

ASCAP NEWSLETTER

Across-Species Comparisons And Psychiatry Newsletter

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"...nature selects not for potential, but for achievement..."

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For the philosophy guiding this newsletter, predicated upon combinations of top-down and bottom-up analyses, see footnote on p11³

Newsletter aims: 1. A free exchange of letters, notes, articles, essays or ideas in whatever brief format.
2. Elaboration of others' ideas.
3. Keeping up with productions, events, and other news.
4. Proposals for new initiatives, joint research endeavors, etc.

Features; J Price follows up on one of last issue's commentaries, that from CR Reichelt (CRR)..... p3
JV Wylie reacts to Price's essay p4
DA Freedman reviews Badcock p5
Finally, ASCAP provides excerpts from Tiger and Fox's (T&F) re-issue of The Imperial Animal..... p6

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Comment: T&F's classic book published first in 1971 has been put forth again with a new introduction. T&F describe with relish their experience of having published the controversial book, what they learned from having done it, and how they work together as co-authors. From the "old," ie, what you and I first read almost 20 years ago, we reproduce their introduction of "biogrammar" (I recently

found outlines for medical student courses from the 1970's that required that students know the term.)

Given ASCAP's purposes, we also quote their suggestions on how psychiatric phenomena could have made adaptive sense in evolutionary history as well as what psychiatrists *basically* do from an evolutionary viewpoint (here's a quick preview: T&F wonder if they display professional friendship by picking nits?!)

For mania, T&F imagined times when manic energy might have been useful for our ancestral leaders and their followers so that such displays therefore got amplified in our biogrammatic behavioral repertoire.

T&F freely articulate such ideas. Some criticize such evolutionary scenarios as "just-so" stories, conjectures that are uncritical views of truth which the constructors of the scenarios seem to think of as important without understanding how scientific methods must be used in verifying or extending such notions, or in disproving counter-hypotheses using methods of "strong inference." Such just-so-ists, the critics assert, desire true-believer followers to go along with them, to conduct political campaigns to convince people of the rightness of their view, rather than relying on data to do the persuasion; they don't have to do research because they know the truth already. Bright lay-persons entering scientific areas without training may especially get muddled in this way.

T&F are not such, but rather are very much scientists; they should be regarded as pioneers in hypothesis construction, unafraid to take already existing data and putting it together in fresh forms for the future to elaborate further. Should or when even pet hypotheses are demonstrated false, they applaud the finding and move on to a next stage of investigation, to new iterations of hypothesis and experiment.

ASCAP considers openly such hypotheses. With new techniques and new bodies of data emerging on molecular levels, hypotheses on the phenotypic level are within hailing distance of being investigated. We're not there yet, but let's consider the bottom-up issues:

Leo Buss, expert on primitive animal forms, asserts that⁵:

Molecular biology has suddenly become a comparative, and inevitably evolutionary, discipline. A new "fossil record," writ in the genome, is now accessible and is being read in a necessarily piecemeal fashion.

Alberts et al's leading new textbook in biochemistry - with James D Watson himself as a co-author - states in its first pages⁶:

Evolution is the central principle of biology, helping us to make sense of the bewildering variety in the living world...We cannot go back in time to witness the unique molecular events that took place billions of years ago. But those ancient events have left many traces for us to analyze. Ancestral plants, animals, and even bacteria are preserved as fossils. Even more important, every modern organism provides evidence of the character of living organisms in the past. Present-day biological molecules in particular, are a rich source of information about the course of evolution, revealing fundamental similarities between the most disparate of living organisms and allowing us to map out differences between them on an objective universal time scale. These molecular similarities and differences present us with a problem like which confronts the literary scholar who seeks to establish the original text of an ancient author by comparing a mass of variant manuscripts that have been corrupted through repeated copying and editing. The

task is hard, and the evidence is incomplete, but it is possible at least to make intelligent guesses about the major stages in the evolution of living cells.

Returning to the phenotypic, whole-organism level, we may in these times of scientific revolution, have trouble in our science with *too few* ideas, not *too many*. We need models such as those furnished in early form by T&F in 1971. A decade later in a paper ancestral to this Newsletter, I pushed for approaches to the investigation of pathophysiology in mania and depression'.

