is this a trade you would make? Why not? I ask you this question myself, for I found Tim's presentation extremely compelling, shorn, if you'll excuse me, of those adornments. At any rate, I find Tim's speeches terribly compelling, and for this reason I feel I have to answer him -- for myself. This is another way of trading with the devil, selling a hunk of frontal cortex. You'll get another.

I think I will tell anecdotes about real people because this is the only way we have of saying something concretely. During World War II an extraordinarily brilliant Italian novelist, or writer, who had been on Mussolini's staff, defected from Mussolini and was taken to New York. I will not mention his name because, unfortunately, we're being televised. But he came to New York and instantly began fundamental propaganda against the Fascists. As the war went on, and as Italy got in worse and worse straits, he got more and more depressed, to the point where it was impossible to rouse him, even by pushing him. He would sit, literally crying, I mean really depressed. And so somebody persuaded him to go to a psychiatrist. He goes to one who says, "Ach, we can get rid of this quickly," and gives him a shock treatment in the office. And the fellow goes out into Central Park after he's released from the office, and he sits there and he

feels -- Italy, so what? The war -- so what? Mussolini -- so what? My wife -- so what? And after an hour or two of this he went back to the psychiatrists's office to kill him because the notion of "so what" was so goddamn immoral at this time. He had to have the world with him. It was not, "Let's get out of here." The depression was sacred. And it was with difficulty, physically, that we restrained him from the murder. A justifiable one in this case. It's another way of selling one's soul.

All of these questions about selling one's soul to the devil can be comprehended under one reasonably simple view. How much are you willing to pay? I don't think that any of you have neglected in your high school to read Faust. Somehow or another you have been exposed to this in a way. You remember that Faust's pact with the devil was fundamentally the pact: if at the moment I say "It is enough," and I can lie down, if I say "Let time stop now," then you have my soul. You see, "Let time stop now." And the interesting thing is that the hell you go to is the hell of time stopping now. This has been a fundamental trait all the way through. Time stops now; you've had it. This is the case for example, and it need not be under drugs, it need not be with the frontal lobes cut off, it need not be with shock treatment. It can be in the ordinary course of experience when you go from professor to administrator. Time stops now. You have sold your soul to the devil at that moment.

There are infinite ways of selling your soul to the devil, but now we must come to the juvenile version of this, namely, how does a kid sell his soul to the devil? Leary would have us believe that one fundamental thing is getting out. You view yourself, you look as it were, sitting glued to the idiot box. You sit glued to the set, watching the play of something going on in which nothing new can possibly occur. Oh, sure, you can marvel at the rearrangements of banalities, but a rearranged banality is no less banal. And so you cop out, you drop out, you get out.

You get out and you have this experience of watching yourself which fundamentally is this: you suspend your judgments. What price the judgments? For it is this, fundamentally, that you are trading off to the devil. You are selling off the noetic functions, you're selling off exactly those functions which have set you off critically in every possible way. You're abrogating, you're dissolving these. Henceforth, suspended judgment for a while. You take your martini at five o'clock. You don't want to remember what a damn fool you were during the day. You don't want to remember being pushed down by this guy, the compromise you made that was against your grain. You see, all of these things, you've got to forget them, so you cop out with the martini, but with the reassurance that when the alcohol wears off, you are possibly back to a state where the judgment miraculously is back. This is the same, incidentally, with marijuana.

As an aside, Tim, let me agree with you, that I could conceive of no more immoral thing than has been done by the government in the wholesale banning of drugs. This is like the Hearst papers trying to

ban pornography: the more there is of it around, the more they thrive. There is a fundamentally monstrous thing about forbidding rather than reasoning people out. If you have a thesis, you advance the thesis, and there is a counter-thesis one argues. One does not go with force, of the kind the government has done, spurring the crime rate, as it has been done by the morphine addicts, et cetera. And I feel very violently about this because I used to take care of an addict ward when I was back in the field.

I am perfectly willing to admit with you that the government has done a monstrous thing in forbidding many of the drugs that are around. The forbidding of marijuana is pure nonsense, in the light of the La Guardia report. It is, however, the law of the land, and therefore I cannot, in conscience, advise people to break the law of the land for the very simple reason that I am not permitted to!

