

# ACTS & FACTS



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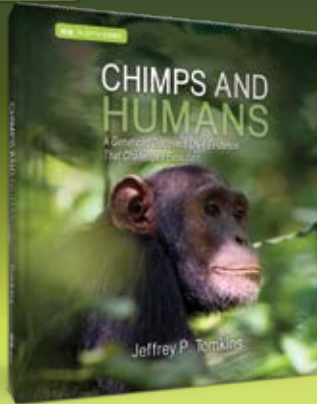
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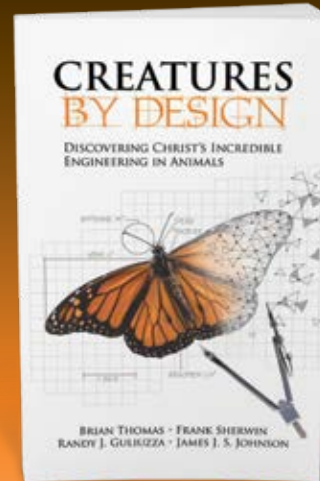


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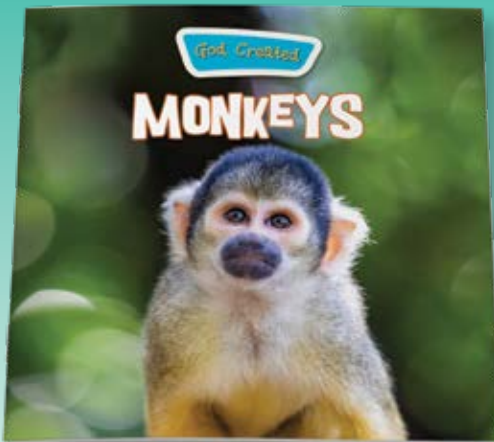


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[Jesus Christ] is the image of the invisible God, the firstborn over all creation. For by Him all things were created that are in heaven and that are on earth, visible and invisible, whether thrones or dominions or principalities or powers. All things were created through Him and for Him. And He is before all things, and in Him all things consist. And He is the head of the body, the church, who is the beginning, the firstborn from the dead, that in all things He may have the preeminence. For it pleased the Father that in Him all the fullness should dwell, and by Him to reconcile all things to Himself, by Him, whether things on earth or things in heaven, having made peace through the blood of His cross.

(Colossians 1:15-20)

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Front cover: Lightning storm  
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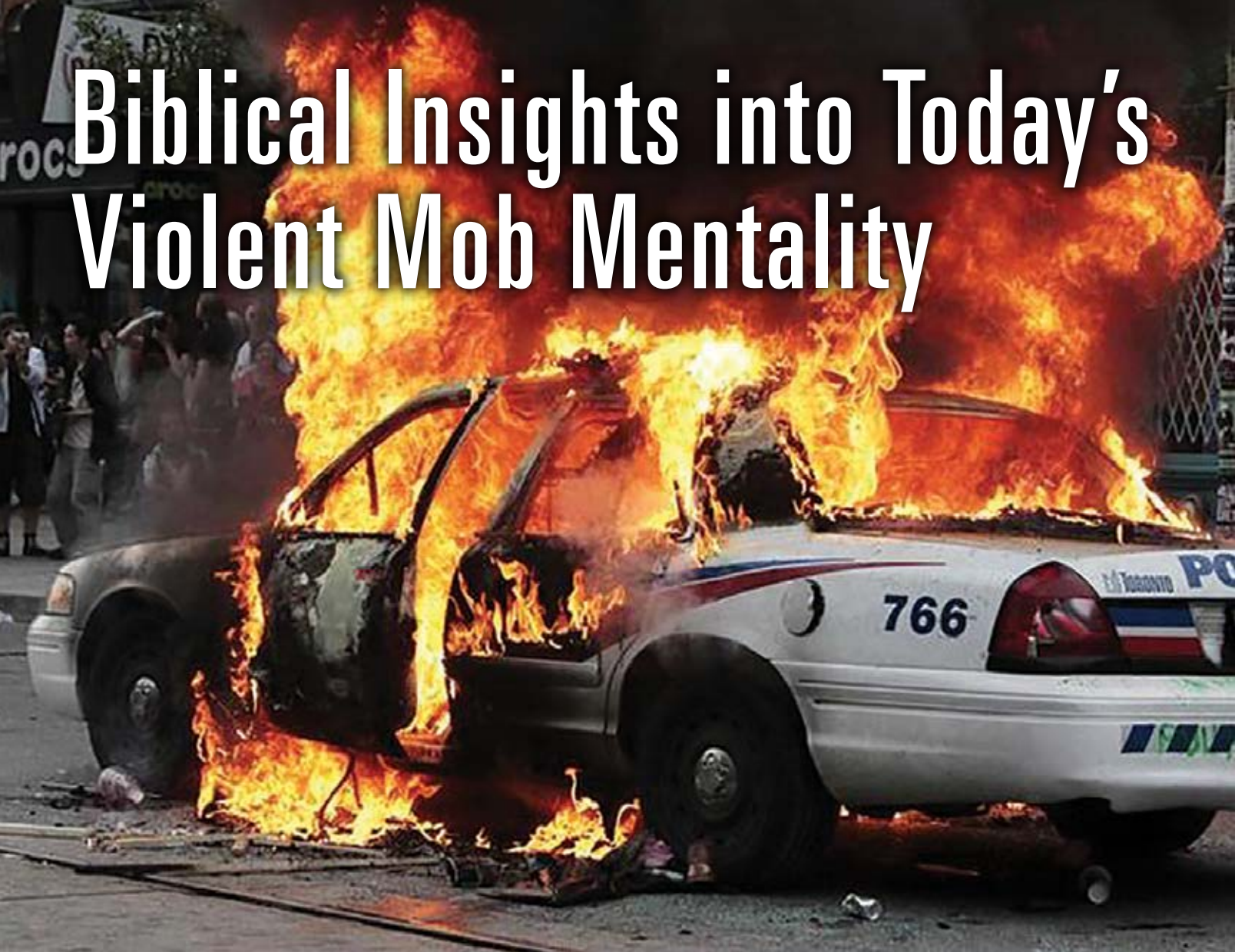
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# Biblical Insights into Today's Violent Mob Mentality



R A N D Y J . G U L I U Z Z A , P . E . , M . D .

**S**ome scenes from the evening news get etched into our memories. I recall seeing a college professor step outside his building and become suddenly surrounded by a very angry pack of students shouting verbal abuse right into his face. He became trapped in a circle of people who blocked his every move. His prior advocacy of these behaviors ironically didn't spare him when he

transgressed some unwritten code. The mob had come to devour one of their own.

Another time, a senator and his wife's evening out was cut short when a mob descended on them and harassed them all the way to their car. Even policemen are targets. Angry crowds swarm over their cars, threatening to set them ablaze. And who can forget the truck driver in Los Angeles pulled from his cab in 1992, beaten, and hit in the head with a cinder block?

## article highlights

- Mob violence appears to be increasing.
- People band together to force something to happen or “cancel” people or organizations.
- We learn three things from mob incidents described in the Bible: 1) Instigators tend to have evil intentions from the start, 2) the mob's size makes it powerful, and 3) mob mentality halts rational speech and civil discourse.
- When facing explosive circumstances, remember that “blessed are the peacemakers.”

## Mob Mentality and a Cancel Culture

Perhaps one of the most terrifying things a person can imagine is for themselves, and especially their family, to be engulfed by an enraged mob. Today's technologies can facilitate a mob mentality. A social media message can summon an aggressive pack in what seems like an instant. Alternatively, an online crowd of cyberbullies can gang up on a victim. In many cases, physical violence isn't necessary as long as the angry throngs are sufficiently vicious with their words.





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Nowadays, colleges, businesses, government, and the entertainment industry will “cancel” someone through the growing sinister threat known as cancel culture. What’s entailed in this evil behavior? Cancelers turn a person into a communal pariah by taking steps to terminate their employment, shun them socially, shout them down, distort their legacy, or even go so far as to erase any memory of their existence. A key factor in enforcement is a united angry mob “up in their face” personally or online.

Some of the techniques of cancel culture were refined on creationist forefathers like Drs. Henry M. Morris and Duane Gish. Even now, ICR’s research ministry and speakers are slandered by malicious and personal lies spread via the internet. Unfortunately, even socially or politically conservative observers have largely remained silent when this happens to creationists. And like most untreated diseases, it’s grown worse. Now, everyone is so afraid of either a riot or online mob that our cherished freedom of speech is seriously threatened through self-censorship or social media being shut down.

What can we learn about violent mobs? What do they accomplish? Are there distinguishing characteristics of a mob? The best place for answers is the Bible. Biblical

history records our unseen enemy regularly stirring up riots. We can’t study them all, but we can read through some passages to better understand the issue.

## Biblical Records of Mob Violence

### *Rebellion Against Moses*

After 10 spies brought back a bad report against invading the land promised by God to Israel (Numbers 13:31-33), a mob rose up against Moses. Numbers 14:1-10 records, “So all the congregation lifted up their voices and cried...and all the children of Israel complained against Moses and Aaron.” Stewing over their perceived hopeless future, they sought to depose Moses.

The intensity of wrath became intimidating, and “Moses and Aaron fell on their faces before all...the congregation of the children of Israel.” The crowd reacted to conciliatory efforts by Joshua and Caleb with even greater fury, “and all the congregation said to stone them with stones.” Providentially, at that moment “the glory of the LORD appeared in the tabernacle,” and the riot abruptly ceased.



