

Re: The velocity of light going pass a moving train.

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- *From:* "Gerald L. O'Barr" <globarr@xxxxxxxx>
 - *Date:* Thu, 21 Jun 2007 18:32:47 -0700
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Subject: Re: The velocity of light going pass a moving train.

Sue... <suzysewns...@xxxxxxxxxxxx> wrote:

BZ <WQAHBGMXS...@xxxxxxxxxxxx> wrote:

Dono <s...@xxxxxxxxxxxx> wrote:

....

<many deletes by O'Barr>

Sue... <suzysewns...@xxxxxxxxxxxx> wrote:

Now! I nominate you to explain why we can't see light on its journey from the sun to the moon and why raindrops viewed from a moving car don't take longer to hit the ground in spite of the diagonal path. >:-)

O'Barr comments:

Why can't we see light moving from the sun to the moon? We cannot see light moving from the sun to the moon, when we are not in the direct line of motion, because in this specified region exists pure ether, which by theory is a perfect carrier of light. Thus, if any portion of this light were being deflected all along its path, so that we could in a sense observe it, then the ether would not be what it is by theory, and light would follow a much greater rate of fall-off than just $1/r^2$. So Sue, what else could it be, than exactly as it is?

And why would rain change its rate of vertical fall? It is just like the old game where you shoot a bullet out of a gun in a horizontal direction, and

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drop a bullet at the same time, which bullet hits the ground first? The greater horizontal velocity of a bullet does not in principle interfere with the vertical relationships that are present. And also, any real observer will note that there is a wind that is causing the rain to move horizontally, and the force of gravity will still be there to keep the vertical fall the same.

So, Sue, do you want to add any second order effects to any of this?

Additional O'Barr comments:

When we on this earth, in going around the sun, we find that between summer and winter, the location of stars shift due to the fact that our speed was first in one direction, and then in another direction.

This angle is slightly different between classical and SR. And one reason why there is a difference is because the tools being used do change with changes in our motions. But in the train example, during the problem, the tools being used by those in the train remain constant, and the tools being used in the frame of the tracks remain constant. Thus, we should be sure that we are understanding the differences here as to what change in angle is actually being measured.

To repeat: The angle that is measured in the frame of the track is exactly classical, and it does not matter how fast the train is moving. The correct vector analyses is the simple absolute velocity of light, c , and the absolute velocity of the train, v , and what these vectors produce is what will be measured in the track frame. The only problem is in knowing the exact angle of the light, and this certainly is not hard to know, as it has been correctly stated.

Thanks for reading.

Gerald L. O'Barr <globarr...@xxxxxxxxxx>

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