But when it comes to LSD, to psilocybin, to all of these other drugs that you have been handing out, that you have been talking about -- at this point, sir, I look upon you as a tool of the devil. I look upon you as a fundamentally vicious tool of the devil, and I will explain to you why. In general, when one takes something like a drink, a martini, or a drink of wine, or gets drunk among friends in the evening, and wakes up the next day with a hangover, there is a reassurance, the miraculous reassurance, somehow or another, of judgment to yourself. With LSD, with psilocybin, with mescaline, do we have this reassurance?

You have said, "Sure, it's Russian roulette. Sure it's dangerous." But let us look specifically at the danger. I'm not going to talk neurologically because it would only be gobbledegook. What is the fundamental danger? Let us say that one person out of 50 will have a reaction like this. He will take a dose, he will take a trip, and three days later he takes a return trip, and a week later he takes a return trip, not having taken any more drugs, and three months later still return trips are occurring. You know 95% of the drug has been excreted in the first day, and 95% of what's left has been excreted in the next day. What's giving him the trips again in three months? Now, goddammit, how is it possible for anybody, on observing this, to say to a person, "You take one chance in a hundred, and the return trips are free."?

What is a return trip? Let me ask you, if there is no cause, how come the return trip? The flipping in suddenly and the flipping out suddenly? Suddenly colors whirl about, suddenly the smells have color, suddenly the colors have sounds, and then you're back in the normal world.

What does this smell like? Clinically, Tim, what does this smell like? If you saw a patient that complained of this, what is it that he would have? How would you diagnose this, Tim?

(LEARY: A visionary mystic.)

Bullshit. You would diagnose him as a temporal lobe epileptic with an aura. You know that goddamn well. He looks this way to me.

(LEARY: I'm only telling what I know.)

Tim, I had great respect for you as a clinician. I still have. Therefore, I'm asking you at this time, is there a case for this?

(LEARY: Let me talk about that later.)

All right. Let us take the examples in point. Those of you who ever think of taking LSD, before you take it, would do yourselves a favor just dipping into two or three textbooks on epilepsy, written before LSD was discovered so you know they are not biased. There's a variety of fit or seizure called the temporal lobe seizure, a perfectly well-known clinical entity. Now this doesn't mean that somebody has scooped a hole in your brain. Half the time people have seizures of this sort, and in the autopsy you can't find where the lesion was. So the lesion is not scooping out of cells. You cannot say, "Show me the lesion," as if it were a liver and you could cut it out. Somehow, there's a misconnection syndrome. How are you going to show a misconnection syndrome? You don't. All you know is that something strange happens.

What is it these people complain of? If you read a description of the aura, either in Penfield and Ericson's book, called Epilepsy and Cerebral Localization, written many years ago, or if you get hold of an exceedingly charming book written by MacDonald Pritchly, called The Parietal Lobe, where he discusses these things, or if you will simply read Dostoyevsky, which is far simpler for most of you, you'll get a notion of what this aura is.

You can become addicted to an aura. When a man comes to me and says, "I haven't had a shot, I haven't had any LSD for three months, but I still flip in and flip out," as a clinician, what do I think and worry about? What I worry about here, specifically, is that he has a functional lesion. This sounds like a joke to you -- a functional lesion -- because I can't show it by cutting him open, but a functional lesion, because clinically it goes along with other things, like tumors, like scars, like hits on the head, and things of this sort. Very well, this is one thing.

The temporal lobe is that particular portion of the brain that is affected in half the ax-murderers that we have in this country. Has it ever occurred to you, why is it you read all about a guy coming home and he knocks off his wife and three kids, and at the station, he stands there and says, "I don't remember." Aha, real amnesia, you say. Well, let me assure you, half of these things are, in fact, temporal lobe syndrome -- what are called psychomotor seizures. This is roughly the sort of seizure that the fellow who shot the various people at the campus in Texas had. In his case they found the tumor.