### *Hatred Toward the Lord Jesus*

An angry crowd was stirred up against the Lord Jesus in Mark 15:8-14. “Then the multitude, crying aloud,” asked Pilate to release Barabbas instead of the Lord. Pilate withstood the demand, “for he knew that the chief priests had handed Him over because of envy. But the chief priests stirred up the crowd, so that he should rather release Barabbas to them.” Yet Pilate further resisted, “so they cried out again, ‘Crucify Him!’ Then Pilate said to them, ‘Why, what evil has He done?’ But they cried out all the more, ‘Crucify Him!’”

### *Opposition to the Apostle Paul*

It seems that mob violence was the weapon of choice to suppress Paul’s gospel message. Acts 14:19 says, “Then Jews from Antioch and Iconium came there; and having persuaded the multitudes, they stoned Paul and dragged him out of the city, supposing him to be dead.” Acts 16:16-22 describes “a certain slave girl possessed with a spirit of divination,” and Paul “said to the spirit, ‘I command you in the name of Jesus Christ to come out of her.’” But those who no longer profited at her expense stirred up a “multitude [that] rose up together against them; and the magistrates tore off their clothes and commanded them to be beaten with rods.”

Then, in Acts 17:5-7 “the Jews who were not persuaded, becoming envious, took some of the evil men from the marketplace, and gathering a mob, set all the city in an uproar and attacked...crying out [that Paul and Silas are] ‘acting contrary to the decrees of Caesar, saying there is another king—Jesus.’” In Acts 18, Paul “was compelled by the Spirit, and testified to the Jews that Jesus is the Christ,” but “the Jews with one accord rose up against Paul and brought him to the judgment seat, saying, ‘This fellow persuades men to worship God contrary to the law.’”

Acts 19 records that after Paul performed numerous Christ-honoring miracles, “many of those who had practiced magic brought

their books together and burned them in the sight of all.” Unsurprisingly, an idol maker stirred up a citywide riot in which “they were full of wrath and cried out, saying, ‘Great is Diana of the Ephesians!’” In characteristic fashion, “the whole city was filled with confusion.” They “rushed into the theater with one accord,” whereby “some therefore cried one thing and some another, for the assembly was confused, and most of them did not know why they had come together.” Confusion notwithstanding, the angry crowd seized Paul’s companions.

After Paul returned to Jerusalem, Acts 21:27-35 records:

The Jews from Asia, seeing him in the temple, stirred up the whole crowd and laid hands on him...and all the city was disturbed; and the people ran together, seized Paul, and dragged him out of the temple; and immediately the doors were shut. Now as they were seeking to kill him, news came to the commander of the garrison that all Jerusalem was in an uproar. He immediately took soldiers and centurions, and ran down to them. And when they saw the commander and the soldiers, they stopped beating Paul...and some among the multitude cried one thing and some another. So when he could not ascertain the truth because of the tumult, he commanded [Paul] to be taken into the barracks. When he reached the stairs, he had to be carried by the soldiers because of the violence of the mob.

### Mob Violence: Characteristics, Effects, and Response

Placing these Scriptures side by side simplifies finding the patterns of behavior characteristic of mobs. First, we saw their *evil provocation*. Recall that *envy* motivated the instigators of mobs against the Lord Jesus and Paul. Envy, lust, and covetousness are closely related passions. This explains why mobs can suddenly explode. Envy readily fuels bitter resentment, outright theft, or envy-driven destruction of coveted property (i.e., “if I can’t have it, neither can you”). Someone compelled by unrestrained envy can spread lying, slanderous reports with the intention of igniting a crowd’s rage.

Next, we see characteristics of why any kind of mob—in person or online—is *terrifying*. The swarm effect swiftly overwhelms the prey. The Bible reveals that there’s a pool of confused, readily enraged people who are inclined to riot. Social media enables summoning a flash mob at will. Behaviors are so unpredictable amidst the commotion that they quickly devolve into anarchy. It’s hopeless to reason with an irrational crowd bent on expressing their fury. Sheer numbers make self-defense impossible and leave no avenue of escape. Angry mobs possess a bloodlust that’s implacable. An appeal for mercy from the victim only fuels the mob’s feeding frenzy.

Finally, we see how a riotous crowd instantly *stops rational*

*speech*. Truthful or unfavorable messages immediately drown in the tumult. What an effective tactic this is for those who don’t want their beliefs challenged or positions scrutinized. Similarly, we’ve seen the academic community allow masses of students to shout down, shove, and pelt speakers with objects rather than encourage them to engage in logical discussion. Given the power in the gospel and the creation message to topple false beliefs, it’s no wonder they’re often met with hostile anger versus rational dialogue.

The Bible clearly addresses this diabolical tool that’s extraordinarily effective in fanning rebellion, inflaming hatred, and suppressing truth. Little wonder, then, that we see malicious people on the street or online trying to stir up an angry following. Should we be surprised to see people wield this intimidating weapon when they want to “cancel” someone?



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Mob violence is rightly upsetting and must be opposed. Some have called for retribution by “canceling the cancelers.” We at ICR disagree and celebrate freedom of speech. When facing potentially explosive circumstances, ICR’s approach is guided by “blessed are the peacemakers” (Matthew 5:9).

For example, when we speak at public universities, some attendees try to deflect attention from our message by looking for a pretext to instigate a heated exchange through incendiary behaviors or questions. Admittedly, it’s tough to not take the bait. But with Christ’s enablement, we’ll keep true to our message while endeavoring to avoid saying provocative words, try to overcome evil with good, and, as much as we can, keep the peace. 🕊️

Dr. Guliuzza is President of the Institute for Creation Research. He earned his Doctorate of Medicine from the University of Minnesota, his Master of Public Health from Harvard University, and served in the U.S. Air Force as 28th Bomb Wing Flight Surgeon and Chief of Aerospace Medicine. Dr. Guliuzza is also a registered Professional Engineer and holds a B.A. in theology from Moody Bible Institute.





Where did bats come from? Evolutionists presuppose that some kind of rodent received just the right mutations to over “a few million years” turn its front legs into exceptionally aerodynamic wings.<sup>1</sup>

If true, the fossil record should record such a gradual transition. Does it? Was the origin of bat wings through eons of time and chance, or plan and purpose?

A study of the bat wing reveals incredible engineering features. It’s not enough for the wing to provide lift for flight. High-speed photography shows bats have an ability to track down, capture, and eat small insects while flying. Therefore, wing shape must change in a fraction of a second to apprehend the tiny morsel. In addition, the wings “are equipped with an unusual repertoire of somatosensory receptors.”<sup>2</sup> Indeed, the bat is able to do all this effortlessly due to its amazing wing design.

spread fingers 2-5 (digit 1, the thumb, is much shorter). The shoulder girdle is modified to take the large flight muscles on the expanded [shoulder blade] on the back.<sup>4</sup>

In other words, they’re fully functional bats. The evolutionary mystery continues: “Bats pop up in the fossil record around 50

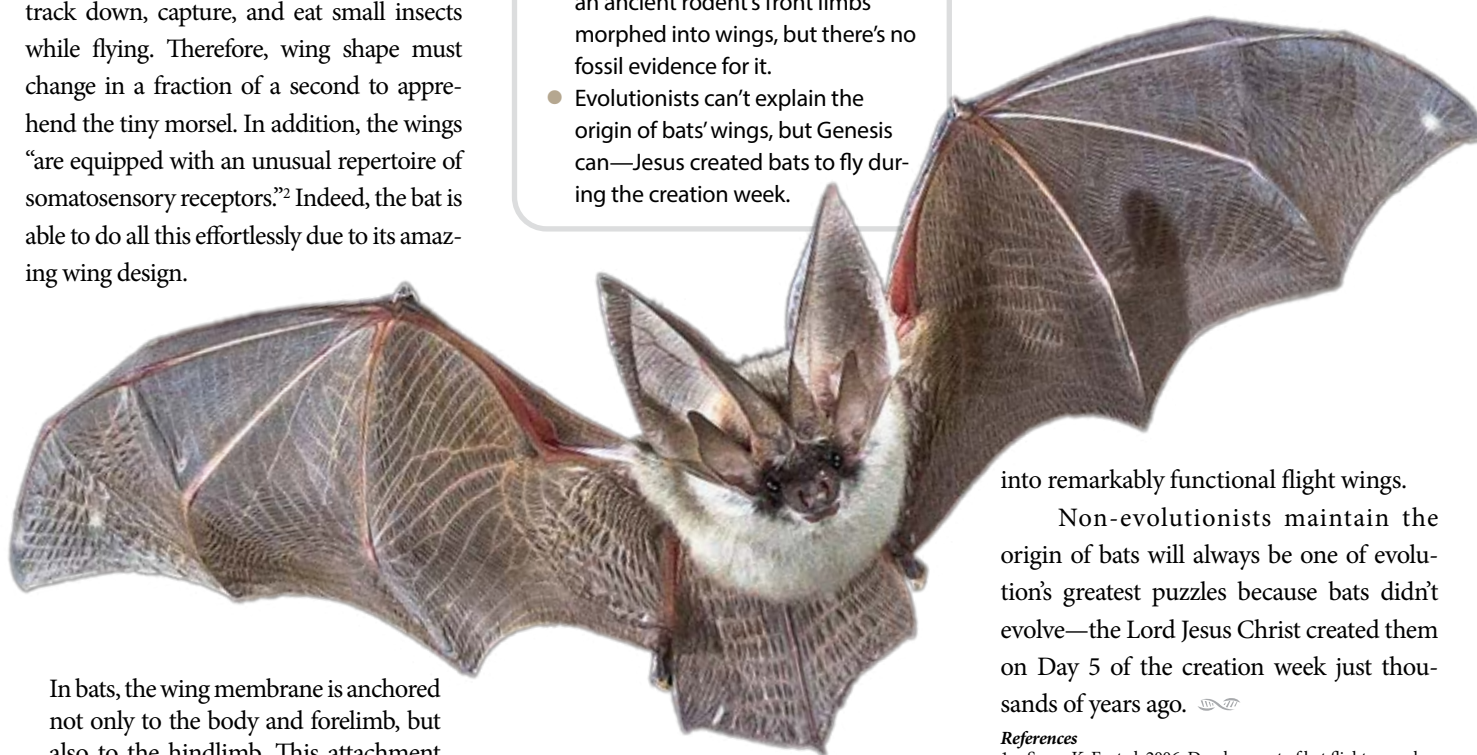
But in bats the webbing remains because designed molecules called BMP (bone morphogenic proteins) that would otherwise cause apoptosis are blocked by two molecules called Fgf8 and Gremlin. As evolutionist Michael Denton stated, “In other words, only the recruitment and simultaneous activity of new compensatory gene circuits enabled bats to extend their digits while at the same time retaining the intervening webbing!”<sup>7</sup>

The webbing remains. The bat can fly. What the authors do not describe is how an ancient rodent slowly changed its front legs


## How Did the Bat Get Its Wings?

### article highlights

- Bat wings are highly engineered to be exceptionally aerodynamic.
- The evolutionary story is that an ancient rodent’s front limbs morphed into wings, but there’s no fossil evidence for it.
- Evolutionists can’t explain the origin of bats’ wings, but Genesis can—Jesus created bats to fly during the creation week.



into remarkably functional flight wings.

