...biopsychiatric theory and research resulted in a tidal wave of sales for the makers of Thorazine®, the first neuroleptic drug (meaning lobotomizing or brain-disabling drug – modern biopsychiatrists prefer to call this class of drug "antipsychotic") and the increasing number of drugs like it. These companies, in turn, funded such research, for money invested in biopsychiatry was virtually guaranteed to result in ever-growing sales of psychiatric drugs. Drugs for depression, mania, and other "mental illnesses" followed; each made a fortune for the company marketing it; and those companies funded further research in biopsychiatry. This unholy alliance between corporations and scientists continues to the present day, giving us drugs for everything from nervousness to PMS to kids that are difficult to manage. No other medical specialty is underwritten by the drug industry to a degree even vaguely approaching that of psychiatry. And with each new drug brought to market for some condition, the list of types of consciousness that are deprecated as "mental illness" grows.

...The hypothetical disturbances of neurochemical function that are said to underlie "mental illness" are just that: hypothetical. No experiment has ever shown that anyone has an "imbalance" of any neurotransmitters or any other brain chemicals. Nor could any conceivable experiment demonstrate the existence of a "chemical imbalance," simply because no one, least of all the biopsychiatrists, has the slightest idea what a proper and healthy chemical "balance" would look like.

Warzone Distro
WARZONEDISTRO.NOBLOGS.ORG
2026

There Are No "Chemical Imbalances"

Exposing the Profit Motive Behind Psychiatry and the Myth of the “Chemical Imbalance” Theory

Eaton T. Fores

"Today's patients, discontented, unhappy, fragmented and confused by an increasingly frantic, alienating and violent society, come to psychiatrists for help, only to have their illusions shored up by an increased dose of a technologic fix. They are told they have illnesses that are biologic and can be fixed, instead of being allowed to speak about their unhappiness, to speak about how difficult it is to be a human being, to speak about their suffering, because human beings have always suffered and always will. To believe that we can conquer depression, despair, anxiety with modern technology is the height of hubris and bad faith, a mere childish fantasy, unworthy of any thoughtful person who has their eyes open to human history and modern culture."

– **David Kaiser, M.D.** Northwestern University Hospital, Chicago, IL, *Psychiatric Medications as Symptoms*, February, 1997

"No biological etiology has been proven for any psychiatric disorder in spite of decades of research. ... Don't accept the myth that we can make an 'accurate diagnosis.' ... Neither should you believe that your problems are due solely to a 'chemical imbalance.'"

Edward Drummond, M.D. Associate Medical Director, Seacoast Mental Health Center, Portsmouth, NH

The Origins of Biopsychiatry

Some decades ago -- through the 1950s, 60s, and 70s -- psychiatric theory fell essentially into one of two camps. There were the *psychodynamicists*, who encompassed psychoanalysis, depth psychology, "client-centered" theory, existential psychology, and a host of other approaches that had as a common denominator the (now radical) idea that a person's experiences in the world, with his or her family, and with his or her fellow persons, shaped and perhaps even determined the personality that was formed, as well as its derangements. Today, incredibly, the idea that one's experiences in life have an impact on who one becomes is an idea that is not taken seriously, and which one needs to defend if one wants to hold.

The other camp, tiny at the time, were the *biopsychiatrists*. Biopsychiatry first appeared when someone noted how close the chemical strauctures of a couple of neurotransmitters were to those of certain psychedelic drugs (which, at the time, were called *psychotomimetic* drugs, meaning drugs that produced effects

deeper encroachment of the nation's police apparatus into the lives of citizens, and for the dismantling of the Bill of Rights. The Supreme Court has historically provided the final check on Executive and Congressional power, but the current Court is the most corrupt and disgraceful in American history, and it is a certainty that that body will do absolutely nothing in the face of these trends (except possibly lend its support to them). Given these conditions, any expectation of a rational national understanding of drugs seems mere fantasy indeed.