Now one of the extraordinary things about diseases in this region is, in effect, that you have aberrations of judgment. So we look at LSD people for what might be considered aberrations of judgment. Now aberrations in judgment you see with alcohol, you see with pot, but the judgment comes back the next day. What about LSD, what about psilocybin?

I know a set of physicists who took psilocybin a while ago, in a group, because they are curious people. All physicists are curious people. A group of about five or six of them took some psilocybin from the recipe gotten from the telephone number here in Cambridge that you're supposed to call to get that recipe. And, having taken it, they got violently sick the first day and every one of them for three months thereafter was incapable of doing any theoretical work. On all behavioral counts the same, but clearly aberrant in their higher critical function, with a hangover of this: a hangover that lasted, not an hour or two hours, but several days, several months. Let us give it only several days, let's be conservative.

Let me now for a moment go to a footnote, before I continue. Do most of you know how suicides by barbiturates in this country occur? Have you any notion of what the most common history is? A fellow takes a Nebutol to go to sleep and he can't sleep, so he takes two. Having taken two, if he took two because he is unhappy, he now loses that judgment that would prevent him from taking more, and in the suspended judgment under this second dose of barbiturates, he takes the rest of it, and that's when they find him. In general, the suicides do not start out by taking the whole bottle. They start out by taking one or two pills to calm themselves, and then the whole thing when the judgment is gone.

Consider now the case where the judgment is aberrant for several days, and consider the fact that the suspension of judgment that you undergo in such cases becomes regenerative; that is to say, under this aberrant judgment, under this loss of judgment, things cease to be as bothersome, or they can be more bothersome, as in the bad trips. They can become either more bothersome or less bothersome, but something happens, and your judgment, by which you weigh things, goes down. You're now in the position of regenerating this, by taking, say, one trip every three days, one trip every four days, and you pay for the vision of yourself by the loss of judgment. You pay for getting out by the loss of judgment. You pay for whatever visions you get by this loss in judgment. And the loss in judgment stays and stays.

Now you might say, how do I know this? Have I ever taken it? No. I haven't taken it for a rather simple reason. When I was a psychiatrist, I used to watch other doctors give shock treatments to patients. And when it came my turn to give a shock treatment to someone, I decided that I would not give something if I myself did not know how it felt. Now I went to the point of being strapped down, the electrodes applied to my head, and then I said, "Look, I can't take it. I'm calling it off." Yes, because I was scared.

Through my office here at MIT have passed in the last couple of years a variety of sickies made sick by LSD. I have watched one fellow, psychotic for nine months, after one dose of this, and who is still psychotic if he leaves off on the drugs that maintain him here as a student. He asked me to tell his name tonight. I have no intention of doing so.

I have watched another fellow go into a coma, an unremitting one, which lasted for quite a while. I have watched my physicist friends

get sick from this and swear never to touch anything of this sort again. I have watched some of the kids around Harvard Square and have talked with them and found that they are shallower than they have any right to be.

Now, when I say shallower, let me bring out the ultimate objection that I have. Suppose you are an artist, or you are a writer, and you are a second-rate artist or a second-rate writer, and you know that you are second-rate because nobody in his right mind would call you first rate. You are confronted with the fact that you have to look at these productions of yours and know that they will never be hung in the Louvre, that you'll never win the Nobel Prize, that this or that or the other thing will not occur. But really, honestly, you gotta have it. You want your kicks like those guys got their kicks. What is the simplest way? Rather than make the works first-rate, diminish your judgment so that a second-rate thing appears first-rate. That is the obvious thing. If I can take a drink, or if I can take something that diminishes judgment consistently, I can be satisfied with a hell of a lot less.

Now pretend that you're in the position of such an artist or such a writer, and you ask yourself, now that I've had this curious kick, under LSD or under pot, where I suddenly appreciate the tremendous intricacy of what I've done, why should I come back to the normal world where it really is not particularly good? And what will the argument be to yourself? Will you argue or will you tend to the indefinitely suspended judgment as the price for getting your kicks out of second-rate stuff?

