

Universum verum by Dr. Giseler Grosskopf

We accept that we cannot see the full spectrum of light or hear the full range of sounds, but when it comes to nuclear science we accept only what we can register, test or examine. Facts and details in areas where we have no access to, taint the fundamentals and may falsify the results of respective research.

Fig. 1 shows an electro-cardio-gram and a human body. An EKG is the electrical topogram of the heart. Nobody would conclude from this electrical topogram that the human heart moves from the right gluteus maximus to the right thigh, then over the body, up the throat, back down to the left part of the body and via left thigh to the left gluteus maximus.

Fig. 2 shows the electrical topogram of a photon, registered by basically similar equipment the EKG is registered with. But in this case we declare the electrical topogram of the photon to the topogram of the photon and claim that the photon moves that way.

If we enlarge Fig. 2 to a geographical scale, we implicate the photon travels from New York to Boston via Alaska with an average speed of 300,000 km/sec ($= c = \text{speed of light} = 186,000 \text{ miles/sec}$) calculated for the direct distance from New York to Boston without exceeding the speed of light on its detour ("there is no speed beyond the speed of light").

A photon has to "pulsate", but not in an angle only seconds less than the right angle to the direction of light, rather in the same direction. Fig. 3 shows the pulsation of photons in a beam of light. With all our analytic methods we only have access to the third dimension, the areas of $c+x$ and $c-x$. An extreme small number of photons leaves the third dimension crossing L3 for a fraction of a second. Everything beyond L3 is under normal conditions completely hidden for us creatures of the third dimension.

Scientists have calculated that we have to accelerate a human to 45 times the speed of light to send the person to the fourth dimension, what could be right, but maybe the expression that we need the energy as if we were to accelerate a human body to 45 times the speed of light comes closer. A photon certainly has mass, extremely small, we could say infinite small mass, what shows another problem of nuclear science: physically an infinite small mass is still mass; mathematically infinite small mass is zero mass. The marriage of natural science with man-made mathematics may prevent us from finding the truth. If for example we divide anything, the universe, a galaxy, our solar system or a golf ball into infinite number of parts, we receive an infinite number of infinite small parts. If we take one of these parts away, the total quantity does not change, because mathematically an infinite small part is zero and if we take zero away from any amount, the amount does not change. But if we re-assemble all these infinite small parts, we re-gain the original object. If we view this mathematically, an infinite small part is zero and the addition of infinite numbers of zeros is still zero

When we assume the mass of a photon with one billionth of a gram, what would be very high, and take as basis 176 pounds (80 kg) for a human body, $c+x$ would mean less than 300,000.00000015 km/sec and $c-x$ more than 299,999.99999985 km/sec, the margin between $c+x$ and $c-x$ being less than .0000003 km/sec or .0003 m/sec or 1.2/100 of an inch/sec.

When we explain anything beyond the 3rd dimension, we can only use paraphrases, where "para" means "next" or "close", but also "missed". The only close term for the 4th dimension is a few thousand years old: "From eternity to eternity".

Fig. 4 shows the "paraphrasetic" area between the 3rd and 4th dimension. L3 is the borderline of the 3rd dimension; L4 is the entrance line to the 4th dimension. From L3 to L4 the control over space goes to zero and from L4 to L3 the control over time goes to zero. Most important is that from L3 to L4 the gravity force becomes infinite high, what means that the 4th dimension is of infinite small space.

Scientists have “tunneled” single photons by sending them through respectively small “tunnels”. As a result the photon reached a speed of 1.7 times the speed of light. Only a small percentage of photons is in the zone $c+y$ (Fig. 3). They return from this zone in time through the “pulsation” effect, the result of the gravity force of the photons in zone $c+x$ and $c-x$. A single photon will consequently spend more time beyond L3 and as a result be faster than the “speed of light”.

If an astronaut travels with half the speed of light and we send a light beam after him, the light does not appear to pass the spaceship with half the speed of light as expected, but the astronaut sees the light passing his ship with the full speed of light, although he already travels in the same direction with half the speed of light. When we see light, we only can see the areas of $c+x$ and $c-x$ (Fig. 3). The astronaut sees part of what we see and part of $c+y$, because he already is half the way to L3 (Fig. 4).

In the particle accelerator at CERN in Geneva particles were accelerated to 90% the speed of light. With release of radiation some particles disappeared. Scientists concluded these particles hit antimatter. When the particles are accelerated, they do not line up; they are assembled in a cloud. Simple mechanics say that the furthest back particle is accelerated the most (rubber-band-effect). These particles will reach the speed of light, cross L4 and disappear. The release of radiation is the same effect as the super-sonic-bang: the super-c-radiation. Of course, there are anti-particles like worked on anti hydrogen atom, but no anti-matter. A nano-appliance accelerated above the speed of light could give us information about the “area” beyond the third dimension.