But what would such a rational understanding look like? Today, drug use is divided into two categories: medical use, and abuse. When a drug company wants to sell a new psychotropic compound, it needs to do two things. First, it must assure that, although psychiatrists will prescribe it, no one will like taking it. This assures that it will not be designated a "controlled substance," which would have an enormous negative impact on its sales. Second, a disease must be fabricated for which the new drug is "indicated," and the disease entered into the compendium of ersatz diseases, the *DSM*, mentioned above. The categorization of all drug use into either "medical use" or "abuse" is what makes such logical contortions necessary. Drugs, considered scientifically, do not naturally fall out into the categories, "medicine" and "drugs of abuse." As described in the digress in the ETFRC discussion of the neuron, drugs naturally fall into three different kinds of categories (the examples following are for the case of imipramine [Tofranil®], a "tricyclic antidepressant"): chemical ("dibenzazepine"), pharmacodynamic ("norepinepherine/serotonin reuptake inhibitor"), and intentional ("antidepressant"). The new fourth level of description, one may say the "political-moral," added to the chemical, pharmacodynamic, and intentional categories that drugs fall into is a cultural and political artifact, not a natural kind. Categorizing drugs as "good" and "bad" is logically meaningless, and a rational understanding of drugs would reject this simple-minded and worthless conceptual scheme. Categorizing them as "legal" and "illegal" is offensive and intolerable to anyone who values the principles detailed in the Constitution and the Bill of Rights – an unfortunately small and ever-diminishing population. As far as a rational *drug policy* – this makes no more sense than the idea of a national shoe policy, or a national shaving cream policy.

Publisher note:

We added "*Exposing the Profit Motive Behind Psychiatry and the Myth of the "Chemical Imbalance" Theory"* as a subtitle to this zine simply to give the reader a little more context as to what this text would be discussing.

rejection) is that it locates the cause of psychic suffering in people's "bad brains," and excludes the conditions of modern life, or anything else, from consideration as the cause of such pain. That is, it acts to deflect attention from the fact that modern life has seen the number of people suffering extreme psychic distress skyrocket – we have "epidemics" of "ADHD," and "depression," and "generalized anxiety," as though those things were communicable diseases – and forecloses any discussion of the inhuman conditions under which people live today. If someone finds taking Prozac® helpful, nothing in this essay implies that he or she should not be allowed to take Prozac®. If someone sees such an implication, it is because the division of drugs into "medicines" and "drugs of abuse" leaves no room for any other uses for drugs – if one wishes to procure and consume a psychotropic drug, one must have a disease, have the disease certified by a state-licensed physician, and obtain a permission slip, called a "prescription," before one can legally purchase that drug. But this is purely a cultural artifact. Severe emotional distress is not a disease, but drugs have valid applications beyond their use in disease states. It is simply not the case that the use of a drug for a non-medical reason is inherently abusive. There is no logical reason for the hegemony of medicine over drugs, and no ethical reason for State control of drugs – indeed, State control of drugs is positively *un*ethical and very clearly unconstitutional.

This is not a tract about the "Drug War." The Drug War is simply indefensible. However, one cannot suggest that biopsychiatry is fraudulent and should be eliminated without discussing the millions of citizens who take psychotropic drugs under the aegis of psychiatry. The relationship between mind, medicine, and drugs must also be discussed. There is no scientific explanation for the fact that morphine is legal while heroin is not. There is no scientific explanation for the fact that Ambien® is legal and methaqualone (Quaalude) is not. There is no scientific reason for forbidding people who benefit from marijuana from having it. Indeed, there is no scientific reason for drug prohibition at all, and it is positively destructive in social terms. The explanation for these things is purely political. The ostensible goal of the War on Drugs – "a drug-free America" – is absurd on the face of it and quite clearly at odds with the endless promotion of psychiatric nostrums in the media, and popular magazine articles expounding on the supposed "scientific discovery" that anxiety, depression, psychological damage from horrible experiences ("Post-Traumatic Stress Disorder"), insomnia, and general discomfort with existence in the modern world are diseases. But the "drug war" will not be abandoned, however hypocritical, illogical, or even evil it may be, because it has become an entire industry: urine testing laboratories, privatization of prisons, profits from unconstitutional "asset forfeiture," the ever-increasing budget for drug law enforcement personnel – none of these things are going to go away of their own accord. There are simply too many people making too much money from them for them to even be called into question. Recent legislation in the name of "terrorism," such as the USA PATRIOT act, is combining with the drug war to provide a rationale for ever-

resembling psychosis). LSD-25, an indolamine, resembled serotonin to a certain degree, and with DMT (dimethyltryptamine) the resemblance was striking: it differed from serotonin (also called 5-HT, or 5-hydroxytryptamine) by only a couple of atoms. Then there were the *catecholamine* neurotransmitters, norepinepherine and dopamine. These molecules were extremely similar in structure to mescaline and amphetamine. Amphetamine-induced psychosis was well-known to physicians. Although not a psychedelic *per se*, amphetamine overdose produced extreme paranoia and delusions that were remarkably similar to those seen in paranoid schizophrenics.