Non-evolutionists maintain the origin of bats will always be one of evolution’s greatest puzzles because bats didn’t evolve—the Lord Jesus Christ created them on Day 5 of the creation week just thousands of years ago. 

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Dr. Sherwin is Science News Writer at the Institute for Creation Research. He earned an M.A. in zoology from the University of Northern Colorado and received an Honorary Doctorate of Science from Pensacola Christian College.



In bats, the wing membrane is anchored not only to the body and forelimb, but also to the hindlimb. This attachment configuration gives bats the potential to modulate wing shape by moving the hindlimb, such as by joint movement at the hip or knee. Such movements could modulate lift, drag, or the pitching moment.<sup>3</sup>

Two “intensively studied early bats” come from early Eocene sediments in Wyoming. As evolutionist Michael Benton stated:

These already show all the key [bat] features: the humerus, radius (and fused ulna) and digits are all elongated, and the flight membrane is supported by the

million years ago.”<sup>5</sup> There’s no explanation of where they “popped” from.

Two evolutionists writing in a university textbook on developmental biology address “how the bat got its wings” (or more correctly, how bat wings develop embryonically).<sup>6</sup> During embryonic development, the bat keeps the critical forelimb webbing between its fingers. In other mammals, the interdigital webbing is dissolved by a sophisticated process of programmed cell death called apoptosis.



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ICR sent a team to the University of North Texas (UNT) on March 30. Partnering with the UNT Ratio Christi chapter, the multifaceted all-day campus outreach impacted several hundred students with creation truth and the gospel. Pictured are Drs. Brian Thomas (left) and Jeff Tomkins chatting with students.



Sponsored by University Lutheran Chapel, Dr. Brian Thomas delivered the presentation “Adam or Apes?” on April 21 in the Benson Earth Sciences Building at the University of Colorado Boulder. During Dr. Thomas’ visit, ICR filmed his interviews with numerous students on campus about creation and evolution—look for them in the future on ICR’s YouTube channel!

If you would like to partner with ICR for a campus outreach near you, please call 214.615.8333 or email [events@icr.org](mailto:events@icr.org)

## Hands-On Creation Science

A group from all over the U.S. experienced creation science first-hand during ICR’s April 25-26 Creation Geology Field Trip. ICR geologist Dr. Tim Clarey led tours of Dinosaur Ridge and Garden of the Gods in Colorado, providing expert insights on the cross-bedding, fossilized water ripples, dinosaur tracks, sediment layering, and massive rock uplifts that point to the global Flood recorded in Genesis.

If you’d like to be part of our next field trip, watch for it at [ICR.org/events](http://ICR.org/events), read the events page in *Acts & Facts*, and make sure you’re on our email list. We’ll have more creation-affirming fun coming up in Spokane, Washington, in October.

If you’d like to bring a speaker to your area for a conference or a hands-on field trip, contact us at [events@icr.org](mailto:events@icr.org) or give us a call at 214.615.8306.

Dr. Tim Clarey pointing out dinosaur tracks at Dinosaur Ridge.



Garden of the Gods



Dr. Jim Johnson has been giving exceptional lectures for the last three days in Houston at the Chafer conference. My boys were able to attend (with my husband), and I can’t even begin to tell you how much they’ve learned and absorbed. I got a picture of my boys with Dr. Johnson. His talks on delayed implantation as well as forensic vs. empirical evidence were amazing.

— K. W. B.



TIM CLAREY, P.H.D., AND BRIAN THOMAS, P.H.D.

# YELLOWSTONE NATIONAL PARK, PART 2: CANYONS AND CATASTROPHE

**A**bout three million visitors tour Yellowstone National Park's 3,440 square miles each year.<sup>1</sup> Most come to see natural wonders like Old Faithful and Mammoth Hot Springs, which we featured in our part one article.<sup>2</sup>

But this park packs in much more. Yellowstone has its own grand canyon, waterfalls, and even upright petrified trees. Its surface features look young and testify to the catastrophic forces that shaped them.

## Grand Canyon of the Yellowstone

A deep canyon with three waterfalls cuts through the eastern spur of the park. This Grand Canyon of the Yellowstone flows for 20 miles and reaches 1,200 feet deep. Before an ancient catastrophe carved the canyon, hot waters moved upward through gray and red volcanic rocks. This hydrothermal action turned them yellow and orange. These yellow stones line the canyon's walls and inspired the park's name and overlook names like Inspiration Point. When did these geologic events occur?

Water flows from Yellowstone Lake through the Grand Canyon of the Yellowstone over stunning waterfalls. The first cliff forms Upper Falls, dropping a modest 109 feet. Next, the water plummets 308 feet down Lower Falls. Tower Falls' 132-foot drop comes last at the northern end of the canyon.

Conventional geologists believe an Ice Age glacier dammed up a huge lake where Yellowstone Lake is today. When water burst through melted ice, it quickly carved through the rock layers.<sup>3</sup> However, they also believe this river canyon started to form much earlier—about a half million years ago.<sup>4</sup>

*Grand Canyon of the Yellowstone as photographed on the ICR 2021 science expedition*



## article highlights

- Yellowstone's majestic geology shows clear evidence of youth.
- The park's stunning waterfalls have steep sides that testify to their recent formation.
- Fossil trees appear to have been ripped up by floodwaters, transported, and placed in volcanic debris as the Flood began to recede.
- The catastrophic forces that shaped the park bear witness to the Genesis Flood and the following Ice Age.



*A stunning Lower Falls image from the 2021 expedition*



Roaring water can erode even hard volcanic rock in a short time. It forms tiny vacuum bubbles that implode with great force in a process called cavitation, which can demolish rock or concrete.<sup>5</sup> After over a half million years, these three waterfalls should have smooth, gentle slopes instead of the steep-sided falls that today command visitors' attention. With Yellowstone's landscape looking only a few thousand years old, it fits well with an Ice Age right after Noah's Flood.<sup>6</sup>

### Fossil Tree Trunks and Catastrophe

The northeastern part of the park has petrified tree trunks embedded in volcanic rock debris. A hike up Specimen Ridge reveals some of them. About 20 different layers in the vicinity contain tree fossils, many standing vertically. Sycamore, walnut, chestnut, oak, maple, redwood, and magnolias were fossilized here.<sup>4</sup> Conventional geologists claim these trees grew in place and that over 20 separate eruptions covered as many separate forests over eons.<sup>4</sup> If so, then where are the roots and branches? Instead, some process stripped, sorted, and reburied these tree trunks.



Specimen Ridge

Lessons from the 1980 Mount St. Helens eruption offer a more fitting model. That historic blast snapped off a forest of trees at their roots, tore off their branches, and then dumped their trunks into Spirit Lake. Some became waterlogged and sank, thickest end down. They

landed upright in the volcanic debris at the lake bottom.<sup>7</sup> An even grander catastrophe must have razed, stripped, and interred the many petrified trees at Yellowstone.

The Flood's world-destroying violence had the energy to do this. Patterns of rock layers globally and around Specimen Ridge suggest these trees sank soon after the Flood crested on Day 150 (Genesis 7:24). Floodwaters likely ripped them from the high hills. As floodwaters flowed off Earth's surface, they jostled the logs in a moving debris mat. Some tree trunks settled vertically, and some sank faster than others. All the while, Yellowstone's eruptions trapped the trunks in wet volcanic debris and ash. The 20 different layers would have quickly formed one right after the other.



Drs. Tim Clarey and Frank Sherwin discuss Petrified Tree.

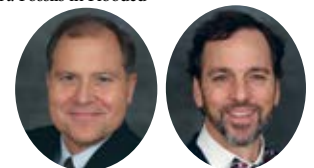
It's a tough hike to Specimen Ridge, but visitors can save their legs by taking a turnout to see Petrified Tree. This big tree grew when Noah was alive around 4,500 years ago. It was torn free by the waves, and the Flood buried it. Later, minerals in groundwater deposited minerals inside the wood to petrify it.<sup>8</sup>

Yellowstone's striking canyons and waterfalls showcase a recently carved landscape. Upright petrified tree trunks make stories of multiple forests sound improbable. And the park's clear evidence of the catastrophic forces that shaped it testify to the global Flood recorded in Genesis. 🙏

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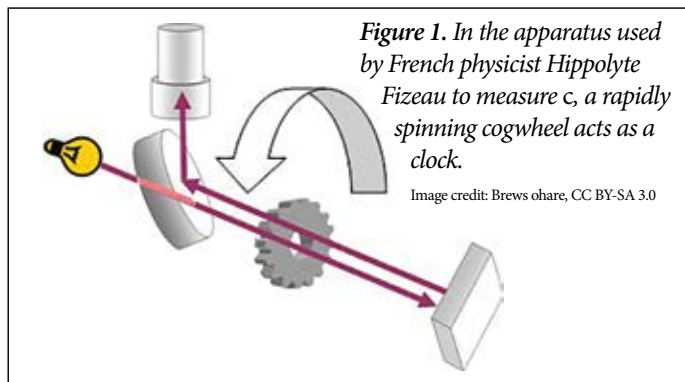


# Seeing Distant Starlight in a Young Universe

Many see distant starlight as an unanswerable objection to recent creation. Both creationist and evolutionist astronomers agree that distant galaxies are billions of light-years from us.<sup>1</sup> A light-year is about six trillion miles, the distance traveled by light in one year. So, shouldn't it take billions of years for distant starlight to reach us?

