Chapter 9

The Effect of Form (Cavity Structures) on Biological Systems

The following bodies are cavity structures: empty honeycombs, mesh structures, porous materials, pyramids, bundles of long tubes, and others (Figure 9.1).

Figure 9.1. Types of cavity structures. From left to right: empty honeycombs, breeding site of solitary bees, pyramid, bundle of long tubes and open book

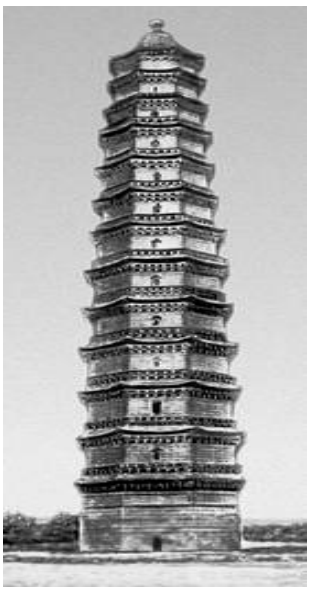


Figure 9.2. Tie Ta Pagoda (Iron Pagoda), Keifeng, China, 1041

The phenomenon associated with the form of ambient bodies, in particular with cavity structures (the influence on living and non-living objects, light radiation, and other things) was known since ancient times. For example, places of worship in Eastern countries, such as pagodas (Figure 9.2 and Figure 9.4) and pyramids (Figure 9.3) intended for storing treasures, in particular, leather, furs, expensive wines, and the mummies of deceased rulers, were made in the form of cavity structures. Upper parts of Orthodox tent-

shape type churches (Figure 9.5) can also be classified as cavity structures. Those special properties of cavity structures have had no established name for a long time. In the 1930s, A. de Belizal and L. Chaumery proposed the term “form radiation” [105]. In A. Mermet’s [106] classic work, the term “radiesthesia” is also used. The Russian scientist, V. Grebennikov, called the phenomenon the “cavity structure effect” [107,108]. The latter name seems to be the best, because it most accurately reflects the main features: the presence of a cavity and curvature in the form of the body.

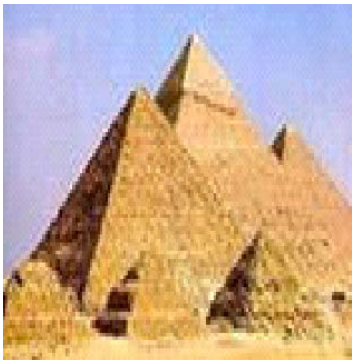


Figure 9.3. The Giza Pyramids, Egypt XXVI–XXIII BC

Figure 9.4. Yakushi-ji pagoda, Nara, Japan, VII–VIII C

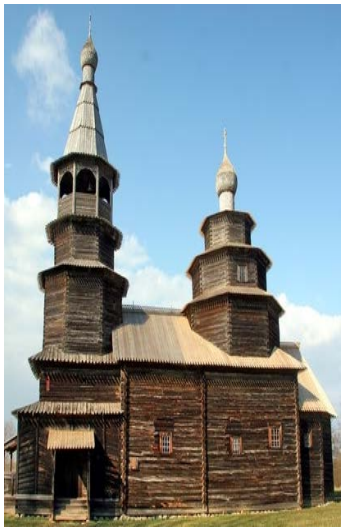


Figure 9.5. An Orthodox wooden church, Russia, 18C

Stonehenge in England also belongs to type of place of worship. It was also built in the form of cavity structures: two rings of stones with one placed inside the other, Figure 9.6(a). In addition, there are two earth banks and a ditch between them, Figure 9.6(b).

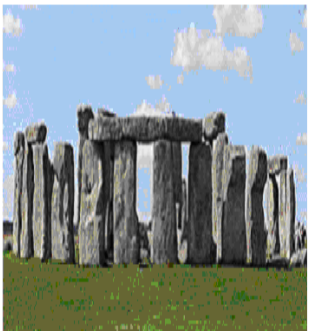


Figure 9.6(a). Stonehenge: A stone structure in Wiltshire, England, constructed from 3000 BC to 2000 BC

Figure 9.6(b). Aerial view of Stonehenge. There are two earth banks around the outer circle of stones and a ditch between them.

The properties of cavity structures will be considered in detail below.