Consider also the engineer's model of Steve Crossan, published first in a 1987 letter to the Chemical and Engineering News Magazine (reprinted in the Apr 90, issue of ASCAP - see SC's letter below in this issue). Are there biological mechanics that can be construed to fit his ideas of a proximate mechanism for the production of an alpha psalic and the out-of-control alpha psalic that mania seems to represent?

Letter: September 1, 1990

Thank you for the copy of page 3 of the April 1990 "ASCAP Newsletter" which was forwarded to me here.. I left Madison in 1989 to take a Federal engineering job in my native Arlington, VA and am glad to be back at work. I received no feedback after the letter appeared in Chemical and Engineering News Magazine, published by the Amer Chemical Soc, in 1987. If there is any now, I'd like to hear about it. So far, I have not found anyone in the Psychiatric community to be at all receptive to my ideas.

Since 1987, I have been taking fiction writing classes and embedding my ideas in safe and fanciful sounding speculative and science fiction. Two novels are with a literary agent in Edmonton, Alberta. I will enter a third in the Turner Tomorrow Awards contest in December 1990. All have

positive Bipolar role models (and a few negative ones) and happy outcomes. Several possible futures of psychiatry are projected through the year 2174, and are contrasted with psychiatry on allied and enemy planets. It's meant to be fun, but the closet Bipolars among us might learn something important about themselves and their fellows.

Again, thanks for quoting my letter and for sending me a copy. I look forward to learning more about your views so that we can publicize an explanation of mania and depression that is positive, rationale, and can help the generic Bipolars avoid counterproductive spirals into mania and depression without inhibiting their natural tendency to be creative, charismatic, and/or entrepreneurial in positive and healthy ways.

Stephen C Crossan, Arlington, VA

Letters (Cont) September 22nd, 1990

Colin Parks writes (in a parenthesis) in the latest ASCAP Newsletter⁸ that loss of a child does not decrease status "since the possession of a child is not associated with high status." Well, that depends on what he means by "status."

What does "status" mean from the point of view in evolutionary psychology? It is not the same as the sociologist's concept of social class. Humans have evolved to relate to small groups. In modern society they typically participate in several small groups, some more important to them than others. They care deeply about their status in some groups. (Some people imagine that they don't care what others think, even within the important groups. In this they are surely mistaken. Like air, they are, unawares, sustained by what they cannot see, and may only experience distress when status has been lost).

This concept of status is profoundly psychological (not socio-

logical). In the small, essential cadre of mothers in which every mother orients herself, the loss of status that comes with the loss of a child is tremendous. In particular, in cultures that seen life as morally coherent, it is common to believe that such loss is punishment for sins: "What did I do to deserve this?"

Big-brained humans are as sensitive to problems of status as any other social animal but one must look closely to identify the group(s) in which status is anchored.

John Pearce, Cambridge, MA

Price-Reichelt-Price by J Price

CRR suggests that the depressive taking the role of physical sickness replays the part of the baby with the caretaker it is imprinted onto, thus eliciting from the caretaker the reassurance and loving nourishment which made the baby feel the centre of the universe and in this way restoring the depressive's self-esteem. Let us imagine an experiment in which we follow three groups of sick people who have just been put off work by their physicians. The first group suffers from some physical illness. The second group suffers from depression but is told by the physicians that they have a physical illness. The third group suffers from depression and is given the correct diagnosis. If we then measure the amount of loving nurturance received by these patients from their families, I would predict that the physically ill would receive the most and those diagnosed as physically ill would come in between, probably nearer to the physically ill than the diagnosed depressives. In other words, what the family believes about the illness is probably more important than the actual behaviour of the ill person.

In primitive tribes and in ancestral times it was probably the usual thing for depression to be

treated as physical illness. It is only the sophistication of western medicine that has enabled us to distinguish it from physical illness and so reframe the depressive as psychologically rather than physically ill and thus deprive him of the loving nurturance which is accorded to the physically ill.

I doubt whether patients perceived as psychologically ill are really given much support by their families. Depression is often treated by families as badness rather than illness. The lack of energy of depression is treated as laziness, the social withdrawal as rudeness, the unhappiness as sulking. Rather than boosting the depressive's self-esteem, the family often lower it with criticism of the depressive symptoms, as CRR pointed out in an earlier ASCAP. Suggestions such as "pull yourself together" or "snap out of it" imply that the depressive is malingering, and could already have pulled himself together if he had wanted to. Work on Expressed Emotion in depression shows that criticism by the family impedes recovery.

