# Principle For The Hologram Of Gravity.

(additional title: Theoretical Prediction Of A Time Related Shift Of The 'Dark Spot' in the CMB).

Author: Dan Visser [1]

Date: May 15 2015

#### Abstract.

A theoretical mechanism is presented for the hologram of gravity. This principle turns the Big Bang-universe into an illusion. The keystone is described as refined time, which is combined with the relativistic time of General Relativity. The refined time is time smaller than the Planck-time, which is formulated in a set of formulas in the Double Torus Theory (DTT). This is a new cosmological theory, which predicts a rotating Time Torus Universe (rTTU). In this particular article the formulations are also extended on how the rotation of the DTT-universe is calculated and can be detected by a shift of the dark spot in the CMB.

## Details of entanglement of two photons in the Double Torus Theory cosmology.

In January 2011 I wrote an article about a sub-quantum mechanism describing how two photons are entangled in the Double Torus Theory (DTT) [2]. The DDT is a new cosmological theory, which predicts a rotating Time Torus Universe (rTTU). Now I use those former results to describe how a 'hologram of gravity' emerges from a rotating time-torus universe. The related dynamics are independent on how large in time two photons are separated. I deliberately do not mention space-separation, because in the time-torus universe space is illusionary. The time-torus universe encloses the illusive Big Bang universe. The Big Bang universe is caused by holographic gravity.

In this particular article I describe how in new physics an amount of surfaces below the Planck-scale relate to an angle-velocity in known physics. The result of the description is a shift-value for a shift of the *black-spot in the CMB*, which can prove the rotation of the time-torus universe. This also called 'dark spot' is observed by the WMAP and Planck-satellites. The detection by astronomical observations should therefore be possible in the Cosmic Microwave Background (CMB).

The entanglement of two photons in the DTT is expressed by (m<sub>t</sub>), which is a spin in a surface-flow of a rotating time-torus universe. This mass is calculated at a value of  $\approx 2.6~x~10^{-34}$  [(J.s)  $m^2/s$ ] per  $2\pi$  rad. This is a representation of energy in a torus-geometry that connects two photons through a domain that is deeper embedded in level below the Planck-scale. In other words: Out of the box of General Relativity. Comparing (m<sub>t</sub>) to the equivalent relativistic energy of the Planck-mass (in Joule), it then represents 1.376 x  $10^{-43}$  [m²/2 $\pi$  rad]. That is a tiny circle-surface per  $2\pi$  rad, which is located out of the box of General Relativity.

However, In order to match the principle of one undividable quantum-unit (=1), a inverse value can be represented for an amount of circle-surfaces with a value of 0.73 x  $10^{43}$  [ $2\pi$  rad/m<sup>2</sup>]. In the referred article this is named as idtt's (inter-dimensional-time-translations)<sup>[2]</sup>. A movement in the entangled domain is therefore determined by the idtt's. The movement exists of an amount of 'time-surfaces below the Planck-time'. In figure 1 is shown how the idtt's are the

principle for generating a hologram of gravity. Contrarily to all other current theories, the Double Torus Theory therefore extends relativistic time with time smaller than the Planck-time, and that is the keystone to emerge a 3-dimensional sphere of space-time, such as the Big Bang is. In figure 1 the principle of a hologram of gravity is shown.

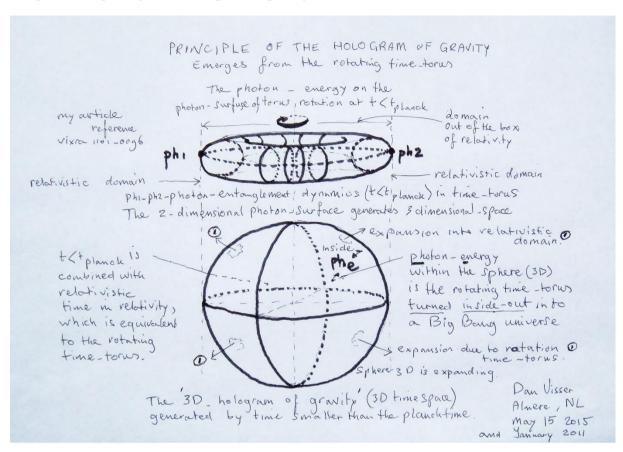


Fig.1: The principle of the hologram of gravity.

