

Grace Killian:
Good morning.

Congregation:
Good morning.

Grace Killian:
Welcome to Morning Prayers. Our responsive reading is 154 in your black Appleton Psalter. Will you please stand? "Happy is the man that findeth wisdom and the man that obtaineth understanding."

Congregation:
"For the merchandise of it is better than the merchandise of silver. And the gain thereof than fine gold."

Grace Killian:
"She is more precious than rubies, and all the things thou canst desire are not to be compared unto her."

Congregation:
"Length of days is in her right hand. In her left hand are riches and honour."

Grace Killian:
"Her ways are ways of pleasantness, and all her paths are peace."

Congregation:
"She is a tree of life to them that lay hold upon her, and happy is every one that holdest her fast."

Grace Killian:
"The LORD by wisdom founded the earth. By understanding, He established the heavens."

Congregation:
"By His knowledge, the depths were broken up, and the skies drop down the dew."

Grace Killian:
"My son, let not them depart from thine eyes. Keep sound wisdom and discretion."

Congregation:
"So shall they be life unto thy soul, and grace to thy neck."

Grace Killian:
"Then shalt thou walk in thy way securely, and thou shalt not dash thy foot."

Congregation:
"When thou liest down, thou shalt not be afraid. Yea, thou shalt lie down, and thy sleep shall be sweet."

Grace Killian:

Be not afraid of sudden terror, neither of the destruction of the wicked, when it cometh.
For the LORD will be thy confidence, and will keep thy foot from being caught."

Choir:

(singing)

John Penniston:

My text is taken from this morning's reading. "The Lord by wisdom founded the earth. By understanding, He established the heavens." Perhaps we can interpret these words more literally today than we would have dared to do 50 years ago. Like a human artist, God has put a signature on his work. This signature isn't in letters but is embedded in six physical numbers which determine the nature of our universe. Astronomers have found that these numbers have a unique set of values, and scientists realize more and more that only with this set of values could life, planets, stars, or even matter exist. Evidence that our universe could not have happened by accident has been accumulating in recent years.

John Penniston:

If our universe didn't happen by accident, it must've happened by design. To illustrate the narrow range within which these six numbers must lie, I'll discuss one case. The number that I'll discuss is Epsilon, the proportion of the mass of protons and neutrons, which is converted to energy upon fusion. In our universe, Epsilon is 0.007. That is 0.7% of the mass of the protons and neutrons is converted to energy when they combined to form helium. That's not much of a mass, but it still produces a lot of energy. This energy keeps our sun and all the stars bright. It lights our day and plants absorbent to produce our food.

John Penniston:

The value of Epsilon is related to the strength of the force which holds nuclei together. If the nuclear force were weaker, giving a value for Epsilon of 0.006, fusion could not occur because the nuclear force wouldn't be strong enough to overcome the electrical repulsion of the protons. Only monoatomic hydrogen could exist. If the nuclear force were stronger, putting Epsilon at 0.008, hydrogen would quickly form a dihydrogen species unknown in our universe which would not lead to the kind of fusion that powers the sun and other stars. So Epsilon must be almost exactly 0.007. Our universe couldn't exist if Epsilon differed from the number that we know.

John Penniston:

Considering all six numbers that I mentioned at the beginning, the chance of all of them having the values that make our universe is vanishingly small. To illustrate, imagine if a huge tornado hit a field of haystacks and left behind a fully-functioning city, complete with subways, streets, and lighting. The chances of that happening are greater than the chance of our universe occurring by accident. I think that the values of the six numbers are God's signature. Thus, a suffocated consideration points to the evidence for a designed universe. Perhaps in the future, all will be able to proclaim with united voice, "The heavens declare the glory of God, and the firmament shows His handiwork." Let us pray.

John Penniston:

Almighty and ever-living God, you made the universe with all its marvelous order, it's atoms, worlds, and galaxies, and the infinite complexity of living creatures. Grant that, as we probe the mysteries of your

creation, we may come to know you more truly and more surely fulfill our role in your eternal purpose. Let us say together the Lord's prayer, which is on the back of your order of worship.

All:

Our father who art in heaven, hallowed be thy name. Thy kingdom come, thy will be done on Earth as it is in heaven. Give us this day our daily bread. Forgive us our trespasses as we forgive those who trespass against us. And lead us not into temptation, but deliver us from evil. For thine is the kingdom, and the power, and the glory, forever. Amen.

John Penniston:

Our hymn is number 187 in the Crimson Hymnal, The Spacious Firmament on High.

Congregation/Choir:

(singing)

Grace Killian:

Now let us go in grace and peace of the one who created the universe. Amen.

Congregation:

Amen.