In a certain sense you might say, "Do you blame people of this sort? Is there any reason why everybody shouldn't have their kicks? Why should kicks be reserved just for those guys who happen to get a prize? Let's give prizes out to anybody." LSD. The price seems to be a little bit big, a little steep to pay. I'm giving the devil my judgment, my soul, my intellect, all of the goddamn things I worked for, for these kicks. Like a nymphomaniac. Not like a neurotic person, but like a nymphomaniac. Does anybody here envy the nymphomaniac? After all, there she is, having orgasm after orgasm, wonderful, all day long, without a stop. Beautiful. Terrific. Does anybody envy her? Why not? Because you didn't envy that guy who was sitting in the state hospital either. The kick is cheap. The ecstasy is cheap. And you are settling for a permanently second-rate world by the complete abrogation of the intellect.

In the old days, if it wasn't done by lobotomy, it was done by psychoanalysis. Now it's done by drugs. I can find in myself no joy in such an outlook. I am not particularly skilled in what I do. I'm sure most of you know that I'm a dilettante. I do my best to get kicks out of things, and, in a certain sense, what I do is to train myself to find a kick out of this or that, but it's always temporary. I get into a depression afterwards, because the kick really wasn't all that good. It's like looking back. You slept with a new mistress last night, you worked like all hell to get it, and all of a sudden, was it really worth it? But with the kicks of LSD, with the kicks of the

permanent aberrations of judgment, you never go back to the critical stand to take another shot.

I don't know what the ethics are here. I, in general, tend to equate good and evil to things that are somewhat different than, shall we say, to what the pulpit man does. For me, something is evil that is mindless. I cannot stand to watch a man turn into a cow, with his great brown eyes rolling sideways at me. He is out of it and ruminating that he has been cropping in the field of the senses. If he looks upon me like a cow in the field, I feel that that transformation is evil. That is becoming a beast, and it is staying a beast. I'm not saying that people who take LSD become beasts and stay beasts. But a small percentage do. Is that worth it?

Somehow this does not ring true, and I do not know how to put my finger on why it doesn't ring true. But it is not true, because I would not trade places with him. My only test for the moral aspect of it is this ultimate test of all morals, namely how I feel. My argument proceeds, therefore, about the evil connectives with the uncontrollable, the unwilling, the prolonged loss of judgment occurring with these drastic drugs LSD, mescaline, and psilocybin.

I accept pot and I accept whiskey because with either of them there is a guarantee for most people, for almost all people, that you will have another chance, you will come back again and decide whether you want to go back. But it will always be your decision, that is, you will always have freedom once again.

But that two or three percent of the various people I have seen taking psilocybin or taking LSD, the two to three percent who do not have this option once they have taken it again, for them my heart bleeds. Why did this have to happen? And then I look with suspicion on the others who have taken it, but have not ended up in the hospital. And I find to my astonishment their whole personality changes. They become more amiable. You might suppose this to be a good thing. A lobotomy patient also becomes more amiable.

I'm not going to waste your time any further by trying to give you data or by exhorting you any more than this. I consider that the evil that is done is this: the evil of the loss, or possible loss, of the highest judgmental faculties we have. It is for this reason that I plead with those of you who want to see that there is possible some distortion of your judgment connected with this, some possible prolonged difficulty, to do your best to look at the clinical records that have appeared -- for example, in the New England Journal of Medicine -- to do your best to look up some of the diseases characterized by epileptic auras or read Dostoyevsky again, if you don't want to read the other technical books. Then make up your mind whether this is worth it. I'm not scared because I will be released to see beautiful pictures. I am scared because of that ultimate me that judges the rest of me, that top noetic function. I don't want to lose it, dammit!

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In 1973, Jerry recorded an Interactive Lecture entitled "A View on the Function of a Neuron". It is an introduction to neurophysiology which at the same time gets right into issues of the mind-brain problem. Jerry answers 31 questions in connection with the lecture. The following two answers, from toward the end of the lecture, seem to me especially memorable and inspiring. In transcribing, I've tried to punctuate so others can "hear" Jerry.

Stewart Wilson, Polaroid Corporation

What are the principal difficulties in doing nervous system experiments?