# Connection of the time-torus and the illusive Big Bang leads to rotation of the time-torus.

Here will be worked-out how the movement of a circle-surface is described as the combination of idtt-surfaces (the amount  $A_{idtt}$  in time-torus cosmology) and velocity (v) determined by the angle-velocity in Big Bang cosmology):

$$O_{rotate} = v \times A_{idtt} \tag{1}$$

$$O_{rotate}$$
 is the rotation (0) of the time-torus. (2)

$$v$$
 is determined by the angle-velocity  $v = \frac{2\pi}{T} r \left[ \frac{rad}{s} \right] \implies v = \frac{r}{T} \left[ \frac{2\pi rad}{s} \right]$  (3)

A<sub>idtt</sub> is a surface 'out of the box of General Relativity'.

$$A_{idtt} = 1.376 \times 10^{-43} \left[ \frac{m^2}{2\pi rad} \right]$$
, and is calculated in the referred article [2], wherein the index

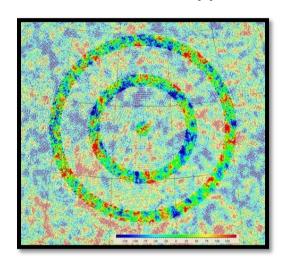
'idtt' are the inter-dimensional-time-translations. (4)

The radius (r) is the radius of the time-torus earlier calculated [3] at a value of  $10^{52}$  [m], (5) which is, by the way, much larger than the radius (r) of the Big Bang universe of  $10^{26}$  [m].

(T) is the orbit-time belonging to the time-torus, which I earlier calculated on T = 35,000 Billion years. (6)

Notification (a): T = 35.000 Miljard year in dutch-terms. Notification (b): One billion year is  $10^9$  x  $365 \times 24 \times 3600$  [s] =  $10^9 \times 0.31536000 \times 10^8 = 0.31536 \times 10^{17}$  [s]. This is:  $35 \times 10^3 \times 10^9 \times 0.31536 \times 10^{17}$  [s].

<u>A further explanation of (T)</u>: In my first book, which was published in April 2014, I embedded a calculation of the orbit-time (T) in the text of the book. The book was printed as five collector-



items. Now I give the references and calculation of (T) in this article. It refers to the *Concentric circles discovered in relation to another theory.* The Concentric circles' in the CMB are shown in figure 2. This was firstly published by R. Penrose and V.G. Gurzadyan. However, R. Penrose declared on the opening of the symposium of the 'platform mathematics' in Leiden, the Netherlands, on May 14 2011, that the CMB comprehends about 350 circles in the CMB. Their discovery had a sigma-6 notification, which means is 100% certainty. Despite this discovery the community of cosmologists and physicists rejected their Conformal Cyclic

Cosmology(CCC) theory, because it is a threat for the Big Bang cosmology.

Fig. 2: The concentric circles originally are proposed in the CCC-theory of R.Penrose and V.G.Gurzadyan (source article: Arxiv 1011.3706 Conformal Cyclic Cosmology (CCC). In total about 350 of these concentric circles are detected experimentally by the Boomerang- and WMAP-satellite data. The CCC-theory claims the Big Bang and cosmic inflation are unnecessary by assuming these circles are due to super-black hole-collisions from an earlier universe ('aeon'). I think the circles can fit in the rotational dark matter torus of the Double Torus Theory. My new formula for dark matter-force shows the dimensions for rotation and such circles.

The publication of the concentric circles gave me the insight, that 350 concentric circles were a token of 350 Billion years per % visibility of matter. I understood the meaning related to 4.45% visibility of visible matter in the universe, because I earlier had calculated that procent-value in two different ways. Firstly in my sub-quantum-manifest (see my website [5]) and secondly in my article "window for the visible matter in a rotating time-tors universe" [6].

The calculation is: 
$$\frac{15.575[billionyears]}{\left(\frac{350[billionyears]}{\%visibility}\right)} x100\%visibility = 4.45\%visibility \tag{7}$$

Here is taken into account, that the Big Bang is 1.775 billion years older than the age of the afterglow of the Big Bang in conventional assumptions. From the afore mentioned given dataparameters the rotation of the time-torus can now be calculated, as follows:

$$O_{rotates} = v \times A_{idtt}$$

$$O_{rotates} = \frac{10^{52}}{35 \times 10^{3} \times 10^{9} \times 0.31536 \times 10^{17}} \left[ \frac{2\pi rad}{s} \right] x1.376 \times 10^{-43} \left[ \frac{m^{2}}{2\pi rad} \right]$$

$$O_{rotates} = 12466 \times 10^{-25} \left[ \frac{m^{2}}{s} \right]$$

$$O_{rotates} = \frac{\left(111.6 \times 10^{-5} \left[ m \right] \right)^{2}}{s}$$

$$O_{rotates} = \frac{\left(1116 \left[ \mu m \right] \right)^{2}}{s} = \frac{\left(1.12 \left[ mm \right] \right)^{2}}{s}$$

$$O_{rotates} = \frac{\left(1116 \left[ \mu m \right] \right)^{2}}{s} = \frac{\left(1.12 \left[ mm \right] \right)^{2}}{s}$$

In order to imagine the above surface in [mm<sup>2</sup>] the rdius can be calculated as:

$$(1.12[mm])^{2} = \pi (r_{sub})^{2} \Rightarrow (r_{sub})^{2} = \frac{(1.12[mm])^{2}}{\pi}$$

$$r_{sub} = \frac{1.12}{\pi^{0.5}}[mm] \Rightarrow D_{sub} = \emptyset = \frac{2.24}{1.772}[mm] = 1,264[mm] \cong 1.3[mm]$$
(9)

A circle-surface with a diameter ( $\varnothing$ ) of approximately 1.3 mille-meter flows per second in a surface of a rotating time-torus.

