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# ANTENNA



Issue 23 - 2006

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Welcome to the next edition of Antenna.

I didn't know what to do for a topic, so I decided to look at Intelligent Design again.

A bit of a hodgepodge this issue

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## Intelligent Design - II

Intelligent Design was brought up in the last Mercury. The proponents claim it is a science. Science at its basic is the observation of nature. As soon as you add the supernatural or a god to the mix it stops being a science discussion and becomes one of philosophy or theology. Aliens have also been put forward; as there is no empirical proof that there is life, of sufficient intelligence, beyond this world, that puts them out of the running so to speak. The ID camps say that by explaining everything through natural means, that science is excluding the supernatural. They make out point for us; science is observational way of thinking.

Another point of attack is the odds of life now being as it is, through chance and natural selection. The error is using a subject – say a watermelon - and working back. Of course it would seem statistically impossible to have a certain order of events to get the watermelon. Rather the watermelon became due to a series of events that at the time made it possible for the parent plants to survive to current day.

If you want to do a simple experiment, get a pack of cards. Shuffle and deal out the first 5 cards. That is your target. Reshuffle and re deal, are they the same cards in the same order? Probably not.

I figured out that a pack of cards can be arranged in  $8.06e 67$  combinations. That's an 8 with 67 zeros. That's from arranging 1 card to all 52 and all the combinations in between.

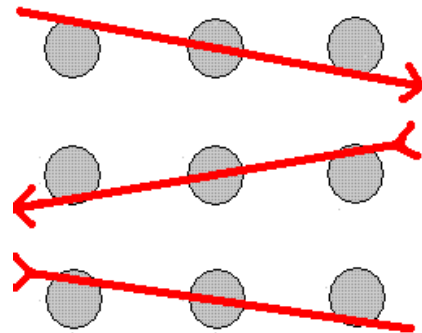
The ID supporters admit that the designer creates outside of nature and that, the process is undetectable. If the process is undetectable, then it can't be observed, no experiments set up to test, no

comparisons or analysis can be made. This alone excludes ID as a science.

Evolution has massive amounts of data in its favour, which can explain some 97% of life. The remaining 3% remains to be discovered. It would be wrong to assume evolution can explain everything, but to say a designer created it explains nothing, it mealy is another way of saying 'I don't know, and have no independent proof'.

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## Going Dotty - Part 3



In the last edition I asked if you could connect the 9 dots with 3 straight lines and theoretically not take the pen off the paper. Well here is the answer, sneaky isn't it? People are conditioned to work within the bounds given them. Although you can't see the edge of the picture, it is there thus the arrow marks. I'm sure you can see how the puzzle can be solved.

Now for the final puzzle, same 9 dots, using 1 straight line, that does not leave the bounds of the image. The bounds are 1 Cm from the dots on all sides.

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## Internet Sites

A fairly good site for the school aged.  
<http://www.schoolscience.co.uk/content/index.asp>

Pick an element and use the tabs at the bottom to find out more:  
<http://www.schoolscience.co.uk/periodictable.html>

Science Experiments:  
<http://www.stevespanglerscience.com/experiments/>

Catalyst: ABC, Australia  
<http://www.abc.net.au/catalyst/>

## The Ten Commandments for Amateur Astronomers

1. Thou shalt have no white light before thee, behind thee, or to the side of thee whilst sharing the night sky with thy fellow stargazers.
2. Thou shalt not love thy telescope more than thy spouse or thy children; as much as, maybe, but not more.
3. Thou shalt not covet thy neighbour's telescope, unless it exceeds in aperture or electronics twice that of thy wildest dreams.
4. Thou shalt not read "Astronomy" or "Sky & Telescope" on company time, for thine employer makes it possible to continue thine astronomical hobby.
5. Thou shalt have at least two telescopes so as to keep thy spouse interested when the same accompanies thee under the night sky or on eclipse expeditions to strange lands where exotic wild animals doth roam freely.
6. Thou shalt not allow either thy sons or thy daughters to get married during the Holy Days of Starfest.
7. Thou shalt not reveal to thy spouse the true cost of thy telescope collection; only the individual components and that shall be done with great infrequency.
8. Thou shalt not buy thy spouse any lenses, filters, dew shields, maps, charts, or any other necessities for Christmas, anniversaries, or birthdays unless thy spouse needs them for their own telescope.
9. Thou shalt not deceive thy spouse into thinking that ye are taking them for a romantic Saturday night drive when indeed thou art heading for a dark sky site.
10. Thou shalt not store thy telescope in thy living room, dining room, or bedroom, lest thou be sleeping with it full time.

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## Submissions

Send submission to [antenna@anzaas.org.au](mailto:antenna@anzaas.org.au)

They can be anything Science based. A joke, something of interest, a question you would like answered.

Just send it to the email address

## Internet Relay Chat

If you want to contact me directly, you can try using IRC. With Windows mIRC is a good client to use. The info for connecting is:

Name: Neo Vortex  
Server: hub.neovortex.org  
Port: 6667

Once connected type: /join #bitmetv

My username is **Knightyme**, I sometimes don't answer immediately so be patient.

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## What is Science?

What is science to you, send in a short description.

I like amusing answers

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## At the Party with the Physicists

... and Friends

- Everyone gravitated toward Newton, but he just kept moving around at a constant velocity and showed no reaction.
- Ohm spent most of the time resisting Ampere's opinions on current events.
- Einstein thought it was a relatively good time.
- Coulomb got a real charge out of the whole thing.
- Bohr ate too much and got atomic ache.
- Watt turned out to be a powerful speaker.
- Hertz went back to the buffet table several times a minute.
- Volta thought the social had a lot of potential.
- The Curies were there and just glowed the whole time.
- Groucho refused to attend any party that would invite him in the first place.
- Shakespeare could not decide whether to be or not to be at the party.
- Pavlov brought his dog; which promptly chased after Schrodinger's cat.
- Witten bought a present all tied up with superstrings.