So an hypothesis naturally arose: what if schizophrenics were producing "psychotomimetic" drugs in their brains naturally? Then, medicine would have determined the etiology of schizophrenia, and psychiatry, never quite accepted by the rest of the profession as "real" medicine, would have to be taken seriously, even by surgeons. A relatively slight derangement of the metabolic pathway that produces serotonin might result in DMT being produced instead. This was the 1950s, and very little neurochemistry, let alone neuropharmacology, was understood at the time. Research-oriented psychiatrists began a furious race to find what was being called the "M" factor ("M" for mescaline). The blood and urine of mental hospital inmates was being subjected to every test that existed at the time, and after the inmates died, their brains were sliced up and examined for any hint of deviation from "normal" brains. It was a very exciting time. In all the excitement, it seems that everyone forgot that tolerance develops to the effects of psychedelic drugs in a matter of days, while the course of schizophrenia was measured in years and decades. Even if mental hospital inmates were producing DMT or mescaline, or some analog of these drugs, in their brains, it could not possibly account for their condition anyway. But research in this direction snowballed, like the stock market frenzy that drove the prices of Internet companies that had never made a dime to astronomical levels. At one point, someone found a " pink spot" present in chromatograms of the urine of mental hospital inmates that was not seen in the general population, and the frenzy reached even greater heights. Eventually, the spot was shown to be the result of the administration of Thorazine ® rather than the result of any disease, but the biopsychiatry frenzy didn't even slow down.

What was behind this frenzy? Of course, there were some researchers who were positive, almost religiously so, that everything about the human mind and personality had to be reducible to molecules. But at the time, such people were few in number, and the originators of the "endogenous psychotomimetic" hypothesis were not among them. However, biopsychiatric theory and research resulted in a tidal wave of sales for the makers of Thorazine®, the first *neuroleptic* drug (meaning lobotomizing or brain-disabling drug – modern biopsychiatrists prefer to call this class of drug "antipsychotic") and the

increasing number of drugs like it. These companies, in turn, funded such research, for money invested in biopsychiatry was virtually guaranteed to result in ever-growing sales of psychiatric drugs. Drugs for depression, mania, and other "mental illnesses" followed; each made a fortune for the company marketing it; and those companies funded further research in biopsychiatry. This unholy alliance between corporations and scientists continues to the present day, giving us drugs for everything from nervousness to PMS to kids that are difficult to manage. No other medical specialty is underwritten by the drug industry to a degree even vaguely approaching that of psychiatry. And with each new drug brought to market for some condition, the list of types of consciousness that are deprecated as "mental illness" grows.

A social trend towards not holding people responsible for their behavior was perhaps the necessary consequence of science "discovering" that, one by one, every form of ill conduct or unpleasant experience was the manifestation of a "disease." Of course, science can discover no such thing; rather, it can only *define* behaviors as diseases. The official compendium of "mental illnesses," the Diagnostic and Statistical Manual, owes its contents not to laboratory discoveries, but to the votes of psychologists and psychiatrists. To put this in perspective, try to imagine a committee of oncologists voting on whether or not lymphoma is a disease. That is exactly how psychiatry proceeds. The process yields predictably absurd results: one year homosexuality is a disease; the next year, it is not, but "caffeine addiction" is; and "substance abuse disorders" are miraculously discovered which mirror perfectly the drug laws. Examples of such obvious nonsense could be (and are) multiplied without end. The normativity of all of this – the fact that psychiatric diagnoses are judgment, taste, opinion, and name-calling, and nothing more – is hidden behind a dense barrage of impenetrable pseudoscientific babble. We are subjected to advertisements depicting sad, anergic neurotransmitter molecules plodding slowly across the synapse, and told that "depression is *medical* condition, and a chemical imbalance may be to blame." After treatment with Zoloft®, we watch perky, rejuvenated transmitter molecules merrily doing laps across the synaptic space. Contemplating the fact that most people actually *believe* this hogwash is almost enough to make one reach for antidepressant drugs oneself.

Of Chemical Imbalances and "Clinical Depression"

The hypothetical disturbances of neurochemical function that are said to underlie "mental illness" are just that: hypothetical. No experiment has ever shown that anyone has an "imbalance" of any neurotransmitters or any other brain chemicals. Nor could any conceivable experiment demonstrate the existence of a "chemical imbalance," simply because no one, least of all the biopsychiatrists, has the slightest idea what a proper and healthy chemical "balance" would look like. This is an extremely important to keep in mind.

is intended to make antidepressant drugs seem analogous to antibiotics: if an infection is not present, of course, penicillin will not alter anything of consequence. But this analogy is a flat-out deception. Reuptake blockers block reuptake in anyone. Whatever effect results from reuptake blockade will ensue in anyone who takes a reuptake blocker. Of course, different people have different experiences from psychotropic drugs, and what may strike one person as mood elevation make strike another as nervousness. But it is simply not the case that "clinical depression" is a disease entity, or that "it" is selectively affected by antidepressant drugs. There are no chemical imbalances, and there are no drugs which correct these nonexistent imbalances. The public's belief in these things is due to the perpetration of a massive fraud.

