Name _____ Date _____

STUDENT WORKSHEET

Graphing the Oyster and Blue Crab Harvests

Directions: Use the harvest graphs to record and analyze harvest trends during the times below. Put the appropriate arrow in the blanks to show what happened. Be sure to rate the "ups" and "downs" at the bottom of the page.

OYSTERS

1882 BROOKS PREDICTION
_____ 5 years later (1887)
_____ 50 years later (1932)
_____ 100 years later (1982)

1887 PATENT TONGS
_____ Short-term (1887 – 1890)
_____ Long-term (1890- 1900)

1890 CULL LAW
_____ Before law passed (1885-1890)
_____ Five years after (1890-1895)

1906 HAMAN ACT
_____ In the next 5 years (1906-1911)

1925 TYPHOID OUTBREAK
_____ In the next 5 years (1925-1930)

1960 FARMING PROGRAM
_____ In the next 10 years (1960-1970)

1972 HURRICANE AGNES
_____ The year after the storm (1973)
_____ Five years later (1977)

1980s DISEASES-MSX/DERMO
_____ In the 1980s and 1990s

CRABS

1900 FIRST CANNERY
_____ 20 years before (1880-1900)
_____ In the next 10 years (1900-1910)

1916 SIZE LIMITS
_____ Before law passed (1910-1916)
_____ After law passed (1916-1926)

1943 CRAB POTS
_____ 1943-1948 After legalized
_____ 1960-1970 Limits removed
_____ 1994 Limits again

1950s CRAB FEASTS
_____ 1950-60 Popular tradition

1972 HURRICANE AGNES
_____ 2 years after the storm (1972-74)
_____ 10 years later (1982)

1985 DROUGHT
_____ At the height of drought

↑ = Increases ↓ = Decreases
↔ = Remains the same

THE "UPS" AND "DOWNS" IN THE HARVEST – CAUSE AND EFFECT

Based on your analysis of the harvest graphs, rate these factors by circling most impact (5) on Oyster and Blue Crab Harvests to least impact (1).

New Technology	5	4	3	2	1
Conservation	5	4	3	2	1
State Laws	5	4	3	2	1
Natural Events	5	4	3	2	1
Economy and the Market	5	4	3	2	1

Name _____ Date _____

STUDENT WORKSHEET

Crab and Oyster Harvests

Directions: Answer the questions below to compare trends and predict the future of Crab and Oyster Harvests.

The Heyday of Crabs and Oysters

Mark the peak harvest on each graph (*Hint: Look for the highest point.*).

In what year did Maryland watermen catch: The most oysters? ____ The most crabs? ____

How many years apart were the two peaks? _____

Harvests — Past to Present

Describe the general trend for oysters. _____

Describe the general trend for crabs. _____

If you were a waterman in Captain Avery's day (1860s – 1880s), would your livelihood depend more on crabs or oysters? Why? _____

_____

If you were a waterman today, would you rely more on crabs or oysters? Why?

_____

When would a waterman have to work harder to bring home the catch – when harvests are low or high? Why? _____

Predict the Future

Predict what will happen to the crab and oyster populations if the trends you see on the graphs in 2000 continue: _____

Why do you think harvests are declining? What could we do to reverse the trend? _____

_____

Extend the Learning

Recently, some people have proposed introducing a new species of oyster to the Chesapeake Bay – the Asian oyster, which is resistant to disease. Choose one of the following to do. Write a paragraph, design a poster, or prepare a speech to answer the question.

Using the Oyster Harvest data, **TELL** why you think people have begun to consider introducing the Asian oyster as an option,

PREDICT what might happen if a new, disease-resistant species is introduced. Consider both the pro's and con's of how a new species might affect the Bay's ecology.

TAKE A STAND and make a case for or against the Asian oyster.

Name _____ Date _____

Advanced Student Worksheet

Oyster and Blue Crab Harvests

Directions: Answer the questions below to compare trends and predict the future of Crab and Oyster Harvests.

GRAPH OF MARYLAND OYSTER HARVESTS

Laws

In 1890 — Why would Maryland adopt a "Cull Law" to require that oysters smaller than 2 1/2 inches be thrown back into the Bay? _____

What do you think the government hoped would happen to harvests over time? Did their efforts succeed over the next 10 years? _____

Conservation

Look at the data from 1950 – 2000: When did oyster harvests increase? _____

Do you think Maryland's Oyster Farming program played a role? Why or why not? _____

_____

GRAPH OF MARYLAND CRAB HARVESTS

Laws

In 1916 — Why did Maryland legislators work to pass laws to protect the crab population? Were their efforts successful over time? _____

In the 1990s — Why do you think Maryland legislators decided to limit the number of days watermen could crab? What were the results? _____

Technology

In 1943 crab pots were legalized. What trends developed over the next 80 years? _____

_____

In the 1960s — What happened to the crab harvest when the State removed all limits on the number of crab pots each waterman could use? _____

Nature

In 1972 Hurricane Agnes struck:

What happened to the crab harvest in the 2 years after the storm? _____

Did the harvests recover 10 years after the hurricane? _____