Families probably vary very much in how they deal with depressed members, and within families there is probably variation with time, especially depending on whether they are in the agonistic or hedonic mode. In an excellent book⁹, two family therapists write: "Watzlawick et al. pointed out that when people attempt to cheer up someone who is sad they may turn a temporary state of sadness into a prolonged state of depression. They suggested, for example, that families may develop a rule forbidding sadness. In the event that an individual in the family becomes depressed, she is told to cheer up and thus may in fact be punished for an appropriate emotional response. The sad and depressed individual may internalize other people's responses and try to cheer herself up. The per-

son believes it is "bad" to be depressed and fights to change a normal reaction, increasing the state of depression."

Reflecting on CRR's comments, it occurs to me that the depressive sick role may have one important effect on the family, in that it may reduce the family's expectations of the depressed person in the realm of agonistic behaviour. It is the fundamental thesis of the yielding hypothesis of depression that the function of depression is to keep the individual out of the competitive social arena, from places (in Goffman's words) where the Action is. Beck's cognitive triad of negative thoughts ensures that the depressed person does not enter the arena by his own volition, but that does not prevent him being pushed into the arena by his family. It may be that the sick role message convinces the family that he is "out of action" and encourages them to postpone the depressed person's engagements for a period. A message of physical illness is likely to be more effective in this regard than the message "I am depressed".

In summary, following this chain of reasoning, it may well be that in reassuring the depressive that he is depressed rather than physically ill, we are depriving him of the basic message he is trying to convey to his family. If we could randomly allocate depressives into psychological and physical labelling, we could discover the effect of the label on the family's responses.

Wylie-Price Exchange by JV Wylie

The issue as to whether or not a depressed person is really sick and worthy of all the nurturant benefits which accrue to a medically ill person is one which affects every mentally ill patient. Psychoanalysis has always been suspect because, not only

does the theory postulate domination by an inner, infantile homunculus, which has never "grown up", but the treatment seems to submit to the infant's most regressive desire: unlimited nurturant attention. Although John Price's theory clearly has the ring of truth, it lends credence to the idea that mental patients "just want attention", and that depression, among other mental illnesses, might be the result of an "arms race" between submissive individuals who want attention and dominant individuals who have evolved sensitivities to separate the medical wheat from the chaff. In fact, just that empathetic "separating" skill is crucial to the modern psychiatrist in trying to ferret out which depressions are psychological in nature and which are psychophysiological and, therefore, will respond to antidepressants. This skill could be based on a constitutional ability to "feel" whether the patient is being subtly manipulative, or whether the illness has "broken away" from the object world and exists as a "closed loop" process wholly within the sufferer.

My own theory as to the mechanism of transferral from the manipulative, psychological state to the pathophysiological state is that, at a certain level of intensity in genetically predisposed patients, the interaction shifts from the hedonic real-world object to the patient's own internal dominance agency: the superego. For reasons too complex to include here, the superego can only interact with the patient in the agonic mode so that a pathological "closed loop" feedback circuit is established: submissive self asserting depressive need; the superego responding aggressively to this assertion, which stimulates more depressive symptoms and so on. The submissive self is stuck in the hedonic mode, the superego in the agonic, both reinforcing each other resulting in a

psychotic vicious cycle of self hatred and depressive symptoms. Observed biological changes could be a RESULT of the biochemical stress from such a massive "revving" of the neurological hardware.

Obviously, John Price's hope that his hypothesis has heuristic value is, for me, fulfilled.

