

How Life Began Assignment

We have **three** competing models for how life began on Earth:

- I. Life originated in shallow warm water, rich with organic molecules, under an oxygen-poor atmosphere – the “primordial ooze model”
- II. Life originated elsewhere and fell to Earth on comets or other extraterrestrial material – the “extraterrestrial model”
- III. Life originated under the surface of the Earth in hydrothermal systems – the “hydrothermal model”.

The best explanation may actually be some combination of these models.

For this assignment, you will compile the evidence supporting each of these models.

FIRST: Go through the Life powerpoint to understand the necessary steps in the origin of life.

THEN: Watch the video, available at: m.video.pbs.org/video/1978170520

This video is **not** organized around these three models for the origin of life on Earth, but it talks about evidence for all three models.

The next page is a chart for you to use as you watch the video. Keep track of the evidence as you hear it, and list each piece of evidence under each of the three models. Some pieces of evidence support more than one model.

Model	Evidence	What piece of the model this evidence helps explain
Primordial ooze model		
Extraterrestrial model		
Hydrothermal model		