"The principal difficulties in doing nervous system experiments is imagining what sort of experiments to do. Surprisingly, most physiological experiments are not hard, in fact one can easily train high school students and grammar school students to do the technical work. Technically -- let's say while for public relations reasons people say Gee look at this microelectrode, you know, a ten-thousandth of an inch in diameter, very fine and all that sort of business -- you know in our technology this is ech, you know, who needs it? The really important part is not the oscilloscopes and the flashing lights, and the meters, and the white coats, and the people looking terribly intense and antiseptic. The important thing is what is it you want to find out about the system -- and the principal difficulty in doing nervous system experiments is deciding what the results are gonna mean.

"Let's suppose that you get a set of results -- what do they mean? You can decide of course to work upon the brain as a tissue in which case you are going to examine tissue properties, and that's one of the great things that Hodgkin and Huxley did. They described tissue properties of nerve membrane, you know, cell properties, cell physiology. That's OK, that's perfectly legitimate. But it's not a nervous system experiment; it's a cell level experiment.

"If someone says, Look, I'm recording from a cell that comes from the eye and this is a red discriminator or a grandmother discriminator or, you know, whatever kind of discriminator you want to put in the eye. At this point you look at him and you can ask him a whole lot of embarrassing questions. What in the world does he mean by this? What are the contingencies under which this operates? What is it that would perceive it? How could this sort of information be combined?

"All of these questions are what you might call soft questions. But then, you have to realize that when you're working with the nervous system you're not dealing with energy, you're not dealing with ordinary measurables, you're dealing with information. And information as a substance is a very different sort of thing from the stuff materialists talk about. Doesn't mean that you have to become mystic, but you at least got to find a kind of lawfulness for the system. And I would say that basic difficulties in doing nervous system experiments

is thinking up experiments that are meaningful in anything except a trivial way.

"I can for example go and measure knee jerks. And, you know, how much the muscle contracts for each stimulus I give to the nerve, yeah, you know, I can do this a lot of time. I can show, you know, that with a full bladder the knee jerk is inhibited and with certain times of the estrous cycle, you know, a certain sexual arousal, knee jerk is enhanced. I can go through all of this. In the end I don't have really very much to talk about. And if I keep on handling the different parts of the nervous system as if they were extended knee jerks in the end all I have is a collection of volumes of knee jerks and no way of putting them together. So the principal difficulties in doing nervous system experiments are conceptual."

What would you like to do next?

"What has been obvious through this lecture and the questions that the lecture has occasioned, is a kind of impalpability of the whole business. Uh, I don't know, for example, that if I were a student I'd be satisfied with the answers to the questions. And certainly being the lecturer I'm not satisfied either with the lecture or the answers that I've given to the questions. Really, the difficulty is, as I say, the devising of questions, and if someone asks what is it that I've planned to do, what sort of work is in the offing? the answer I suppose would be, find a way of putting the questions seriously. That is, there must be a right way of asking questions about information and information handling that do not return or do not break down to the...shall we say the elementary and very special case of information as is presently handled in information theory.

"I'm not trying to say that gee there is some deep mystical quality of information which is not handled by numbers. No, all I'm saying is that for the most part kinds of information that we deal with nervously are not accounted for by the kinds of information that electrical engineers, you know, dump into their wires. And, uh, ways of combining information in the nervous system are very different from the ways of combining information that one sees in computers. It's not that a computer can not be a brain, or a brain can't be a computer, I'm not saying anything of the sort. All I'm saying is... the systems seem to be very different and it's not obvious to me that one can go from one to the other.

"I suppose that what I want to do most of all right now is find a way of re-introducing semantical problems in a...oh, in a way that finally asks questions about the relationship of the message to the content of the message. Not the sign and the thing signified, I think that's a wrong way of putting it, but the message and the meaning of the message. Uh, I'm not sure that this is decomposable into the sorts of things that people have previously decomposed messages into, you know, sets of signs or sets of signals and that which is signified by the signals because we have seen that if information is distributed,

that which is signified has no meaning, you see, in a distributing system. There must be a way of handling the idea of information in a distributing system such as I've talked about here....that makes sense. I suppose that I'll devote my remaining years to try to make sense out of it. I doubt very much if I will, and it may be that I'm on the wrong track. At least some of my students are going to try this. Other people will try other things.

