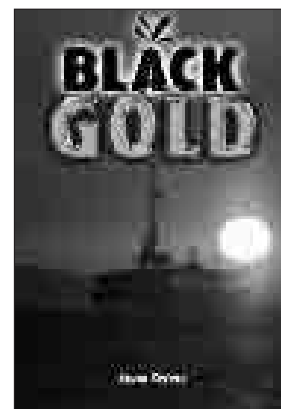


Black Gold

by Anna Kenna



Book Summary

Most of the world's energy comes from crude oil. Finding and selling oil is one of the world's biggest industries. This text examines how oil is formed, processed, and used and why this non-renewable resource is such a precious commodity.

Features of the Book

- Dates – numeric and text form
- Historical photographs
- Visual information requiring interpretation – pie graph, map, diagram
- Comparisons
- Maps

Purpose

Black Gold can be used to introduce and reinforce the following skills and understandings:

- S** analysing cause and effect;
- S** sequencing;
- S** interpreting graphic information;
- S** exploring types and uses of natural resources.

Investigation Tools

- **Making Connections** – Earth's Bounty, page 5
- What's the Background? – Oil Boom Pioneer, page 7
- Digging Deeper – Kuwait, page 10
- Looking Closer – A Rotary Drilling Rig, page 15
- Step by Step – Completing a Well, page 19
- Weighing Both Sides – The Good and the Bad, page 26

The Guided Reading Lesson

S Analysing cause and effect

S Sequencing

Introducing the text

Ask the students to list some of the ways they use power (energy sources).

- *What have you used today that required electricity? Petrol?*
- *Could you go a day without using any power or gas? Why/why not?*

Explain the difference between renewable (wind, solar, hydro) and nonrenewable (oil, coal, gas) sources of energy.

- *Why might a non-renewable resource be more valuable?*

Distribute the books.

- *Can anyone guess what this book is about?*
- *What do you think the title means? Why would oil be referred to as gold?*

Ask the students to predict the content of the book based on the chapter headings.

Reading and discussing the text

Ask the students to read chapters 1 and 2. Ensure that they understand how oil is created by discussing the following chain of events:

Layers of mud settle over dead organic matter; pressure turns the matter into oil; oil is pumped out of the ground; oil is refined into fuel; and fuel powers cars.

- *Why is oil so precious?* (hard to get, finite supply, non-renewable resource, very useful to humans)
- *Why has its value increased?*
- *Why do we have to import oil? How might that affect us in the future?*

Ask the students to help you list the resources in “Earth’s Bounty” on page 5 in order of their importance to humans. Encourage them to debate the importance of the resources by asking:

- *What would happen if this resource got used up?*
Could we survive without it?

Ask the students to read chapters 3 and 4, looking for how finding and producing oil has changed since Drake’s day.

- *How has technology changed the process of finding oil?*
- *What evidence suggests that oil is “bigger business” today than when Drake started?* (Companies now employ geologists and scientists and use special technology to find oil.)
- *What are some differences between ocean drilling and land drilling?*

Ask the students to work in pairs and take turns retelling the steps in completing a well (page 19). Encourage them to use their own words and to use linking words like “first”, “next”, “then”, and “finally”.

- *How do the numbered steps make it easier to retell the sequence?*
- *Why do the linking words make it easier for the listener or reader?*

Ask the students to read to the end of the text while considering the following questions:

- *Why should we be concerned about conserving power?*
- *Why is oil both “good” and “bad”?*

Revisiting the Text

The activities below can be used immediately after the guided reading lesson, during later reading sessions as mini-lessons, or as independent activities.

S Interpreting graphic information

Ask the students to study the illustrations on pages 8 and 9 and rank the countries from most to least wealthy.

- *Where is the most oil located?*

Next, ask them to turn to pages 16 and 17 and use the illustrations to imagine what a floating rig might look like.


- *What might it be like to work on one?*

S Exploring types and uses of natural resources

Ask the students to review the information about renewable and non-renewable resources on pages 24–25. Discuss ways in which people rely on oil and which uses are most important.

Next, invite the students to imagine that the world is almost out of oil. Ask them to find evidence in the text to support both of these statements:

- It’s a good thing that we’re almost out of oil because ...
- It’s a bad thing that we’re almost out of oil because ...

 They can then use the blackline master on page 67 to record their priority uses for oil.

S Analysing cause and effect

Ask the students to work in pairs to review “Oil Boom Pioneer” on page 7 and “Kuwait” on page 10 and examine the effects of oil’s discovery.

The students can use the Making Connections investigation tool on page 93 to record their thoughts.