

Outline

Lesson 5 / Part 1 - Science: What is True?

I. Introduction

- A. Psalm 19:1-4 – "The heavens declare the Glory of God" – General Revelation
- B. Romans 1:18-20 – "God has made it plain to them ..."
- C. Only two possibilities: the cosmos has always existed or the cosmos had a beginning – either one poses a serious problem for those who deny a Creator

II. Design vs. Randomness

- A. Earliest scientists were convinced that the universe bore evidence of design
- B. Scrabble Example – Where does the organized information in the genetic code come from?
- C. Wald- "Time is the hero of the plot ...the impossible becomes possible."

III. Examining Darwin's Theory

- A. Hypothesis, theory, law – data must confirm investigation of truth claims
- B. Darwinian Evolution taught as "Fact" – Does his theory match reality?
- C. Paley's Argument – Anyone who looks at a pocket watch understands that it was designed with intelligent purpose
- D. Ignoring the obvious – Francis Crick: You've got to keep in mind that all of this was not designed

Lesson Guide for Tour 5

Introduction



In this, our fifth worldview tour, we will head northwest, enter the cavern of nature, gaze upon the jewels of creation, and establish yet another important pillar in the Temple of Truth: *Science*. In the process, we will discover that whereas "the heavens declare the glory of God and the firmament shows His handiwork" (Psalm 19:1) so that the Creator's "invisible attributes are plainly seen" (Romans 1:20), mankind has nevertheless chosen to ignore the obvious truth, twisting scientific investigation into a vehicle for propagating a godless philosophy of human independence and self-determination.

Themes

Having completed our brief and cursory discussion of the nature and character of God, we turn now to consider a very different question: what does "the stuff in the box" really tell us when we honestly look at it? Dr. Tackett argues that *scientific investigation* – "the systematic study of the structure and behavior of the physical and natural world through observation and experiment" – is also a valid way of ascertaining *truth*. For when we open the box, we find that it is filled with voices that speak to us loudly about the majesty and power of the One who has created the physical universe. Everywhere we look – whether up at the grandeur of the stars and galaxies or deep into the tiny and elegantly designed inner workings of a living cell – there is evidence that the cosmos is the handiwork of an intelligent, rational mind. In the contemplation of nature, we come face to face with the truth that *God exists* and that *He has revealed Himself to us*, not only through His written Word (*special revelation*) but also through the works of His hands (*general revelation*).

Our natural reaction to this experience should be like that of a child: wonder, marvel, and praise for the Creator. But because of the effects of the fall and the polarizing influence of the *Cosmic Battle*, man shows a tendency to deny what is plain to the senses and to "exchange the truth of God for a lie" (Romans 1:25). Driven by this impulse, he transforms straightforward scientific inquiry, which properly concerns itself with *particulars*, into an all-embracing *philosophy*, which claims to establish *universals* on the basis of the "stuff in the box." The result is the propagation of a *worldview* that "scientifically" excludes the Creator, thus "freeing" mankind from accountability to a higher authority.

Central to this philosophy are the assertions of Darwinian evolutionary theory. By keeping the details of creation's story completely inside "the box," evolution effectively rules out the existence of God. Herein lies the *heart* of the debate over "Intelligent Design." Atheist C. Richard Bozarth actually goes so far as to claim that "evolution destroys utterly and finally the very reason Jesus' earthly life was supposedly made necessary." It is exactly this kind of *philosophical* assumption that inspires the visceral antagonism of evolutionists toward anyone who dares question the validity of their theory. This is why Darwinists so fervently assert that "evolution is no longer merely a theory, but an established *fact*." But the truth of the matter, as Dr. Tackett and his guest experts demonstrate in great detail, is that the theory is *not* supported by the evidence. Many inside the scientific community are beginning to recognize this. But they dare not acknowledge it publicly because of the worldview issues at stake. As Dr. David Berlinski says, "The consequences are serious."