"But make no bones about it, the crucial and most important scientific work that one has to do now lies not any more in the material aspects of the world, namely how do you combine compound A and B, what are the different modes of combination, but in what you might call the informational aspects which have never been really thoroughly explored and have been neglected as a kind of informal consequence of energetic processes. But more and more as we proceed into the world of complex modern science it becomes obvious that the ...the cheerful semi-determinism of most of the biophysicists is really uncalled for and certainly has no place with respect to the nervous system. I don't know, I would like to know where I'm going myself. I'm not sure, and maybe in a year or two I'll give another lecture."

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Jerry Lettvin's recipe for platinum plating solution, used with Dowben-Rose microelectrodes:

1 gram platinum chloride in 100 ml H<sub>2</sub>O  
Add enough lead acetate to fit on the head of a pin  
To 100 ml H<sub>2</sub>O (70°), add enough agar to fit on half a thumbnail  
When cool, add platinum solution to agar solution and additional H<sub>2</sub>O to make a total of 250 ml.

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Recording one day from the frog tectum, Jerry and I obtained results that were more and more at variance with his previous work. He finally had enough, threw up his hands, and said forlornly -- "You see, that's why you should never publish."

Ed Gruberg

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Christmas at the Raymonds', 1970. Back row: Steve Burns, Mark Dowson, Mark Lurie, Judy Lurie, Jonathan Lettvin, Vicki Stirling, Ian Hentall, Sadia Stephenson, ?, Rob Stephenson, Peter Harper, Ken Muller, Carol Pass, Sue Udin, David Udin. Bottom row: ?, Karen Tate, John Tate, ?, Eric Newman, Steve Raymond, Maggie, Jerry, Sandra Raymond, ?, ?, and ?

Alex Andrews' hagis party was one of the gastronomic curiosities of the decade for me. More surprising than the food itself was its preparation. The hagis was in a can immersed in boiling water on the kitchen stove. When it was time to serve it, Jerry reached into the boiling water with his bare hand to remove the can. To a young graduate student it was a feat nearly matching the expected walking on water.

Bob Gesteland

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Lab picture. Spring, 1977. Standing: Penny Chase, Lynette Linden, Sue Udin, Don Quick, Steve Raymond, Don Schoendorfer. Seated: John Moore, Ian Hentall, Jerry, Eric Newman, Ed Gruberg.

There are two Lettvin jumps which I know of. One occurred when the telephone rang in the middle of an electrode making session. The glass pipettes were standing tip-up on a stool near the phone. The conversation became engrossing and apparently irritating and Jerry sat on the stool. His response took him near to the ceiling in the Building 20 lab. He claimed that it took two weeks for the glass pieces to work their way out. The other jump was on birthday number 40 when he joyously demonstrated his youth to the group in the Publications Office by leaping in the air and clicking his heels. To the surprise of all, Building 20 only shook but did not fall.

Bob Gesteland

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LEFT: Eric Newman and Jerry. Spring, 1977. TOP RIGHT: Presentation of the "final version" of Jerry's nerve membrane model with Steve Raymond, Dave Cohen and Bill Pope looking on. Monday Night Lecture, Woods Hole, Summer, 1979. BOTTOM RIGHT: Jerry with Frank Morrell and Harry Grundfest. Woods Hole Lecture, Summer, 1979.

## Some Jerry-isms:

"It is not reducible to language; it is not even reducible to data."

"One does not like to attribute such great intelligence to single neurons in a frog's head as would shame a whole frog."

"Noise is whatever you can't read."

"More data, more noise."

"On the whole, we do not trust in revelation, which is the production of relevant output without input information."

"In a word..."

"Oh dear..."

"Passionflower!"

"Our friend Helmholtz."

"Our friend Leibniz."

"Le Bon Dieu."

"Goodie."

On answering a phone: "Speak thou."

On using your argument against you: "Thank you."

"Neurophysiology is dead."