So What About Psychotropic Drugs?

So what of psychotropic drugs – the various antidepressants, anxiolytics, "mood stabilizers," sleeping pills, stimulants and other things that people go to psychiatrists for? Should such things be banned? Are people outside of their rights by seeking out and taking such drugs?

Absolutely not. Any adult should be able to purchase any drug he or she wants to. If a person feels that working with a physician (or pharmacologist, for that matter) to find a drug or combination of drugs that makes their experience of life less distressing, it is difficult to see any ethical reason for preventing him or her from doing so. But it should be recognized that *psychiatric drugs are not different in kind from other psychotropic drugs* – specifically, the compounds that are outlawed and deprecated as "drugs of abuse." Until 1953, opioid drugs were routinely used in the medical treatment of depression; now, investigation into their use for that purpose is again being explored, albeit with some trepidation, since physicians rightly fear the intercession of the vast and ever-growing drug police state. But the acceptability of opioid use for depression only a few decades ago, and its investigational use today (however tentatively), shows that which drugs are condemned and which are allowed to amass vast fortunes for drug companies is ultimately arbitrary.

Denying that so-called mental illnesses are diseases, and denying the legitimacy of psychiatry as a branch of medicine, is not to deny the usefulness of psychotropic drugs to certain people, or the value of experts on those drugs to those who might want to take them. This is an extremely important point. A common response to one's rejection of biopsychiatry is to accuse one of being cruel and wanting people to suffer, of wanting to deny helpful drugs to people who wish to take them, of believing that extreme psychic distress does not exist, and so on. This is an awful misinterpretation of what is being said. Nothing of the kind has been said or implied in this essay. *The principal reason for rejecting biopsychiatry (aside from the fact that intellectual honesty demands its*

> *between active antidepressants and placebo in contemporary outpatient trials involving patients with depressive illness of only moderate severity. With pediatric and geriatric depression, results are typically even less clear. Pediatric studies often have failed to show superiority of drug over a placebo ... Another major problem with antidepressant agents is that because placebo response rates tend to be as high as 30% to 40% in research subjects diagnosed with major depression and possibly even higher in some anxiety disorders, statistical and clinical distinctions between active drug and placebo are difficult to prove ... Moreover, evidence concerning clinical dose-response and dose-risk relationships is especially limited with this class of drugs.* [10th edition, p.470]

Given this stunning admission from the most recent edition of the leading pharmacology text, it is difficult to see why these drugs are even in clinical use. There is no other class of drug for which so little placebo-controlled evidence of efficacy exists which is in common clinical use. The manufacturers of these drugs tell the public again and again that the medications are almost always effective, a claim which is explicitly contradicted by the above quote. Television commercials now assure us that millions of people need treatment with these drugs, and that the drugs will be effective for the vast majority. The fact is, antidepressant drugs are almost indistinguishable from placebo in study after study. The difference is so small that sample sizes of thousands of patients are required before a study can claim to have shown a statistically significant difference between the 40% of the placebo patients whose condition improved and the 50% of the drug patients who improved. Drug companies must throw away the majority of studies, presenting to the FDA only the few that showed a significant difference between drug and placebo, to obtain approval for the drugs. If one repeats an experiment 20 times, the odds are that one of the trials will show such a difference, by chance alone ("Statistical significance" is defined as a 5% chance that the results were due to chance alone). The non-responsiveness of pediatic populations (i.e., children) to "active" drug is especially telling: having not yet completely formed the concepts of medicine, of what pill-taking could possibly have to do with mood, of wanting the doctor to think they are 'good' for reacting the he or she wants them to, children are especially poor placebo responders where psychotropic drugs are concerned.