9.1. The Energy of Cavity Structures

Like all quantum objects that are singularities in electric and/or magnetic fields, quantum objects (electrons, protons, neutrons) that constitute the substance of a cavity structure create virtual photons. According to Eq. (1.9) (Section 1.2), the orientation of the spin precession frequency of the virtual photon created by a quantum object is determined by the orientation of the object velocity. Consequently, if a quantum object constitutes an atom, then, the orientation of the spin precession frequency of the virtual photon created by a quantum object is determined by the direction of the object's orbital velocity. As the mutual space arrangement of the orbits of the quantum objects that constitute the substance of the cavity structure depends on the form of the latter, the mutual orientation of the precession frequencies of the virtual photons created by these quantum objects cannot be arbitrary. In particular, the precession frequencies of the spins of the virtual photons created by the quantum objects of a cavity structure cannot be aligned with the same straight line. An example of the possible configuration of r virtual photons created by the quantum objects that constitute the substance of a cavity structure is shown in Figure 9.7: the directions of frequencies ($\boldsymbol{\omega}_1$, $\boldsymbol{\omega}_p$,  , …, $\boldsymbol{\omega}_r$) of precession of these virtual photons' spins are tangential to a ring. In this configuration, according to definition Eq. (1.12), a spin supercurrent $\left(I_{ss}\right)_{pq}$ between the arbitrary p and q virtual photons will never be zero, that is,

$$\left(\mathbf{I}_{ss}\right)_{pq} \neq 0 . \tag{9.1}$$

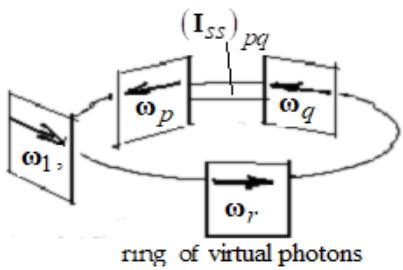


Figure 9.7. An example of the configuration of r virtual photons with respective precession frequencies: $\boldsymbol{\omega}_1$, $\boldsymbol{\omega}_p$, $\boldsymbol{\omega}_q$, …, $\boldsymbol{\omega}_r$. $\left(\mathbf{I}_{ss}\right)_{pq}$ is a spin supercurrent.

Thus, the space inside the ring will be constantly “filled” with spin supercurrents [110].

Many phenomena associated with energetic properties of cavity structures can be explained by the action of spin supercurrents.

1) In 1952, Czech researcher, K. Drbal discovered the possibility of a pyramid “maintaining razor blades and straight razors sharp” without an auxiliary source of energy. He was granted a patent for this discovery [111].

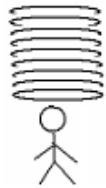
2) O. Korschelt, a 19th century researcher of cavity structures, observed the feeble glow of the structures in the dark [112].

3) J. Parr in 1977-1987 discovered an area near a pyramid that has the property of shielding various fields [113,114,115]. Parr called this area a “bubble”. Parr placed energy sources that emitted various fields (gamma rays and radio frequency sources) inside a pyramid and measured the extent the bubble shielded or blocked them. He has demonstrated in thousands of experimental runs that this bubble is indeed blocks off all known energy fields and influences the weight of ambient bodies. By rotating a pyramid in an alternating magnetic field, he could increase the bubble’s shielding properties.

Let us consider some examples of experiments that illustrate the influence of cavity structures on BS.

9.2. The Effect of Cavity Structures on Biological Systems

1) There are many examples of the use of cavity structures for therapeutic purposes during previous centuries. For example, the healing properties of pyramids are well known, see the survey by J. Little [116]. It is noteworthy that in Russia headaches have been treated by a sieve (a cylinder with a mesh bottom) for centuries. The sieve was placed on the head or held in front of the face with the mesh parallel to the face, Figure 9.8(a). People living on the banks of the Lower Amur used to cure a sick child by putting a hoop consisting of 9 wooden rings on him or her [117], Figure 9.8(b). Chinese physicians fighting against the plague epidemic in Manchuria in 1910–1911 wore face masks that were, in fact, sets of cavity structures; it was believed that such forms of mask considerably reduced the risk of infection, Figure 9.8(c).

(a) (b) (c) (d)

Figure 9.8. Types of cavity structures used for therapeutic purposes

The following form of self-healing can also be used: laying the palms of hands on a problem area of the body so that the fingers of one hand are at an angle to the fingers of the other hand, thus forming a grate, Figure 9.8(d), [110].

Figure 9.9. Honoring a person by dancing and singing in a ring.

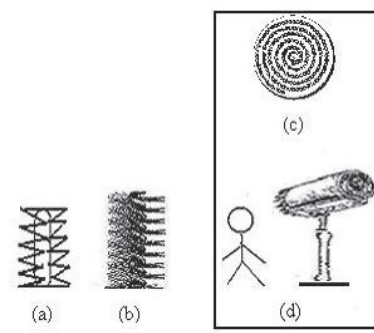


Figure 9.10. The type of cavity structure used by Korschelt for therapeutic purposes.

