SULPYCO METHOD: A NEW QUANTUM AND INTEGRATIVE APPROACH TO DEPRESSION

Maja Roje Novak, MD, MSc

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Author:

Maja Roje Novak, MD, MSc

Private Neurological Practice (Clinic)

Croatia

www.dr-roje.com

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Introduction

The use of SULPYCO in treating depression and related disorders is a simple, innovative method that involves a combination of two known, but very different, medicinal drugs: dissolved parenteral sulpiride--a classical neuroleptic generic drug--and Coenzyme Compositum solution (Heel, Germany), a parenteral complex and over-the-counter homeopathic and isopathic medication. The term "SULPYCO" stands for "SULP" (sulpiride), "Y" (and), plus "CO" (coenzyme); this drug was discovered accidentally, but has benefited many. The SULPYCO trademark and the hybrid content of SULPYCO are internationally patented. This bizarre blend works so well in clinical settings that it has the potential to revolutionize antidepressant therapy. Generally, it is used as a subcutaneous injection, like insulin.

I am a neurologist; I work mainly in the field of integral neurorehabilitation.

The SULPYCO method emerged accidentally, from own clinical observation and integrated medicine rationale, but outside of my core field of work.

Herein, I present a detailed description of the SULPYCO method, in a subjective manner. I am a clinical doctor who observes patients every day in my line of work, while at the same time I try to be free of any medical ideology.

Ideological (dogmatic) medical thinking emerging from conventional education often favors only a one-dimensional attitude towards medical treatment, thereby reducing the repertoire of therapeutic possibilities. So I compared my observations to conventional medical knowledge and hopefully overcame some basic misconceptions while creating new medical quality.

Throughout the course of this book, I have revealed my medical personality, as a sincere and enthusiastic physician of integrated health orientation who is looking for authentic clinical evidence and improvements.

Depression: A Short Overview of Common Knowledge

Depression is a common condition characterized by a disordered and low mood. Depressed patients may feel sad, guilty, anxious, helpless, empty, hopeless, and worthless. They may also have the following problems: loss of appetite or overeating, loss of interest in activities that were once pleasurable, concentration problems, contemplating or attempting suicide, insomnia or oversleeping, loss of energy, as well as physical pain and aches of various forms [1].

However, depression can also be a normal reaction to a particular life crisis or medical conditions, and it can be a side effect of some medical treatments. Depressive illness is one of the highest causes of disability in the world. According to predictions of experts, depression will be the second leading cause of disability among people of all ages by the year 2020. Currently, the percentage of major depression for people seen in primary care is between 5 and 10% (130) [2]. The main types of depression are as follows: major depressive disorder is when a patient is unable to perform daily activities owing to disability; dysthymia is a form of a chronic, less severe, nondisabling depression; minor depression involves minor symptoms that last for more than two weeks; psychotic depression involves delusions; postnatal depression; seasonal depression; and bipolar disorder [3].

Another very common disorder is the anxiety disorder, which is characterized by an abnormally high degree and quality of fear and anxiety of various forms, with neurotransmitter and etiological dynamics similar to those of depressive disorders [4].

At present, depression is known to have connections to altered brain neurochemistry. Although no single cause of depression is recognized, several hypotheses that try to explain the biology of depression probably work in concordance [5].

Monoamine hypothesis (most popular)

The monoamine hypothesis postulates that a deficiency of certain neurotransmitters is responsible for the corresponding features of depression. These neurotransmitters are the monoamines, namely serotonin, dopamine, and norepinephrine [6].

However, the available evidence does not convincingly favor this theory because some studies show that the depletion of monoamines fails to cause depression in healthy subjects. In addition, some medications can consistently benefit patients with depression and are known to operate outside the monoamine system [7].

Monoamine oxidase A (MAO-A), an enzyme that antagonizes monoamines, may be excessively active in depressed people. This results in a subsequent lowering of the levels of monoamines. This hypothesis were acknowledged by positron emission tomography studies that found significant elevated activity of MAO-A in the brains of some depressed patients. However, in some depressed young individuals, lowered MAO-A activity was observed as a consequence of intense stress. Thus, the data are still contradictory [8].

Altered neuroplasticity

In chronic stress and depression, synaptic and dendritic plasticity is reduced. Fortunately, antidepressant medications can enhance neuroplasticity at both molecular and dendritic levels [9].

Genetic factors

Several studies have attempted to identify genes that might influence the development of depression and its underlying mechanism. The most popular studies were those investigating depressive episodes, considering allelic variations of the serotonin-transporter-linked polymorphic region (5-HTTLPR), via gene-environment interaction. The results of some studies were positive while those of others were negative; therefore, no consistent conclusions could be drawn. In addition, brain-derived neurotropic factor (BDNF) gene polymorphism was investigated as well, but again contrasting results were obtained [10].

Circadian rhythm theory

Depression may be connected to the brain mechanisms

that control the cycles of sleep and wakefulness--the so-called circadian rhythm. Depressed individuals can exhibit a significant lift in mood after a night of sleep deprivation, which can increase serotonergic system activity [11].

Abnormalities in brain regions

Depressed patients usually show disturbed functioning of interactions between the islands of cell neurons in the brain. Some of the nuclei show overfunction while others show underfunction. The raphe nucleus, suprachiasmatic nucleus (SCN), nucleus accumbens (NAcc), anterior cingulate cortex (ACC), and subgenual cingulate are the most important areas of the brain [12].

Hypothalamic-pituitary-adrenal (HPA) axis

The hypothalamic-pituitary-adrenal axis is a system of endocrine structures that are activated during the body's response to stressors. It often shows increased activation in depression, and drugs that reduce its activity are sometimes effective in reducing symptoms [13].

Fructose and tryptophan

Fructose malabsorption and tryptophan deficiency can cause depression in some patients [14].

Inflammation and depression

This inflammatory hypothesis of depression emphasize the role of psychoneuroimmunological dysfunctions. Subsets of patients with depression have an altered peripheral immune system, with impaired cellular immunity and increased levels of cytokines. In addition, acute administration of cytokines causes altered behavior similar to depression, and patients undergoing cytokine treatment develop depressive symptoms [15].

Social circumstances and depression

Researchers found that a significant percentage of very low income people met the criteria for a diagnosis of depression, which is also often connected to alcoholism and drug abuse [16].

Cultural aspects of depression

A person's cultural environment may influence the his [17]/her being diagnosed with depression, the variability of symptoms, and treatment outcomes. Particularly, considering increasing globalization, Western-oriented diagnostic tools may be at least partially inappropriate for patients from other cultural backgrounds [18].

Viral theory of depression

Some animals infected with the Borna disease virus displayed depressive behavior; moreover, some patients taking antiviral drugs were relieved of their depressive symptoms. In this way, depression was also regarded as a viral disease [19].

Personal perspective

Many patients have depressive syndromes or related conditions. They visit a neurologist because their psychological realm carries over into their body. Individual patient responses to life and life stressors are highly varied. Some people are resilient and some dwell on minor difficulties. This individuality manifests in responses to therapeutic procedures like electroacupuncture. For instance, some cannot endure even minute electrical stimulation while others want more and more stimulation. Therefore, whether "the glass is half full or half empty" depends most probably on the genetic makeup of the individual's brain and on a unique combination of the etiological aspects described above. The interplay of these factors will make a person more or less prone to anxiety or depression. Therefore, the reasons for these diseases are complex and multileveled and the rationale for integrative medicine is justified.

In the conventional therapeutic approach, depression is corrected by antidepressant drugs. Possibly, the SULPYCO method can emerge as a new unconventional treatment for depression.

Contemporary Antidepressant Medications for Depression and Other Disorders

Antidepressant drugs are used to treat depression and its subtypes and have more recently been used for treating generalized anxiety disorder, panic disorder, bulimia nervosa, anorexia nervosa, obsessive-compulsive disorder, and post-traumatic stress disorder [20]. In controlled studies, these antidepressant agents have been effective in treating smoking addiction, alcoholism, premenstrual dysphoric disorder, borderline personality disorder, obesity, and migraine [21,22].

The most common antidepressant drugs include monoamine oxidase inhibitors, tricyclic antidepressants, tetracyclic antidepressants, selective serotonin reuptake inhibitors, and serotonin-norepinephrine reuptake inhibitors [23-25]. Other medications, including antipsychotics in low doses and benzodiazepines, can also be used [26,27].

The following are common side effects of more or less all antidepressant medications that are evident at three to six weeks [28-30]:

- Dry mouth
- Nausea
- Headache
- Sleepiness
- Dizziness
- Insomnia (numbness)
- Constipation
- Increased blood pressure
- Excessive sweating
- Tremor
- Agitation
- Muscle weakness
- Sexual dysfunction

Amphetamine, methylphenidate, or modafinil is sometimes added to an antidepressant treatment regimen. In addition, antiepileptic drugs can also be added [31-33]. Lithium remains the standard treatment for bipolar disorder and is often used in conjunction with other medications. Alternative therapies, like herbalism and nutritional therapy, are sometimes used for mild cases of depression, but have not yet shown convincing benefits [34].

Unfortunately, between 30 and 50% of individuals treated with a given conventional antidepressant do not show a favorable response. Even among cases of good response, relapse rates are high. In addition, antidepressant drugs tend to lose efficacy over time [35,36].

Personal perspective

Conventional antidepressant therapy is the preferred and frequently prescribed therapy. Clinical doctors cannot do without it because depression and its consequences are very common [37-39]. Problems arise mostly with delayed onset of antidepressant action and unpleasant side effects. Therefore, antidepressant drugs require improvements, and new therapies involving different paradigms are warranted.

Homeopathy and Quantum Medicine

SULPYCO consists of two components: the well-known chemical sulpiride and a homeopathic Coenzyme Compositum (Heel). Hence, I shall provide some basic information regarding the dilemma of homeopathy because it is not popular among average medical doctors.

Homeopathy is a medical system that treats diseases by using a special kind of medical product called "remedy." What is specific about homeopathy is that highly diluted substances (a millionth part or less) are used, so they are present in a solution in traces of mass or there is no substance at all (dilution beyond C30 that is 1/10030 dilution) [40-45]. However, because of dilution, homeopathy is regarded as placebo among classical medicine proponents [46-57]. Sign D refers to decimal dilution and sign C to the centesimal dilution range. For example: Belladonna D6 means that Belladonna tincture is diluted 10X6 times (i.e. 1 part of Belladonna and 10x6 parts of the solution) and Belladonna C30 means that Belladonna tincture is diluted 100X30 times (1 part of Belladonna and 100x30 parts of the solution) [58-66].

Homeopathy treats by the principle "likes cures like." That is, a substance that causes symptoms in a large dose can treat those same symptoms in a small dose. For example, smoking too many cigarettes can cause irritability, but if you are irritable you can take nicotine at a dilution of 1/108 [67-71].

Homeopathic medicines (which homeopaths call "remedies") are prepared not only by dilution but also by using a careful process of dilution and "succussion" (vigorous shaking) [74-75]. The principle of treating "like with like" goes back to Hippocrates (460-377 B.C.E.), but in its current form has been widely used for more than 200 years. It was discovered by a German doctor, Samuel Hahnemann. Homeopathy gained popularity in Europe and the U.S.A. in the 19th century because good treatment outcomes were achieved during epidemics of cholera, yellow fever, typhoid, scarlet fever, etc.

Isopathy is a system of treating the disease that comes as an extension to the like cures like principle. For example, "if Escherichia coli is one of the etiological factors of a disease, then homeopathized E. coli is administered to the patient as a remedy" [76-88]. Gunther Enderlein developed an extensive system of isopathic healing with various bacteria and fungi, thereby bringing isopathy to a high technological level [89-91].

Dr. Reckeweg was another expert of homeopathy. Among other useful insights, he connected dysfunctional cell metabolism; namely, energy production system in the cell, the citric acid cycle (Krebs cycle), with possible isopathic treatment for disturbed cycle with homeopathized (diluted and potentized) components of this same cycle [92-103].

According to Dr. Reckeweg, disturbed energy production in the cell (its mitochondria) can be the beginning of a more complex pathology that becomes an organic disorder. A cell that is lacking energy reduces its functioning to a minimum, using large quantities of glucose in a metabolic route that does not require oxygen, thereby polluting the surrounding connective tissue; this process occurs in the mitochondria. Clearly, it is important to keep this sequence of biochemical reactions as efficient as possible for both the catabolic and anabolic aspects of cell functions.

Therefore, according to Dr. Reckeweg, people with chronic diseases need stimulation of the citric acid cycle function. Treatment with citric cycle components in a diluted and dynamized form offer exceptional therapeutic possibilities in this domain. Coenzyme Compositum used in SULPYCO is a complex homeopathic and isopathic remedy that contains these components as well as other polychrest (medicine that serves for many uses or diseases) homeopathic substances [104-108].

Nevertheless, conventional medicine disregards these claims as purely fictional and nonscientific [108-122]. Therefore, every package of these remedies has to carry a "without proving medical effect" label. Only clinical application of such substances can give us more insight into their potential usefulness [123-130].

Debate on whether or not homeopathy is a placebo continues [131-133]. However, with time, more and more evidence shows that homeopathy produces clear clinical results [132-137]. For example, the hormone thyroxine, prepared as a homeopathic "30C" dilution, can partially halt the metamorphosis of tadpoles into frogs [138-148]. Evidence for homeopathy is listed in the reference section of this book.