It is difficult to see why people would subject themselves to the considerable discomfort of antidepressant side effects when evidence for the effectiveness of these drugs is virtually non-existent. Another common myth about antidepressant drugs is that they have no effect on someone who doesn't "have" the disease of "clinical depression." Most of these drugs act by blocking synaptic reuptake of monoamine neurotransmitters. Drugs are molecules. They do not know why they are present in the nervous system, and do not act differently depending upon the mood of the person who takes them. The myth

The *hypothetical* neuropathology lies at so fine a level – the molecular level – that, even if it *did* exist, its status as "pathology" would be profoundly unclear. Far more questions would be raised by such results than would be settled. Rather than bringing one more difficult problem under medical control, it would instead occasion a reflective and critical analysis of what we mean by the word "pathology" in the first place. Every mode of thinking, feeling and perceiving has an associated neurochemistry. Is it being suggested that certain thoughts, feelings, and perceptions are – literally, and not metaphorically, as Szasz forces us to insist – *"sick"* in exactly the way that we use that word when describing multiple sclerosis, or melanoma? References are made to "serotonin imbalances," but what is the cash value of this phrase? As it turns out, nothing at all. The nervous system has nothing remotely like a global serotonin level, and no one has ever measured synaptic concentrations of transmitters anywhere in the brain. Contrary to popular belief, stories in the popular media, and pharmaceutical industry advertising, there is no evidence at all that serotonergic transmission is impaired in depressed persons. Neurons use serotonin as their substrate for a myriad of mental phenomena, both conscious and unconscious. There is no reason to believe that what we call "mood" is controlled by one specific neurotransmitter; and in fact, there is every reason to believe that it is not. Pharmacologic disruption of serotonin re-uptake appears most unlikely to selectively impact mood.

But of course the most compelling reasons to reject the biopsychiatric view lie on a deeper level, and have nothing to do with biopsychiatry's repeated insistence on grounding itself in non-existent empirical data. Considered *qua* science, biopsychiatry is simply an atrocity, a blight upon science after the fashion of astrology, Creation science, orgone theory, phrenology, and so forth. At every point from hypothesizing to theory-building, it can be counted upon to find the most stunningly fallacious line of thinking, and take it. But that is unimportant, because the views and beliefs of biopsychiatry have nothing to do with the answers to scientific questions in any case: the hunt for biological "causes" of "mental illness" is an entirely fallacious enterprise in the first place; the non-existence of data to support its assertions is quite beside the point. First of all, *to say that 'this type of consciousness is good, and that type is bad,' is a to make a political and moral, but certainly not a medical or biological, judgment.* Consider a situation in which blacks were declared mentally inferior (I know it's difficult for Americans to imagine such an inhuman scenario, but please bear with me – if only for the sake of argument) on the grounds of their skin color. Then, melanin and melatonin are discovered and – *voila!* – science has now *proven* that being black is a pathological condition.. After all, a clear biochemical and genetic difference can shown between blacks and "normal (read: 'white') controls." And the noted expert, Dr. Unwissenheit – who is the head of the National Institute of Epidermal Health – has said many times that a cure for Disagreeable Epidermal Pigmentation Disorder is right around the corner – awaiting nothing, save more research.

"What is pathological?" is an inescapably *normative* question, and orders of magnitude more so when it is asked of conscious phenomena. A tidal wave of binding assays, brain scans, and receptor sequencing may obliterate everything in its path, but will never turn this normative, value-laden question into a *positive* question. Vanilla ice cream could be subjected to the most exhaustive physical and chemical analyses imaginable, but no amount of data that could ever be assembled would answer the question, "does it taste better than chocolate ice cream?" On such matters, science is, properly, silent, for these are not positive, or scientific, questions. When, as with biopsychiatry, scientists must be shushed, disabused of their delusions of grandeur in public, it is embarrassing for all concerned. For 'pathology' to exist, one person must examine some feature of another person, and render a negative judgment about that feature. When the feature under examination is *someone's mind*, the 'judge' would be well advised to watch his or her step. The rubbish that the priests and the congregation of biopsychiatry are trying to feed us is no more logically sound, no less appalling in its narrow-minded ignorance, and no more "scientific" than the outrageous scenario concerning skin pigmentation discussed above is. Most students of law and psychiatry are familiar with Thomas Szasz, who, for forty years, has written book after book asserting, and arguing the case for, the thesis that what are called "mental illnesses" are illnesses only in a metaphorical sense. Szasz's argument is fundamentally unassailable, and critics who virulently hate him generally have never read him, and often have strong emotional investments in the idea of "mental illness" and the notion that distressing behavior and experience is entirely biochemical in origin. What makes Szasz's argument finally sound is his assertion that, if one of what are called "mental illnesses" should be demonstrated to be biochemical in origin, it would then be a neurological problem, like a seizure disorder. It follows immediately that psychiatry, by definition, cannot be treating actual diseases – at best, psychiatrists treat putative diseases whose etiology and proper treatment are unknown.