## Measuring the Speed of Light

Physicists use the letter  $c$  as the symbol for the speed of light. To determine  $c$ , very accurate clocks measure the time needed for light to bounce off a mirror and return to its starting point (Figure 1). For a distance of five meters between the light source and mirror, the measured speed is the round-trip distance of 10 meters divided by the total time for the trip. These measurements show that the speed of light,  $c$ , is 186,000 miles, or 300,000 kilometers, per second.



## Light Is Weird

The speed of light is rather weird, and this makes the issue more complicated than one might assume. The value of  $c$  is always 186,000 miles per second regardless of whether the light source is moving toward you, away from you, or standing still. If you stop and think about

## article highlights

- If the universe is young, how can we see galaxies billions of light-years from Earth?
- Creation critics should be aware that the Big Bang has its own version of this problem.
- Creationists have proposed different ways Einstein's theory of relativity could allow distant light to reach Earth quickly.
- Distant starlight is really a philosophical objection to recent creation, not a scientific one, and creationists offer plausible solutions that agree with known physics.

it, that's *really* counterintuitive. This is one of the details that led to Albert Einstein's theory of relativity, which allows for weird effects like clocks ticking at different rates.

It's ironic that episode four of the 2014 reboot of the science television series *Cosmos* explained how relativity theory invalidates our "commonsense" understanding of distance and time. However, that same episode used a "commonsense" understanding of distance and time to claim distant starlight rules out recent creation!<sup>2</sup>

## The Big Bang Model Has a Light/Time Problem

The Big Bang model has its own version of a distant starlight dilemma, the horizon problem.<sup>3</sup> It was one of several reasons Big Bang theorists tacked a process called inflation onto the Big Bang story.<sup>4</sup> Inflation solves those problems, but it creates others that are arguably even worse. Former proponents now harshly criticize inflation, claiming it isn't even a scientific theory.<sup>5</sup> Purported "smoking gun" evidence for inflation in 2014 was quickly retracted.<sup>6</sup>

Moreover, distant galaxies often seem more mature than expected by Big Bang reckoning. If one assumes distant starlight really does take billions of years to reach us, we should be seeing the most distant galaxies not as they are now but as they were more than 13 bil-

lion years ago, shortly after the supposed Big Bang. These most distant galaxies should look “immature” and “unevolved,” yet they routinely contradict this expectation.<sup>7</sup>

Conventional astronomers therefore claim galaxy evolution somehow occurs much faster than they thought. But this assertion does nothing to explain *how* galaxy evolution could occur, let alone so quickly, nor *why* their previous expectations were so wrong.

These observations mean that either there’s something wrong with evolutionary ideas about galaxy evolution, or the assumption that distant light takes billions of years to reach us is mistaken—or both.

### Supernatural or Natural Explanation?

Some might worry creationists are treading on “holy ground” by even attempting to explain distant starlight. The creation week was a time of unique supernatural activity, and we can’t expect to understand everything about it. In fact, we can’t expect to understand most of it! Even if we don’t know for certain, exploring the distant starlight question is worthwhile.

As discussed below, it’s at least theoretically possible that distant starlight might still be reaching us quickly even today. If that were the case, the correct explanation would not be a creation week miracle, since God finished His creative work by the end of Day 6 (Genesis 2:1-2). In that case, the explanation would be understandable in terms of normal physics.

Even if God used a miracle to get starlight to us quickly, we may be able to understand the effects of the miracle. For instance, if God decreed that  $c$  had a much higher value during the creation week, this is simply a miracle we can’t explain scientifically. But such a miracle might have left behind astronomical clues we can explain better than Big Bang advocates can. Hence, it’s useful from a theological perspective to try to understand how God brought distant starlight to Adam’s eyes, even if He used a miracle to do so.

### Can We Even Talk About a Distant Light Problem?

Remember that physicists measure  $c$  by bouncing light off a mirror and measuring the total round-trip time. You might wonder “Why do you need a mirror? Why not just use two clocks separated by some distance?”

The speed of light is so fast that you’d need precisely synchronized clocks to keep from getting a wildly erroneous answer. However, according to well-established relativity theory, even if two clocks next to one another start out synchronized, the very act of moving one of the clocks causes them to become unsynchronized. Despite many clever attempts, no one has ever figured out a way to get around this difficulty. Apparently, it’s impossible to measure the one-way speed of light.

But if measuring the one-way speed of light is impossible, then it’s also impossible to calculate the time for distant starlight to reach us. That travel time is apparently unknowable. And if this travel time

is unknowable, can we even talk about a light travel time problem? Is such a problem even real?

Even conventional physicists have acknowledged it’s theoretically possible that light from distant stars could reach us in no time at all, provided the outbound speed of light is  $c/2$ .<sup>8</sup> This would imply we’re seeing the universe in real time, with no time lag.

### Relativity Theory to the Rescue?

As the above discussion suggests, most creationists think Einstein’s theory of relativity is the key to answering this question.<sup>9</sup> They’ve generally taken two approaches to this issue. One involves our inability to measure the one-way speed of light. This inability is closely related to the fact that according to relativity theory, events seen by one observer as happening at the same time don’t necessarily have to be seen as simultaneous by another observer.

A second approach, first proposed by physicist Dr. Russell Humphreys,<sup>10</sup> makes use of something called time dilation. Both theory and experiment indicate that clocks can tick at different rates due to differences in gravity. To put it simply, gravity makes clocks tick slower. This raises the possibility that clocks in deep space could tick much faster than clocks on Earth, allowing billions of years since creation to elapse in deep space but only 6,000 years as measured by clocks on Earth.<sup>11</sup>

These approaches have their pros and cons. As discussed below, time dilation seems better able to explain deep-space observations that imply vast ages, such as colliding galaxies (Figure 2). But other creationists question whether Humphreys’ original time dilation model is capable of providing the billions of years of gravitational time dilation needed for it to work.<sup>12</sup>



*Figure 2. Given the great distances and slow relative speeds between them, collisions between galaxies seem to require millions of years. This suggests that clocks in deep space have ticked much, much faster than clocks here on Earth.*

Image credit: NASA, ESA



An infinitely fast inbound speed of light is an easy-to-understand way to answer the distant starlight objection, but many see it as philosophically and scientifically unsatisfying. An even bigger issue is that galaxies are usually so far apart that one wouldn't expect collisions between them to occur in just 6,000 years. Yet, computer simulations do a very good job of reproducing the appearances of colliding galaxies.<sup>13</sup> This strongly suggests that these collisions are the result of real processes over time and not simply illusions caused by God creating some galaxies very close to one another.

## A New Suggestion

Recently, Humphreys proposed a theological option in which God caused  $c$  in deep space to be much greater on Days 1 through 4 of the creation week. Interested readers may view his explanation online.<sup>14</sup> Although it's too early to unreservedly endorse, this option appeals to me for a couple of reasons.

A much higher deep-space speed of light is a fairly obvious way to get distant starlight to us quickly. And by limiting this higher value of  $c$  to Days 1 through 4 of the creation week, it avoids some potential problems that plagued previous "faster speed of light" creationist proposals.

But there's an added bonus. Many people are aware that  $c$  is the "cosmic speed limit" controlling how fast objects can move through space.<sup>15</sup> But they may not be aware that  $c$  also controls how fast objects travel through *time*.

In relativity theory, time can be thought of as a dimension like length, height, and width. These four dimensions intertwine to form what physicists call spacetime. All objects travel through spacetime at the speed of light  $c$ , as physicist Lewis Epstein explains:

Why can't you travel faster than light? THE REASON YOU CAN'T GO FASTER THAN THE SPEED OF LIGHT IS THAT YOU CAN'T GO SLOWER. THERE IS ONLY ONE SPEED [through spacetime]. EVERYTHING, INCLUDING YOU, IS ALWAYS MOVING AT THE SPEED OF LIGHT.<sup>16</sup>

Note that you aren't moving through space at  $c$  but through spacetime at  $c$ .<sup>17</sup> Some of that speed  $c$  is moving you through space, and some of it is moving you through time. Epstein continues:

If your speed through spacetime could be increased, that increase could be used to increase your speed through time or through space or a combination of the two. But no one knows how to increase it.<sup>16</sup>

No one, that is, except the Lord Jesus! He could have decreed that on Days 1 through 4,  $c$  in deep space was trillions of times greater than  $c$  near Earth. Because  $c$  controls how fast objects move through spacetime, this would automatically imply deep-space objects were moving through spacetime trillions of times faster.

That implies that deep-space clocks were ticking trillions of times faster than clocks on or near Earth. This would give ample

time (as measured by clocks "out there") to explain deep-space observations implying long ages while also getting distant starlight to us quickly.