"Neurophysiology hasn't advanced since

- a) Leibniz
- b) Helmholtz
- c) 1868 (Pflugers Archiv volume 1)
- d) 1894
- e) 1953"

According to S-H Chung, possible responses by Jerry to a new experiment proposed by someone else:

- a) It's a trivial experiment
- b) Even if you did it, it wouldn't say anything new.
- c) X and I did the identical experiment in 1948.

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After 15 years of Jerry's unending  
(and often devious) matchmaking,  
I finally got married and Jerry  
didn't even turn up for the  
wedding!

Sandy Skiba



\* \* \* \* \*

Jerry has never been known for his sartorial splendor. In order to avoid decisions about what to wear he has pared down the variety of clothes in his wardrobe. A friend of mine once stayed overnight at Jerry's. In the morning Jerry selected his shirt for the day by going to the laundry hamper and pulling out shirts until he came to one that seemed presentable.

So it was a little surprising that when a few of us wanted to go with Jerry to hear him debate about lie detecting at the Massachusetts Bar Association, he was concerned that we wouldn't be sufficiently well dressed. Us? We put on our best tweeds and headed over to Bexley Hall to drive him down to the Parker House. Jerry was wearing a suit and tie and looked like a cut rate undertaker. As we ambled over to the car, we noticed a large split down the seam of the seat of his pants. "Oh dear."

He went back to his house and put on another pair, his only other available pair, of black baggy pants. Jerry very delicately moved his bulk into the car, seat first. Just as he was coming in for a soft landing we heard a loud tearing sound. The seam in his left pants leg had opened for three-quarters of its length.

When we emerged from the car, he bent over, gathered up the offending loose ends and limped into the Parker House. He wended his way to the front desk past people who were arriving for various weddings, Bar Mitzvahs and law seminars and bellowed out "Do you have any safety pins?" There was a flurry of activity and like manna from heaven one of the desk clerks came through with two safety pins. Jerry and one of our group tried to pin the seam, but people kept bumping into them. So they went off to the Men's room, Jerry trailed by the other fellow who was still holding onto Jerry's pants. Not surprisingly people kept turning around to stare at this odd pair.

The debate went well (Jerry took the negative against a Mr. Zimmerman, the man who tested the Boston Strangler). However, everytime Jerry stood up to speak I found it hard to concentrate on the debating points.

Ed Gruberg

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Some years ago when my husband, Robert, my daughter, Deborah, and I were flying to California, we sat across the aisle from Jerry. Three memories of that trip often come to mind.

When the young woman in the window seat near him left, Jerry moved over so we could talk. He was uncharacteristically restless. After a while he explained to me that his seatmate was transporting a tranquilized snake of large dimensions in a bag now at his feet. He felt responsible for determining that the snake remained tranquilized while she was gone. This information so absorbed me that I have forgotten the remainder of our conversation.

Later, Jerry fell asleep. When the other passengers, having eaten, were settling down to watch the movie, read, or sleep, the stewardess brought Jerry his dinner. I've tried for years to describe the gesture with which Jerry dismissed the meal. It was final, irrevocable, but not impolite. It said, "Some things one just does not do, and eating airline meals is among them."

The light grew brighter as we approached California. I was reading. Jerry asked me about the book. While we were talking, he glanced toward the rear of the plane, gasped, and evaporated up the aisle. I could not make out what was going on, and I went back to my book. After a considerable interval I noticed, out of the corner of my eye, a man's foot in a large black shoe step back, rest on its toe, touch down the heel. The other foot followed, toe first, then heel. The steps were slow, rhythmic, with the quality and precision of the ballet. A large rump passed me slowly. Whoever was backing down the aisle -- could he be bowing? His back had a deferent curve; his arm stretched before him. Courtiers in wigs and satin flickered across my mind. Jerry's face came into view. His gaze was fixed on something I could not see. His smiling face was arresting, absorbing. It seemed illuminated with pleasure and hope. Jerry's outstretched hand was holding and supporting another hand in the posture of a dance...a minuet perhaps? The mating ritual of herons? I looked around. Holding onto and being supported by Jerry was the hand of an elderly, infirm woman of uncertain step. With the intensity of his gaze and the courtliness of his posture, Jerry was literally willing her down the aisle.