But Szasz does not take up the problem of the normativity of *all* pathology, e.g., that the normative proposition, "solid tumors in the liver constitute pathology" is different in kind from the positive proposition, "an oxygen atom covalently bound to two hydrogen atoms constitutes a water molecule." To judge something "pathological" is to *render an opinion about what is desirable*; hence, there can never be a *fact of the matter* regarding pathology. From a maximally objective viewpoint, the fact that a particular organism is developing what we call malignant tumors is simply another fact about the world. Placing a negative value upon this fact removes us from the realm of science. This is why medicine as a discipline is closer to engineering than it is to science. The goal of medicine is to detect events judged negative in the organism, which are called "pathology," and, if possible, to restore a state, called "health," which is regarded as good. The normativity of the concepts of "health" and "pathology"

"antidepressant," although stimulants like amphetamine had been used, unsuccessfully, in an attempt to relieve depression. Although psychiatry insists that they are "antidepressants" and thus are without effect in people who aren't depressed, the truth is that MAO inhibitors will raise *anyone's* mood, sometimes to manic levels. But MAO inhibitors had lots of side effects, including some that could be fatal when people taking the drugs ate certain foods. Doctors found them far from ideal drugs for their depressed patients. So the drug industry came up with the *tricyclic* compounds, of which *imipramine* is the prototype. These drugs were very close chemical cousins of the *phenothiazines* – like Thorazine®. They had been synthesized in an attempt to produce new antihistamines and sedatives, when, quite by accident, they were found to have an effect on some depressed patients. At the time, antidepressants were generally reserved for use in severely depressed, hospitalized patients. Nothing much happened with drugs for depression for a couple of decades after the tricyclics were introduced.

In recent years, of course, there has been a vast explosion of unrelated drugs targeted at depression, including the Selective Serotonin Reuptake Inhibitors (SSIRs), of which fluoxetine (Prozac®) is the prototype; mixed-action reuptake inhibitors like venlafaxine (Effexor®) and mirtazapine (Remeron®); and other, difficult to categorize compounds like bupropion (Wellbutrin®). The public perception is that "antidepressant" drugs are highly effective treatments for depression. Touted as vastly more effective, more selective,and with far fewer side effects than "classical" antidepressants, these drugs have reached an enormously wider population. Accordingly, "diseases" like "dysthymia" had to be invented to rationalize prescribing the drugs to people who didn't really have anything wrong with them. This, of course, posed little problem, since, unlike epilepsy or diabetes, psychiatric "diseases" can go in and out of existence simply by a show of hands. The pharmaceutical companies, flush with billions of dollars from sales of Prozac® and its cousins, became emboldened, and began marketing the new drugs directly to the public, rather than to physicians as they traditionally had. In pamphlets and television commercials they told the public that the evidence for a biochemical origin for depression is beyond dispute, and that antidepressant drugs are almost always effective. However, Goodman & Gilman's The Pharmacological Basis of Therapeutics, the standard medical school textbook of pharmacology, has this to say regarding these drugs:

> *A somewhat surprising fact is that clinically employed antidepressants, as a group, have outperformed inactive placeboes in only about 2/3 to 3/4 of controlled comparisons, with a similar proportion of depressed adult subjects rated as showing clinically significant responses. Moreover, assessment-based changes in clinical rating of depressive symptoms, rather than categorization as "treatment-responsive," often yield surprisingly small differences between surprisingly small average differences*

