

# Black holes and astrotheology

## Introduction

In this paper, I present some calculations on Black Holes as seen from Astrotheology Mathematics. The goal is to fit Black holes into the theory of Astrotheology. It seems from the calculations, that the extra mass (which is Hydrogen) is crated from the reaction of light and the Ether. The Energy level tops out at  $c=2.99792$  ( $P.E.=Mc^2=Mass$ ) The speed of light should be a perfect 3.00000, but we know it isn't. When this energy level reacts with the Ether, the 30-60-90 triangle has one of its legs exceeded ( $>\sqrt{3}$ ) and mass is formed ( $dM/dt > 2$ ). This is where all that mass in a Black Hole comes from. It's hydrogen produced by a energy singularity (Figure 1). Now because Black Holes have a horizon, it must be the point where  $>2.99792$  or  $E=hv=6.626v=3^2-2.99792^2$   $V=.903-0.707=196=Infinity$ . 196 is an infinite number.

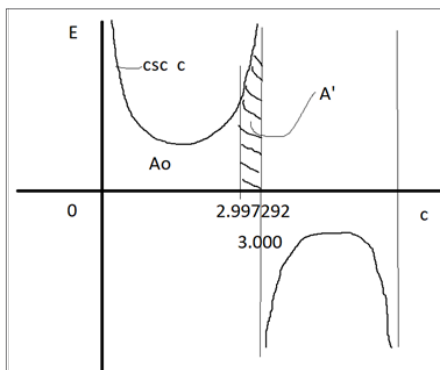


Figure 1 Plot of CSC x the speed of light.

$$\int csc\theta = -Ln |csc\theta + cot\theta| + C$$

From 0-3.000

$$= -Ln|csc 3+cot 3|+0 - -Ln|csc 0+cot 0|+0$$

$$=2.632+4.3358$$

$$=6.9678$$

$$\sim 7$$

Multiply by 2

$$7 \times 2 = 14$$

From 0-2.9979292

$$= -Ln|csc 2.9979+cot 2.9979|+4.3358$$

$$= -Ln|19107+1908|+4.3358$$

$$=9.95299+4.3358$$

$$=14.28$$

$$= 1/7$$

Multiple by 2

$$1/7 \times 2 = 2/7$$

$$14 - 2/7 = 14 - 2.857$$

$$114.3$$

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## Inverse

$$1 / 11143 = 0.089742 = 2.9956^2 = c^2$$

$$= c \times E$$

$$= c(mc^2)$$

$$= c(c \times c^2)$$

$$= c^4$$

$$= 81$$

$$1/81 = 0.12345679 = Mass$$

Now,

$$E = Mc^2$$

$$Eac^2$$

$$E=hv$$

$$3.000^2 - 2.99792^2 = 6.626007004 v$$

$$v = 0.903$$

$$0.903 - 0.707 = 196 = \infty$$

And,

$$E=1/100138=0.9986$$

$$E=hv$$

$$=0.9986/6.626=150 = Mass Gap$$

$$\int F - \int P = 4.14 \text{ Ionic Bond Energy}$$

$$\int F = Ma = 4.14 - Mv$$

$$M(a-v)=4.14$$

$$M-4.14/196=2.1122$$

$$P.E=Mc^2$$

$$=1.89$$

$$1/1.89=56.77=3.01 \text{ rads}$$

$$3+1=401=Re$$

$$E=4.14 \times 6.023=1/401=1/re=1/t=E$$

$$401 \times 2\pi = 251.9 = \text{Period } T$$

$$F = G M_1 M_2 / R^2$$

$$2.657/6.67=396=1/T$$

$$E=4.14 (6.036)=1/401=1/Re=1/t=E$$

$$E=h\nu$$

$$1/401=6.626 (\nu)$$

$$\nu = 2.657 \sim 2.666 \text{ Superforce}$$

$$4.14/196=2.1122 \text{ (from above)}$$

$$2.1122/ (1+1.6183)=807$$

$$= c^4 = 2.99792$$

Thus the speed of light is mathematically related to the roots of the golden mean parabola; to the Super force; and to mass (Figure 2) (Figure 3).

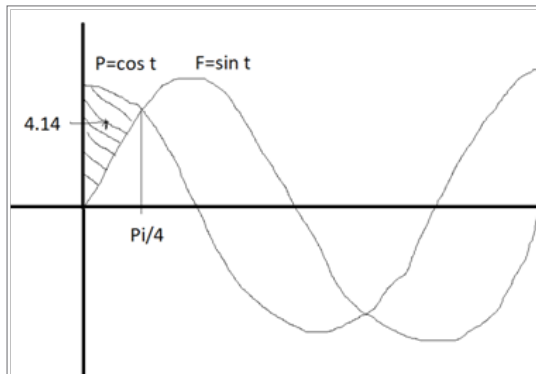


Figure 2 Showing the bond strength area between force and momentum.