Book Review of Badcock CR (1990) Oedipus in Evolution. London: Basil Blackwell by D A Freedman¹¹

The copy I received was accompanied by a note from the publisher which acknowledged that, "This is, clearly, not a book with which everyone would agree...". As much, of course could be said about any stimulating and provocative work. This issue is not whether one "agrees" but in which respects does one disagree. With regard to Badcock my questions are complex and troubling. As I read him I am reminded of Trevelyan's version of British history: he recounts repeated catastrophes - wars, famines, protracted sieges, massacres, fratricides, plagues etc., etc. After each he perorates with a comment to the effect that had this not happened something which redounded to the Greater Glory of the British Empire would also not have happened. In a similar vein, Badcock's teleological perspective, the notion that evolutionary forces are pointing towards a greater good, seems to me to be rife throughout his essay. My personal predilection in these matters is otherwise. I am inclined to agree with Gould who, in his recent account of the history of the Burgess Shale, points out that fitness is only defined retrospectively, that it cannot be predicted prospectively. Badcock obviously is convinced otherwise. I quote only one of innumerable statements in which he assumes that intent and purpose are inherent in the evolutionary process.

"...behavior",- he says, "evolves to promote the ultimate reproductive success of the genes an individual possesses...", (p.123). It is clear that this is a judgement which can only be made after the fact.

The "invisible hand" in this economic analysis (and his model of psychoanalysis is essentially economic) knows where it is guiding each EGO. Perhaps it is as a corollary of this approach that he oscillates between macro and micro analyses with an abandon that leaves this reviewer more than a little confused. Virtually within a sentence, regularly within a paragraph, the author will shift from a consideration of the role of parental investment in reproductive success - certainly a macroeconomic hypothesis -- to the significance of premature ejaculation. For the practising psychoanalyst this latter (whatever putative survival value it may have) is an individual problem to be understood in the context of a particular person's developmental experience. Like the death instinct and the racial unconscious, parental investment in reproductive success is an overarching theory which, at first blush, seems to have some heuristic value. It does not, in my opinion stand up under close inspection any better than either of the grand concepts I have already mentioned.

Oscar Lewis pointed out many years ago that some rupture in the experience of continuing unconditional maternal care appears to be necessary if the male child is to be motivated to assume a role which is compatible with adaptive success in most societies. This is a thesis with which I certainly agree. Ironically, from the standpoint of Badcock's argument, free access to all and sundry females - albeit without any concern with the larger consequences of reproducing ad lib - is a critical element in the "tender trap" in which

the institutionally poor find themselves mired.

In summary, I agree with the publisher whose letter I have already quoted. This is a stimulating and provocative essay. However, it presents a thesis which I cannot find myself sympathetic. In terms of evolutionary theory it seems to me to be both retrogressive and anthropocentric. It assumes a transcendent purpose which can only be defined in terms of the human value system. This, Badcock asserts, guides the evolutionary process. Philosophically, at least, I find myself more comfortable with the notion of indeterminate forces and the role of chance. Whether parental reproductive success will have survival value will depend on a multitude of randomly associated and coincidental factors. The relative importance of any one or combination of such forces will only be adjudicable retrospectively by some as yet unborn theorist.

Excerpts from the new Introduction and the original manuscript of The Imperial Animal by L Tiger & R Fox

From the "New" - 1989

(pp.x-xi) We had no predetermined political or philosophical program when we wrote this book. The changes we advocated appeared to us to be compelled by the overwhelming data we were faced with, data of which we were the accountants and translators. But quickly after the book's appearance it became clear that in the narrowed eyes of too many we were bad people. Pro-aggression and warfare, anti-female, advocates of unfettered capitalism, enthusiasts of the primordial - normal throwbacks in a greening age. What a surprise! since we had always done our lessons, maintained tolerably clean fingernails, met our classes on time, and were earnest about good grammar and lucid ar-

gument. Of course we saw ourselves in no way the energetic villains we evidently were for some reviewers, correspondents, irritated colleagues, and a hive of others. We helpfully wrote letters to literary editors, protested to journals, populated seminars and after-class bars, confident that one more fact, one more measured and generous statement of the position, would win the day. Surely no one preferred misinterpretation and unfair calumny? Surely the brisk refreshment of scientific truth would bring a smile to the scowling face of the most curmudgeonly of our new, unwanted enemies? But it was not to be. In fact, the more that we corrected their often puzzling misrepresentations, the more that we pointed out the factual errors, the more that we conclusively refuted their bizarre connection of our carefully documented and argued words to the unsavory positions listed above, the more irritated, angry, and abusive they became. It was soon obvious that we had trodden on some very sensitive toes. As far as the owners of these delicate digits were concerned, there was no room for argument. They didn't want to know. They wished we would roll over and die, or at least shut up and go away. As we puzzled over the nature of our grievous offense, we came to understand that our bright-eyed effort had a significance wider than we could have realized at the time: not because of its specific content, but because it raised an issue that the voluble opponents did not want raised, much less discussed and debated. We found out that the world could not be changed by pointing out truths to honest scholars, because the very definition of truth was at issue. No amount of fact and argument would help because *ex definitione* our premises were so deeply in error that we could not even approach the truth.