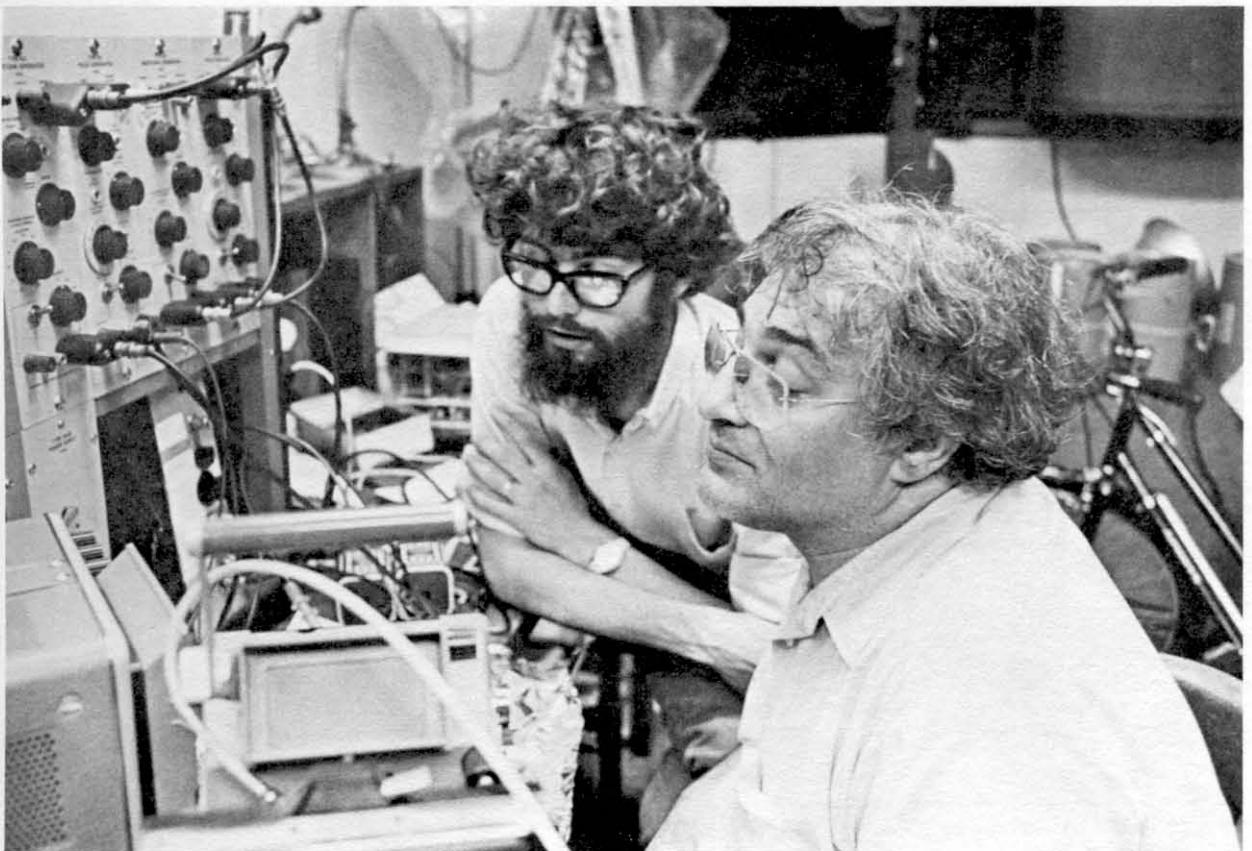
After all these years, the clarity of that scene astonishes and touches me. The metaphors of grace with which I remember Jerry are exactly right.

Robin Cohen

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We thank all those who generously contributed anecdotes and photographs. We are sorry that due to space limitations, we could not use all the material submitted.

Eric Newman  
Janice Gepner  
Ed Gruberg



Jerry with Per Haugen. 20C-026, 1970. © Bill Saidel.