Creation critics may not like the suggestion that  $c$  in deep space was once much greater than it is now. But since none of us can actually measure  $c$  in deep space (either now or in the past), this is a philosophical objection, not a scientific one. Within a biblical worldview, it makes perfect sense that the Lord Jesus might have done something like this. After all, He indicated in His Word His intention to get light to Earth quickly (Genesis 1:14-19).

## Conclusion

The skeptic can only use distant starlight as an argument against recent creation by making unproven (and likely unprovable) assumptions. He also has to ignore similar difficulties in the Big Bang model. So, despite superficial appearances, distant starlight is really a philosophical objection to recent creation, not a scientific one.<sup>18</sup>

Creation scientists haven't yet nailed down all the details of the answer to this question, but by rejecting dubious evolutionary philosophical assumptions, they offer plausible solutions that agree with known physics. 🙏📖

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# The Bobtail Squid's Living Cloaking Device

**H**awaiian bobtail squid (*Euprymna scolopes*) live among the sand flats and sea plants of the Hawaiian archipelago. Along with other bobtail squid, these lime-size ocean dwellers glow in the dark. The ability to glow in the dark has multiple purposes, including aiding the ability to find a mate.

Scientists spend whole careers trying to figure out how these squid lights work. Bioluminescent bacteria named *Vibrio fischeri* colonize unique light organs *inside* the squid's bodies. The squid feed the bacteria, and the bacteria light up.

Simple, right? Well, it's simple to look at but intricate in its setup and function. Bobtail squid light organs have lenses and reflectors to control light direction and intensity, filters to control light color, and expandable ink sacs to control light volume (illumination). It needs all these parts to match its glow with the ever-shifting moon glow from above.

A closer look at the required interactions between germ and squid reinforces faith in the Creator revealed in the Bible.

## Lighting the Lamp

Bobtail squid are the size of a fruit fly when they hatch. They need to light their lamps before they can start cloaking and then feeding. They spend their first 48 hours of life prepping their light organs.

The light organ has several perfectly integrated parts. These include six crypts—three on each side of their bodies. The crypts nurse pure colonies of *Vibrio fischeri*. Bobtail squid use three specific steps to culture *V. fischeri* out of hundreds of bacteria floating in ocean waters.

### Step 1. Select *Vibrio*

At birth, bobtail squid have lobes just outside their light organs. The skin there makes mucous when it detects bacterial cell walls. Tiny ports lie at the base of each lobe. The ports lead to ducts lined with cilia spaced two microns apart. This keeps out all microbes except bacteria, which are about two microns wide.

The cilia wave like microscopic pool noodles that push microbes out—the opposite direction that *Euprymna* needs *Vibrio* to go. Squid tissues kill microbes with nitric oxide and acid. *Vibrio* come already equipped to endure those conditions on their journey to the crypt.

### Step 2. Nurse the *Vibrio*

Squid tissue releases chemicals that attract *Vibrio* down the ducts toward each crypt. One *Vibrio* cell enters each crypt after the squid's first six hours of life. The squid's protective crypt feeds *Vibrio* with sugar and amino acids in solution, like plant nectar. *Vibrio* notify the squid when they have grown into a colony.

### Step 3. Make *Vibrio* Glow

Bobtail squid tissues sense and interpret bacterial cell wall chemicals as saying, "This crypt is full, so would you please fold up your welcome mat?" Once *Vibrio* tells the squid to finish forming its light organ, the squid narrows its ducts to keep out invaders, absorbs the welcoming lobes it no longer needs, and finishes forming lenses.<sup>1</sup>

Without *Vibrio*, the squid cannot turn on its lights. Without the squid, *Vibrio* don't stay lit. Since this relationship shows such strong purpose, it stands to reason that it was made on purpose. In fact, the *Vibrio* and squid could never relate to each other unless each had a highly engineered interface system that facilitated the exchanges in information and materials.<sup>2</sup>

## Squid's Stacks of Craftwork

Bobtail squid light organs have vent ports. The animal squirts about 95% of each day's bacterial growth out the vents just before dawn. (More on this later.) The squid nurtures new bacterial growth while it stays hidden in the sand during the day. It turns out that God designed bobtail squid to culture bacteria long before microbiologists began doing it.



*Euprymna* comes stacked with many more jaw-dropping design features. It can glue sand to its skin every morning. This makes great camouflage. It shoots ink to distract predators. Its Creator positioned that same ink sac as a backdrop for the light organ, like the black layer behind a mirror.

Plus, a bobtail squid changes the color of its skin to match its surroundings. These three features combine with its cloaking device to help these little guys thrive in a big ocean. Features like these showcase the Creator's handiwork in unique ways. But there's even more to their light organs.

### The Daily Dance

The light organ crypt cells begin daily cycles two days after the bobtail squid hatches. Researchers discovered that just before dawn and right after the squid has vented most of its light-making germs, the squid's cells upregulate genes that code for structural proteins. Once built, the new proteins resurface the lining that will interface with that day's *Vibrio* growth. Then just after dawn, the squid cells downregulate—turn off—those same genes.<sup>3</sup> It spends the morning hours, while covered in sand, equipping each crypt to nurse its few remaining *Vibrio* cells into a full batch.

How does *Euprymna* know when to start and stop these daily cycles? The bacteria tell them!<sup>4</sup> The germs use light and chemicals to signal squid cells when to upregulate and downregulate the squid's genes. They were made for each other.

### How Do *Vibrio* Glow?

The bacteria don't start converting chemical energy into light energy until they have reached a certain cell density. Each bacterial cell exports molecules called 3-oxohexanoyl-homoserine lactone. They fit like keys into locks found along *Vibrio* cell walls. Each cell counts how many of its locks the chemical keys have turned. Just like man-made threshold sensors,<sup>5</sup> this living sensor turns on its suite of light-making enzymes only after it has counted a preprogrammed number of these chemical keys.

Keys only work if they are the exact shape that fits the lock. In other words, they were made together and on purpose. It turns out that the Creator made locks and keys long before human locksmiths got into the trade.

When the bacteria live in seawater, *Vibrio* keys just drift away, and the bacteria won't light up. So, the confined space of each crypt is critical to lighting the bacterial glow lamps. These two very different creatures work in intimate harmony throughout the squid's life.

### Martyr Cells

Each crypt has armed guards called hemocytes. They scour the

## article highlights

- Hawaiian bobtail squid glow in the dark via an intricate symbiotic relationship with a specific type of bioluminescent bacteria.
- This squid can also change the color of its skin to match its surroundings.
- These remarkable camouflage and glowing abilities shout design.

place for bad bacteria. If invaders took over, the squid would no longer glow.

Every day new hemocytes travel from the bloodstream into the crypts. After they finish guard duty, they die to feed the growing *Vibrio*. These armed guards become self-sacrificing nurses. Who programmed these particular hemocytes to provide the needed food for *Vibrio*?

### Back to the Beginning


So many core components have to be in place for bobtail squid to live. How could these remarkable systems possibly evolve?

Some see time as a substitute engineer when they talk about how this intricate symbiosis arose. Bobtail squid and their glowing bacteria buddies have supposedly been living together so long that they have adapted to help each other perfectly. Any problem with this idea?

Well, for starters, time does not build cool stuff. It instead allows more opportunity for pre-existing systems to break down, diffuse, cool off, lose energy, and lose information, as undirected (natural) processes always do.<sup>6</sup>

Who would look at the precise interface between, say, a cell phone and its charge cord and think, "Well, I suppose charge cords and cell phones have been together so long that they shaped themselves for each other"? Time merely allows more opportunity for the cell phone to lose charge or for the cord plug to bend out of shape.

These squid need *Vibrio*. They therefore need every part of their systems that attract and maintain those *Vibrio*. They even needed—from the very start—their ability to "talk" with *Vibrio* and *Vibrio* with them via highly engineered interface systems. Without all this in place from the beginning, we would have no Hawaiian bobtail squid to marvel at.

Evolutionary thinking calls upon a god of long ages working through random changes to perform what could only have occurred in an instant—bobtail squid/bacteria symbiosis. And it turns out the Bible describes a Creator who "commanded, and it stood fast."<sup>7</sup> No time required. Just Christ Jesus our Creator. He made this symbiotic light organ to illuminate His handiwork. 

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# Asia Data Confirm Progressive Global Flood

The Institute for Creation Research's Column Project team recently finished a two-year study of Asia. We have now accumulated column data across five of the world's continents, with Australia in progress and Antarctica in the future. Our results reinforce earlier findings of a progressive global flood (Figure 1).<sup>1-3</sup>

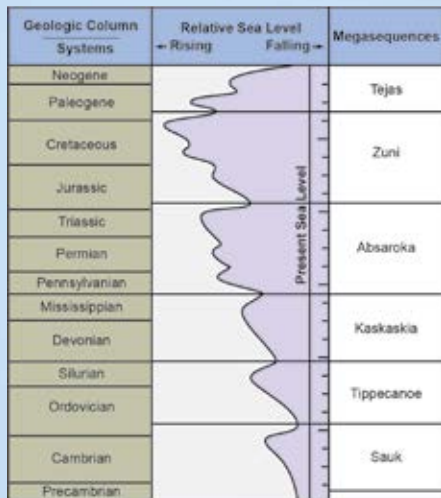


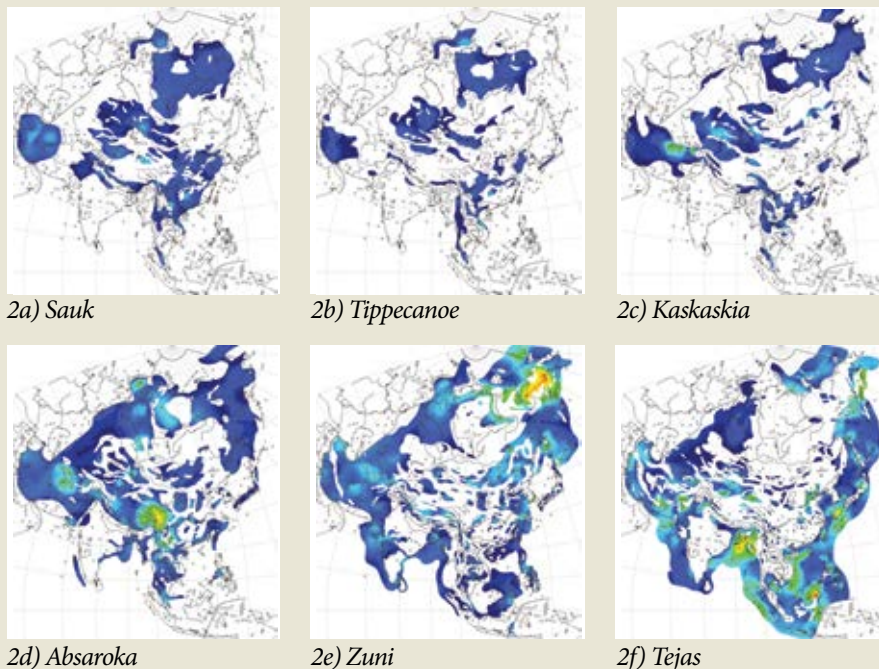
Figure 1. Megasequence/geologic column chart and relative sea level curve for the Flood year