Despite the fact that we do not know exactly how homeopathy works, it is a good tool to use in my work--just as I do not know exactly how a car motor works, but I use it in my everyday life [149-156].

Even though we assume that homeopathy is not a placebo, we still want to know how it works. Because a homeopathic solution contains few or no molecules of the "active" ingredient, we cannot count on a classic biochemical mechanism of action [157-159]. Therefore, we attempt to explain it in terms of energetic phenomena and nonlinear physics. Currently, homeopathy is a

domain of quantum medicine and the theory of complex systems [160-166].

Principles of quantum medicine

In order to become familiar with quantum medicine, it is necessary to define the terms. Quantum medicine refers to the quantum world, quantum phenomena, and quantum theory, which describes the world on a very small scale. Quantum medicine also applies facts from the quantum world to biological phenomena and various medical treatments [167].

"Quantum" originally meant "quantity or a proper amount of a given parameter." The small scale of existence is the basis of the atoms, molecules, and other more complex structures of nonliving and living matter. The term was invented by the well-known physicist Max Planck who was experimenting with cavity radiation. He postulated that a vibrating, charged particle emits radiation not in a smooth flow, but instead in lumps, like cannon balls from a cannon, called "quanta." Thus, quantum theory came into existence [168].

Quantum physics refers to a behavior of the subatomic world, which is a world of subatomic particles. Here, we come face-to-face with a speed limit in nature, find space and time mixed together, and learn that mass can change to energy and energy can change to mass. Quantum physics has postulated rules that were systematized in quantum mechanics and in the special theory of relativity [169].

The major formula, coined by Albert Einstein for special relativity (the physics of very fast) E=mc2, brings energy and mass into correlation. It states that mass contains a lot of energy, but a lot of energy is needed to get a small quantity of mass. In addition, for quantum physics (mechanics), there is another well-known equation by Planck, which is E=fh that states that the greater the frequency of a wave, the greater is the amount of energy. So the Planck's equation correlates frequency and energy. Therefore, if we have a high frequency wave it will be very strong and penetrating, like gamma rays, for example. Thus, the two major constant values in physics are speed of light, "c" and Planck's constant, "h".

A brief analysis of a subatomic world

If you crash your car, you will experience a force, trauma, and severe damage. Here, we are faced with the tough solidity of matter. However, if we go more deeply into the structure of matter, we encounter completely new dimensions.

Ultimately, all matter is made up of atoms. Atoms consist of subatomic particles and a lot of empty space. In school, we learned of three major subatomic particles: electrons, protons, and neutrons abiding in empty space, a vacuum. At present, the empty space is regarded as a sea of energy (of zero point).

Today, a standard model of the subatomic world describes 24 fundamental particles. We can roughly divide these into two major types of particles--fermions and bosons. Fermions are leptons (electrons and mu and tau particles together with their neutrinos) and quark-building blocks of protons. Bosons are particles that mediate fundamental forces; the well-known ones are gluons, photons, gravitons, and W and Z bosons. The properties of fermions and bosons differ in regard to their respective spins (i.e., angular momentum).

However, if the superstring theorists are right, there may be smaller, simpler structures that are yet to be discovered.

In daily life, we are not usually aware that we are surrounded and bombarded by subatomic particles: protons that come from space as primary cosmic radiation, neutrinos that can pass through our hands, photons that are light particles from the sun, and moons that are part of so-called background radiation.

The subatomic world occupies small dimensions and travels very fast. We use a femtometer (10-15m) to describe length and speed of light to describe velocity (3×108m/s).

Quantum object spin is a rotational movement or angular momentum of a given particle. It is interesting that for an electron to make a full rotation, it needs to rotate not 360 degrees, but 720 degrees--something completely different from our everyday perception.

Atoms and molecules spin as well. They also vibrate, more with more kinetic energy and less with less kinetic energy. Heat, an infrared photon energy, enhances the vibrational kinetic energy of a system.

Subatomic particles and their product, atoms, are brought together in certain types of arrangements. Subatomic particles are related; their relation is postulated by physical forces that exert power over them, forming structures of matter. Matter always tends to be in a state of least energy.

There are four fundamental physical forces, each mediated by corresponding boson particles that are being exchanged in an event called "force." Force can be defined as a capacity to exert some action; a field is a space where a force can be detected.

Fundamental forces in nature

Gravitation: Gravitation is a physical force by which physical objects attract each other. The larger the mass, the larger the force. Gravitation is mediated by gravitons.

Weak force: Weak interaction is caused by the exchange (emission or absorption) of W and Z bosons. The best known is β decay, a form of radioactivity. The Z and W bosons are heavy particles that cause the very short range of the weak interaction. Weak force also initiates a process of hydrogen fusion in stars.

Strong force: Strong force binds the parts of an atomic nucleus together, as well as their components, quarks that form protons and neutrons. The strong interaction is thought to be mediated by gluons.

Electromagnetic force: An electromagnetic force has the power to attract and repel charges. The electromagnetic force is generated by three types of fields: electrostatic field, magnetostatic field, and the electromagnetic field. It is mediated by the exchange of photons.

Quantum weirdness

When we observe the quantum world, which is the world of the incredibly fast and the incredibly small, we must make a logical shift to approach it.

In a macroscopic world, we make conclusions in accordance with our perceptive experience, i.e., that solid matter is always solid, that an object's mass is stable, that one cause will have a predictable effect, that input of certain information makes an accurate output, and that one object can only be in one place at one time. However, in a subatomic world, things prove to be very different. Solid matter is mostly empty space, time is dissolving, mass is gained or lost in a collision, and cause and effect are inconsistent. Thus, the principles of our macro world become deconstructed, and we observe the quantum world as being more like "form" is in postmodern art. Therefore, the behavior of the quantum world becomes strange, unpredictable, and counterintuitive.

Several principles are used to describe the weirdness of the quantum world:

a. Uncertainty principle (known as the Heisenberg principle of uncertainty)

We cannot ascertain the position of a particle and its velocity at the same time. For example, if we know a position of an electron, we cannot know its velocity. That tells us that measurements in the quantum world are limited and so is our possibility to know about them. Therefore, we use probabilities, not predictions, to best describe the characteristics of particles.

b. The "granular" nature of energy

Energy travels in quanta and lumps, not in a smooth flow.

c. Dual nature of matter (principles of complementarity)

A particle can have features of a wave or of a particle, however, not simultaneously. According to Milo Wolff's theory, an electron is composed of two spherical waves, which form a standing wave that has layers like an onion; therefore, it is a very dense wave. On the other hand, an electron is not a particle circling around the nucleus but is more like a fog of probability taking one particular position only when observed (quantum collapse). Therefore, it can be assumed that the wave and particle depend on external conditions.

d. Quantum jump

An electron jumps across the energy levels (orbits) in a discrete way, but at the same time, it does not go through the interspace (space between). Therefore, it is not gliding from position to position but rather jumping, disappearing from one point to appear at the other.

e. Nonlocality and quantum entanglement

Two parts of a single quantum system remain entangled, no matter how distant in space and time they are, meaning that if we act upon one particle, the other one will also react. These particles can exert force one upon another, even across distant space, if they were once related. This type of action at a distance, especially if it occurs instantaneously, violates both our common sense and the theory of relativity, which posits that nothing can travel faster than light. For example, if two electrons were together in a system and then separated--both being in distant parts of the universe--and we observe one of them, our act of observing will instigate the quantum collapse of a wave function. Quantum collapse takes place when one state is determined, out of the many possible states of a quantum system. The other entangled electron will then also show the same quantum changes as the first one does. Thus, those two particle exchange information nonlocally, which means that no material force is being shared between them. This entanglement happens immediately and is therefore faster than the speed of light.

f. Superposition

One subatomic object can exist in many different states simultaneously, so those states seem to be superposed one onto another. Only in a measurement situation does it take one certain and concrete state.

When the subatomic object is not observed, it behaves like a wave; when we observe it, it behaves like a particle. This is called "collapse of a wave function".

g. Quantum tunneling

Particles go through the barriers, although that should not happen according to common prediction.

Classical mechanics states that particles that do not have enough energy to classically triumph over a barrier will not be able to reach the other side, or that, lacking the energy to penetrate a barrier, they would be reflected or absorbed. In quantum mechanics, with a very small probability, these particles can tunnel to the other side, subsequently crossing the barrier. This process is illustrated by the sun and is the reason why the sun shines.

h. Energy contribution to mass

Because a neutron has greater mass than the sum of the quarks of which it is composed, the extra mass comes from added energy. It is interesting that perpetual motion in a quantum world is commonplace, as an electron in an atom never gets tired and "friction" never slows it down.

I. Quantum coherence

Two waves can aggregate to create a wave with an amplitude that is greater than that of either wave (constructive interference) or they can subtract from each other to create a wave with low amplitude (destructive interference).

Change of paradigms

In a Newtonian worldview, nature and the universe are perceived as parts of a large mechanical clock, where the parts are always the same, unchanged, be it alone or in a system, exerting forces one onto another as in a game of marbles. This is our conventional worldview based on our everyday experiences. It is

phylogenetically imprinted into our minds as a biological heritage of our evolutionary ancestors. If we look at the tiger chasing a gazelle, we can observe that at a certain moment he abandons the chase if the gazelle is running too fast. That is because he is able to calculate speed and the cost-benefit of the chase. Without this simple calculation, physical survival would be impossible. In addition, our language is commonly structured in a way that mirrors those same logical principles. Therefore, the quantum world behaves counterintuitively to our natural common sense.

Quantum weirdness helps us to explain some phenomena that were previously treated as impossible or paradoxical.

"Quantum medicine" is currently a fashionable term that embraces various sorts of therapies outside of a biochemical paradigm in two ways. First, it focuses on the application of quantum entities in healing; for example, photons in laser therapy, light therapy, and magnetic therapy; and electrons in electro acupuncture, etc. Very often, other complementary methods are regarded as quantum medicine. For instance, to consider acupressure, needle acupuncture, herbal and nutritional therapy as quantum medicine is not justified, because those comply with the classical positions of physiology and neurophysiology if we understand quantum medicine properly. For example, in acupuncture, we are concerned with energy channels called "meridians," while a metal needle pricked into the body exerts local microcurrents generated by electrical and frictional interactions of the metal of the needle and electrolyte interstitial tissue fluid. These microcurrents stimulate nerve endings, thereby stimulating nerves. This process can be traced all the way up to the brain cortex and is shown by PET scans. This phenomenon is purely neurophysiological. At the same time, meridians as energy channels might exist as well, but are not needed to explain the effects of needling if we understand the principles of neurology. Therefore, not everything that is labeled "quantum" is necessarily so.

Second, quantum weirdness are used to create theories about experienced phenomena that were previously paradoxical because they did not fit into the classical worldview. Therefore, quantum medicine gives a frame of reference for therapies emerging from complementary and alternative medicine (CAM) that were previously disregarded as scams, such as radionics, distant healing, and prayer.

In a quantum worldview, the body is regarded as a very dense fabric of waves since matter particles are, in fact, waves. Therefore, the body is susceptible to influences from other waves, fields, subatomic particles, and physical forces (the electromagnetic smog, for instance) in terms of local influences. Therefore, we use quantum locality to describe and hypothesize about a possible mechanism of influence.

Quantum phenomena in biology help us define the DNA molecule as a quantum antenna that can emit and receive waves, principles of actin and myosin molecules as quantum mechanical and the dynamics of biophotons as information carriers inside the body and across bodies, etc. "Quantum jazz" is a term that postulates how molecules and matter waves in the tissues vibrate in coherence, especially important for water molecules, as a greater part of the body contains water molecules.

The nonlocal phenomena of quantum physics are events, as mentioned above, where two objects are connected in a way that bypasses exchanges of material particles as in quantum entanglement. These nonlocal phenomena are transcribed to the other areas of life like entangled minds and distant healing; what we have here is the information exchange.

"Information" can be defined as "a set of data, giving a description or a meaning to something" or can be simply defined as "knowledge." Roughly, we can say that information answers the questions what, why, where, how, and how much. Further, one can speculate that information is a huge nonlocal force in nature (meaning it exists beyond space and time, therefore being a vast field) containing the blueprint for all material forms of the nonliving and living world as well for all knowledge. Since the basic particles, forces, and fields are common to all known matter, it is the information itself that gives these basic constituents of matter, organizational input in order to finally expresses itself as certain form--be it living or nonliving. This informational field is also called "consciousness" and "universal intelligence".

In quantum medicine, we can say the informational field is active when the power of intention is in play, because our own intelligence, conscious thoughts, and emotions are the mediators of the informational field like bosons in the area of fundamental forces. The informational field is working outside the dimension of space. Furthermore, every form of matter is highly connected to its informational blueprint that organizes it. With informational waves, a virtual part is always carried on a real frequency wave, structuring it in forms of energy and matter. These are borderline theories involving science and philosophy, and many scientists dispute these concepts as being obscure. However, observing the development of scientific thought over time, we can see one firm principle: what was once perceived as science fiction is today considered ordinary technology; therefore, it is wise to be open to new ideas since our picture of nature is certainly as limited now as it was before, but on a different level.