(p.xv) It became clear that the

issue went far beyond our book when four years later E. O. Wilson's Sociobiology was greeted with the same outbreak of scorn, calumny, outrage, ferocity, and partisan passion. In detail, our two books were very different — which Wilson was at pains to point out in his Introduction. While kindly praising our effort as "unquestionably correct" and displaying "brilliant clarity," he sought to distance himself: his was to be a work of scientific hypothesis testing, while ours was "advocacy." We admit cheerfully to the charge, since we were indeed trying to effect a "scientific reorientation" (in Robert Merton's terms) rather than seeking a fullfledged scientific theory. Although we did hope such a unified theory might emerge, we did not feel confident enough to say exactly what it might be. We simply suggested where it might come from. But Wilson's efforts met with as little sympathy on the ideological battlefield as ours, even though he had a battery of indisputable and extensive "science" behind him that we lacked. His critics were, if anything, more furious. It seemed that the better the science of evolutionary behavior got, the more threatening it was to THE IDEA.

(p.xviii) Our major challenge was that the fields in which we were to operate were poorly or at best subtly defined. Flexibility was essential. So was an eagerness to explore what might at first seem unrelated to issues of human violence and inequality, because sometimes the connections became obvious and useful only later. For example, ...Jonathan Winson of Rockefeller University, called to say he wanted to study nightmares, which with undue confidence we pronounced beyond our scheme. Until we slept on it, and the next day called him back to begin discussion of what became a fascinating, fundamental study of brain functions,

memory, evolution, and the Freudian theory of the meaning of dreams.

(p.xx-xxi) In two other areas there have been such rapid strides that it is hard to keep abreast: cognitive sciences and neuroscience... We have to add endocrinology to this list of crucial developments. Many of the hypotheses in the book can now be tested by data from the burgeoning sciences studying hormones and behavior. It is clear that the body is the arena for a host of secretions and messages which with remarkable complexity and yet effectiveness mediate between physical experience and social behavior. Now we know that not only does physiology affect behavior but vice versa: the judge pronounces more severe sentences when his digestion is perturbed, but the behavior of his digestion can be as readily affected by the social life around him. The skin is not an envelope but a means of transmission from inside to out and back again.

(pp.xxvii-xxviii) We were fortunate to have a fertile, elaborate, exquisitely worked out theory of behavior and its evolution which was rooted in the generous intellectual hospitality of the Darwinian perception. We were its servants, and glad to be. There were new data, there was a world changing every day, there were exciting theories that seemed to promise a better understanding of more human behavior in a way that made both scientific sense and gave some hint of more civilized and fairer social arrangements which knowledge could help provide.

...We both had one sacred rule. Every single sentence had to be written with both perpetrators present. We followed this same rule in writing this new introduction. No taking home of manuscripts, no dividing up of chapters. Either could rewrite anything and rewrite everything, so much so that eventually we forgot totally who started and finished what, whose

idea was this and whose caveat that. In the end what occurred was a kind of improvisation rather like jazz. A theme would be announced, worked over, run through and worked over again, to the point where the separate instruments blend into one sound. While the separateness is there, it is submerged in the joint product--which becomes the only thing that matters. We had fun writing it; we hope you have fun reading it. We also learned more through writing it together than we could ever have through solitary research.

From the "Old" - 1971

(p.2) The purpose of this book is twofold: to describe what is known about the evolution of human behavior, and then to try to show how the consequences of this evolution affect our behavior today. To do this we must draw from zoology, biology, history, and genetics. We must use the sophisticated techniques and many materials of the social sciences -- the techniques with which, as social scientists, we are most familiar -- to place man in the broad context of the natural world. The real and intellectual pressures forcing us to see ourselves as an endangered species demand an expansion of the vision of the social sciences. They demand a skeptical review of how we explain our political behavior, our economies, our leisure, our forms of education, and the recurring tragedy of war.