## article highlights

- ICR's Column Project now has compiled stratigraphic data on five of Earth's continents.
- The data from Asia match the other continents studied in providing strong evidence of the progressive nature of the Flood.
- The data also reflect the enormous uplift of the Himalayas during the Flood year, when runoff caused significant erosion and offshore deposits.
- More than ever, we can be sure there was a global flood as described in Genesis

We compiled a total of 784 stratigraphic columns across the Asian continent and surrounding offshore regions. The columns were derived directly from oil industry wells, published cross-sections, surface outcrops, and seismic data. Maps of the surface extent and thicknesses by megasequence are shown in Figure 2. A graph of the percent surface area to total area for each megasequence is shown in Figure 3.

Figure 2. Thickness and extent maps of sedimentary layers by megasequence for Asia



2d) Absaroka

2e) Zuni

2f) Tejas

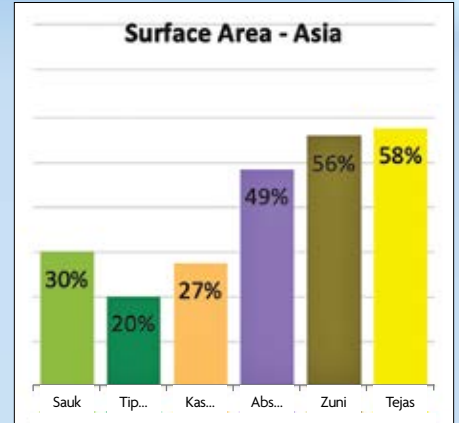


Figure 3. Graph of percent surface area covered by megasequence for Asia

The maps and the graph show that Asia follows the same general patterns of North and South America, Africa, and Europe.<sup>2</sup> Similar patterns on every continent are strong evidence of the progressive nature of the global Flood.

## Asia Peaks in the Tejas

The first three megasequences (Sauk, Tippecanoe, and Kaskaskia) across Asia show the least surface coverage (20 to 30%) and generally stack on top of one another (Figure 3). This is also what we observed across the other four continents.<sup>2</sup> These areas likely represent pre-Flood shallow seas surrounding the continents, possibly delineating the extent of the Flood through the first 40 days.<sup>4</sup> The Absaroka Megasequence shows a sharp increase in surface coverage to 49%, followed by substantially more coverage in the Zuni (56%) and the Tejas (58%) (Figure 3).

Not surprisingly, the sediment volumes for each megasequence show similar patterns (Figure 4). The first three megasequences show the lowest volume of sediment deposited (4 to 8%). The Absaroka (15%) nearly doubles the volume of any earlier megasequence, and the Zuni also shows a steady increase in volume to 22%. And like



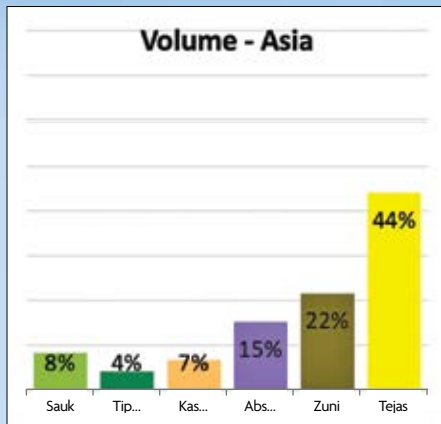


Figure 4. Graph of percent volume by megasequence for Asia

the surface area, the Tejas Megasequence exhibits the highest volume of sediment. It jumps dramatically to 44% of the total sediment by megasequence.

In our earlier reports, we found that the surface area and the sediment volumes generally both peaked in the Zuni.<sup>1,2,4</sup> When we add Asia to the other four continents (Figures 5 and 6), we see that the global total surface coverage still peaks in the Zuni. We believe this denotes the high point of the Flood on Day 150 (Genesis 7:24).

Prior to our study of Asia, the peak in volume was in the Zuni at 35% of the total volume deposited. Adding Asia to the mix shifts the peak for the largest amount of global sediment volume to the Tejas. In fact, we find that 36% of the total volume of sediment deposited in the Flood year was during the Tejas—more than any other megasequence (Figure 6). The Zuni is now second

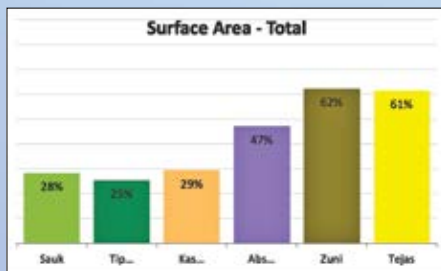


Figure 5. Graph of percent surface area covered by megasequence for five continents

at 30%. Recall, the Tejas comprises the bulk of the Cenozoic (Tertiary) sediments prior to the Ice Age and is considered to be the receding phase of the Flood.<sup>4</sup>

### Late Flood Collision Between India and Asia

Why is the Tejas thicker in and around Asia? Substantial catastrophic tectonic plate movement was still occurring during the post-Zuni receding phase of the Flood. In fact, over one-third of today's ocean crust formed during the Tejas.<sup>4</sup> Part of this plate movement involved the collision of the sub-continent of India with Asia. This occurred midway through the Tejas, creating the Himalayan Mountains and tremendous uplift across central Asia.

Because this occurred during the runoff phase, it caused immense erosion of the uplifted regions. These eroded materials were transported offshore as the receding phase continued to drain water off the land. Note the yellow areas in the Bay of Bengal and the offshore regions surrounding Southeast Asia and China in Figure 2f. These are the thickest deposits of Tejas sediment.

### Tejas Volume Supports a High Flood/Post-Flood Boundary

The enormous uplift and erosion that took place in southern Asia late in the Flood year appear to be the driving force that generated the increased offshore Tejas sediment, so much so that it altered the world

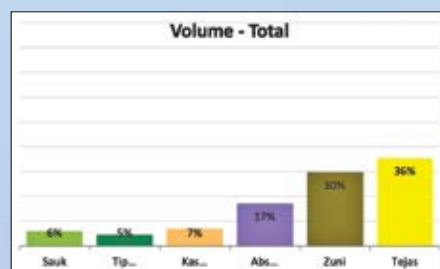


Figure 6. Graph of percent volume by megasequence for five continents

totals (Figure 6). We still think, though, that the high point of the Flood (Day 150) was most likely near the end of the Zuni Megasequence since it covers the maximum surface area (Figure 5).<sup>4</sup>

The tremendous amount of tectonic plate motion during the Tejas, the volume of sediment transported offshore, and the offshore Tejas coal beds<sup>5</sup> all independently support a high Flood/post-Flood boundary. We maintain that the best location for the boundary is at the top of the Tejas, the N-Q boundary (Neogene-Quaternary), just below the Ice Age sediments (Figure 1).<sup>4</sup>

### Progressive Flood Confirmed

The stratigraphy across Asia and the other four continents demonstrates the progressive nature of the global Flood. All of the continents studied so far begin with minimal flooding followed by marked increases in surface area coverage and sediment volume.

Our interpretation is confirmed that the first three megasequences (Sauk, Tippecanoe, and Kaskaskia) represent the first 40 or so days of the Flood, and the Absaroka and Zuni the next 110 days of the rising Flood.<sup>4</sup> In addition, the Tejas is verified as the receding phase, deposited during Days 150 to 314 of the Flood year.<sup>4</sup>

After examining the rock record across five continents, we can now be more assured than ever that there was a global flood as described in Genesis. The rocks don't lie! 🌊

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Dr. Clarey is Research Scientist at the Institute for Creation Research and earned his Ph.D. in geology from Western Michigan University.

Nitrogen is vital for human survival, yet few appreciate how lightning and soil bacteria contribute to Earth's nitrogen cycle.