In contemporary culture, it is not uncommon for someone to return from a visit to the doctor with a prescription for an "antidepressant" drug and the notion that the doctor has diagnosed some kind of "chemical imbalance" in the extremely delicate process of neurotransmitter metabolism and release. Medical diagnoses are generally backed up by empirical facts: infection may be diagnosed when the patient has a fever and a high white blood cell count. Hyperthyroidism may be diagnosed by measuring circulating levels of thyroid hormones. Heart disease may be diagnosed by angioscopic visualization. How are the chemical imbalances which are the supposed basis for the prescription of "antidepressants" diagnosed? Is exploratory neurosurgery performed, using some technique that allows the surgeon to quantify synaptic transmitter levels? No, the very idea is absurd. Is a spinal tap, then, done to at least measure, on a gross scale, the distribution of neurotransmitter metabolites? Of course not – how many people have undergone spinal taps before receiving a prescription for Effexor®? Is blood at least drawn, to test *something*? No. This diagnosis – the diagnosis of the most subtle of chemical disorders in the most complex organ in the body – is made on the basis of the patient's report of feeling sad and lethargic. Try to imagine a hematologist diagnosing leukemia this way to get a sense of just how ridiculous this idea is. The latest edition of one pharmacology text has this to say about the status of depression as a disease: "Despite extensive efforts, attempts to document the metabolic changes in human subjects predicted by these [biological] hypotheses have not, on balance, provided consistent or compelling corroboration." This is a long-winded way of admitting that not even a scrap of evidence supports the idea that depression results from a "chemical imbalance." Yet patients are told every day – by their doctors, by the media, and by drug company advertising – that it is a *proven scientific fact* that depression has a known biochemical origin. It follows directly that *millions of Americans are being lied to by their doctors*; and people surely can't give informed consent for drug treatment when what they're being "informed" by is a fraud. These facts should have enormous social consequences, yet, for reasons that are unclear, they have no social or legal effects at all. To sum up: there is no evidence whatsoever to support the view that "mental illness" is biochemical in origin; in other words, things like "Unipolar Disorder" and "Attention Deficit Disorder" simply do not exist. Even if there *were* such evidence of the existence of these things, how could one fail to notice that doctors *do not test for anything at all* in making the diagnosis of "clinical depression" or any other "mental illness?" The principal difference between medical and psychiatric diseases is this: medical diseases are *discovered*, generally through scientific research. But psychiatric "diseases" are *invented* – that is, they are fabricated out of thin air by committees.

Now let's briefly look at the "antidepressant" drugs themselves. The earliest of these were the *MAO inhibitors*. One of these drugs, *iproniazid*, was being used for the treatment of tuberculosis, when doctors noted that the patients were becoming euphoric. The drug was put on the market in 1951, and was the first

is inescapable. The question then becomes, how far can we reasonably extend the notion of pathology? Shall we extend it to cover social "pathologies," such as crime and poverty? Is the stock market suffering a medical syndrome when it undergoes long periods of decline? Perhaps the low quality of popular culture is a symptom of an underlying disorder; should we assemble a committee of physicians to restore it to "health?"

Let's try turning definitions around. It is, I think, not too unreasonable to equate "pathology" and "disease" with those conditions which physicians, in virtue of their special training in anatomy, physiology, surgery, and pharmacology, are uniquely qualified to identify and address. Clearly, then, placing crime and poverty in the domain of medicine would be a mistake. What about the varieties of human consciousness – the thoughts, feelings, moods, perceptions, memories, and emotional tones that make up our mental lives? These can be variously exhilarating or distressing, and account for a large portion of peoples' troubles and complaints. Does expertise in anatomy, physiology, surgery, and pharmacology – collectively, the body of medicine – confer a special expertise regarding these sorts of troubles, and a special insight into addressing them? On the face of it, the answer is, no, obviously not. Yet we know that the all of the phenomena of consciousness have neurochemistry and neurophysiology as their physical substrate. Does it therefore follow that emotional, social, and cognitive problems are appropriately addressed by physicians? I don't think so. Compare: we know that all material objects are ultimately composed of subatomic particles. Does it follow from this that a quantum physicist is the appropriate person to fix a leaky faucet?

Biopsychiatrists hunt for physiological differences between the "mentally ill" and the "normal" to support their contention that subtle neuropathologies underlie "mental illness." This is a very odd idea given the history of psychiatry: the psychiatrist was the final "dumping ground" for people who came to a physician with a complaint, or a set of complaints, for which no basis could be found despite the best efforts of a whole gamut of consultants and specialists. Many of these people were eager to 'assume the patient role,' and the psychiatrist gave them the opportunity to do that. Others were essentially impossible to communicate with at all; for such people, the insane asylum performed exactly the function its name suggests: it gave them a place, free from the difficulties of reality, where they could simply wait out their lives. So psychiatry performed several social functions, but no one – not psychiatrist, patient, or onlooker – suggested that the diagnosis and treatment of "mental illness" was one of those functions. Indeed, even today, the first step in the "diagnosis" of *any* "mental illness" is to *rule out* any organic or medical explanation for the observed symptomology. Nevertheless, the quest for a chemical cause, and a chemical solution, to the problem of people being "poorly adjusted" continues. Various sorts of brain imaging techniques are currently very