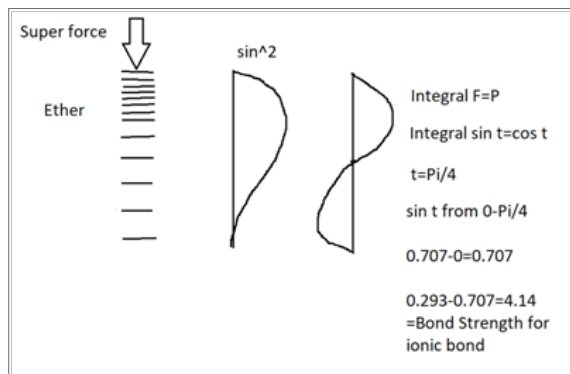


Figure 3 Compression of the ether by the superforce yields ionic bond strength.

$$E \times t = |E| |t| \sin \theta$$

$$E \times s = |E| |s| \sin \theta$$

Divide one by the other:

$$t / s = t / s \sin \theta$$

$$\sin \theta = 1$$

$$\theta = \pi / 2, ..$$

And, Mass is the dot product, when Mass=0

$$E \cdot t = |e| |t| \cos \theta$$

$$E \cdot s = |E| |s| \cos \theta$$

$$\theta = \pi / 2$$

$$M=4.14/196$$

$$= 4.14 / \infty$$

So the mass is of a particle that has zero mass (photon, graviton) that travels at the speed of light (Figure 4).

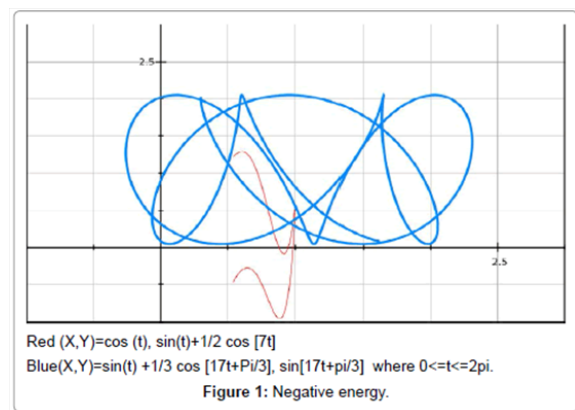


Figure 4 Universal signature derived from the universal parametric equation.

$$M=4.14/196=2.1122$$

$$P.E. = Mc^2$$

$$=2.1122 (9)$$

$$=1.89$$

$$1/189=52677=3.01 \text{ rads Speed of light.}$$

1/Mass=Temperature of a Black Hole, which equals 52.67, or 220.5 K

$$\int x^2 - x - 1 dx \text{ from } 0.618 - 1.618$$

$$=1514+ 348$$

$$=186.23$$

$$\sim 189$$

$$E/t=2.1122/1.618=1305$$

$$2.1122/0.618=3.477$$

$$E=2.1122$$

$$E / c^2 = 23.50 = Ln \pi$$

**Universal parametric equation**

$$\sin t + 1 / 3 \cos [17t + \pi / 3], \sin \{17t + \pi / 3\}$$

Let t=0.618, 1.618

$$99.05 \times 321.02 = 31.8 = \text{freq} = 1 / \pi$$

Finally,

$$E / t = P.E. / K.E. = Mgh / 1 / 2Mv^2 = 2gh / v^2$$

$$2(2.667)(4/3) / (2.667)^2 = 1$$

$$E/t=1$$

$$E=t$$

$$\int \ln t \, dt = t \ln t + t + C \text{ from } 1 \text{ to } \pi$$

$$=145.46$$

$$1 / 145.46 = 1.24 \sim E_{min}$$

$$1.4546 + 150 = 2.9547$$

$$=1.338$$

$$=1/3 \text{ rads}$$

For double the profile:

$$1/3 + 1/3 = 2/3 = 6.67 = G$$

The event horizon is where  $time = \pi$ .

Before  $t = \pi$ ,  $c > 2.9979$

For the Universal Parametric Equation, at the first singularity point (Figure 5).