In medicine, we talk about the vital body--an energetic body, which is in fact an informational body. This body can be targeted for informational healing like radionics, for example, and maybe homeopathy. We can also speak about doctor-remedy-patient entanglement where the intention of a doctor to heal and that of the patient to be healed are imprinted into a water component of any remedy in a quantum way, thus raising the very potential of healing. Here, the work of Masaru Emoto can be referred to.

Integrative medicine must fill the ideological gap between the exclusively Newtonian approach of the physician to the patient and a quantum approach that deals with local and nonlocal energy fields and forces constituting the energetic level of existence. The question of interest would be where do the quantum end and the Newtonian begin? In this sense, we can say that the quantity of non-Newtonian entities (particles) changes the quality of physical laws, meaning that many small objects with quantum properties make up a visible world of Newtonian objects (with Newtonian quality). Therefore, the laws of physics, applied depend on the quantity of matter.

Nonlocality also emphasizes that everything in the universe can be interconnected through the subtle informational exchange that could possibly justify, for example, the credibility of hermetic laws. Here again, science meets philosophy and mysticism.

The law of attraction, as a hermetic law, is observed as a consciousness phenomenon where thoughts (bits of consciousness or information) are becoming things, meaning that thoughts applied in a certain system can create changes in the physical world. This is an example of another bizarre nonlocal phenomenon, as a link between informational and fundamental forces of nature.

There is a growing body of evidence supporting the idea that intelligence and consciousness can exist without the body and that directed intention, like prayer or affirmation, can have a positive effect on health.

Highly controversial scalar waves are considered a vehicle for carrying information beyond the space and time dimensions. Scalar waves are nonlinear waves. They travel faster than the speed of light and do not decay over time or distance. A scalar wave is a mathematical wave of force having quantity and magnitude but without direction

Why is homeopathy regarded as quantum medicine?

Homeopathy either contains traces of mass or no mass at all (beyond the dilution of C30). Theory based on the Arndt-Schulz law (Arndt-Schulz rule) may explain how homeopathy works in low potencies. High concentrations of a substance kill; medium concentrations suppress or inhibit; and low, or minute, concentrations stimulate. Although this can be true for some substances, for most of them this is dubious and consequently unconvincing. For example, one can be poisoned by kitchen salt or develop hypertension if salt is taken inappropriately, yet salt (NaCl) in small doses is needed to maintain life; does this theory hold true for the agrimony plant?

At the level of the Arndt-Schulz law, homeopathy can be explained within the biochemical paradigm of molecules interacting with molecules. Even so, this theory has many shortcomings. Molecules of the active substance are diluted in water to a very high extent. This solution becomes even more diluted when it encounters the water in the body. Therefore, we cannot trust that the solution's molecules can interact with the biological structures of the body, namely receptors, in order to produce biological effects. In that sense, homeopathy should work outside the intermolecular communication model. Therefore, if we postulate that homeopathy does work, it should work in some other way than that described above.

Although it is still unclear exactly how homeopathy works, quantum medicine gives us a theoretical frame for a hypothesis about an underlying mechanism, based on the nonlocality principle. It is all about the informational fields of the active substance, water, and the patient.

The informational field of a given substance can be described with a certain quantum frequency, each respective to the given substance. This frequency acts as a hologram, an informational blueprint. The hologram is imprinted, as a mirror picture, in the correspondent counterpart of water. Therefore, the smallest part of the solution carries the whole picture. The homeopathic solution is then introduced into the body. It becomes further diluted to the three or more levels of magnitude and then eventually is expelled through the kidney and out of the body. Somehow, it has an impact on the informational body (vital body) of the patient, functioning as a frequency model, a tuning fork, thereby changing the quantum frequency of the vital body, eventually creating changes to the physical body according to the principle of "as above, so below." Influencing the patient's vital body is a process similar to growing a fractal where the fractal is one multiplying information--and information is a sort of a form, like meaning is form in semiotics. Therefore, because the molecules do not interact with molecules, but fields do interact with fields, we say that homeopathy might work on a nonlocal quantum level.

Another theory that originates from local quantum phenomena, namely quantum electrodynamics, is a theory of quantum coherent domains of matter and liquid. Such domains exist in superconductors and superfluids at extremely low temperatures. At room temperature, only 28% of the volume displays coherent domain characteristics.

How can this theory translate into the homeopathic mechanism of action? Each molecule, each atom, or larger clusters of molecules have a characteristic electromagnetic frequency that describes it. When a substance that is to be diluted, is brought into the water, it transfers its unique electromagnetic value to the water molecules. This process is multiplied with vigorous succussion and mixing of the solution. As living systems are sensitive to electromagnetic fields, a homeopathic remedy could influence it in this way.

Another theory of local quantum influence is that of the formation of clusters by means of electrical fundamental force. Water molecules are dipoles that interact electrically with each other. When exposed to a diluted substance, water molecules form clusters that work as a sort of imprint of the original substance that was diluted in the water. In high dilutions, the original substance is gone, but the water clusters save the memory of that substance. Thus, we can refer to the memory of water [170-172].

Personal perspective

Although we do not yet know how a homeopathic remedy can produce a biological effect, it should not stop us from using it in our practice if we perceive it as useful. This is a rationale of integrative medicine, after all: to restore health as soon as possible with no or minimum collateral damage. I am convinced that homeopathy is not a placebo, based on my day-to-day clinical observations, although I can state that only for injectable homeopathic remedies as I work only with them.

Apart from the use of SULPYCO, there have been instances in neurological practice when I have used Belladonna and Cuprum as well, for treating striated muscle spasticity. It works so well that my training personnel notice whether or not a patient has received the injection because those who receive it are able to stretch the spastic muscles with less difficulty. It is also true for nosode isopathic therapy, which works excellently in cases of chronic inflammation (multiple sclerosis, transverse myelitis, and polyradiculoneuritis) (Figure 1 & 2).

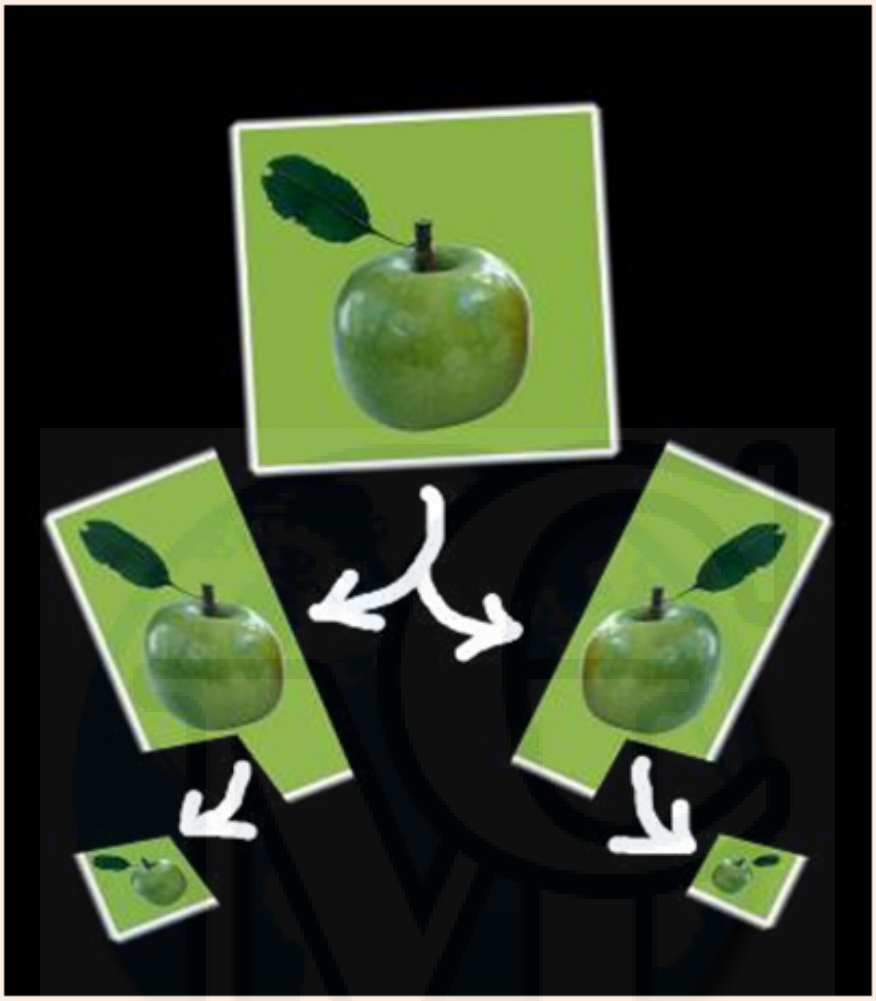


Figure 1: Hologram: unique information in all parts.

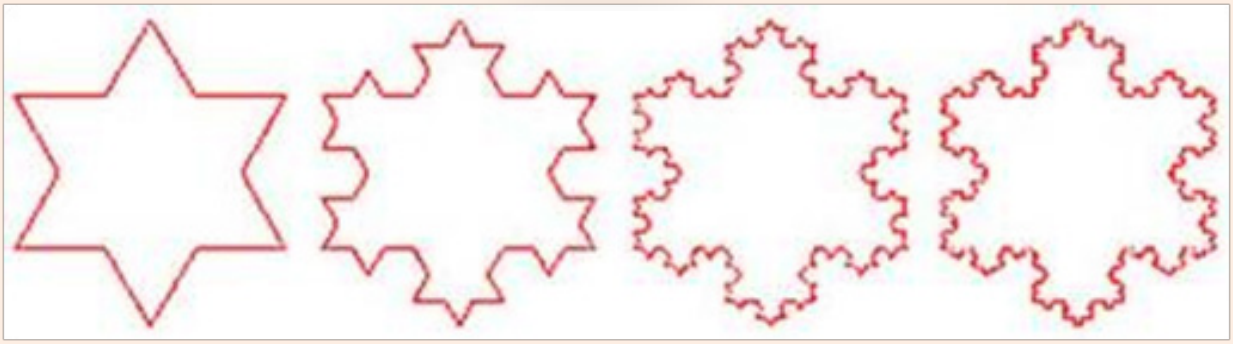


Figure 2: Fractal: a growing similarity.

Discovery of a SULPYCO method

My clinic is a private clinic for integrative neurology. Although we deal mostly with cerebral palsy and multiple sclerosis, we occasionally treat depressive and somatoform disorders by integrated medicine. These are very frequently encountered and the patients can show symptoms that sometimes mimic neurological diseases.

Integrative medicine is a treatment modality for the whole person (body, mind, and spirit) that also takes lifestyle aspects into account. It makes use of all appropriate therapies, both conventional and alternative, which show evidence of safety and effectiveness. I use the following therapies: chemical, neurological drugs, acupuncture, electroacupuncture, homeopathy, chiropractic, nutritional therapy, magnetic resonance therapy, electrical stimulation of nerves and muscles, physical therapy, pranic healing, and autohemotherapy. Whenever possible, I use injectables as a way to bypass the digestive system as it is often an obstacle for absorption of therapeutic agents into the blood.

The principles of integrative medicine, as defined by Dr. Andrew Weill, are:

- A partnership between patient and practitioner in the healing process
- Appropriate use of conventional and alternative methods to facilitate the body's innate healing response
- Consideration of all factors that influence health, wellness, and disease, including mind, spirit, and community, as well as body
- A philosophy that neither rejects conventional medicine nor uncritically accepts alternative therapies
- Recognition that good medicine should be based on good science, be inquiry driven, and be open to new paradigms
- Use of natural, effective, less-invasive interventions whenever possible
- Use of the broader concepts of promotion of health and the prevention of illness, as well as the treatment of disease
- Training of practitioners to be models of health and healing, committed to the process of self-exploration and self-development

In my work, all of these principles are implemented. Freedom in medicine is also respected and patients that come to me are able to choose what kind of therapies they want, after a consultation with me. Needless to say, they all passed through conventional medicine protocols in the institutions of a conventional system without satisfactory results before seeking new solutions for their health problems.

The SULPYCO method was discovered by observing patients treated on the freedom of choice principle. One group of depressive syndrome patients chose to be treated only by low dose parenteral sulpiride (chemical-allopathic therapy in a low dose); a second group was treated by complex homeopathy only with a parenteral remedy, Coenzyme compositum (Heel GmbH, Germany; homeopathic/ isopathic therapy); and the last group chose to take both substances simultaneously as two separate s.c. injections as a true integrated therapy.

Sulpiride was chosen because it is a good atypical antidepressant and can be given parenterally, on the grounds of low dose neuroleptic treatment. Coenzyme compositum was chosen for its capacity for regulating cellular energy production, according to isopathic philosophy and theory. As a blend, these two substances could possibly work synergistically, each on its own level (biochemical and quantum/nonlinear, respectively), thereby acting transparadigmatically, with one optimizing the other. This was the rationale for combining the two therapies.

The results of this investigation were systemized in an observational study where the antidepressant effects in the three groups were measured in terms of the Hamilton scale and compared. The present study was conducted using female patients only, although the SULPYCO method can be used in male patients as well.

