History of Science:

A few important aspects

Science is an invented institution

"an *invented* cultural institution, an institution not present in all societies, and not one that may be counted upon to arise from human instinct."

Loren Eisley, Francis Bacon, in The Horizon Book of Makers of Modern Thought, p. 95-96

The scientific method arose in the 16th and 17th century in Christianized Europe

"The type of thinking known today as scientific, with its emphasis upon experiment and mathematical formulation, arose in one culture – western Europe – and in no other."

Peacey and Thaxton, **The Soul of Science**, p 17

"It is the Christian world which finally gave birth in a clear, articulate fashion to the experimental method of science itself."

Loren Eisely Darwin's Century, p 62

Philosophical premises that are required for the practice of science:

-There is order or regularity or rationality to the natural world

-Our minds are capable of discovering it

-The order in nature cannot be deduced, but can only be discovered by examination

Philosophical premises that are required for the practice of science:

-There is order or regularity or rationality to the natural world

(one God or Creator)

-Our minds are capable of discovering it

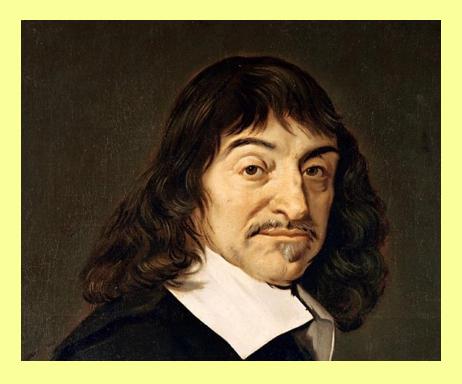
(We are made in the image of God who gave us
the ability to discover)

-The order in nature cannot be deduced, but can only be discovered by examination

(God created by choice, nature is contingent)

"Men became scientific because they expected law in nature and they expected law in nature because they believed in a legislator."

C. S. Lewis



René Descartes (1596-1650)

"God might have arranged these things in countless different ways; which way he chose rather than the rest we must find by observation."

Principles of Philosophy (Part 3, 46)

Pioneers of modern science who were Christian theists:

Copernicus (1473-1543)

Bacon (1561-1626)

Galileo (1564-1642)

Kepler (1571-1630)

Descartes (1596-1650)

Boyle (1627-1691)

Hooke (1635-1703)

Newton (1643-1727)

Faraday (1791-1867)

Maxwell (1831-1879)

Door to Cavendish Laboratory, Cambridge University



inscription requested by James Clerk Maxwell

Psalms 111:2. The works of the Lord are great, sought out (studied) by all that take pleasure therein

Bacon: "all things proceed according to the artificer's first design"

Galileo: God - divine craftsman who created the world as an intricate mechanism following mathematical principles

Kepler: "I was merely thinking God's thoughts after Him"

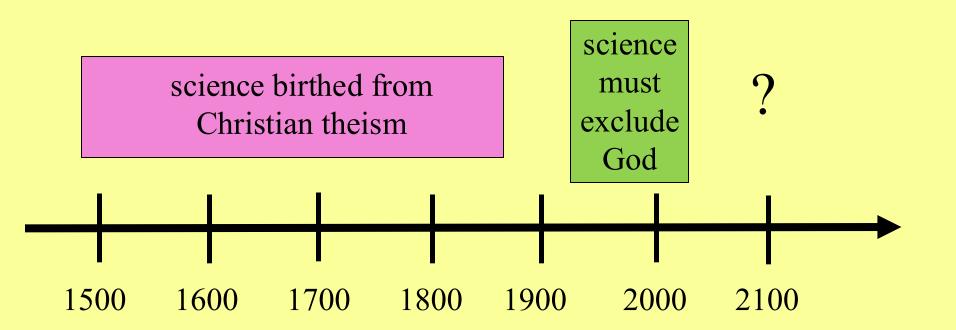
Descartes: the mathematical laws were legislated by God