Points to Watch for

The essence of Dr. Tackett's message may be summed up as follows: fallen man ignores the plain evidence of objective scientific inquiry and promotes the atheistic *philosophy* of evolutionary theory primarily because he is determined to do as he pleases without answering to a higher authority. This charge may make some group participants uncomfortable precisely because it hits so close to home. Dr. Tackett also illustrates the point that *ideas have consequences* by drawing a historical connection between Darwinian theory and the horrors of Nazi Germany. Some students may feel inclined to debate his assertions in this regard.

The Truth Project Lesson 5 / Part 1 - Science

Psalm 19: 1-4

- ¹ The heavens **declare** the **glory of God**;
The skies **proclaim** the **work of his hands**.
- ² Day after day they **pour forth speech**;
Night after night they **display knowledge**.
- ³ There is no **speech** or **language**
Where their voice is not heard.
- ⁴ Their **voice** goes out into all the earth,
Their **words** to the ends of the world.

The Heavens declare the glory of God

Carl Sagan was right in that “gazing at the cosmos stirs us”. It does not stir us because we are made of “star stuff” but because of the God we serve.

“...as countless as the stars of the sky...(Jeremiah 33:22)

How many stars are there?

128 BC: Hipparchus = 1,026

1600 AD: Kepler = 1,005

2003 AD count: 70 sextillion stars (70×10^{21}) (*Includes over 1 billion galaxies*) ...more than the grains of sand in every desert and beach on earth.

Romans 1:18-20

¹⁸The wrath of God is being **revealed** from heaven against all the godlessness and wickedness of men who suppress the truth by their wickedness, ¹⁹since what may be **known** about God is **plain to them**, because God has **made it plain** to them. ²⁰For **since the creation** of the world **God's invisible qualities**—his eternal power and divine nature—have been **clearly seen**, being **understood from what has been made**, so that men are **without excuse**.

Is God's handiwork difficult to see? Is it hidden?

- No it has been made “plain” to us.

Man has a tendency to look at that which is plain and ignore it.

Romans 1:21-23

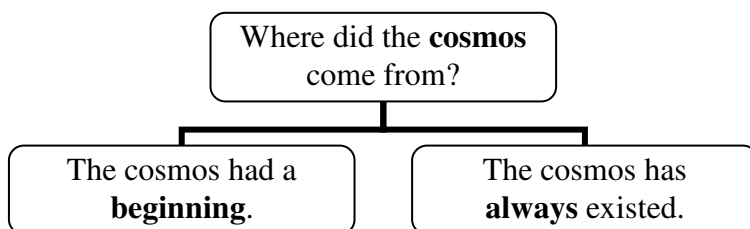
²¹For **although they knew God**, they neither glorified him as God nor gave thanks to him, but their **thinking** became **futile** and their foolish **hearts were darkened**. ²²Although they **claimed to be wise**, they became **fools** ²³and **exchanged the glory of the immortal God for images** made to look like mortal man and birds and animals and reptiles... ²⁵They exchanged the **truth** of God for a **lie**, and worshiped and served created things rather than the Creator...

Psalm 53:1

¹ The fool says in his heart, "There is no God."

Why is he a fool? - Because it has been made “plain” to him.

The Great Cosmological Question:



There are only two possible answers...

Without God in the picture both answers have deep, difficult problems.

- If the cosmos has always existed (without beginning – eternal) based upon the 2nd law of thermodynamics it should be “dead”. Observations don’t fit.
- If the cosmos had a beginning, what existed before it? Where did the matter which makes up the cosmos come from?

Metaphysical Questions

Why is there **something** rather than **nothing**?

Why is **anything** in **motion** rather than everything **still**? (or *hot/cold*?)

Why is there **order** rather than **chaos**?

Why is there **life** rather than **deadness**?

Why is there music?

What Does The Cosmos Reveal?

Two choices...