Integrative Sulpiride with an Atypical Adjuvant Therapy for Treating Depressive Syndrome- An Observational Study

Abstract

In this observational study, patient records were analyzed after antidepressant treatment. One group of patients chose to be treated by integrated medicine consisting of two separate subcutaneous injections of a low dose (20mg) of sulpiride and a 2.2ml complex homeopathic solution based on the Krebs cycle elements; each injection was administered once daily. Another group of depressed patients chose to receive conventional therapy of 20 mg sulpiride only. The third group chose to be treated with homeopathy only. The HAMD scores differences were evaluated before and after 3 months of treatment in these three groups of patients. The HAMD score yielded a statistically significant decrease in favor of the group treated with combined sulpiride and homeopathy. This observation suggests that a low parenteral dose (20mg) of sulpiride, when administered subcutaneously with a complex homeopathic remedy, may give better therapeutic results for mild and moderate depression than either sulpiride or complex homeopathy alone.

Keywords: Allohomeo; Depression; Homeopathy; Sulpiride

Introduction

Sulpiride is an atypicial antipsychotic drug used mainly in treating psychosis and depression [173]. It is a selective antagonist of the dopamine D2 and D3 receptors and this action predominates for doses over 600 mg daily. At doses of 600-1600 mg, sulpiride is mildly sedating and antipsychotic. At low doses (100-200mg daily), its prominent feature is antagonism of presynaptic inhibitory dopamine receptors, which accounts for some antidepressant activity and a stimulating effect. It also alleviates vertigo. The oral bioavailability of sulpiride is only 25-35% [174].

In Croatia, parenteral sulpiride is available at a dose of 100 mg per vial. Oral sulpiride is available in a 50mg per tablet dose. When used for depression, this drug is usually administered orally in a 3x50mg daily dose [175].

Material and methods

This observational study analyzed patient records after treatment in order to determine whether the therapeutic action of sulpiride given parenterally by subcutaneous injection would improve if it were combined with a liquid homeopathic complex remedy based on Krebs cycle elements suitable for parenteral use. The remedy was a commercial preparation produced and sold by the German company Heel, called Coenzyme Compositum, which comes in 2.2ml vials and is sold as an over-the-counter drug.

Preparation of the combined drug

A dose of 0.4ml (20mg) of an isotonic solution of sulpiride was combined in two separate syringes with 2.2ml of an isotonic solution of mixed homeopathic substances. The dose of sulpiride was measured using a micropipette. These two injections (one with sulpiride and the other with the homeopathic remedy) were applied simultaneously in the waist region using a 23G (0.6x25) needle, once daily at 10 am.

Homeopathic substances present in this complex parenteral isotonic preparation were mainly compounds involved in the Krebs cycle as well as some herbal homeopathic remedies, all in equal volume amounts up to 2.2ml:

- Intermediates: Citric acid (D8), cis-aconitic acid (D8), alpha ketoglutaric acid (D8), succinic acid (D10), fumaric acid (D8), DL malic acid (D8), sodium diethyloxalateoacetate (D6), sodium pyruvate (D8), and barium oxalosuccinate (D10)
- Vitamins, Nucleosides, and Their Biosynthetic Intermediates: Coenzyme A (D8), nicotinamide adenine dinucleotide (NAD) (D8), adenosine triphosphate (ATP) (D10), ascorbic acid (D6), thiamine hydrochloride (D6), sodium riboflavin phosphate (D6), pyridoxine hydrochloride (D6), nicotinamide (D6), cysteine (D6), and DL-alpha-lipoic acid (D6)
- Minerals: Magnesium orotate (D6), cerium oxalate (D8), and manganese phosphate (D6)
- Herbal Extracts: Pulsatilla (D6) and Beta vulgaris (D4)
- Miscellaneous Ingredients: Sulfur (D10) and Hepar sulfuris (D10)

The letter "D" in the parentheses stands for "decimal dilution," whereas the numbers that follow the "D" represent the number of (decimal) dilution procedures repeated according to basic homeopathy principles [178]. In this manner, "D" means that the corresponding solution of a given active homeopathic ingredient (drug) is obtained by decimal dilution of the starting mother solution. According to the German Homeopathic Pharmacopoeia by Driehsen et al. [179], a solution of six (6) repeated decimal dilutions in a predefined diluent-water or aqueous ethanol, e.g., 1 ml of mother solution (defined by the HAB), is diluted with 9ml of diluent to give D1; this D1 solution (1ml) is subsequently diluted with 9 ml of diluent, giving a D2 solution, etc.

"After the present study, sulpiride and the complex homeopathic remedy were mixed together; thereby creating a new drug, which was patented and was approved as new and inventive by international evaluation".

Preparation of the single drug-- Sulpiride

In a 5ml syringe, 0.4ml (20mg) of the isotonic sulpiride solution was combined with a 2.2ml of isotonic NaCl solution. The quantity of sulpiride was measured using a micropipette.

This one injection was applied simultaneously in the waist region using a 23G (0.6x25) needle, once daily at 10am.

Preparation of the single drug--complex homeopathy

One syringe with 2.2ml of an isotonic solution of mixed homeopathic substances in relatively equal amounts was used.

Homeopathic substances present in this complex parenteral isotonic preparation were mainly Krebs cycle compounds as well as some herbal homeopathic remedies, all in equal volume amounts up to 2.2ml:

- Intermediates: Citric acid (D8), cis-aconitic acid (D8), alpha ketoglutaric acid (D8), succinic acid (D10), fumaric acid (D8), DL malic acid (D8), sodium diethyloxalateoacetate (D6), sodium pyruvate (D8), barium oxalosuccinate (D10).
- Vitamins, Nucleosides, and Their Biosynthesis Intermediates: Coenzyme A (D8), nicotinamide adenine dinucleotide (NAD) (D8), adenosine triphosphate (ATP) (D10), ascorbic acid (D6), thiamine hydrochloride (D6), sodium riboflavin phosphate (D6), pyridoxine hydrochloride (D6), nicotinamide (D6), cysteine (D6), DL-alpha-lipoic acid (D6).
- Minerals: Magnesium orotate (D6), cerium oxalate (D8), manganese phosphate (D6).
- Herbal Extracts: Pulsatilla (D6) and Beta vulgaris (D4).
- Miscellaneous Ingredients: Sulfur (D10) and Hepar sulfuris (D10).

This one injection was applied to the waist region using a 23G (0.6x25) needle, once daily at 10 am. This group was treated in the period before that the first and second groups were treated.

Patient groups

The subjects of this study of antidepressant activity were sixty-seven (67) women, 44-80 years of age, who were suffering from depressive syndrome. One day prior to this experiment (day 0), all patients were tested by a 17-item version of the Hamilton rating scale for depression (HAMD test). These patients came to my clinic for antidepressant treatment. Some of them wanted combined treatment and some of them wanted single conventional or homeopathic treatment, since my clinic is a private integrated medicine clinic. After the treatment was completed, we analyzed the patients' HAMD scores and compared them to scores taken before the treatment and we noticed some significant differences. The third group of patients (15 women, 34-56 years of age) was

treated in previous period only with the complex homeopathy remedy described here and was also tested before and after treatment.

Consequently,

a. The first group (N=35) received one dose of the combined drug (sulpiride and complex homeopathy) as 2 separate injections daily in the morning for 3 months.

b. The second group (N=32) received one dose of the single drug (sulpiride only) daily in the morning for 3 months.

c. The third group (N=15) received one dose of a complex homeopathy remedy as 1 injection daily in the morning for 3 months, but in an earlier period. At the beginning of this study, the third group was tested for HAMD score before and after treatment, so those data were used for statistical analysis.

This study used the Hamilton rating scale for depression, also known as the HAM-D or HAMD test, which is generally accepted as a "gold standard" for quantifying severity of depression symptoms such as low mood, anxiety, agitation, insomnia, and weight loss. It was performed on day 90 of taking the injections. For the 17-item version of the HAMD test, scores can range from 0-54. In relation to depression, scores between 0 and 6 indicate a normal person, between 7 and 17 indicate mild depression, between 18 and 24 indicate moderate depression, and scores over 24 indicate severe depression.

Results

- The average HMD score in the three groups prior to the study was 20.2±7.1.
- In the second group (N=32), prior to the study, the HAMD score was 18.8±9.2 and after the study it was 17.3±8.8 (Table 1).
- In the first group (N=35), prior to the study, the HAMD score was 21.3±5.0 and after the study it was 8.8±4.1 (Table 1).
- In the third group (N=15), prior to the treatment, the HAMD score was 20.7±4 and after the study it was 19.4±4.5 (Table 1).

The results in Table 1 were subjected to a paired t-test. The pairs were chosen to reflect changes during the study in the control groups (rows 1 and 3) and the experimental group (rows 2 and 4). A paired t-test is usually chosen to establish the difference between groups; i.e. their mean values during the study.

The results of the paired t-test, performed with the Analyse-it version 2. 21 software, are shown in Table 2.

The results from the HAMD test strongly suggest that the combined therapy has a strong antidepressant activity (see the mean difference in Table 2). The HAMD mean score decreased by 12.5 points in the first group and overshadowed the results from the sulpiride only and complex homeopathy only treatments.

No side effects, such as sedation, constipation, dryness of the mouth, or prolactinogenic activity, were observed.

Discussion

Sulpiride is an atypical antipsychotic drug used mainly to treat psychosis and depression. For productive psychosis, treatment uses rather high doses (more than 600mg daily). It can be administered orally or parenterally. For psychosis with negative symptoms, long-term treatment uses moderate doses (approximately 600mg daily). Depression and vertigo are treated with low to moderate doses (100-200mg daily) [173-175].

Sulpiride is absorbed slowly from the gastrointestinal tract. Its oral bioavailability is only 25 to 35%, with marked differences according to the individuals. The peak plasma concentration is reached 4.5 hours after oral dosing. The usual half-life is 6-8 hours. Ninety-two percent (92%) is excreted unchanged in the urine. Sulpiride is usually given in 2 or 3 divided doses [175].

Sulpiride is a selective antagonist of the dopamine D2 and D3 receptors. This action predominates at doses exceeding 600mg daily. At low doses (in particular 50-200mg daily), its prominent feature is antagonism of presynaptic inhibitory dopamine receptors, which accounts for some antidepressant activity and a stimulating effect. Therefore, at these doses, it is used as a second line antidepressant. Additionally, it alleviates vertigo [173-175]. For depression, sulpiride is given orally, at 100-200 mg daily, divided into 3 doses [178].

Sulpiride has a bioavailability of 25-35% when given orally. If 20 mg is given subcutaneously (s.c.), one part of the drug is lost in the process of injection. According to my rough estimation, only about 17.5mg reaches the s.c. tissue because the process of injection incurs some losses. The bioavailability of an s.c. application is also rarely or never the value of 1 compared to an i.v. application. Therefore, the overall quantity of sulpiride in blood after 20mg has been present in the syringe is even less than 17.5mg. In the case of a 150mg daily dose (which is the average dose prescribed for sulpiride to treat depression), the drug would be present in the blood at 37.5-52.5mg at approximately 4.5 hours after oral dosing [174]. In this study, I explored whether sulpiride given parenterally s.c. at a low dose (20mg) would act better if combined with the complex homeopathic remedy than with an isotonic NaCl solution.

In this study, sulpiride was administered at a 20mg dose, combined either with a complex homeopathic/isopathic remedy mainly based on diluted and potentized Krebs cycle elements or with the isotonic NaCl solution. Anecdotally, homeopathized (potentized) Krebs cycle components act as a nonspecific metabolism activator (Witt et al. [46], according to the Reckeweg theory of isopathy and homotoxicology).

According to integrative medicine principles, we combine paradigmatically different therapeutic actions in time and space in order to possibly magnify therapeutic potential in a given patient. This is achieved by means of "synergy," which is defined as "a cooperative action of discrete agencies such that the total effect is greater than the sum of the two effects that act independently" [179].

Table 1: Mean HAMD score before and after the therapy.

	Group	HAMD
Before the study		
1	Second group (N=32)// Third group (N=15)	18.9±9.2//20.7±4.6
2	First group (N=35)	21.3±5.0
After the study		
3	Second group (N=32)//Third group (N=15)	17.3±8.8//19. 4±4.5
4	First group (N=35)	8.8±4.1

Table 2: Paired t-test parameters for second and first groups.

Paired t-test parameters	Second group	First group	Third group
Mean difference	1.6	12.5	1.7
93% Confidence interval (CI)	0.9-2.2	10.9-14.2	0.9-2.1
Standard error (SE)	0.31	0.81	0.32
t-statistic	4.97	15.47	5.0
Degrees of freedom (DF)	31	34	31
2-tiled "p" value	<0.0001	<0.0001	<0.0001

Using a combination of sulpiride and a complex homeopathic remedy followed integrative medicine principles. Two paradigmatically different substances were used together in order to multiply the therapeutic potential. We can define a "paradigm" as "a mental model, a way of seeing, a filter for one's perceptions, a frame of reference, a framework of thought or belief through which one's world or reality is interpreted, an example used to define a phenomenon, and a commonly held belief among a group of people such as scientists of a given discipline". Kuhn [180], a philosopher of science, says that a paradigm is a constellation of concepts, values, perceptions and practices shared by a (scientific) community that forms a particular vision of reality that is the basis of the way a (scientific) community organizes itself.

