

Name _____ Section _____ Date _____

LT: I can analyze specific quotations and statistics to support my argument.

Do Now: What are the 4 ways we use to analyze claim?

*Is aquaculture the most promising solution to the world hunger crisis?
Looking at Evidence*

Part 1: The Documents

Complete 5 of the 6 documents in this packet.

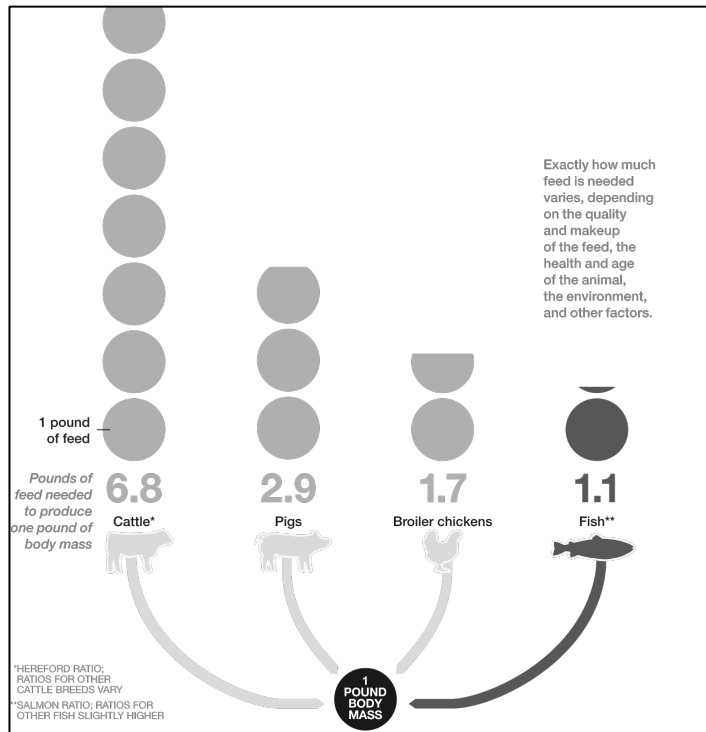
Part 2: The Facts

List 4 statistics or quotes you want to use in Friday's Socratic Seminar.

Part 3: Thinking Bigger

1. Which side of the argument do you feel was more convincing? Explain your reasoning. (2-3 sentences)
2. List one question or comment you have for the aquaculture teachers.
3. On Tuesday or Thursday, you will do your own research on the laptops. What is one specific thing you will look up that will help you in the Socratic Seminar?