2) In Europe, O. Korschelt (1853–1940) was likely the first person to be granted a patent for specially fabricated cavity structures to be used for medical purposes [118]. Figure 9.10 shows examples of the cavity structures made by Korschelt. The cavity structure in Figure 9.10(a) is a tin-plate cylinder with soldered zinc or steel teeth. The cavity structure shown in Figure 9.10(c) is a wooden disk with a copper chain coiled on it. The size of

each cavity structure does not exceed 50 cm. The cavity structure used was suspended from the ceiling, Figure 9.10(c), or attached to a floor-type setup, Figure 9.10(d). Korschelt treated stomach problems, nerve diseases, insomnia and pain using such cavity structures.

Korschelt might have learned of these structures' curative value while attending Tokyo Medical School in Japan. Pagodas, which are tiered buildings with multiple eves, are common in Japan, China, and many other Eastern countries (Figure 9.2 and Figure 9.4).

3) In Russia, the medical aspect of a cavity structure was studied by V. Grebennikov.

V. Grebennikov found that the breeding sites of solitary bees affected microorganisms at a distance and, in particular, the viability of yeast was suppressed (dough inflation was reduced by 26 percent); the same occurred with certain saprophytic soil plants (growth was reduced by 33 percent).

In particular, Grebennikov showed the possibility of using the parts of empty honeycombs as a medical treatment for humans (Figure 9.11 and Figure 9.12). There is a museum in Novosibirsk (Russia) where a device intended for therapeutic purposes based on empty honeycombs is exhibited.

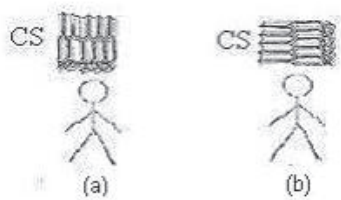


Figure 9.11. Two variants of the orientation of a cavity structure (honeycombs) as a human medical treatment.

Figure 9.12. Device based on empty honeycombs used for therapeutic purposes.

4) Dowsing is an example [119] of the influence of underground cavity structures on people (Figure 9.13).

It is possible that priest's headwear (Figure 9.14(a)), bracelets (Figure 9.14(b)) as well as necklaces (Figure 9.14(c)) were originally used

medicinally, and it was only with time that they changed their purpose. The bracelets and necklaces became used as ornaments; priest's headwear was used in religion rituals (its form is similar to the form of headwear of Egypt Pharaohs as well).

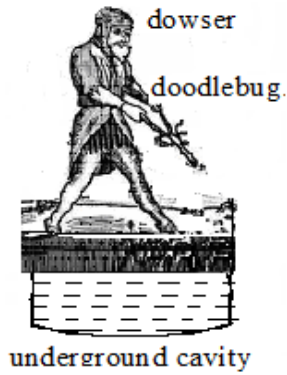


Figure 9.13. The search for an underground substance by a dowser using the doodlebug.

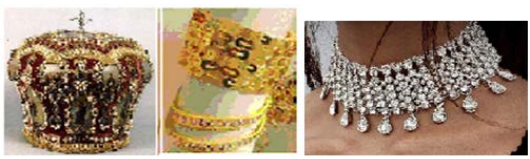


Figure 9.14. Types of cavity structures

5) The experiments are conducted on the effect of cavity structures on animals and plants.

a) An experiment carried out by J. Brock of Texas [120] showed that keeping 20-day-old rabbits for 57 days in pyramid-shaped hutches resulted in significantly increased weight (by up to 35 percent) and the size compared with the rabbits from the control group kept in standard hutches.

b) A. De Belizal and P. Morel [105], as well as J. Pagot [121], describe experiments with coaxially joined hollow-wooden hemispheres.

Placing nine such hemispheres of 9 cm diameter above pieces of fish or meat resulted in their mummification in less than a calendar day.

Seven hemispheres of 25 cm diameter that were placed above rats in a cage caused them to panic, which was then followed by a kind of catalepsy.

c) Experiments conducted by De Belizal and Morel have shown that a seed's germinating ability changes when it is placed in a pyramid.

Similar experiments were conducted in 2009 by a group headed by Sklyarov [122]. They were comparing the germinating ability of pease placed in the Great Pyramid of Cheops (test samples – Figure 9.15, curve 1) with those not placed in the Pyramid (control samples – Figure 9.15, curve 2).