Conventional medicine is mainly based on a biochemical paradigm, so drugs are perceived as acting by interacting with receptors on cells. Health and disease are perceived as purely biochemical processes. Although medicine strongly holds for a biochemical paradigm of biological processes, we are now in a process of revising the past century's biochemical concept. Therefore, major biological processes can also be electromagnetic in nature. Thus, we come to a concept of energy medicine where illness is regarded also and at the same time as a disturbance in energy fields and can be addressed via interventions into those energies and energy fields [178]. The paradigm shift, as a change from one way to another, is not a transformative revolution, but a sort of gradual metamorphosis driven by agents of small bits of slow change [180], and integrative medicine is surely one of those small bits.

Consequently, sulpiride acts at a biochemical level or paradigm, while homeopathy surely does not, since the quantity of diluted matter is so small it cannot satisfy the receptor theory in a biochemical paradigm [181,182]. Many disputes about how homeopathy works or whether it works at all. Although many suppose that homeopathy is a placebo, others hold a different opinion [183-185]. Nevertheless, even though we do not fully understand how homeopathy works, it is usually perceived as being energetically programmed water interacting with water in the body, which affects cells on an energetic (quantum field) level [184]. This is the proposed mechanism of action for high dilutions/potencies, which integrate global dynamics also by electromagnetic regulation.

Another model emerging from nonlinear complex systems theory has been proposed for low potencies [179]. A quantum and nonlinear physical model for homeopathy may work in concordance as well, so at the same time both mechanisms of action may be in play.

The findings of the present study indicate that sulpiride at a low dose, given subcutaneously in combination with a complex homeopathic remedy, acts better than sulpiride with an isotonic NaCl solution does. How can that be?

My opinion is that the body exists on different levels or in different paradigms that are mutually related concurrently. Therefore, we cannot say definitively that the body is just a machine or just a computer or just a quantum operator. It is all of these at the same time. For example, if a bone is fractured, it should first be treated mechanically, i.e., operated on with osteosynthesis (mechanical paradigm). In order for it to be healed, growing processes (biochemical paradigm) should be applied. If we apply magnetic therapy to a fracture site, it can grow even faster (energetic paradigm), so by intervening with mechanical, biochemical and energetic processes, we may achieve positive synergy and multiply the healing potential. Thus, we see that the body is a complex system, which means at least two things:

- It is a system composed of interconnected parts that, as a whole, exhibits one or more properties that are not obvious from the properties of the individual parts; the whole is more than merely the sum of its parts.
- It is also a network of heterogeneous components that interact nonlinearly.

In a linear system, an effect is always directly proportional to cause, whereas in a complex system, a small perturbation may cause a large effect (the butterfly effect), a proportional effect, or even no effect at all. Here, we come to the principle of chaos theory [179].

In the context of this study, I speculate that a homeopathic remedy can make a small change in cellular energy production so that sulpiride can perform better and at a smaller dose. The foremost problem with sulpiride in low doses is a strong stimulation of prolactin secretion; whether this may contribute to the development of breast cancer in women is currently not known, but in this study, no milk production or breast stimulation was observed.

If such combined allohomeo (R) therapy is really a therapeutic possibility that needs to be investigated in further studies, it will have a paramount significance. It would enable us to reduce the dose of the chemical drug, thereby helping to avoid drug side effects while still achieving the desired therapeutic effect.

Conclusion

This study confirms that sulpiride at a low dose (20mg) taken parenterally has a statistically better effect on depression if combined with a complex homeopathic/isopathic remedy based on Krebs cycle components than if combined with an isotonic solution of NaCl. It also presupposes that homeopathy is not a placebo. Further experiments are necessary to determine whether this observation is based on a firm grounding [186-188].

After I became aware of the great potential of a combined or hybrid drug, I administered it to myself as a mix of two in one syringe (not in two separate syringes as was done with the patients). As an overworked doctor, I was a potential burn-out syndrome victim, so I wanted to try the therapy for myself to see what would happen. The results were astonishing. Sleep was regulated after the first injection. The very same night, I had a deep, healthy sleep with nice dreams, lasting 8-9 hours, and I awakened completely refreshed. After one more day, my mood and concentrations were elevated and my burn-out symptoms had subsided. After 5 more days, I discontinued the injections because I felt completely well and did not need them anymore. Fantastic!

Therefore, a new drug was born, as well as a new medication system called ALLOHOMEO therapy. It is innovative because chemical drugs are combined with homeopathic therapies, and these show synergistic properties. At the present time, I am developing more ALLOHOMEO drugs with other chemical and homeopathic compounds.

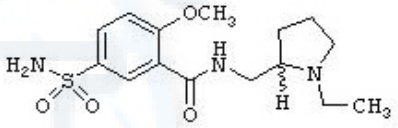
Afterwards, I patented the hybrid drug internationally and it passed with high degree. The method was given the name SULPYCO, which is the registered trademark of the method.

Later administration was continued by giving two separate injections merely for administrative reasons. When I administer it to myself, I mix the two components together in the same syringe and give it in a subcutaneous manner in the region of the lower waist. Just to mention again, both sulpiride and Coenzyme compositum (Heel GmbH, Germany) are registered drugs; the latter being OTC and safe even for self administration, but labeled: "Without proven medical efficacy or indication". No drug interactions are probable nor observed since Coenzyme compositum, in a chemical sense, contains mostly saline and only infinitesimal quantity of other molecules. This was confirmed by chemical modeling made by an independent Croatian chemist, Ivica Cepanec, PhD, shown in the subsequent text.

Analysis of Possible Chemical Interactions between Sulpiride (1) and Ingredients of Coenzyme Compositum (Heel GmbH, Germany)

Project task

Analysis of all theoretically possible chemical interactions of (*R*,*S*)-(±)-5-(aminosulfonyl)-*N*-{(1-ethylpyrrolidin-2-yl)methyl}-2-methoxy benzamide, known under generic name of sulpiride (**1**):



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and all 26 ingredients of so-called modified Krebs solution, a homeopathic product of **Coenzyme compositum** of the manufacturer Heel GmbH, Germany, of the following composition (Table 3):

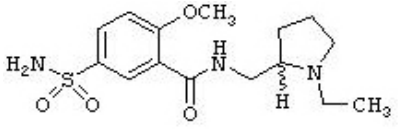
The concept of the SULPYCO therapy

Anti-depressive SULPYCO therapy is carried out by subcutaneous administration of a freshly prepared mixture of sulpiride (0.4ml; 20mg) and 2.2ml of Coenzyme compositum (Heel GmbH) solution.

From this administration regime follows the fact that the contact time of sulpiride and Coenzyme compositum ingredients is very short, <5min; administration is conducted immediately after mixing of the parenteral solutions in a syringe.

Analysis

Reactivity of sulpiride (1)



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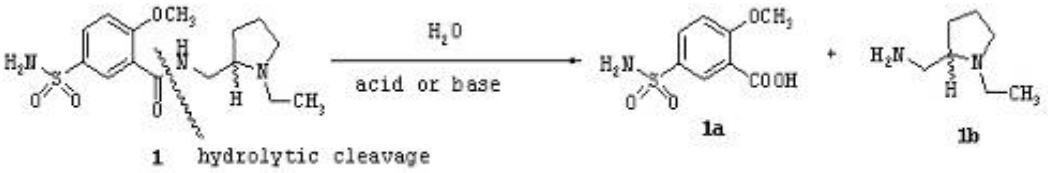
Concerning the structure of sulpiride, theoretically, the following degradation reactions can be expected:

(i) hydrolysis of the amide group to 4-methoxy-3-carboxy-benzene sulfonamide **(1a)** and 2-aminomethyl-N-ethyl-pyrrolidine **(1b)**;



R Reactions of hydrolysis of secondary amide function usually proceed under harsh reaction conditions, e.g. at the reflux temperature of water-dioxane mixture in the presence of strong mineral acids at 100 °C for several hours. From the standpoint of stability of the sulpiride solution, this is the most important product of spontaneous hydrolytic degradation. The process eventually proceeds by autocatalytic action of a tertiary amino group of the same molecule (participation of neighboring group).

(ii) hydrolysis of sulfonamide to the respective sulfonic acid **1c**:

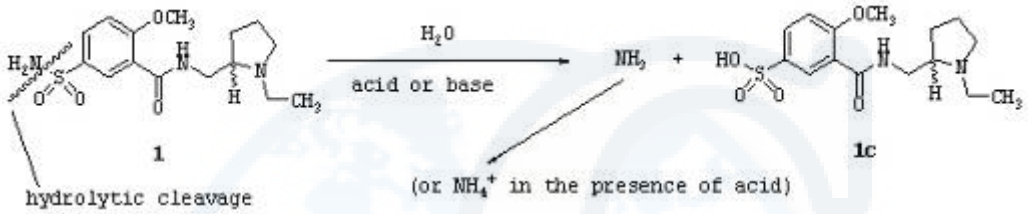
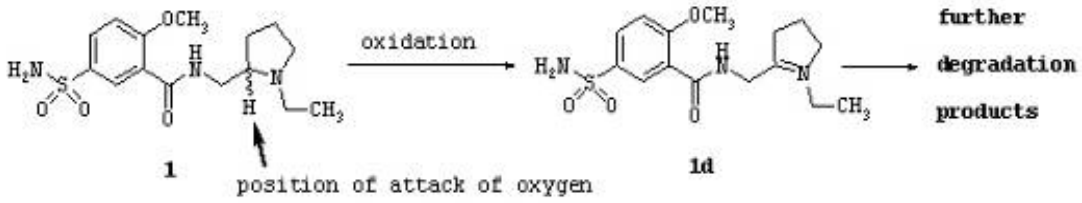


Table 3: Composition of Coenzyme compositum of the manufacturer Heel GmbH, Germany.

	Ingredient	Homeopathic Dilution	Solvent	Real concentration (mg/ml)
1	Ascorbic acid **(2)**	D6	15% ethanol	$1X10^{-5}$
2	Thiamine chloride **(3)**	D6	Water	$1X10^{-5}$
3	Sodium riboflavin phosphate **(4)**	D6	Water	$1X10^{-5}$
4	Pyridoxinc hydrochloride **(5)**	D6	Water	$1X10^{-5}$
5	Nicotinamide **(6)**	D6	43% ethanol	$1X10^{-5}$
6	cis-Aconitic acid **(7)**	D8	43% ethanol	$1X10^{-7}$
7	Citric acid **(8)**	D8	43% ethanol	$1X10^{-7}$
8	Fumaric acid **(9)**	D8	43% ethanol	$1X10^{-7}$
9	α-Ketoglutaric acid **(10)**	D8	43% ethanol	$1X10^{-7}$
10	DL-Malic acid **(11)**	D8	43% ethanol	$1X10^{-7}$
11	Succinic acid **(12)**	D8	43% ethanol	$1X10^{-7}$
12	Barium oxalosuccinate **(13)**	D10	-	$1X10^{-9}$
13	Sodium pyruvate **(14)**	D8	43% ethanol	$1X10^{-7}$
14	Cysteine **(15)**	D6	Water	$1X10^{-5}$
15	*Pulsatilla pratensis* extract **(16)**	D6	Water	$1X10^{-5}$
16	Hepar sulfuris	D10	Water	$1X10^{-9}$
17	Sulfur	D10	Water	$1X10^{-9}$
18	Adenosine triphosphate **(17)**	D10	Water	$1X10^{-9}$
19	Nicotinamide adenine dinucleotide **(18)**	D8	Water	$1X10^{-7}$
20	Coenyme A **(19)**	D8	Water	$1X10^{-7}$
21	*Beta vulgaris* ssp. *vulgaris* var. *conditiva e radice* extract **(20)**	D4	Water	$1X10^{-3}$
22	Sodium diethyl oxaloacctate **(21)**	D6	Water	$1X10^{-5}$
23	Manganese phosphate	D6	-	$1X10^{-5}$
24	Magnesium orotate **(22)**	D6	Water	$1X10^{-5}$
25	Cerium oxalate **(23)**	D8	-	$1X10^{-7}$
26	α-Lipoic acid **(24)**	D6	Water	$1X10^{-5}$

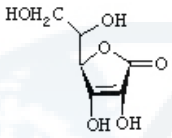
Hydrolysis of the sulfonamide function of sulpiride takes place under more drastic reaction conditions than the hydrolysis of amide in the reaction under **(i)**.

(iii) oxidation of sulpiride at the tertiary hydrogen atom in the vicinal position next to the tertiary amino group of pyrrolidine, furnishing the Shiff's base **1d**, which subsequently undergoes hydrolytic cleavage into further degradation products:



Possible chemical interactions between sulpiride and ingredients of Coenzyme compositum (Heel GmbH)

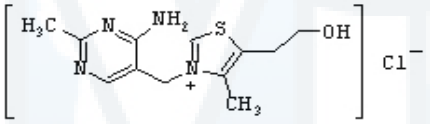
L-Ascorbic acid (2)



2

At a homeopathic concentration of D6, no chemical interaction with sulpiride can be expected. Possible catalytic hydrolysis of the amide function of sulpiride is not likely to occur, due to the fact that **2** is a weak acid. At the same time, on account of its significant reductive action, ascorbic acid preventively protects sulpiride and also other ingredients of Coenzyme compositum (which are sensitive to oxygen) from oxidation. Because of a short time of contact in the solution, all of these interactions are not relevant. Ascorbic acid itself undergoes oxidation in the solution. The stability issue is presumably solved during technological development of the Coenzyme compositum product.

