

# Re: Formula for Decelerating Light

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*Source:* <http://sci.tech-archive.net/Archive/sci.physics/2008-05/msg00444.html>

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- *From:* [jjsajd@xxxxxxxxxx](mailto:jjsajd@xxxxxxxxxx)
  - *Date:* Mon, 5 May 2008 13:12:15 -0700 (PDT)
- 

On May 5, 1:07 pm, Michael Helland <mobyd...@xxxxxxxxxx> wrote:

On May 3, 5:02 pm, jjs...@xxxxxxxxxx wrote:

On May 3, 5:15 pm, MichaelHelland<mobyd...@xxxxxxxxxx> wrote:

On May 3, 1:26 pm, jjs...@xxxxxxxxxx wrote:

On May 3, 5:58 am,  
MichaelHelland<mobyd...@xxxxxxxxxx>  
wrote:

On May 2, 11:20 pm,  
jjs...@xxxxxxxxxx wrote:

On May 3,  
12:26 am,  
MichaelHelland<mobyd...@xxxxxxxxxx>  
wrote:  
<snip>

Show a  
derivation  
of your  
formula....

## Re: Formula for Decelerating Light

Instead of calculating a Hubble distance, calculate Hubble time instead.

Expansion time and deceleration time are identical, because  $f = 1/t$ .

Unlike Uncle Al I am interested to know where you dug these numbers up from  
 $v = 1 - (t * (20 * 1.05702341) * 10^{-13})$   
like the 20 and 1.05702341...

The Hubble's Parameter is about 20 km / Mly

Actually try 71 km/s/Mpc

71 for megaparsecs, 20 for million light years.

That's the 20, and the  $1.057 * 10^{-13}$  converts km into light years.

435 364.304 m / s is what it should be

1 kilometers =  $1.05702341 \times 10^{-13}$  light years

20 km should be  $20 * 1.05702341 \times 10^{-13}$  light years.

I think I fucked up, because it should be in million light years.

## Re: Formula for Decelerating Light

So that would really be  $10^{-19}$ ?

So actually your math is total wrong as are some of your units and your numbers...

But the concept is solid.

Think of Hubble Law, and think of Hubble's parameter as a parameter of expansion.

You can redefine the expansion parameter in to a deceleration parameter, with the units  $\text{km/s}^2$ , then you have:

$$v = c - (t * H)$$

Read this:

[http://en.wikipedia.org/wiki/Hubble\\_parameter#Derivation\\_of\\_the\\_Hubble\\_parameter](http://en.wikipedia.org/wiki/Hubble_parameter#Derivation_of_the_Hubble_parameter)

Hubbles law and parameter are a bit more complex then that.

Cheers

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