Re: Review of Mueckenheims book.

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- *From*: mueckenh@xxxxxxxxxxxxxxxxx
- *Date*: 23 Feb 2007 00:56:15 −0800

On 22 Feb., 19:30, "MoeBlee" <jazzm...@xxxxxxxxxxx> wrote:

> On Feb 22, 5:08 am, mueck...@xxxxxxxxxxxxxxxxx wrote:
>
>> On 21 Feb., 21:50, "MoeBlee" <jazzm...@xxxxxxxxxxx> wrote:
>>
>>> Are you talking about Skolem's paradox now? First, what
>>> identity
>>> mapping are you referring to? There always exists a bijection
>>> of a set
>>> onto itself. As to other mappings, they exist or they don't as
>>> provided by the axioms of the theory. And we have to be
>>> careful to be
>>> specific as to what requirements we place as to in WHICH
>>> sets a
>>> mapping does or does not exist.
>>
>> In any model of ZFC: With the empty set there exists the set omega and
>> with it is power set, and with it the identity mapping of the power
>> set onto itself
>
> It is not excluded "a priori" that a model of ZFC might not map '0' to
> the empty set, 'w' to omega, or even 'e' to the membership relation.

Every model of ZFC has the empty set, has omega and has P(omega) let
alone the "element of" relation. Otherwise it is not a model of ZFC
including the three important axioms.

> Anyway, the identity function on the power set of omega is a bijection
> from the power set of omega onto the power set of omega, yes, we know
> that.

And if there is a model of ZFC without this identity function, then this raises the question, whether this identity function is in other models. Every set theorist believes that the identity mapping of R exists in current mathematics − perhaps without reason?

> > ZFC is not a theory of physics. I don't know much about the Tarski−
> > Banach theorem, but I have not read that it entails anything contrary
> > to physics. As I understand, the theorem does not render that a
> > PHYSICAL object may be perform in the way the ABSTRACT object in the
> > theorem performs.

> It is about geometry. Geometry is about physics.

Geometry is USED for physics. That does not entail that all geometry has a direct object−by−object correlation with physics.

Geometry is developed from physics and can be applied to physics.

> If the dissection as
> proven possible by Banach and Tarski (but, of course, not concretely
> defined −−− see well ordering of the reals) could be applied in
> geometry, then it could be applied in physics.

Only you could say how YOU would apply it. Meanwhile, other people are free not to apply it the way YOU apply it.

I can apply it. And if I knew the trick of Banach Tarski (if they themselves knew it which they don't) then we could make money or distroy the world or do whatever is desirable or undesirable.

> Obviously this result
> of set theory contradicts set theory (more precisely: the axiom of
> choice) for anybody who is not a strong believer without a critical
> sense or the wish to accept the truth.

> More empty rhetoric by you. No P and ~P in set theory do you adduce.

P: X is one ball. ~P: X is not one ball. That is a contradiction.
There is no need to dig deeper.

> > As far as I remember you wanted to do some proofs
> > concerning the binary tree, which from my diskussion with Dik should
> > be clear to anybody.

> There've been a lot of posts I've made to you regarding things other
> than your tree. I wasn't talking about the tree. But as to the tree,
> you completely miss my point about that, even as I BELABORED it: I was
> willing to discuss your tree argument with you IF you would give me
> the courtesy of FIRST telling me what the ground rules are,
> specifically whether you were claiming to work strictly in a Z set
> theory

If you will work on it, you may do it in ZFC.

I for my part see that every path existing in the tree cannot exist
without an edge where it splits off from the rest of the tree,
whenever it splits off. Hence there cannot be more paths than edges,
or in other words: the number of existing paths is not larger than the
number of edges.

This reasoning is basic to thinking and prior to any theory like ZFC.

Regards, WM

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