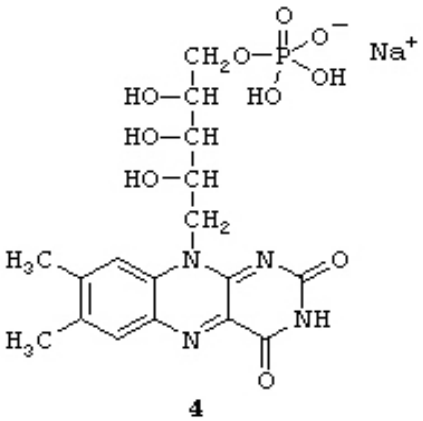
Thiamine chloride (3)



3

At a homeopathic concentration of D6, no chemical interaction with sulpiride can be expected. The 2-Amino-pyrimidine function of thiamine is of too weak a basicity and thus of a weak nucleophilicity to be able to catalyze possible hydrolysis of the amide function of sulpiride.

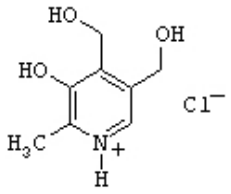
Sodium riboflavin phosphate (4)



4

At a homeopathic concentration of D6, no chemical interaction with sulpiride can be expected. Riboflavin is sensitive to light and bases. Stability in the solution of the composition is presumably solved during the development of Coenzyme compositum.

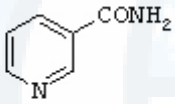
Pyridoxine hydrochloride (5)



5

At a homeopathic concentration of D6, no possible reaction with sulpiride exists. Pyridoxine itself is sensitive to oxidation at the hydroxymethyl function at 4-position of the pyridine ring. The intensity of oxidation is probably minimized under influence of ascorbic acid.

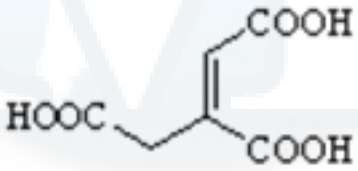
Nicotinamide (6)



6

At a homeopathic concentration of D6, not a single chemical reaction with sulpiride is possible. Nicotinamide is generally a very stable compound with practically only one possible degradation reaction, that of hydrolysis of the amide function into nicotinic acid (pyridine-3-carboxylic acid).

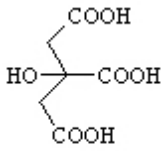
cis-Aconitic acid (7)



7

At a homeopathic concentration of D8, not a single chemical interaction with sulpiride is possible except for the formation of the corresponding salt (sulpiride aconitate; neutralization reaction). Despite a fact that aconitic acid is a stronger carboxylic acid (K_1=1.5x10^{-3}; 25 °C), potential acid-catalyzed hydrolysis of the amide function of sulpiride at a measurable level is not likely to occur.

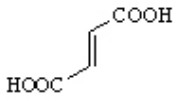
Citric acid (8):



8

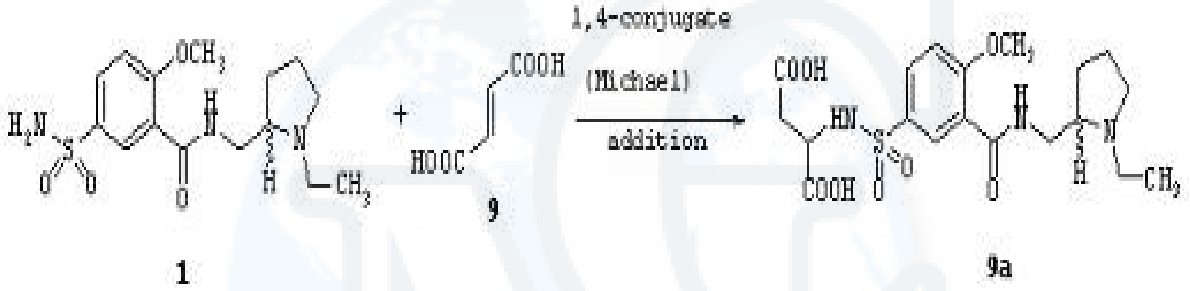
At a homeopathic concentration of D8, no chemical interaction with sulpiride is possible, except for the formation of the salt (sulpiride citrate). Citric acid itself is chemically stable, both as a bulk substance and in a solution. Although it can be a substrate for microbial growth, this is a parenteral product that is, by definition, sterile and thus potential microbial decay is not relevant.

Fumaric acid (9)



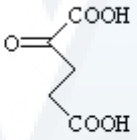
9

At a homeopathic concentration of D8, no chemical interaction with sulpiride can be expected, except formation of the salt (sulpiride fumarate; neutralization reaction). Despite the fact that fumaric acid is a stronger carboxylic acid (K_1= 3. 03; 25 °C), potential acid-catalyzed hydrolysis of the amide function of sulpiride at measurable intensity is not likely to occur. In addition, the theoretically possible Michael 1,4-addition of the nitrogen atom of sulfonamide function of sulpiride to fumaric acid with generation of **9a**- at room temperature and within a short period of time - is not likely to occur.



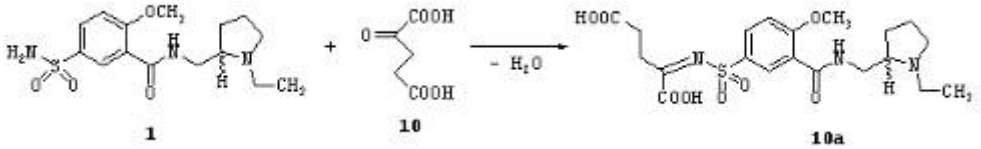
1 **9** **9a**

α-Ketoglutaric acid (10)



10

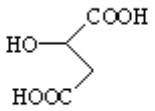
At a homeopathic concentration of D7, **α**-ketoglutaric acid certainly forms a salt with sulpiride (sulpiride a-ketoglutarate). Except for the neutralization reaction, the reaction of the sulfonamide group of sulpiride and keto-function of the acid **10** is possible, giving *N*-alkylidene-sulfonamide **10a**



1 **10** **10a**

Because of the high level of dilution of the system, the short period of time of reactants **1** and **10**, and the very mild reaction conditions (room temperature, and pH close to neutral), the probability of occurrence of this reaction is negligible.

DL-Malic acid (11)

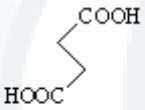


11

At the homeopathic concentration of D8, no chemical interaction with sulpiride is possible, except for the formation of the salt (sulpiride DL-malate).

Malic acid itself is chemically very stable, with the exception of the oxidation reaction (in which gives 2-keto-butan-1, 4-dicarboxylic acid), from which it is probably protected by the presence of ascorbic acid in the composition.

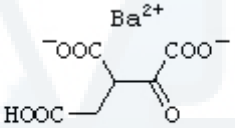
Succinic acid (12)



12

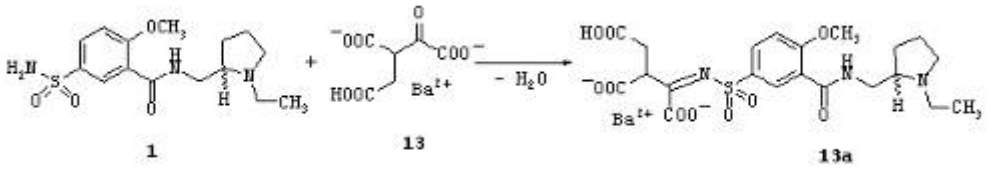
At the homeopathic concentration of D8, no chemical reaction of succinic acid with sulpiride is possible, except for the formation of the salt (sulpiride succinate). Succinic acid is chemically very stable.

Barium oxalosuccinate (barium salt of oxalosuccinic acid; 13)



13

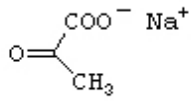
Compound **13** can react with supiride (**1**) in a neutralization reaction and in a reaction for generation of the respective N-alkylidene-sulpiride **13a**



1 **13** **13a**

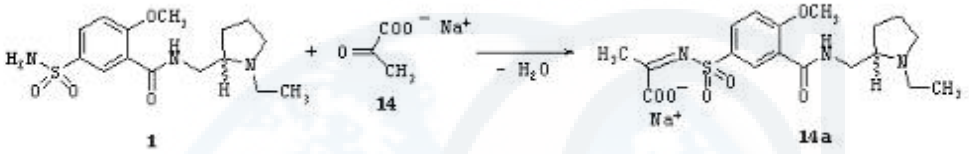
As in the case of a-ketoglutaric acid, due to the high level of dilution of the system (compound **13** is at a homeopathic concentration of D8), the short time of contact of reactants **1** and **13**, and the very mild reaction conditions (room temperature, pH close to neutral), the probability of occurrence this reaction is negligible.

Sodium pyruvate (sodium 2-ketopropionate; 14)



14

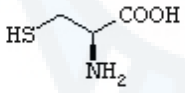
A theoretically possible reaction of compound **14** and sulpiride (**1**) furnishes the corresponding N-alkylidene-sulpiride **14a**



1 **14** **14a**

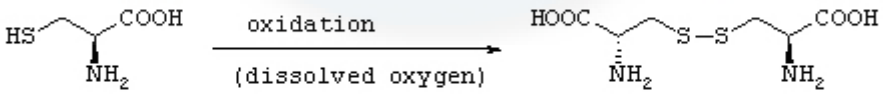
Due to the short time of contact of reactants **1** and **14**, and the very mild reaction conditions (room temperature, pH close to neutral), the probability of occurrence of this reaction and eventual degree of its conversion are considered as irrelevant.

L-Cysteine (15)



15

Cysteine itself is prone to an oxidation reaction, with the formation of the dimeric amino acid cystine (**15a**) by the following reaction

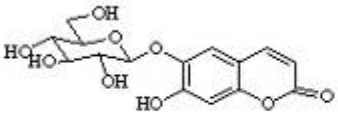


15 **15a**

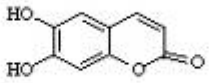
The oxidation is fast in alkaline solution, while under acidic conditions it is slow. Since this is a parenteral type of composition with a pH close to neutral, it is possible that the issue of cysteine stability has not been resolved. In this case, it is possible that a significant part of the cysteine in the composition is actually present in the form of cystine (**15a**). Cysteine cannot react with sulpiride, except in the neutralization reaction.

Extract of *Pulsatilla pratensis* (16)

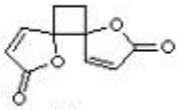
According to the literature, the extract of the plant *Pulsatilla pratensis* L. (Small Pasque Flower) contains the following pharmacologically active ingredients: coumarin the glycoside esculin (**16a**), its aglycone esculetin (**16b**), the terpene anemonine (**16c**) [189], the triterpene glycoside anemoside (**16d**), and the isoquinoline alkaloids berberine (**16e**), palmatine (**16f**), and jatrorrhizine (**16g**) [190].



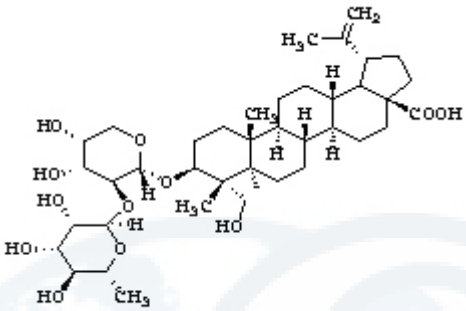
16a



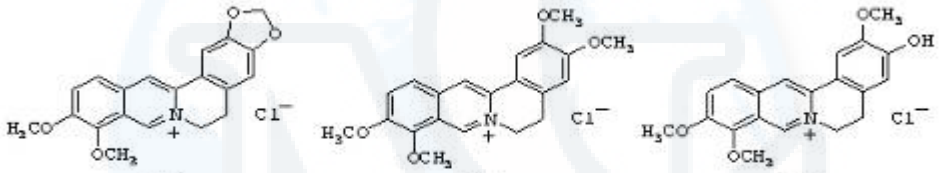
16b



16c



16d



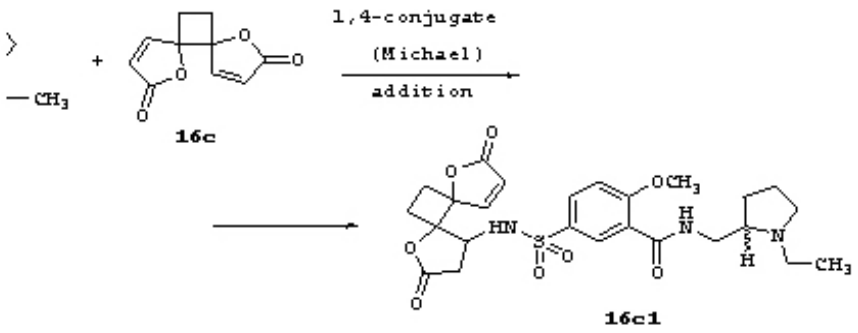
16e 16f 16g

Isoquinoline alkaloids **16e**-g are chemically very stable and cannot react with sulpiride.

Esculin (**16a**), esculetin (**16b**), and anemoside (**16d**) cannot react with sulpiride at neutral pH and under mild reaction conditions.