Glory of God as transcendent creator

- or -

God of itself as the self creator

God as creator:

- Created the cosmos – acts within it
- Revealed himself to us
 - Special Revelation – His Word
 - General Revelation – Observation of the cosmos
 - Psalm 19, Romans 1

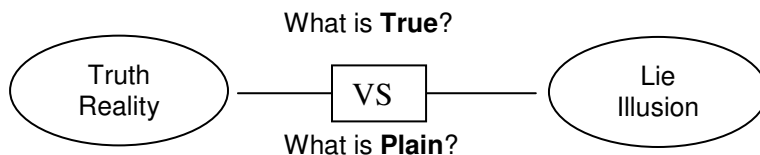
Self Creator – Deep problem

- It appears to have a beginning yet came from nothing.

George Wald – Scientific American

- **Time** makes **all** things **possible**
- “...Time is the hero of the plot...what we regard as impossible on the basis of human experience is meaningless here. Given so much time, the impossible becomes possible.”

The Battle Over Science



Cosmos: Assumptions

“I believe our future depends powerfully on how well we understand the cosmos...”

“We wish to pursue the truth no matter where it leads. But to find the truth, we need imagination and skepticism both.”

“We will not be afraid to speculate, but we will be careful to distinguish speculation from fact.”

What Is Plain?

Science (defined by Oxford): “... the **systematic study** of the structure and behavior of physical and natural world through **observation** and **experiment**.”

Science and philosophy are therefore closely linked. Both are attempting to develop truth claims about reality.

- Philosophy, in the realm of the universals
- Science, in the realm on particulars.

Johannes Kepler:

“The chief aim of all investigation of the external world should be to discover the rational order and harmony which has been rational order and harmony which has been imposed on it by God.”

Dr. Stephen Meyer – Senior Fellow – Discovery Institute

“ The earliest scientists whether it was Sir Isaac Newton or Robert Boyle or before him Johannes Kepler, Galileo, many of those scientists were very strongly committed to the idea of the existence of God and to Christianity in many cases. They were, moreover, convinced the universe bore evidence of design and it was therefore intelligible to the human intellect...in fact the idea of design was one of the inspirations of the scientific revolution because of the conviction that we could study nature and make sense of it derived from that idea that it was the product of a rational intellect and if a rational intellect had created nature, had given it order, had given it it’s so called laws, then it became possible for us to make sense of that order.”

Design vs Randomness

If all in the box is random, chaotic, then there is no reason to study it for “patterns”

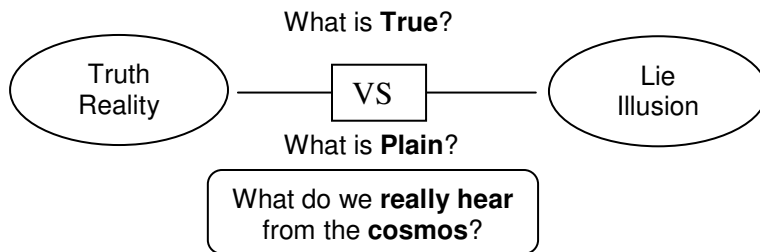
“Unlocking the Mystery of Life” clip – Example illustrating the problem of chance to produce information...

- “By the 1970’s most researchers had rejected the idea that the information necessary to build the first cell originated by chance alone.
- To understand why, consider the difficulty of generating just two lines of Shakespeare’s play Hamlet by dropping Scrabble letters onto a table top. Then consider that the specific genetic instruction required to build a protein molecule in even the simplest one cell organism would fill hundreds of pages of printed text.”

Not to mention – where would the Scrabble letters come from? (Where did the amino acids come from to be available to combine themselves into the initial protein(s)?)

Consider someone off to the side “flicking” paint toward blank Scrabble squares in hopes of generating a letter(s).

The Battle Over Science



Rulers From The Grave

Keynes (1863-1946)

Dewey (1859-1952)

Freud (1856-1939)

Wellhausen (1844-1918)

Marx (1818-1883)

Kierkegaard (1813-1855)

Darwin (1809-1882)

Examining Darwin’s Theory

The most **influential theory** in **modern civilization**.