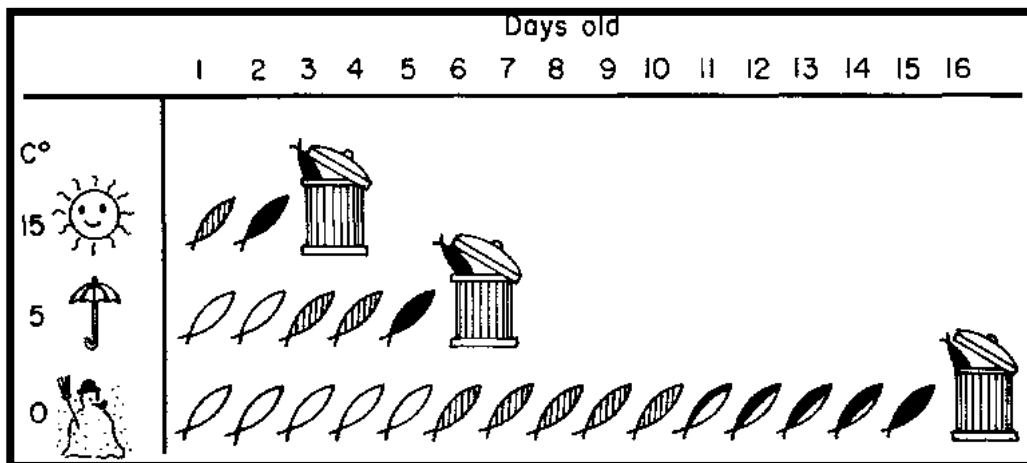
Document 1: Feed Conversion Ratios



1. According to the chart, what is an advantage to using aquaculture to solve the world hunger crisis?

2. Do you think this is an important advantage? Explain.

Document 2: Shelf Life of Finfish

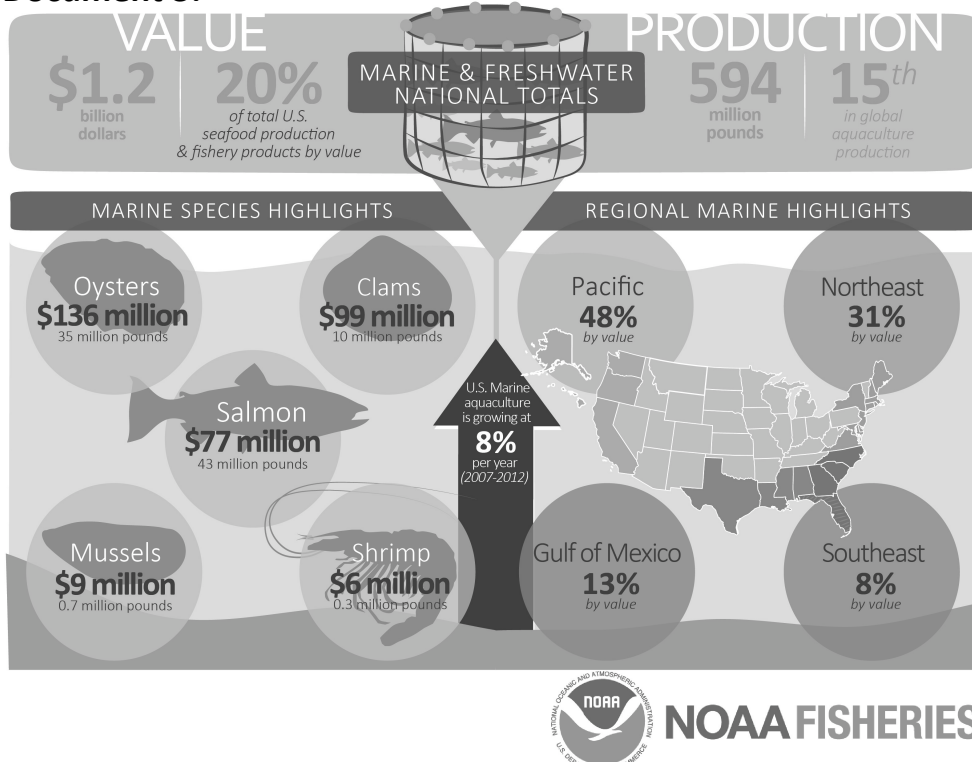


*0 C= 32 degrees F
5 C= 41 degrees F
15 C= 59 degrees F

1. According to the chart, what is a disadvantage to using aquaculture to solve the world hunger crisis?

2. Do you think this is an important disadvantage or one that can be solved? Explain.

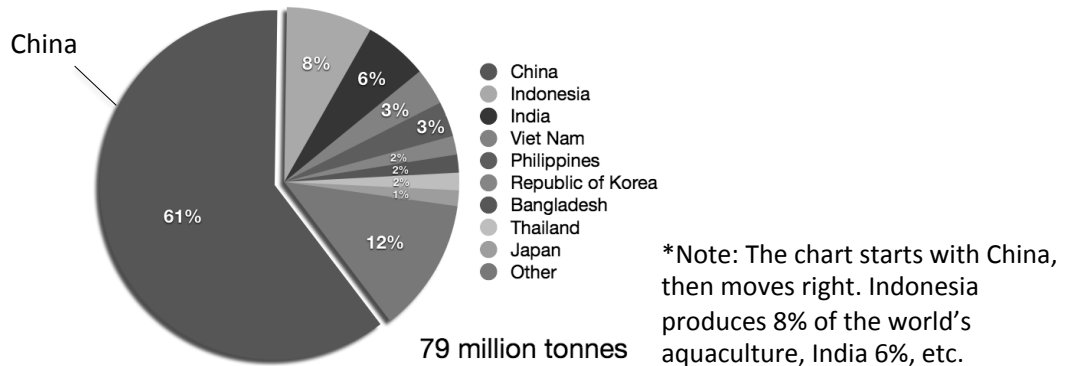
Document 3: 2012 AQUACULTURE PRODUCTION VALUES



- Which regions are being affected by aquaculture in the United States? What ranking is the United States in terms of Global aquaculture production? _____

- Do you think this shows an advantage or a disadvantage to using aquaculture to solve the hunger crisis? Explain. _____

Document 4: Global Aquaculture Production 2010



- According to the chart, in what region of the world is most aquaculture being produced? _____

- Do you think this shows an advantage or a disadvantage to using aquaculture to solve the hunger crisis? Explain. _____

Document 5: Time Magazine Excerpt

Close to 40% of the seafood we eat nowadays comes from aquaculture; the \$78 billion industry has grown 9% a year since 1975, making it the fastest-growing food group, and global demand has doubled since that time. Here's the catch: It takes a lot of input, in the form of other, lesser fish — also known as "reduction" or "trash" fish — to produce the kind of fish we prefer to eat directly. To create 1 kg (2.2 lbs.) of high-protein fishmeal, which is fed to farmed fish (along with fish oil, which also comes from other fish), it takes 4.5 kg (10 lbs.) of smaller pelagic, or open-ocean, fish. "Aquaculture's current heavy reliance on wild fish for feed carries substantial ecological risks," says Roz Naylor, a leading scholar on the subject at Stanford University's Center for Environmental Science and Policy. Unless the industry finds alternatives to using pelagic fish to sustain fish farms, says Naylor, the aquaculture industry could end up depleting an essential food source for many other species in the marine food chain.

Excerpt from "Fish Farming's Growing Dangers", *Time Magazine*, Ken Stier Wednesday, Sept. 19, 2007

1. According to the excerpt, what is the disadvantage of using aquaculture to solve the world hunger crisis? _____

2. Do you think this is an important disadvantage or one that can be solved? Explain

Document 6: Center for Food Safety Excerpt

New Orleans, LA.—Center for Food Safety has filed a new lawsuit challenging the National Oceanic and Atmospheric Administration's (NOAA) new federal regulations permitting, for the first time, industrial aquaculture offshore in U.S. federal waters in the Gulf of Mexico. The questionable federal permitting scheme, more than ten years in the making, is NOAA's attempt to do an end-run around the United States Congress: multiple national bills that would have allowed and regulated industrial aquaculture never made it into law in the past decade. In an effort to push offshore aquaculture forward without a new law permitting it, NOAA exceeded its authority to regulate fishing and now plans to permit offshore aquaculture as a "fishing" activity.

"Fishing and Public Interest Groups File Challenge to Feds' Decision to Establish Aquaculture in Offshore U.S. Waters"

1. According to the excerpt, what is the disadvantage of using aquaculture to solve the world hunger crisis? _____

2. Do you think this is an important disadvantage or one that can be solved? Explain