Esculin (**16a**) and anemoside (**16d**) theoretically can react under conditions of pH<7 (acidic medium), where hydrolysis of the glycoside bond occurs and where the released sugar molecule can subsequently react with sulpiride to yield an imine of the sugar aldehyde group and sulfonamide function of sulpiride. Considering the very short time of contact of sulpiride and Coenzyme compositum and the very mild reaction conditions (neutral pH and room temperature), the probability of occurrence this reaction is negligible.

Anemonine (**16c**) can react with sulpiride (**1**) by the 1, 4-conjugate Michael addition, giving derivative **16c1**



16c

16c1

However, the probability of occurrence of this reaction and the degree of its conversion is negligible.

Hepar sulfuris

In homeopathy and pharmacy, the term hepar sulfuris (sulfurated potash) represents a mixture of potassium sulfide (K_2S), potassium polysulfide (K_2S_x; x=2-6), potassium thiosulfate ($K_2S_2O_5$) and potassium sulfate (K_2SO_4), which is produced by the reaction (heating) of potassium carbonate (K_2CO_3) with excess of sulfur (S) in absence of air at 250 °C.

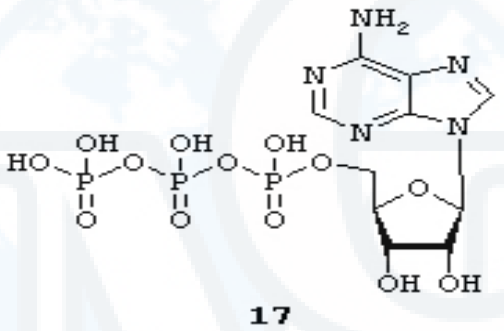
At a homeopathic concentration of D10 (as well as at higher concentrations), potassium sulfide (K_2S) from hepar sulfuris undergoes hydrolysis accompanied with liberation of hydrogen sulfide (H_2S; odor of rotten eggs). In the same manner, potassium polysulfides (K_2S_x) are prone to hydrolysis accompanied with generation of polysulfane acids, H_2S_x, which rapidly undergo degradation to hydrogen sulfide and elemental sulfur.

At a homeopathic concentration of D10, not a single ingredient of hepar sulfuris or product of its hydrolysis (H_2S, sulfur) can react with sulpiride.

Sulfur

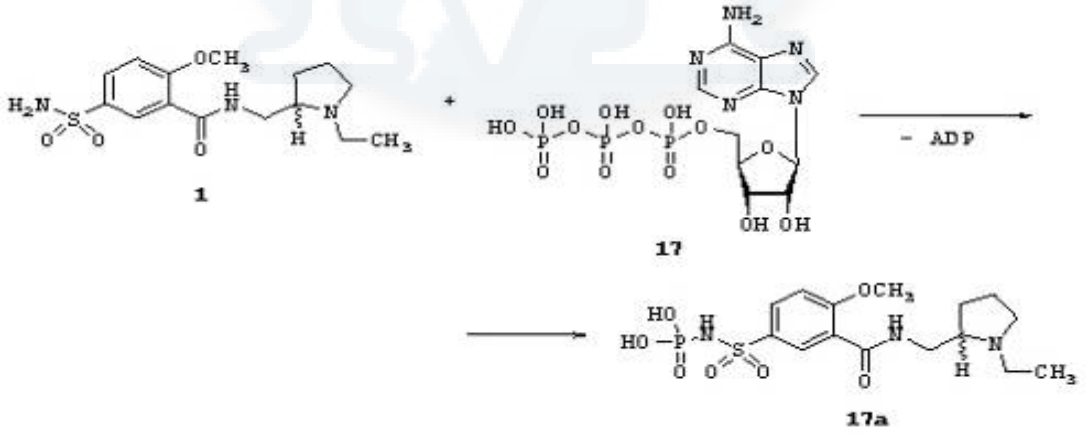
At a homeopathic concentration of D10 and under the conditions of the SULPYCO therapy, precipitated sulfur cannot chemically react with sulpiride.

Adenosine triphosphate (17)



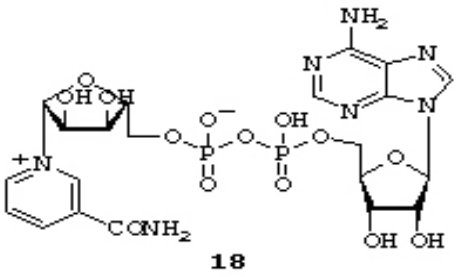
17

Adenosine triphosphate (ATP) can react with sulpiride at room temperature by phosphorylation of its sulfonamide group, yielding *N*-phosphoryl sulpiride (**17a**):



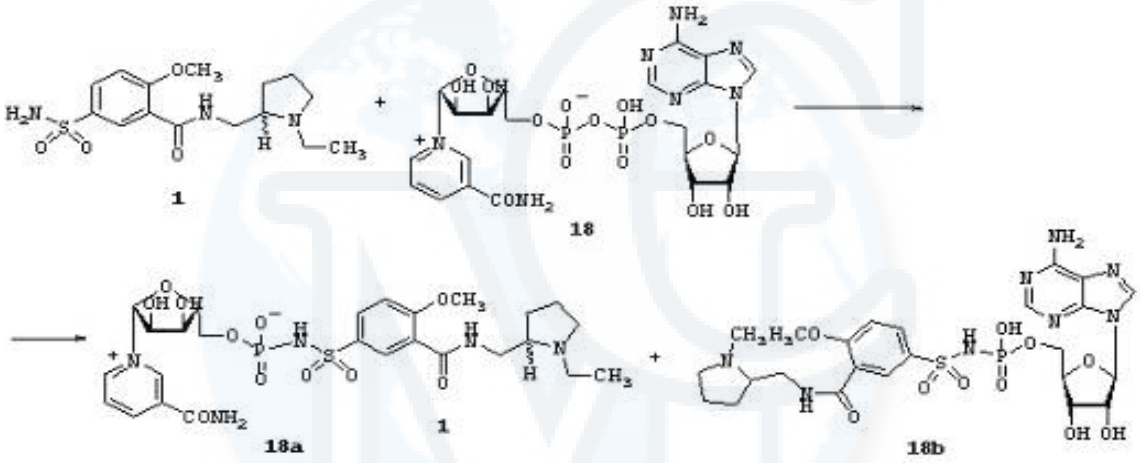
However, N-phosphoryl sulpiride (**17a**) presumably undergoes hydrolysis with formation of sulpiride (**1**) and phosphoric acid (H_3PO_4) by hydrolytic cleavage of P-N bond. Because of the short time of the contact of sulpiride and Coenzyme compositum solution containing ATP, the probability of occurrence of this reaction and its conversion is negligible.

Nicotinamide adenine dinucleotide (NAD; 18)



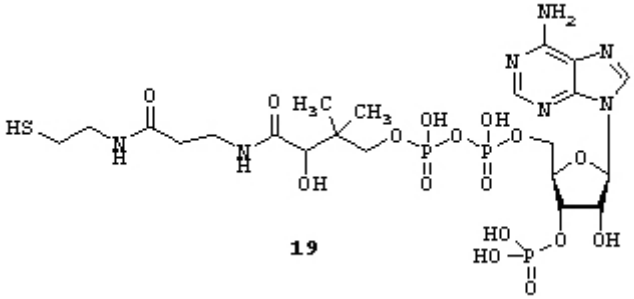
18

Theoretically, NAD can react with sulpiride (**1**) by phosphorylation of the nitrogen atom of the sulfonamide group, giving derivatives **18a** or **18b**



At a homeopathic concentration of NAD of D8, this reaction is very unlikely to occur. Also, derivatives **18a** or **18b** in aqueous solution certainly undergo further hydrolytic cleavage of P-N bonds, which results in regeneration of sulpiride (**1**).

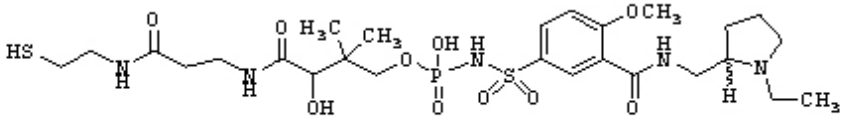
Coenzyme A (19)



19

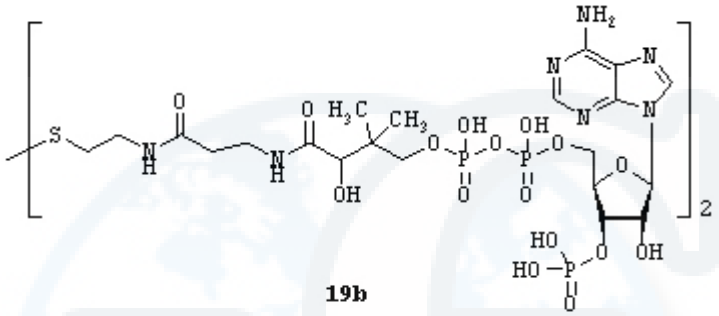
Coenzyme A can react with sulpiride in the sense of phosphorylation yielding compounds **18b** or **19a**:

Coenzyme A can react with sulpiride in the sense of phosphorylation yielding compounds **18b** or **19a**:



19a

Possibilities for these reactions are irrelevant. Coenzyme A (**19**) itself is prone to relative rapid oxidation to disulfide **19b**:

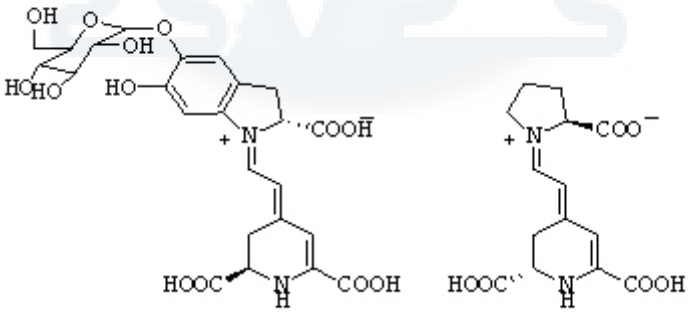


19b

The issue of stability of coenzyme A within the composition of Coenzyme compositum is presumably solved somehow during the development of the product.

Beet (*Beta vulgaris* ssp. *vulgaris* var. *conditiva e radice*) extract (20)

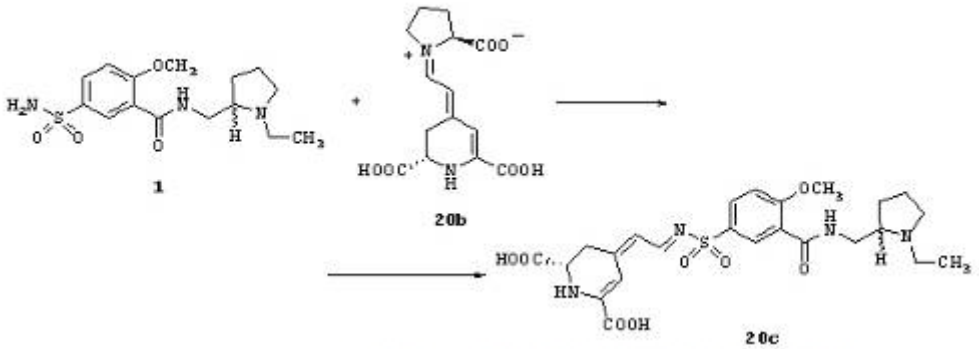
According to the literature, beet extract contains a dozen substances of nutritive significance, including, vitamins of the B group (thiamine (B1), riboflavin (B2), nicotinamide (B3), panthotenic acid (B5), and folic acid (B9)), as well as ascorbic acid (C). It contains a high content of iron ($Fe^{2+/3+}$; 0.8mg/100g), zinc (Zn^{2+}; 0.35mg/100g), and calcium (Ca^{2+}; 16mg/100g). In addition, it provides significant amounts of the natural pigments, betanin (**20a**; E162) and indicaxanthin (**20b**).



20a **20b**

Potential chemical interaction between compounds of the B group of vitamins for the present analysis is not relevant, because these compounds are present in very small concentrations in the beet. Consequently, their absolute concentration in the Coenzyme compositum of D4 is extremely small.

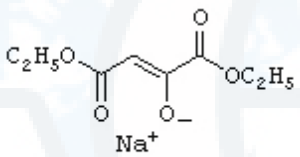
The presence of some concentration of iron ($Fe^{2+/3+}$) and zinc (Zn^{2+}) might theoretically influence catalytically in certain possible reactions of sulpiride and relatively reactive ingredients of Coenzyme compositum. Furthermore, pigments **20a** and **20b** can react with sulpiride **(1)** in a transimination reaction, giving the respective imide **20c**, e.g.



1 **20b** **20c**

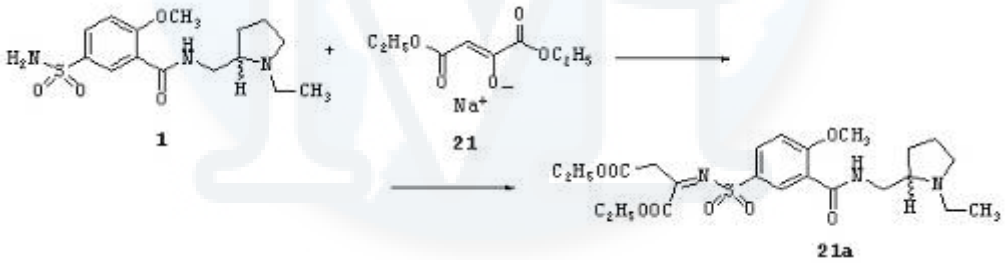
The possibility of this reaction under the conditions of SULPYCO therapy is not significant.