Does it really match reality?

Hypothesis – Early assumption based upon initial data.

If further study confirms then it becomes a theory

Theory – Begins to predict results when collecting data (predicting data = truth claim)

Law – Data always matches the theory

If a theory does not work (does not match the data – reality) one needs to go back and redo the hypothesis

Hypothesis: Very early assumption made on the basis of limited evidence used as a starting point for further investigation.

Theory: Idea or belief about something formed by speculation, conjecture, or deduction from certain facts within certain parameters

Law: A statement of scientific fact that a particular natural or scientific phenomenon is invariable under given circumstances

Sir Julian Huxley:

"...Darwin's theory is...no longer a theory, but a **fact**...Darwinianism has come of age to speak. We are no longer having to bother about establishing the **fact** of evolution."

Isaac Asimov:

"Today, although many educators play it safe by calling evolutionary ideas 'theory' instead of '**fact**' there is no reputable biologist who doubts that species, including Homo sapiens, have developed with time, and that they are continually, though slowly, changing."

Carl Sagan:

"Evolution is a **fact** amply demonstrated by the fossil record and by contemporary molecular biology. Natural selection is a successful theory devised to explain the **fact** of evolution."

Dawkin's Perspective:

"It is absolutely safe to say that if you meet somebody who claims not to believe in evolution, that person is **ignorant**, **stupid** or **insane** (or **wicked**, but I'd rather not consider that)."

Sagan, Asimov, Huxley

Evolution is a "fact" – the **assumption** of virtually all school textbooks...

Creating Reality

"The theory of evolution is no less reliable than is the atomic 'theory' or the 'germ theory of infectious disease.' As with atoms, which cannot be directly observed, we cannot directly observe the production of new species by evolution. Biologists have gathered a tremendous amount of evidence in support of biological evolution, however, and not one major piece of evidence has ever been obtained that suggests it has not occurred...Conversely, the so-called theory of creationism proposes no testable hypothesis and thus cannot be proven right or wrong. Proponents simply accept it on faith. The theory of evolution, however, suggests many predictions that can be tested."

Dr. David Berlinski – Author & Senior Fellow, Discovery Institute

"The claim that all skeptics about Darwinian orthodoxy are Christian fundamentalists stands refuted by me...it is obviously not true; I am neither Christian nor a fundamentalist. But lots and lots of people are skeptical in the scientific community. I know of dozens of mathematicians who scratch their heads and say you guys think this is the way life originated? Absolutely a preposterous theory...and many, many very significant figures...John von Neumann a great mathematician of the 20th century laughed at Darwinian Theory, he hooted at it. So it is perfectly absurd...this is a point in a polemical dispute...that is not a reasonable standard of criticism. Opposition to Darwinian Theory is, I wouldn't say wide spread, but there is a consistent group of people among mathematicians, among physicists, among some very good speculative biologists who simply don't accept it...don't even regard it as a scientific theory in any reasonable sense."

Seeing Our Own Position:

Man tends to see their own position.

We as Christians need to be careful as well.

Two Books:

William Paley – *Natural Theology*

Paley's argument for design: Named after William Paley (1743-1805), this is sometimes referred to as the watchmaker analogy: it is plain to see that the parts in a watch are designed and placed in relationship with each other for a purpose and that the watch therefore must have a maker. In the same way, our universe bears evidence of design and purpose and, therefore, must have a maker.

Richard Dawkins – *The Blind Watchmaker*

- "Natural selection, the blind, unconscious, automatic process which Darwin discovered, and which we now know is the explanation for the existence and apparently purposeful form of all life has no purpose in mind. It has no mind and no mind's eye. It does not plan for the future. It has no vision, no foresight, no sight at all. If it can be said to play the role of the watchmaker in nature, it is the blind watchmaker."
- "Biology is the study of complicated things that give the appearance of having been designed for a purpose."
 - He is essentially saying "I know it looks designed...but it wasn't"

Ignoring the Obvious

Francis Crick - "Biologists must constantly keep in mind that what they see was not designed, but rather evolved."