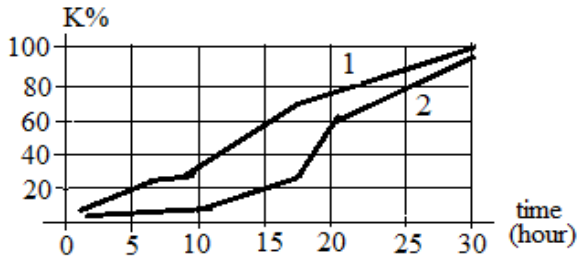


Figure 9.15. The number of pease (K in percent) against the time of observation (in hours). Curve 1 – test sample, curve 2 – control curve.

d) While studying the effect of nanoparticles on BS, it was found that the effect depended on the particle's form. For example, in experiments on the action of AgNPs on *E. coli* [71,77], it was found that the toxic action of AgNPs depended on their form: triangular particles were more active than spherical ones.

9.3. The Comparison of the Special Features of Cavity Structure Effects on Biological Systems with the Properties of Spin Supercurrent

The main results obtained in studies of the effects of cavity structures on BS are as follows:

1) Cavity structures exert an influence on BS independent of the substance the structure is made from, such as plastics, paper, wood, or metal, etc. However, its efficacy depends on the cavity structure substance and its form (sphere, pyramid, and so on).

These properties are in accordance with the definition of spin supercurrent: the type of substance affects the factors of proportionality (b_1 and  in Eq. [1.12]). The form of cavity structure influences the mutual orientation of precession frequencies of spins of virtual photons created by quantum objects of the cavity structure substance, which in turn, according to Eq. (1.12), influences the values of spin supercurrent emerging between the virtual photons.

2) The efficacy of the cavity structure action depends on its orientation with respect to BS. For example, the therapeutic effect of the cavity structure orientation in Figure 9.11(a) on a human appears more pronounced than that of the cavity structure in Figure 9.11(b).

This is in accordance with the vector nature of spin supercurrent following from its definition: spin supercurrent depends on the mutual orientation of precession frequencies of virtual photons spin between which it emerges, see Eq. (1.12).

3) Cavity structures exert their influence on BS independent of the presence of any screens between the cavity structure and the BS, such as brick walls or metal shields, etc.

This is in accordance with property 6 of spin supercurrent (see Section 1.2.); it is not shielded by electromagnetic and some molecular screens.

4) The BS that is in the coverage area of a cavity structure, even a very efficient one, can stop reacting to the action of the cavity structure over time: that is, the BS shows a habituation effect with respect to the cavity structure.

This property follows from the definition of spin supercurrent, Eq. (1.12): if as a result of the action of spin supercurrent the difference between the angles of precession and between the angles of deflection of the spins of virtual photons created by the quantum objects of a BS, on the one hand, and those created by cavity structures, on the other hand, becomes equal to zero, the spin supercurrent ceases.

5) The efficacy of a cavity structure depends on its orientation with respect to the Earth and/or the Sun. It is this phenomenon that O. Korschelt observed while analyzing the therapeutic action of the cavity structures he created [112].

This property can be explained by the following. 1) The Sun's electromagnetic radiation direction (that is the direction of its electric and magnetic components) influences the characteristics of quantum objects of the

cavity structure substance and, consequently, the characteristics of virtual photons created by the quantum objects. Then, according to Eq. (1.12), a change in the value of the spin supercurrent emerges. 2) Since, according to Eq. (1.7), the electric dipole moment is associated with the spin of the virtual photon, the Earth's electric field influences the orientation of the spins of interacting virtual photons and, consequently, on the spin supercurrent emerging between them.

Thus, all of the considered features of a cavity structure's effect on BS are in accordance with the properties of spin supercurrent considered in Section 1.2.

Discussion

1. To decide the global task, i.e., to determine the most favorable form of ambient bodies for a human, it is necessary, first, to carry out the complex analyses of spin supercurrent properties in dependence of the form of cavity structures and, secondly, experimentally investigate how a spin supercurrent affects the human organism. However, some recommendations can be given with taking into account the cavity structure effect: one should not have one's sleeping accommodations located in such a way that one's head would be in a corner of the premises. The ceiling above the bed should not be bent inwards, as it is better for it to be dome shaped like in religious buildings. If the ceiling is flat, then a canopy can be arranged over the bed. (It should be noted that pharaohs and emperors' sleeping places were at the center of room under a canopy.)

One should not stay long in the premises which are a sort of narrow niche or in a deep armchair with a metal frame, since, according to the model, spin supercurrent emerging in a cavity structure formed by an armchair is greater with the use of metal frame than with the use of wooden or plastic frame. The influence of such spin supercurrent on BS must be investigated.

2. Any BS has a form that is a cavity structure. Consequently, first, a BS creates an energy field ("bubble") nearby and, secondly, the internal "energy" properties of any BS depend not only on the biochemical processes performed in it but on its form as well.