## Detection of the rotation of the time-torus universe.

The rotation of the time-torus universe is marked by a circle-surface with a diameter of approximately 1.3 mille-meter, which flows per second at the surface of the rotating time-torus, as follows. How can that be detected? The detection is possible by observing the CMB (the Cosmic Background Radiation). There is a 'black-spot' in the CMB. That can be used. During the rotation of the observer's sub-time-torus, the angle towards the 'black spot' is changed by the angle-velocity . This enlarges the diameter of the circle-surface that flows (per second) in the observer's horizontal time-line of its time-torus. However, the enlarged diameter looks like expanding space-time, but it isn't! The expansion is illusive, because space-time is illusive (see fig. 1) through the emergence of holographic gravity. Moreover the black-spot can never be enlarged either, because for the CMB in terms of afterglow, this is also a time-torus at another

time-line in the rotating time-torus universe. So, as a consequence it will be the 'black-spot' that is shifted with the enlarged diameter!

The enlarged diameter is calculated as follows:

$$\varnothing \left[ \frac{1.3mm}{s} \right] = \varnothing \left[ \frac{1.3x0.31536x10^8 \, mm}{0.31536x10^8 \, s} \right] = \varnothing \left[ \frac{\simeq 41km}{1year} \right] = \varnothing \left[ \frac{\simeq 410km}{10year} \right] \tag{10}$$

# Shift of the 'dark spot' (black-spot) in the CMB.

I calculated that the enlarged diameter will shift the 'dark-spot' in the CMB with approximately 410 km in 10 years. This is almost the distance Amsterdam-Paris. For a longer period this can be further enlarged. Astronomical experiments to detect that are suggested. In the afore chapters was explained that the illusive Big Bang space-time is part of the rotating time-torus. Therefore many parallel time-lines horizontally rotate as sub-time-tori in the entire rotating time-torus system. That is what parallel universes are. The 'dark spot' is an empty-centrum in the time-torus geometry. An independent observer would be able to observe that 'empty centrum'. The Planck-satellite has confirmed the WMAP satellite-data by detecting the 'black-spot' in the CMB. Figure 3 visualizes the 'shift of the dark spot'.

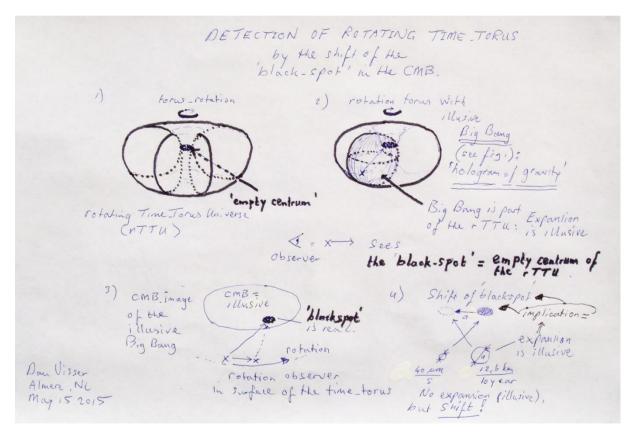


Fig. 3: Detection of the rotation of the time-torus by a shift of the 'black-spot' in the CMB. The black-spot is the 'empty-centrum' of the torus-geometry. The black-spot ('dark spot') is really detected in the CMB-image by the WMAP- and the Planck-satellite.

### Conclusions.

- 1. The principle for a hologram of gravity is related to time below the Planck-time in the Double Torus Theory and emerges an illusionary Big Bang space-time.
- 2. The rotation of the time-torus universe can be calculated by a flowing circle-surface (per second) anywhere in the surface of an independent time-line of the time-torus.
- 3. The 'dark spot in the CMB' should shift as a consequence of the rotation of the timetorus. The 'dark spot' is the 'empty-centrum' the CMB' (which is overlapping a correlated large void much closer by in the illusive space of the Big Bang cosmology). This also correlates to the 'empty-centrum' in the time-torus, which is due to a 'standard' torusgeometry. The 'dark spot' shifts with a value of 410 km in 10 years; or more in the same ratio with time). Is technology able to measure that?

### References.

- [1] The author lives in Almere, the Netherlands: Contact by email <a href="mailto:dan.visser@planet.nl">dan.visser@planet.nl</a>; fixed phone: +31 (0)36 5499701 or mobile phone: +31 0642183322.
- [2] www.vixra.org/abstract/1101.0096: Entanglement related to cosmology-TTM.
- [3] www.vixra.org/abstract/1408.0188: Dark matter time-clock faster than light in vacuum.
- [4] www.vixra.org/abstract/1405.0306: Eternal Rotational dark torus suggests visible Big Bang in Double Torus Universe.
- [5] www.darkfieldnavigator.com : website Dan Visser.
- [6] www.vixra.org/abstract/1412.0211: Window for the visible matter in a rotating time-torus universe.