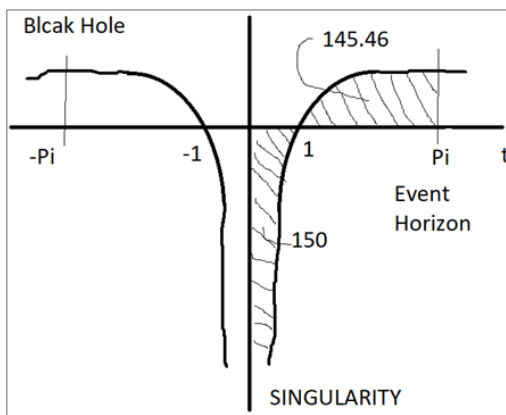


Figure 5 The black hole singularity.

$$\sin t + 1/3 [\cos 17t + \pi/3], \sin [17t + \pi/3]$$

For  $t=0.618$

$$0.9905 + 2.00268$$

$$= 2.99318 \sim c$$

Similarly for  $t=1.618$

$$32102 + 4479$$

$$= 365.81$$

$$\text{For } 0.9905 \times 32102 = 31.8 \text{ Hz} = 1 / \pi$$

For the ln function the derivative = 1 at  $t=1$ ,  $E=0$

If the Mass Gap =  $1.5 \times G = 1.5 \times 2/3 = 1$

So gravity is 6.67 to the right of  $t=1$ ; and  $d$  it is  $\infty$  to the left. Thus, the black hole.

$$\text{Area} = \pi R^2$$

$$= \pi (1)^2 = \pi$$

$$= E \times t \times s$$

$$= 1 \times \pi \times 4/3 = 4/3$$

$$\text{Volume} = 4/3 \pi R^3$$

$$= 4/3 \pi (1)^3$$

=Area

$$\int \int \ln t = \int \int d^2 E / dt^2$$

$$\int x \ln x + x = E$$

$$x^2 / 2 (x \ln x + x^2 / 2)$$

$$= x^3 L : n x + x = 2E$$

$$\text{Let } x = t = \pi$$

$$\pi^3 \ln \pi + \pi = 2E$$

$$E = 193.17$$

### Cusack's equation form above

$$M \int \ln x = G + \text{Period } T$$

$$x \ln x + x = 0.66667 + 0.2513 / M$$

$$M = 1 / 2., 71 \sim 1 / e^t$$

$M1/M = \text{Temperature of a Black Hole}$

$$e^{-\pi} = 0.4233 = cuz$$

$$e^{\pi} = 221.4$$

Kelvin

$$273.15 - 221.14 = 193.23 = E \text{ from above}$$

Volume of a Black Hole

$$= 2\pi \ln t$$

$$= 2\pi \ln \pi$$

$$= 7.19$$

### For the collision of 2 black holes

$$7.19 \times 2 = 1438$$

$$1 / \text{Vol.} / \text{Temp} = 1 / 1438 / 221$$

$$= 3.1466 \sim \pi$$

$$\text{Temp} / \text{Vol} = \pi$$

$$Vol. / Temp = 1 / \pi = 31.8 \text{ Hz}$$

But we know that the inverse of the mass of a Black hole is its Temperature.

$$1/M=Temp.$$

$$1 / (M) \text{ vol.} = \pi$$

### Cusack's equation

$$M \int Ln t = G + Period T$$

$$1 / (\pi \times Vol) \int Ln t = G + Period T$$

$$1 / \pi \times 1 / Vol. \int Ln x = 6.67 + 251$$

$$1 / [G+T+\pi] \int Ln t = \pi$$

$$1 / [6.67+251+\pi] \int Ln t = \pi$$

$$x Ln x + X = \pi (1.006)$$

$$e^x x + e^x = e^{0.3161}$$

$$e^x [x+1] = 85.92$$

$$xe^x + e^x - 85.92 = 0$$

$$x^2 e^{x+xe} - 85.92 e^x = 0$$

$$x^2 + x - 85.92 = 0$$

### Roots

$$x=6.22, 5.22$$

$$\Delta Temp = 52.2$$

$$273.15K - 52.2 = 221 = Temp.$$

$$273.15 K - 62.2 = 211 = 2.1122 = E$$

$$\text{Volume of a Black Hole} = 2\pi (Ln x)$$

$$= 2\pi (Ln 87.82)$$

$$= 0.816$$

Things are chiral inside a Black Hole.

### Conclusion

We see that black holes fit mathematically into Astrotheology.

### Acknowledgements

None.

### Conflict of interest

The author declares that there is no conflict of interest.

### References

1. Cusack PT. Astrotheology, Cusack's Universe. *J of Phys Math*. 2016;8.
2. Cusack PT. The Universal Parametric Equation. *J Generalized Lie Theory Appl*. 2017;11(1).