Astronomers discovered that the speed of stars in the outer parts of a galaxy is higher than to be expected on the basis of the force of gravity on these stars. So scientists invented “Dark Matter” as a source of gravitational pull and claim that 96% of the universe consists of Dark Matter (23%) and Dark Energy (73%), holding the universe together. We know that the universe is expanding at accelerating speed. Sooner or later the stars in the outer part of a galaxy will reach speed of light and beyond. After crossing L3 these stars become invisible for us, but their force of gravity increases so immense (Fig. 4) that they accelerate any body in this outer part of the galaxy. If we want, we could name the increase in gravity force “dark energy” or “dark matter”, but it is no additional substance.

“Black Holes” are explained as mass giants with a specific density so enormous high that a few planets like the earth would have the size of a golf ball with the same density as a Black Hole. The force of gravity of a Black Hole attracts everything, even photons (that is the reason for being black) in a certain area around the Black Hole, called the “event horizon”, practically the gravity-aura of the Black Hole. After “sucking up” everything around it, mostly bodies with lesser specific density, for billions of years, the specific density of a Black Hole would decrease so much that it had to set free the photons. The release of the over billions of years acquired photons would illuminate the universe in a burst of light unimaginable.

Black Holes are not static phenomena as explained above; Black Holes are dynamic events. As explained in the part on Dark Matter, stars in the outer part of a galaxy are accelerated to the speed of light and will accelerate stars, planets, dust and gas in their neighborhood through the immense increase of gravity force (Fig. 4), until the force of gravity is so strong that the Black Hole becomes a funnel to the fourth dimension.

The universe will not end by becoming cold and black, but with a “Big Crunch”, the reverse of the “Big Bang”. Black Holes are the local events of the Big Crunch, the compression through infinite high gravity, the loss of space. The more Black Holes appear, the closer is the Big Crunch.

The “Superstring Theory” was developed in the early 1970s. According to the theory an elementary particle is not a point but a loop of a vibrating string, and like a piano string these

basic strings do not only have one tone but many, to different elementary particles like electrons, photons, etc. corresponding harmonics or forms of vibration, meaning that these elementary particles, electrons, photons, etc., owe their existence to the subtle differences in vibration of strings and are in essence different manifestations of the same basic string. The Kaluza-Klein-Theory (Superstring Theory) explains that these basic strings are so thin, practically infinite thin, that we could call them two-dimensional, another indication that the answers to our questions concerning nuclear science lie outside the third dimension. Based on the Superstring Theory scientists conclude that -while time under ordinary conditions appears as a well defined notion- the very notion of time loses its meaning as we get closer to the Big Bang. We can not agree more.

When the universe was a fraction of a second old, it underwent a tremendous expansion by a factor greater than 10 to the power of 50, what is called the "inflation of the universe". The Big Crunch is not only the reverse of the Big Bang, but the Big Bang is also the opposite of the Big Crunch. Something, most probably some kind of pure energy from the fourth dimension crossed L4 and L3 (Fig. 4) and went from infinite high force of gravity to "normal" gravity, an unimaginable explosion of matter ($E=mc^2$; by Einstein's definition c^2 is a constant; if we do not commit any specific value to E or m , $E=m$ and as m is a potential value to E , extreme high mass is close to infinite high pure energy).

We have problems with the consequences of time travel. The "grandfather paradoxon" says, if someone travels back in time and kills his grandfather before he knew the grandmother, the time traveler erases his own existence. Time travel will take place in the "area" between L3 and L4 (Fig. 4). The time traveler will meet our world in this area, not in a "parallel universe", as some scientists suggest, avoiding the problem of the past-present conflict. But the time traveler will not be able to change anything. Although he meets the past in reality, his status is of reduced control-power over space and the third dimension. Practically speaking, if we see a person walking over the lawn of Central Park without bending one blade of grass, this person is a time traveler -or maybe if we see someone walking on water.

The philosophical aspect of the thesis could fill not one, but several books and is as old as mankind. 2400 years ago a Greek philosopher questioned, if our daily life or our dreams are reality, because we can control time in our dreams; or the question, if we have any present or are only the product of our past, two trains on the rails of time, the past pushing the future with no space between the two trains (simple example: when we open our mouth to speak, the command of the brain is already past, when we act); or the question, if Heraklit was wrong saying "panta rhei" - everything is flowing, if one claims time is frozen in the third dimension etc.

But if we accept the Universum-Verum-Theory, pieces fall in places: the defined infinite universe, the end of the universe as gravitational collapse, the Einstein-Quantum differences, the Big Bang, photo tunneling, Dark Matter, Black Holes etc.

Epilog: In spring 2004 I sent this article to different magazines, but received only negative replies. July 21st 2004 Stephen Hawking confirmed at a conference in Dublin that there are no parallel universes (Baby-universes). He explained that Black Holes "suck up" matter around them and confirmed that these stars, planets, dust, and gas are condensed to bodies with extreme high specific density and that these altered bodies will be released as a different matter from the Black Holes in a few billion years (maybe at the Big Crunch of the universe in a few billion years?). This is basically a confirmation of the Universum Verum theory: in the fourth dimension time is no irreversible motion. If lapse of time is physically insignificant, it does not matter, if anything happens today or in a few billion years.