- Evidence says design – yet we shut ourselves off from anything outside the box

We must recognize design. Evidence of design is "plain" to us.

Charles Darwin

"I remember well the time when the thought of the eye made me cold all over, but I have got over this stage of the compliant, and now small trifling particulars of structure often make me very uncomfortable. The sight of a feather in a peacock's tail, whenever I gaze at it, makes me sick!"

Why sick? The appearance of design.



Key Terms Lesson 5

Charles Darwin (1809-1882): British naturalist who proposed the theory of evolution through natural selection in his book *The Origin of Species* (1859). This book, and Darwin's theories, have had massive ideological and philosophical effects on our world and humanity.

Darwinian Evolution/Darwinism: A specific area of evolutionary biology involving natural selection proposed by Charles Darwin.

Directed Panspermia: Theory that suggests that highly-evolved life forms sent microorganisms or biochemical compounds from outer space to earth. Francis Crick developed this hypothesis to explain life on earth.

Fossil Record: The fossilized remains of plants and animals that provide the evidential means to understand when those organisms were alive, where they lived, and what they looked like.

Francis Crick (1916-2004): Co-discoverer of DNA who rejected the evidence of design. During the 1960s he became concerned with the origins of the genetic code and in the early 1970s proposed the theory of Directed Panspermia.

Great Cosmological Question: Where did the cosmos come from? The cosmos either had a beginning or has always existed.

Hypothesis: Very early assumption made on the basis of limited evidence used as a starting point for further investigation.

Intelligent Design: Scientific theory that nature and complex biological structures were intelligently designed and, as such, are not the result of chance. Proponents of intelligent design argue that there is empirical evidence that is subject to scientific investigation that complex biological systems and the information bearing properties of DNA could not have been created by natural selection.

Irreducible Complexity: A complex system that could not function if it were any simpler, and therefore could not possibly have been formed by successive additions to a precursor system with the same functionality. An analogy often given in support of irreducible complexity is the mousetrap.

Jonathan Wells: Biologist, senior fellow of the Discovery Institute, and author of *Icons of Evolution*. A prominent spokesperson for the intelligent design movement, Wells' book proves that many of the most commonly accepted arguments for evolution are invalid.

Law: A statement of scientific fact that a particular natural or scientific phenomenon is invariable under given circumstances

Michael Behe: American biochemist, senior fellow of the Discovery Institute's Center for Science and Culture, and author of *Darwin's Black Box*. Behe is a leading advocate and spokesperson for the intelligent design movement who is most well known for articulating the concept of irreducible complexity.

Molecular Biology: The branch of biology that deals with the formation, structure, and function of macromolecules essential to life; in particular the interactions between the various systems of a cell, including the interrelationship of DNA, RNA and protein synthesis and learning how these interactions are regulated

Paley's argument for design: Named after William Paley (1743-1805), this is sometimes referred to as the watchmaker analogy: it is plain to see that the parts in a watch are designed and placed in relationship with each other for a purpose and that the watch therefore must have a maker. In the same way, our universe bears evidence of design and purpose and, therefore, must have a maker.

Punctuated equilibrium: A theory in evolutionary biology that says the appearance of new species occurs suddenly and without continuous slow variations; species will show little or no evolutionary change throughout history

Science: The systematic study of the structure and behavior of the physical and natural world through observation and experiment. Science and philosophy are both attempting to develop truth claims about reality; philosophy in the realm of universals, science in the realm of particulars.

Stephen Jay Gould (1941-2002): American paleontologist and evolutionary biologist who taught at Harvard University and worked at the American Museum of Natural History. He was an influential and widely read author that developed the theory of punctuated equilibrium (see glossary entry) due to the lack of evidence in the fossil record for gradual Darwinianism.

Theory: Idea or belief about something formed by speculation, conjecture, or deduction from certain facts within certain parameters