That Earth's nitrogen cycle serves us as it does, reliably enabling our bodies to live and grow, proves God's providential care for His creatures. To illustrate, we receive nitrogen in chemically usable forms whenever we consume fish, eggs, legumes, and/or dairy products.<sup>1,2</sup>

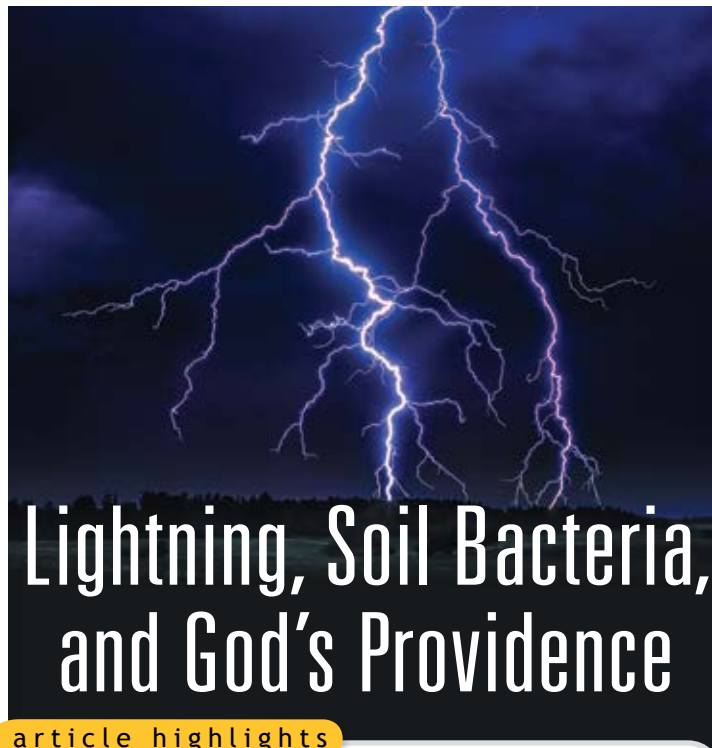
In contrast, consider how carbohydrate production is popularly appreciated. Photosynthesis is routinely taught in K-12 schools.<sup>3</sup> But what about the nitrogen-containing foods our bodies need to build peptides for proteins and nucleotides for DNA and RNA? Because we need proteins, RNA, and DNA, we must constantly consume usable nitrogen in our diets.<sup>3</sup>

Although nitrogen is plentiful on Earth, not all forms are metabolically usable.<sup>2</sup> Earth's atmosphere is almost 80% nitrogen gas consisting of diatomic nitrogen (dinitrogen), but dinitrogen isn't directly useful for building essential amino acids or nucleotides.<sup>2</sup> So, we need providential processes to somehow solve that nutrition problem.

Thankfully, the greatest systems engineer, the Lord Jesus Christ, designed and programmed Earth's nitrogen cycle, so gazillions of moving parts purposefully perform gazillions of nitrogen-harnessed services that benefit Earth's ecosystems in general, as well as our bodies in particular.

For example, lightning breaks apart dinitrogen gas (which, apart from lightning's heat and energy, is normally stable) in the atmosphere to recombine nitrogen and oxygen into nitrogen oxides such as NO and NO<sub>2</sub>. If raincloud moisture (H<sub>2</sub>O) interacts with nitrogen oxides so that acidic hydrogen is bonded, nitrous acid (HNO<sub>2</sub>) or nitric acid (HNO<sub>3</sub>) can result, falling into soil and allowing water-soluble nitrates (NO<sub>3</sub><sup>-</sup>) to form as "fixed" nitrogen.<sup>2</sup>

Much more nitrogen-fixing is accomplished by "nitrifying" soil bacteria (e.g., *Azotobacter* or *Rhizobium*) or cyanobacteria (e.g., *Anabaena*) that quietly convert nitrogen gas into usable nitrogen compounds (N<sub>2</sub> → N<sub>3</sub>, then N<sub>3</sub> + O<sub>2</sub> → NO<sub>2</sub><sup>-</sup> or NO<sub>3</sub><sup>-</sup>) in ongoing chemical reactions that busily occur 24/7 at microscopic levels—of-



article highlights

- We need nitrogen for our bodies to live and grow.
- Lightning and soil bacteria convert nitrogen into a metabolically usable form.
- Earth's nitrogen cycle was beautifully designed for our benefit, revealing our Creator's providential care for His creatures.

ten in symbiotic relationships between fungi and leguminous plants.<sup>4</sup>

Meanwhile, Earth's global nitrogen cycle requires a systematically dynamic equilibrium, so counterbalancing denitrifying processes are also needed.


Some bacteria are constantly "fixing" nitrogen into an absorbable form, while other types of bacteria are constantly "denitrifying" it into a gas [N<sub>2</sub>]. These processes balance one another to maintain life-appropriate amounts of both absorbable and inert nitrogen.<sup>2</sup>

As ICR's Dr. Brian Thomas observed, this systems-engineering operation is purposeful and well-balanced.

At the smallest level, the enzymatic machinery in each kind of bacterium

is stunningly well-engineered. At a much larger level, the continued maintenance of the overall nitrogen cycle by soil bacteria in varying environments is a well-designed meta-system. And all of it had to be put in place at the same time in the beginning in order for life to exist, just as Scripture teaches.<sup>2</sup>

But there's more. Nitrogen cycle eco-engineering is not limited to producing nutritional health benefits. In the case of Texas bluebonnets (*Lupinus texensis*)—a nitrogen-fixing leguminous lupine—God clothes eco-engineering with brilliant beauty beyond that of King Solomon's most glorious garments.<sup>4</sup>

The engineering and artistry surrounding us reveal the glory of our Creator Jesus Christ's handiwork. We just have to look to see it. 

References

1. Acts 14:17 (food demonstrates God's caring providence); Luke 11:11-13 (fish and poultry eggs are good sources of nutrition); 1 Peter 2:2 (milk is good for growth).
2. Thomas, B. New Insights into Earth's Nitrogen-Balancing System. *Creation Science Update*. Posted on ICR.org November 21, 2011, accessed May 5, 2022; Hill, R. D., R. G. Rinker, and H. D. Wilson. 1980. Atmospheric Nitrogen Fixation by Lightning. *Journal of the Atmospheric Sciences*. 37 (1): 179-192.
3. Sunlight energy is harnessed by chlorophyll-equipped plants to produce organic carbon products that we need, such as carbohydrates (like sugars and starches). It's an oversimplification fallacy to say human diets mostly need food energy via carbohydrate consumption, yet food pyramids promoted during the 20th century misleadingly promoted that error. E.g., see Nestle, M. 1993. Food Lobbies, the Food Pyramid, and U.S. Nutrition Policy. *International Journal of Health Services*. 23 (3): 483-496.
4. Johnson, J. J. S. It's Bluebonnet Season! *Creation Science Update*. Posted on ICR.org April 3, 2020, accessed May 5, 2022. See also Matthew 6:28b-29 and Luke 12:27.

Dr. Johnson is Associate Professor of Apologetics and Chief Academic Officer at the Institute for Creation Research.





# To the End of the Earth

The book of Acts recounts the apostles' journeys across the Roman Empire from Jerusalem and Judea "to the end of the earth," preaching the good news of Jesus Christ (Acts 1:8). They frequently faced fierce opposition in carrying out the Great Commission. But they also were greatly encouraged by the generous and sacrificial support of fellow Christians who gave to help them carry out their mission (Philippians 4:10-20). Where would we be today if those early believers hadn't helped spread the message of salvation through Jesus Christ?

Like the apostles, ICR scientists are sent out to urge those who believe in the false claims of evolution and the misled conclusions of conventional science to turn instead "to the living God, who made the heaven, the earth, the sea, and all things that are in them" (Acts 14:15). ICR scientists travel to various cities, speaking at events to encourage and equip saints, and challenge unbelievers, with the scientific truth that confirms creation as described in Genesis.

An ICR scientist's work can be wearisome and discouraging in a world full of opposition and skepticism. But the Lord uses



Ruins of ancient Philippi

many encouraging testimonies, often from attendees at ICR events, about how ICR has impacted people in powerful and life-changing ways. It's always inspiring to hear how a well-researched article, a helpful book, a timely radio broadcast, a carefully delivered presentation, or a challenging debate changed the life of a person from doubting God's Word to trusting in its accuracy and clarity from its beginning.

In 1941, a series of creation presentations had a ripple effect for decades to come as they changed the life of a young man named Henry M. Morris. A recent college graduate, he joined the highway department as an engineer, designing roads and bridges. As a boy, Henry was taught what the Bible said about creation, but years of evolutionary teaching had left doubts in his mind about the historical and scientific accuracy of the Genesis account.

That changed when Dr. Irwin Moon of the Moody Institute of Science visited Henry's home church in El Paso, Texas, and gave his "Sermons on Science." Those Genesis-affirming presentations precipitated a reorienting of young Henry's life mission toward studying God's world in light of God's Word and sharing those faith-fueling findings with God's people. Where would we be today if Dr. Moon hadn't given those presentations,

or if Dr. Morris hadn't followed the calling on his life that came through those presentations? He subsequently led many to the truthfulness of the Bible and founded ICR in 1970.

The work of ICR scientists is vital to the building up and equipping of the saints, but bringing scientific and scriptural evidence for creation to a world thirsty for the truth comes at a cost. Your support of ICR makes possible resources like *Acts & Facts*, new books and video productions, and, of course, opportunities for our scientists to share the message about creation and its Creator, the Lord Jesus, with thousands of people every year across the country.

We can't know who the next young Henry Morris in the audience might be, but we strive to faithfully share the message accurately and courageously so that lives are changed by the power of Jesus Christ. Your prayerful and practical support to spread the message of the truth about creation and our Creator Jesus Christ will have a life-altering impact on someone. We thank the Lord Jesus for your partnership in sharing the gospel and seeing lives changed through this important ministry work. 🙏

Mr. Kautt is Director of Events at the Institute for Creation Research.



## article highlights

- ICR scientists travel far and wide to teach Christians about biblical creation.
- Emissaries of creation science like Drs. Irwin Moon and Henry Morris have had a profound influence on the lives of millions, and at ICR we follow in their footsteps.
- Please stand alongside ICR as we spread the truth of Genesis and our Creator Jesus Christ.

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**Been to a couple of creation museums, and [the ICR Discovery Center] beats them by miles.** Take your time and enjoy all the exhibits. Nice to have volunteers who enjoy what they do  
— M. O.