Sodium diethyl oxaloacetate (21)



21

CAS No. 40876-98-0; M_r=210.16. Theoretically, this compound can react with sulpiride **(1)** yielding the corresponding imine **21a**



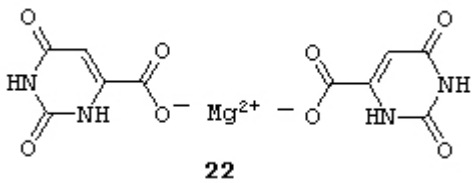
1 **21** **21a**

The significance of this reaction under conditions of SULPYCO therapy is negligible.

Manganese phosphate [$Mn_2(PO_4)_3$]

Manganese phosphate is a stable inorganic compound of extremely low water solubility. It cannot react with sulpiride. Since it releases equilibrium concentrations of manganese (II) (Mn^{2+}) ions, which act as a Lewis acid of significant strength, it theoretically may play a role as catalyst in some of the earlier described organic reactions of sulpiride.

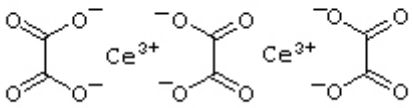
Magnesium orotate (22)



22

Magnesium bis(2, 6-dioxo-3*H*-pyrimidin-4-carboxylate); CAS No. [27067-77-2]; $C_{10}H_6MgN_4O_8$ M_r= 334.48. It cannot react with sulpiride under the conditions of SULPYCO therapy.

Cerium oxalate (23)



23

Erium (III) oxalate; $Ce_2(C_2O_4)_3$; CAS No. [139-42-4]; M_r= 544.29. It cannot react with sulpiride under the conditions of SULPYCO therapy. It is also of very low water solubility. It releases equilibrium concentrations of cerium (III) ions (Ce^{3+}), which may catalyze some of the earlier mentioned reactions of sulpiride and some of the relatively reactive components of Coenzyme compositum.

α-Lipoic acid (24)

24

This substance cannot react with sulpiride under the conditions of SULPYCO therapy.

Conclusion

I. Theoretically, sulpiride (1) in solution undergoes three degradation reactions:

a. hydrolysis of the amide function;

b. hydrolysis of the sulfonamide function; and

c. oxidation of tertiary hydrogen in pyrrolidine ring.

The stability of sulpiride is presumably resolved during development of the corresponding parenteral product, ensuring sufficient stability within the limits of the product specification during whole declared shelf life period.

II. Analysis of possible chemical reactions of sulpiride and all of thr ingredients of Coenzyme compositum in the conditions of the SULPYCO therapy showed the following:

a. 16 ingredients **cannot react**

L-ascorbic acid (**2**), thiamine chloride (**3**), sodium riboflavin phosphate (**4**), pyridoxine hydrochloride (**5**), nicotinamide (**6**), cis-aconitic acid (**7**), citric acid (**8**), DL-malic acid (**12**), succinic acid (**12**), L-cysteine (**10**), hepar sulfuris, sulfur, magnesium orotate (**22**), α-lipoic acid (**24**), manganese phosphate, and cerium oxalate (**23**);

b. Theoretically, total of 10 ingredients **can react**: fumaric acid (**9**), a-ketoglutaric acid (**10**), barium oxalosuccinate (**13**), sodium pyruvate (**14**), extract of *Pulsatilla pratensis* (**16**), adenosine triphosphate (**17**), nicotinamide adenine dinucleotide (**18**), coenzyme A (**19**), extract of *Beta vulgaris* (**20**), and sodium diethyl oxaloacetate (**21**); and there are also

c. **ingredients that cannot react, but act as sources of catalytically active metals,** which can further influence some reactions of sulpiride and certain reactive components of Coenzyme compositum under point (b); these are: magnesium phosphate [$Mn_2(PO_4)_3$], cerium oxalate [$Ce_2(C_2O_4)_3$ (**23**)] as well as metals from the beet {*Beta vulgaris*; iron ($Fe^{2+/3+}$) and zinc (Zn^{2+})} extract.

III. In conclusion, the probability of occurrence of theoretically possible reactions of sulpiride and certain reactive components of Coenzyme compositum **is very small or negligible** due to the following facts:

a. **the methodology** of the SULPYCO therapy, which includes mixing of sulpiride and Coenzyme compositum solutions immediately before the parenteral administration; so the contact time of sulpiride and Coenzyme compositum solutions is very short, less than 5 minutes;

b. **conditions of potential reactions** of sulpiride and certain reactive components of Coenzyme compositum, which involves:

- aqueous medium;
- room temperature; and
- extremely high level of dilution of Coenzyme compositum ingredients (D4-D10).

In conclusion, no new chemical compounds would be observed in a mix of sulpiride and Coenzyme compositum. Each one of the SULPYCO drug components has its own pharmacological identity, known and defined because they have long been present on the market. They are not changed by mixing at room temperature prior to injecting. In addition, no interactions are likely once these substances enter the body.

Clinical Experience with the SULPYCO Method

SULPYCO works quickly. Although the data in the observational study suggested 3 months of use, I found later, with more experience, that results come much earlier. The treatment will usually show results in first 5 days, with a maximum by the tenth day. If it does not show results in 10 days, then it is futile to continue. What we observe is:

- Deep healthy sleep with pleasant dreams
- Feeling alert and fresh upon waking
- The mood is stabilized and brightened
- Concentration improves
- Motivation for everyday work, social interaction, and self grooming is raised
- Sexual desire is better
- Conflict tendencies are less
- Working capacity is heightened
- Anxiety is significantly reduced

No side effects were noticed. Galactorrhea, as a typical sulpiride side effect, was not observed.

The treatment is appropriate for mild, moderate, and less severe cases of depression and anxiety, dysthymia, chronic fatigue, involutive depression, and depression of a chronic disease. It is interesting how often depression adds to the gait difficulty in multiple sclerosis patients. When depression is resolved, the gait improves. It can also be administered over other antidepressant conventional therapy that the patient already takes. Very often, the SULPYCO method works better than sulpiride 3x50 mg orally. I have no experience with hospitalized depressive patients nor with bipolar disorders.

The SULPYCO method for an average patient with depression/anxiety usually requires about 20 injections. In the first few days, it is given every day; in the later stages, it is given every other day, and then even once or twice a week. The frequency of injections can be gradually reduced over a few weeks. I use one injection per day for people of average weight. The heaviest person was about 100 kg and also responded to one single injection daily.

The SULPYCO method is appropriate for mild or moderate depressive and anxiety disorders.

Application of SULPYCO Method

There are two ways to apply the SULPYCO method that take into account administrative barriers that may occur:

a. To give it as two separate injections: first sulpiride in a 20mg dose (0.4ml in a 1ml insulin needle) and then Coenzyme compositum in a second injection. A 23G (0.6x25) needle is used. The site of injection is usually the lower waist region of the lateral lumbar region, over the gluteus medius muscle.

b. 'To mix Sulpiride with a Coenzyme compositum in the same 5ml syringe, use a 23G (0.6x25) needle and inject it into the lower waist region. In this way, 18mg (0.36ml of liquid isotonic sulpiride) is sucked into the syringe because precisely 20mg is hard to measure, considering the marks on the 5ml syringe. In this way, the dose error is 10% with respect to the original dose of 20mg. Any other way of mixing and applying it in the same syringe is completely impractical for everyday use, so I risked the difference. The effect is in fact the same. It is better to give 20% less than 20% more compared to original 20ml of sulpiride because I found that a 20% overdose may cause excitation.

c. When I apply the method to myself, I use a combined drug. I also tried to take it separately: it is still effective, but the mix is even better, according to my experience.

How to prepare a SULPYCO drug in two syringes without micropipette:

1. take one 1ml insulin syringe with needle
2. withdraw 0.4ml of sulpiride into the syringe
3. take one 5ml syringe
4. withdraw the contents of 1 vial of Coenzyme compositum into the 5ml syringe
5. give the two injections separately s.c.

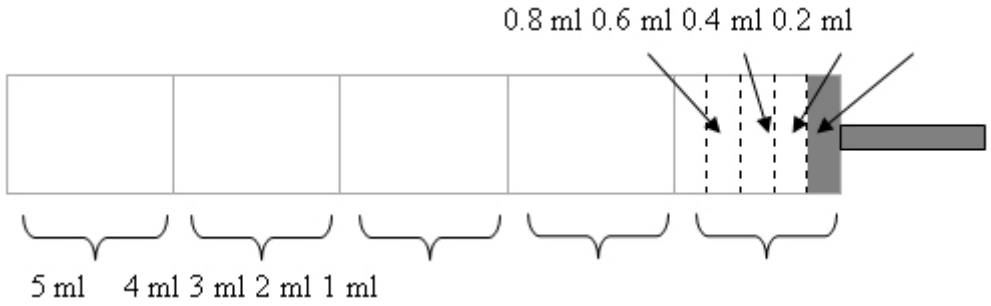
In one 5ml syringe without the micropipette:

1. take one 5ml syringe
2. take one 23G (0.6x25) needle
3. Withdraw 0.36ml (18mg) from a 100mg/2ml vial of sulpiride. Remember that some sulpiride will be left in the tip of the syringe and this is not a negligible quantity since it is important not to overdose with sulpiride in the sense of this method. Therefore, withdraw sulpiride solution up to the first line of the syringe, indicating a 0.2ml volume, and the rest will be left in the syringe tip. The tip should be fully filled with sulpiride.

The procedure is shown in pictures 1 and 2.

(If the SULPYCO drug is made in a vial, then 20mg of sulpiride should be used, since some losses occur during withdrawal of the substance from the vial, while injecting it, and due to its incomplete absorbance from s.c. injection site.)

Picture 1:



Sulpiride must occupy the syringe tip and the 0.2 ml sector of the syringe, and no more than that.

Picture 2:

Syringe piston upper edge must underline the 0.2 ml mark on the syringe.

4. Then, open one 2.2ml vial of Coenzyme compositum, withdraw it completely into the syringe containing the sulpiride.
5. Put a 23G (0.6x25mm) needle onto the syringe.
6. Injection is done in the lower waist region or at the lumbar lateral region with a 23G (0.6x25mm) needle, as a classical subcutaneous (s.c.) injection.

SULPYCO is given once daily, optimally at about 1p.m. If it is given too early in the morning or too late in the day, it might not work well enough.

The quantity of sulpiride reaching the blood is even smaller than the quantity in the syringe; namely, one part of the drug is lost in the process of injection since some substance remains in the syringe and needle. The amount of sulpiride reaching the systemic circulation is then even smaller than that, since the bioavailability of s.c. use is always smaller than 1, compared to i.v. use. Therefore, in the SULPYCO method, we deal with really small dose of sulpiride.

Usually, the first results are seen within 1-5 days of use. It is rational to wait until the tenth day: if no effect is seen, SULPYCO has to be discontinued as non functional.

Most patients need 10 injections/10 days in a row, 1 injection daily. It can then be slowed down by 1 injection every other day or more. Some patients need it only once a week, which gives them satisfactory effects over several months. No side effects were observed.

As life stressors fluctuate, it can be given on demand to patients that previously took it in a row over a certain period of time. Therefore, it is not necessary to take it continually once a primary benefit is reached.

Patients that take SULPYCO are mostly very satisfied with the therapy. About 75% of patients respond.

Patients describe the benefits of the SULPYCO method as follows:

- ''I feel like I was born again''
- '' My sleep is much better''
- ''I don't need other medications anymore''
- ''I dress up and put on make-up''
- ''I go to the hairdresser and take care about my styling more than before''
- ''I can communicate with people much better''
- ''My mood is elevated''
- ''My outlook to life is better''
- ''I am less negative about life''

- ''I go out alone without fear''
- ''I have more initiative''
- ''I'm less tired and have more energy''
- ''I feel like a new man in my body''
- ''I do not feel dizzy anymore''
- ''I don't panic anymore''
- ''My sexual desire is better''
- ''I bought myself new clothes''
- ''I started working again''
- ''I eat better''
- ''I feel less fear of people and have fewer conflicts''
- ''I'm less irritable and I feel less gloomy about life''

Advantages of the SULPYCO method are:

- Quick onset of the effect
- Low dose of the chemical drug and no side effects
- No need for long-term continued therapy
- Possibility for on-demand application
- Low cost (one combined injection or two separate injections cost about 2.5 Euros)
- The Simplicity of making the drug - it can be mixed or prepared on the spot

Afterword

The SULPYCO method can possibly change the system of antidepressant medication. It unites two presently opposed worlds, one of chemical drugs and one of homeopathy. This also is proof that good ideas from different and even opposing backgrounds, if put together in the right way, can create a better quality if we just choose to think outside of the box. It also proves that drug discovery is not necessarily connected to high tech laboratories and big companies. As for innovations, imagination is much more important than anything else.

It would be perfect if SULPYCO had a chance for mass production, which requires a Pharma partner. I hope this goal can be achieved in the near future. If the SULPYCO method reaches more people, the total sum of human suffering caused by depression and related disorders could significantly decrease. This is my dream.

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