much in vogue: a PET scan (*positron emission tomography*, which visualizes regional energy utilization in the brain) of a depressed person is different from the same scan of a "normal" person. A SPECT (*single photon emission computed tomography*) scan is even more impressive, since it has the ability to visualize particular kinds of receptors. But this line of argument is entirely fallacious. If the argument is: mental state *x* can be shown to have a physiological substrate, therefore it is pathological, the response is obvious. *All* mental states, without exception, have neurochemical substrates. This proves exactly nothing. No doubt there are neurochemical differences between conservatives and liberals, too. Who, however, is to decide which state is pathological? Brain imaging techniques are currently the favorite tool used by biopsychiatrists to argue for a purported physiological cause for the various phenomena called "mental illnesses," largely because the scans yield brightly colored pictures of the brain – almost like coloring book drawings – which can be shown to the public and which appear to offer highly dramatic demonstrations of something "wrong" with the brain that has fewer bright colors in it. The public generally knows little about either scientific method or logical inference, and even less about the interpretation of brain scans, and so is likely to be mightily impressed by this "scientific evidence."

So PET and SPECT scans of people called schizophrenic, or depressed, or obsessive-compulsive, are compared to those of people called "normal", and differences between the images are taken as evidence of a biochemical original for mental illness. Do the varieties of consciousness called mental illnesses have a biochemical substrate? Of course they do, but, as noted above, this is only because *every* kind of mental state has such a substrate. Having said that, let's think in greater detail about the idea that brain scans demonstrate that various unwanted mental phenomena are biochemical in origin - as opposed to their being the result of experience. There are so many fallacies in the "argument from brain imaging studies" (if I may borrow that phraseology for our *modern* religion) that it is difficult to decide where to begin criticizing it. Should one start with the experimental details, such as the near-universal irreproducibility of such studies? Or should one begin with the larger problems, such as the impossibility of distinguishing whether what is seen in the scans is the *cause* or the *effect* of the phenomenon in question – assuming that it is related to said phenomenon at all?

Perhaps the fact that the criteria for categorizing the subjects in the first place are so nebulous as to be nearly arbitrary might be a good place to begin. Or should one discuss the fact that everything from playing music to asking the subject to think about a particular thing will radically alter PET and SPECT images of the brain? The idea that brain imaging studies prove that the wildly divergent phenomena that are grouped under the label "mental illness" are brain diseases doesn't *need* to be torn to shreds: it is essentially nonsensical in the first

place. Consider: a woman goes to the doctor for her annual physical. The year is 2074, biopsychiatry has found a definitive brain scan for schizophrenia, and brain scans have become cheap enough that they're now considered routine lab work. The woman's scan shows that she "has" schizophrenia, even though she feels fine and shows none of the symptoms of schizophrenia. But the doctor, armed with objective evidence, knows better, and starts her on a powerful antipsychotic drug. Does something seem absurd about this scenario? Everything from the assumptions and definitions underlying such studies to the details of contemporary brain scan work are ridiculous; indeed, they are laughable. It is astonishing that anyone could know anything of life, especially modern life, of history, of the nature of human consciousness, and conclude that he or she should search for the roots of twisted experience and misery in pictures of glucose utilization by the nervous system. If mental illness *does* exist, surely belief in so bizarre an idea must qualify one for inclusion in that category.

The crux of the problem is that at some level of neurochemistry and neurophysiology, the notion of pathology breaks down, because the various possible states that the nervous system can be in are neither generally advantageous nor disadvantageous in terms of the survival of the organism – which is the ultimate criterion for "health." What meaning is there in the idea that, say, transvestitism (or "Gender Identity Disorder," as it is officially known) constitutes "pathology?" Here we have a clear-cut case of a deviant behavior which does no harm to the person, but which is socially disapproved of, becoming a disease simply by psychiatric fiat. The "substance abuse disorders" are even more outrageous. To begin with, how can it be a crime to have a disease? How can it be that crimes just so happen to turn out to be diseases ("chemical imbalances," of course)? With this set of "disorders," it is especially telling that the term "medical model" is employed when describing their status as diseases. Are those who use this phrase aware that the phrase entirely gives the show away? Medical model? We don't have "medical models" of diabetes or leukemia. Why not? The answer is obvious: these things are *actual medical problems*, and so no "medical model" is needed. A "medical model" of colon cancer would be an absurdity. To have a medical model of something is to view that thing *as if* it were a medical problem. Actual medical problems do not need to be viewed "as if" they were medical problems, because they *are* medical problems. The use of the term "medical model" constitutes a direct admission that the things so treated are not, in fact, medical issues. Do scientists ever ponder whether a medical model or a criminal model would be more appropriate for understanding kidney failure? Of course not. Why? Because kidney failure *is* a medical problem; the idea of "modeling" it *as if* it were a medical problem is simply preposterous.