(pp.5-6) Biogrammar? Each species has a repertoire of signals -- postures, gestures, movements -- to communicate what the animals feel and what they plan to do. When a young Gelada baboon intrudes into the personal space of an irascible elder, the latter affects what looks to be a huge yawn but what is, on the contrary, a warning display of canine teeth and red gum tissue meant to intimidate the careless youngster. When one herring gull lands on

another's territory, the situation instantly becomes ambiguous. Male and female gulls look more or less the same to one another. The intruder may be either a challenging male to be fought, or an enterprising female to be courted. If the newcomer stares head on, it is a signal for a fight; if it wags its head, it is an invitation to seduction. If one of the wives of a Hamadryas baboon strays too far and shows a friendly rump to a roving bachelor, her overlord will chase her and bite her on the neck — a part of her anatomy well enough padded to prevent damage but sensitive enough to remind her that, for better or for worse, she is part of an exclusive mating group. If a human being gives something — real or incorporeal — to another, something will be given back. Even the Spanish beggar gives his blessing in return for alms. A female chimpanzee who has left her band to give birth to a new member does not simply rejoin without ceremony. She approaches the old males of the band with hand outstretched in a begging gesture; the old males touch her palm or stroke the back of her neck; only then will she rejoin the females of the group.

(pp. 15-16) It is not *instincts* in any old-fashioned sense that are at issue here; initiation ceremonies and male rituals are not "instinctive." They emerge from the biology of an animal programmed to produce them, once it is given the appropriate stimuli. Without these stimuli, there will be no behavior, or only a modified or distorted form of it. The human organism is like a computer that is set up or "wired" in a particular way. It is always in a state of readiness — at successive points in the life cycle — to process certain kinds of information and to produce certain kinds of information. To be sure, the information has to be of a specific type in order to be processed, but its content can vary a

great deal. Once the information is received, the computer stores it and goes onto the next task. If the system is confused — if, for example, adult programs are fed to adolescent computers — then the fuses blow and there is risk of breakdown.

(p.16) The wiring is geared to the life cycle so that at any one moment in a population of *Homo sapiens* there will be individuals with a certain "store" of behavior giving out information at another stage to others who are wired to treat this information in a particular way. The outcome of the interaction of these individuals will be .."typical" relationships.

(pp.39-40) Aristocrats know all the primate tricks--particularly those relating to what Michael Chance has called "attention structure." Dominant primates get looked at most; they are the focus of attention, and also the center of the group's social structure. It is not clear -- nor does it really matter — which comes first. What matters is that leadership and visibility are closely linked, and that human attention structures -- while infinitely more complex and symbolic than the other primates' -- nonetheless can be identified and their functions for politics made clear. Consider the dramaturgy of aristocracy -- the forms of address, the styles of clothing, the seating plans, and the very dining halls themselves. The architecture is made to impress as much as to shelter, and to be definitive rather than merely serviceable. The round of life celebrates the status and pomp of the aristocracy, the more visible the better... It is too easy to scorn the tourists... They are real people who choose to spend their time and energy...to gape at foreign palaces ...many... components of primate systems of hierarchy and deference can be seen in the attention-structure efforts of aristocrats.

(pp.192-193) In assuming that men-

tal "illnesses" might have adaptive functions, we are not so far from Freud, to whom neuroses were essentially adaptive pieces of behavior. He, however, saw them only as adaptive in the life of the individual, not the species. The problem with neuroses was that while they might have been useful at their inception, they certainly were not in future years. The proposition here is to put behavior that falls at either end of the curve into social perspective by seeing it as part of the normal variation in a population - as normal as variations in height, speed, strength, intelligence, or any other feature. Extremely high intelligence, for example, is "abnormal," and people so endowed often cannot function very well in society. But they can solve chess problems faster than computers, and so society eventually finds a use for them. When people occur for whom we can find no use at all, we call them lunatics... But their seemingly abnormal behavior may have once had a function that we can no longer recognize because our circumstances have changed.

