Re: rpasken@eas.slu.edu , You have made comments that Momentum is not Conserved in my PAPER. It is not CORRECT. It is explained in 100 Years of E=mc2

Source: http://sci.tech−archive.net/Archive/sci.astro/2006−10/msg00004.html

- *From*: "AJAY SHARMA" <devianju@xxxxxxxxx>
- *Date*: 2 Oct 2006 17:42:58 −0700

CeeBee wrote:

> "AJAY SHARMA" <devianju@xxxxxxxxx> wrote in sci.astro:
>
> <snip spam>
>
> So you think constantly changing your e−mail to circumvent spamfilters will succeed. Good. Keep it that way.
>
> At least it makes clear what you are. A rotten spammer. Get lost, idiot.
>
> −−
> CeeBee
>
> *** Democracy is not a spectator sport ***

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Robert Pasken
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rpasken@xxxxxxxxxx , You have made comments that Momentum is not Conserved in my PAPER. It is not CORRECT. It is explained in 100 Years of E=mc2

rpasken@xxxxxxxxxx
See how Momentum is conserved in my paper. All references are given in the end.
Part I
General meaning , explained in 11th class Physics.

The law of momentum conservation,
* In an isolated system, the momentum of system must be conserved.*

Mathematically implies that
Initial Momentum = Final Momentum
mu=mv (1)
As mass remains same in classical mechanics.
So u=v
which is Newton s First law of motion.

Application of momentum conservation.
When body emits energy (in this cases light energy)
then it recoils .Thus it is used to calculate the velocity of recoil.
It can be applied to following two cases.

−−−−−− Light bullet fired from TOY Gun, system remains at rest.
(body does not recoil with noticeable velocity, it tends to recoil)
The velocity cam be calculated but may be of the order of
1/10000000000000000000000000000000000 m/s or 10−^40m/s
This case resembles with Einstein s two waves of equal energy emitted in opposite directions.

−−−−−Shot fired from gun, gun moves backward.
the velocity can be calculated from conservation of momentum i.e.

initial momentum =final momentum
Vrecoil = mv/M ~ 5m/s (say)
Thus after emission of energy BODY MAY REMAIN AT REST OR MOVE, the Momentum is Conserved. It is basic physics of 11th standard.
If some one does not want to understand this then it his problem.
Einstein did all calculation under Classical conditions of velocity (v <<c, her v is relative velocity between two systems i.e. system in which body emits light and second system in which energy is measured.

Part II
The law of conservation of momentum is obeyed in my paper.

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When two waves are emitted. The body recoils with velocity v , with magnitude of the order of 10^−32 m/s i.e.
V (recoil)=1/10000000000000000000000000000000000000000000000000000
It can be easily calculated.

When two waves of different energies are emitted. If body emits two light waves of slightly different energies i.e. 0.5001L and 0.4999L (Einstein has used light waves of energy 0.5L and 0.5L) in opposite directions. Now using the law of conservation of momentum, it can be easily justified that in this case body remains at rest.

Let the body of mass 10kg
emits light energy in two waves in visible region equal to
7.9512×10^−19 J, this energy corresponds to TWO light waves in
visible region having wavelength 5000ºA or energy, 2hc/» or
7.9512×10^−19 J.
Let towards the observer the body emits light energy 0.5001L i.e.
3.97639512×10^−19 J i.e. will have momentum (p1 = E/c)
1.32546504×10^−27 m/s.
Secondly, the body emits light wave of energy 0.4999L i.e.
3.97480488×10^−19 J, away from the observer (Æ= 180º) i.e. will
have momentum (p2 = E/c) 1.32493496×10^−27 m/s. Let us assume that
when the body emits light waves of energy and moves (if it actually
does) with velocity Vb , then according to law of conservation of
momentum we get
0 = p1 +p2 +MbVb or Vb = −(p1 +p2) /Mb =
.3×10^−32 m/s (2)
0 = p1 +p2 +MbVb or Vb = −(p1 +p2) /Mb =
.3×10^−32 m/s (3)
Thus conservation of momentum requires that body should move with
velocity .3×10^−32 m/s opposite to observer. Thus body will
tend to move with velocity 5.3×10^−32 m/s (away from the observer)
which is immeasurably small by all means, hence the body remains at
rest. Due to this uniform relative velocity v of the system (¾, ·, ¶
) will not change, if body moves then v will vary accordingly.
=========Einstein s Sep 1905 paper==========
The first and basic equation in Einstein s paper is
l* = l{1 v/c cos Æ } / [1 v2 /c2] (1)
In eq.(1) v is the relative velocity between light emitting body and
the measuring system i.e. system (¾, ·, ¶). If body moves after
emission with velocity v away from the observer, then relative
velocity will be v+v (say V). Thus in this case eq.(1) becomes
* = {1 (v+v) cos Æ/c } / [1 (v+v)2 /c2]
(1a)
The rest of the calculations remain the same. Thus Einstein s
derivation is also valid if the body moves, Einstein has considered the
simplest case when velocity v is zero (V= v+v =v), which is
special case. Also experimentally the law of inter conversion of mass
energy holds good in all possible cases.

Hence you cannot say that LAW OF CONSERVATION OF MOEMTUM IS NOT TAKEN
IN ACCOUNT IN MY PAPER.
It is your MISPERCEPTION.

AJAY SHARMA 2ND Oct 2006

References of Einstein s work
..
A.Einstein, Annalen der Physik 18 (1905) 639−641.
.. DOES THE INERTIA OF A BODY DEPEND
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Weblink is

Einstein s 27 Sep 1905 paper available at
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PartII
References of Ajay Sharma s work

My work is available at
A. Sharma, Physics Essays, 17 (2004) 195−222.
The Origin of Generalized Mass−Energy Equation DE = Ac2 DM; and
its applications in General physics and Cosmology .
http://www.burningbrain.org/pdf/ajaysharma_einstein.pdf
For details
https://www.novapublishers.com/catalog/product_info.php?cPath=23_48_324&products_id=4554

International Conferences
It has been accepted for presentation over 55 conferences all over the
world
−−−few of them
1. Sharma, A. presented in 19th International Conference on the
Applications of Accelerators in Research and Industry , 20−25
August , 2006 Fort Worth Texas, USA

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Euro physics Conference) Isachia (Naples) Italy (2006) 53.

3. A. Sharma , Abstract Book , A Century After Einstein Physics 2005 ,

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ENGLAND

5. A. Sharma,. Proc. Int. Conf. on Computational Methods in
Sciences and Engineering 2003 World Scientific Co. USA ,
(2003) 585.

6. A. Sharma, Proc. Int. Conf. on Number, Time, Relativity United
Physical Society of Russian Federation, Moscow , (2004) 81
plus more
−−−
Journals
This paper
The Origin of Generalized Mass−Energy Equation DE = Ac2 DM; and
its applications in General physics and Cosmology .
is published in journal
Physics Essays , CANADA
www.physicsessays.com
The paper

The past ,present and future of E=mc2
will be published in 2007 Galilean Electrodynamics, Massachusetts,
USA.
In parts it is published in various others journals.
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Book 100 Years of E=mc2
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