I love your magazine *Acts & Facts* and the devotional *Days of Praise*. I have enjoyed creation research ever since I was a kid. As a 39-year-old father of five kids, I am passing on this enthusiasm. ***Acts & Facts* is one tool I use to do that.**  
— H. Y.



I truly appreciate how Dr. Randy Guliuzza articulates so clearly and understandably the purpose, principles, facts, and ideas that make up the ministry and scientific research of ICR...as do the other researchers, writers, and speakers in the organization. Indeed, the multiple dimensions of your media and outreach make your invaluable research and information accessible to all ages.

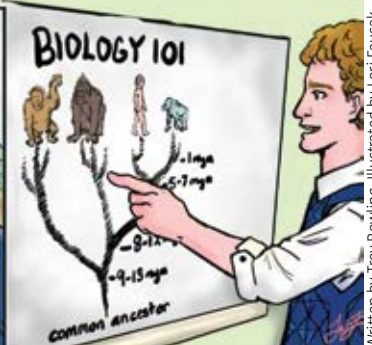
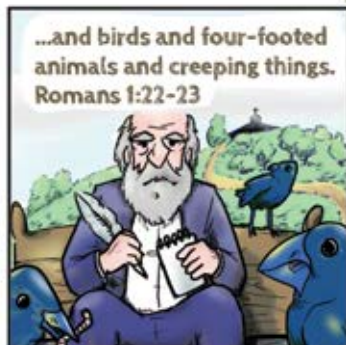
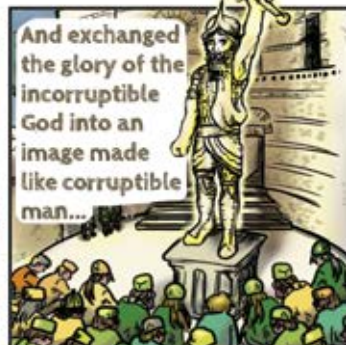
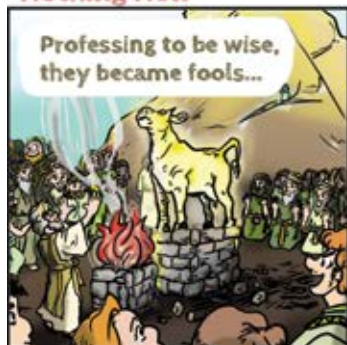
What's more, the humility expressed by your organization is so very evident. I was impressed with this as I read the recent article by Dr. Guliuzza "Finding Biblical Clues to Design" [January/February 2022 *Acts & Facts*], where he gave credit to those who have gone before him, such as Dr. Russ Humphreys and Dr. Henry M. Morris. **And most of all, credit is always primarily given to Almighty God, Jesus Christ, and the Holy Spirit.**  
— F. W. S.



This ["Christian Courage Is Imperative," March/April 2022 *Acts & Facts*] is the best non-science article these guys have put out. They call out the fear from the pulpit that's infesting our churches. Not only with preaching creation but pretty much any difficult issue of the day. Pastors refuse to preach about sexual immorality, abortion, same-sex marriage, gender, and Bible-based politics. Even hearing a sermon about sin is rare. Most pastors preach about strengthening your already existing relationships with people. If you do hear a sermon about the Flood, it's taught as a symbolic message of salvation. They never will say the Flood literally happened, nor



**Nothing New**



Written by Trey Bowling, illustrated by Lori Fausak

will they say it didn't. **A sermon should never be based on what congregants want to hear but what they NEED to hear. Pastors really shouldn't fear offending people. Jesus offended people all the time.**

Pastors constantly tell us to step out in faith when it comes to tithing. Why won't they step out in faith when it comes to teaching? They might lose some members at first, but the Lord will replace them with more people. People who are desperate for truth and guidance.  
— B. K.



We took our third graders on a field trip [to the ICR Discovery Center]...It was a fun, educational, and inspirational day. Parents and students alike loved it. **"Best trip ever" was the comment I heard from many kids.** To see creation happen gave me goosebumps. To see our planets up close in the planetarium, amazing. And such unique books, pictures, postcards, puzzles, and gifts from the gift shop. The gals who welcomed us as we came in, to the volunteers in each section made it a memorable day! All agreed, we'll come back.  
— S. A.



I'm a new subscriber to *Acts & Facts* and *Days of Praise*. Both magazines are superb and extremely well-researched, written, and educational, as is your terrific website. Wish I'd found ICR years ago. ***Days of Praise* is one of the best (if not the best) Bible study/devotional I've ever come across.**  
— M. N.



*Thank you so much for the package, you made her entire week!*  
— E. R.

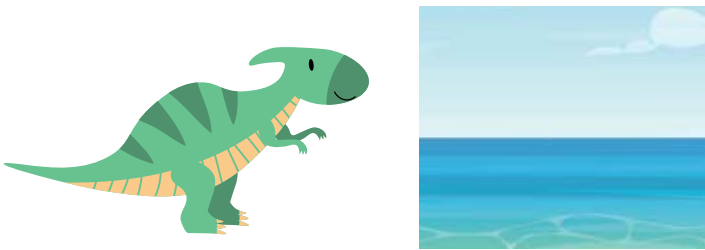
Have a comment? Email [Editor@ICR.org](mailto:Editor@ICR.org) or write to Editor, P. O. Box 59029, Dallas, TX 75229. **Unfortunately, ICR is unable to respond to all correspondence or accept unsolicited manuscripts, books, email attachments, or other materials.**



Earth is called the Goldilocks Planet because it's just right for life. Its just-right distance from the sun makes it not too hot and not too cold. Earth is also tilted at enough of an angle to cause our changing seasons—fall, winter, summer, and spring. Did you also know. . .

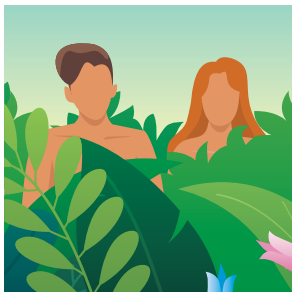
- ✓ The Lord Jesus made the sun, moon, and stars on Day 4 of the creation week. But He spent most days of the creation week perfecting Earth.
- ✓ Earth's temperatures allow water to remain in liquid form in most places of the world. People and animals couldn't live without water.
- ✓ Life has not been found on any other planet. And no known planet other than Earth has the ideal conditions for life.
- ✓ Earth's mountains, rocks, oceans, and trees—and the living creatures dwelling there—reveal God's kindness, power, and creativity each and every day.

On which creation day were each of these created? Read Genesis 1 for clues.



1. \_\_\_\_\_

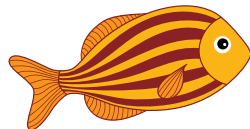
2. \_\_\_\_\_



4. \_\_\_\_\_



3. \_\_\_\_\_



5. \_\_\_\_\_



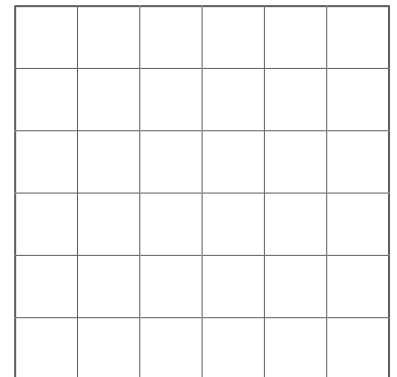
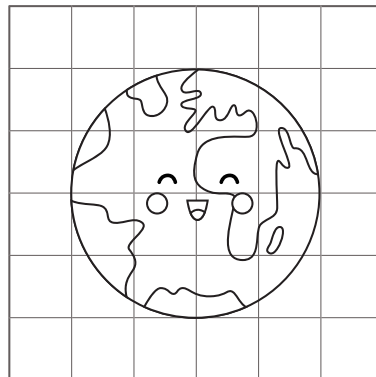
### DOWN

1. Earth is tilted at enough of an angle to cause \_\_\_\_\_, like summer and fall.
2. God made grass and trees grow on the earth on Day \_\_\_\_\_ of the creation week (Genesis 1:11–13).

### ACROSS

3. \_\_\_\_\_ is our home and the third-closest planet to the sun.
4. Earth is known as the \_\_\_\_\_ Planet because it's just right for life.

Copy the picture in the squares on the right and color.



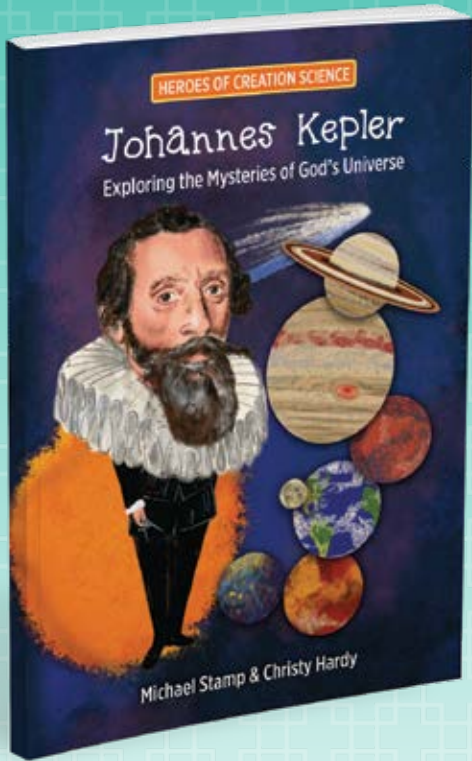
Day of creation: 1. Day 6; 2. Day 2; 3. Day 2; 4. Day 5; 5. Day 5; 6. Day 5; 7. Day 5; 8. Day 5; 9. Day 5; 10. Day 5  
 Crossword puzzle: 1. seasons, 2. three, 3. Earth, 4. Goldilocks

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