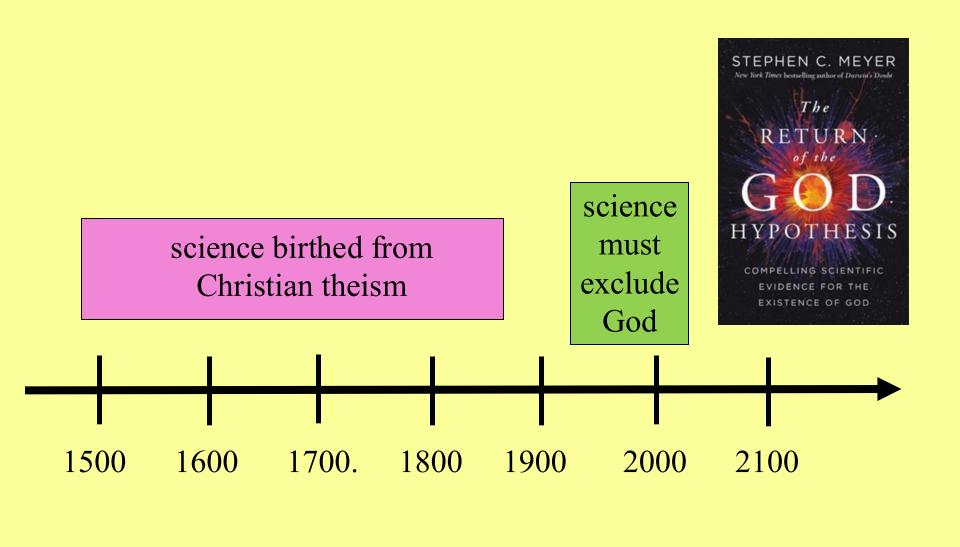
Boyle: God is the "free establisher of the laws of motion"

Hooke: nature's mechanisms are "the works of the Almighty"

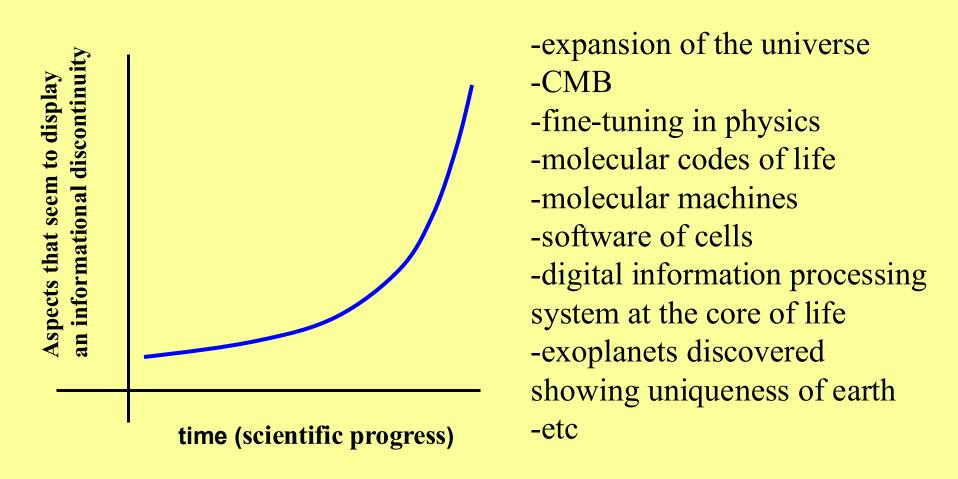
Newton: the creator of the planetary system must be "very well skilled in mechanics and geometry"

from The Soul of Science, Pearcy and Thaxton





Trend with scientific progress



As science has advanced more informational discontinuities have been discovered

OPERATION VS ORIGIN



Unintelligent natural processes explain how it functions but do not explain where it came from.

An informational discontinuity

Copernicus (1473-1543)(1561-1626)Bacon (1564-1642)Galileo Kepler (1571-1630)(1596-1650)**Descartes** (1627-1691)Boyle (1635-1703)Hooke (1643-1727)Newton (1791-1867)Faraday (1831-1879)Maxwell

These pioneers of science were mostly addressing the operation of our world, not the origins questions

Origins questions (informational singularities?)

The origin of the universe from nothing
The origin of the fine tuning of the universe
The origin of the natural laws
The origin of life
The origin of the genetic code
The origin of molecular machines
The origin of software algorithms encoded into molecules
The origin of multicellularity

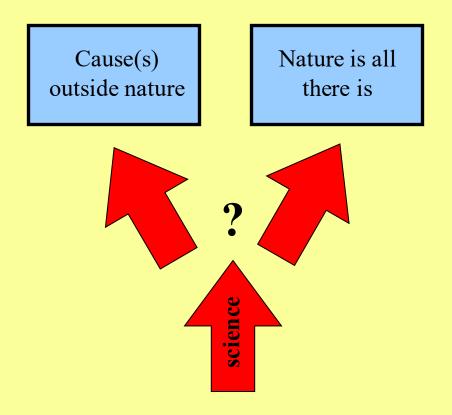
The origin of multicellularity

The origin of animal body plans

The origin of sexual reproduction

The origin of consciousness (Descartes)

The pioneers of science did not know enough to address many of these origins questions



Does the fact that science was invented from within Christian theism impact your opinion as to whether science can function (or would be better served) if both possibilities were allowed?

What would the inventors of science think about the charge that their theism compromises the scientific method that they invented?