(pp.194.195) But what of true states of schizophrenia? What of delusions, paranoia, manic-depression, catatonia? Again, they crop up everywhere, and again they often serve every important functions. Christ would no doubt be diagnosed today as suffering from paranoid delusions (talking to God, destroying the world, etc.), while Joan of Arc with her voices would not be burned, but bureaucratically incarcerated for life for her own good. But their "delusions" helped them to complete almost impossibly difficult tasks requiring more than the usual quota of heroism and dedication. In our hunting past, such requirements cannot have been uncommon, and a proportion of people with such "delusions" -- with immediate and confident contact with the other world, for example --

would have been more than useful and well worth the minor costs. We ourselves do not seem to mind paranoid delusions of grandeur in our leaders; it is only when they occur in "inappropriate" people -- like assistant professors and busboys -- that we send for the straitjackets.

The roots of these mental-behavioral adaptations may go very deep. The origins of grandiose delusions, for example, may lie in the comportment of dominant animals under stress; a form of megalomania would have helped to make a convincing show of really dominant behavior. On the other hand, deep withdrawal symptoms may have characterized chronically subservient animals trying to stay out of trouble. Similarly, manic phases may have coincided with sudden rises in the hierarchy and the energy necessary to complete and maintain these, and depressive phases with equally sudden changes downward. Sociologists have noted how sudden changes in status (in either direction) affect mental illness and especially suicide in contemporary human society. In fairly small hunting groups it must have been much easier to find roles for all variant forms of behavior exhibited by the members. In our own huge societies lack of fit between an individual's behavior and the roles available to him is often glaring, and so we have to put out of the way those whose behavior is "inappropriate" to their station.

p.202...The psychiatrist is a very skilled best friend, one trained in a very special kind of friendship. In primates, friendship is, as we know, expressed by grooming. When in our species the symbolic mental equipment becomes tangled, infected, and painful, it needs grooming just as much as the fur of a baboon. The psychiatrist helps us to pick over the messy details of our confused and unhappy lives and to reorder them in some more satisfactory way.

1. Rogers JH: The role of introns in evolution. FEBS 1990;268:339-343
2. For ASCAP Newsletter Volume 3 (Jan through Dec, 1990) please send \$18 (or equivalent) for the 12 issues. Make checks or money orders out to "Department of Psychiatry and Behavioral Sciences, UTMB." Note on page 11 that subscriptions for ASCAP Newsletter Volume 4 (Jan through Dec, 1991) are now being taken.
3. ASCAP philosophy and goal. High scientific importance rests on comparing animal behaviors across-species to understand better human behavior, knowing as we do so that evolutionary factors must be considered for understanding properly such behaviors. To accomplish these comparisons, very different new ways of viewing psychological and behavioral phenomena are required. This in turn explains why we need new words to define and illustrate new dimensions of comparisons across species. We expect that work in natural history biology combined with cellular-molecular biologic research will emerge as a comprehensive biologic basic science of psychiatry. Both top-down and bottom-up analyses are needed. Indeed, this must happen if we are to explain psychiatric illnesses as deviations from normal processes, something not possible now. Compare to pathogenesis in diseases of internal medicine.
4. Tiger L, Fox R: The Imperial Animal NY: Henry Holt Co
5. Buss L (1987) The Evolution of Individuality Princeton NJ: Princeton U Press, p.vii
6. Alberts B, Bray D, Lewis J, Raff M, Roberts K, Watson JD (1989) Molecular Biology of the Cell. Second Edition NY: Garland Publishing, Inc., p3
7. Gardner R: Mechanisms in Manic-Depressive Disorder: An Evolutionary Model. Arch Gen Psychiat 1982;39:1436-1441.
8. ASCAP Newsletter 1990;3(#9):6-7
9. Weeks GR, L'Abate L (1982) Paradoxical Psychotherapy. New York: Brunner/Mazel, p145-6
10. This is a response to the essay by Price JS: METAPHORS OF SUBMISSION: An answer to the question "Do depressed patients get their own way? ASCAP Newsletter 1990;3(#7):1-11 (July issue)
11. David A Freedman is a faculty member, Baylor U School of Medicine, and member, Houston-Galveston Psychoanalytic Institute
12. Gould SJ (1989) Wonderful Life NY: W.W. Norton.
13. Lewis O: The Culture of Poverty. Scientific American. 1968;214(#4):19-25.