1. Table 9.01:

Explain why Fossil fuel consumption goes up 16x, while population increases only 3.5x

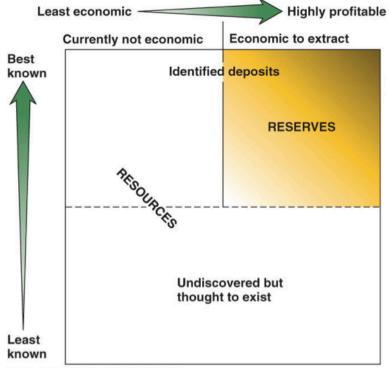
Copyright © The McGraw-Hill Companies, Inc. Permission required for reproduction or display.

TABLE 9.1 World Population, Economic Output, and Fossil-Fuel Consumption

	Population (Billions)	Gross World Product (Trillion 2000 US\$)	Fossil-Fuel Consumption (Billion Metric Tons Coal Equivalent)
1900	1.6	0.6	1
1950	2.5	2.9	3
2007	6.6	43.3	16

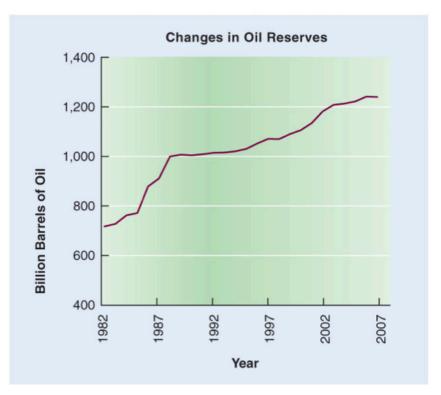
2. Figure 9.02:

Explain where the BP Gulf Oil rig shows up on this diagram, and what it means.



3. Figure 9.03:

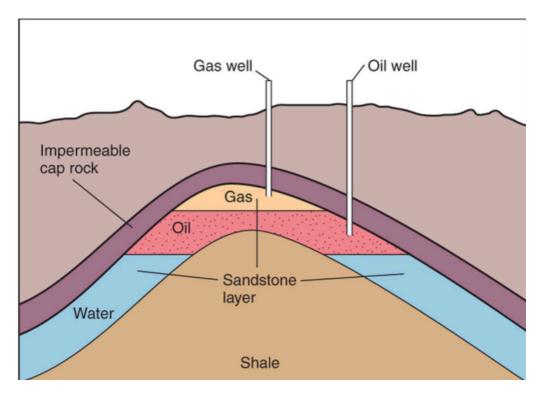
Is this graph accurate? Explain.



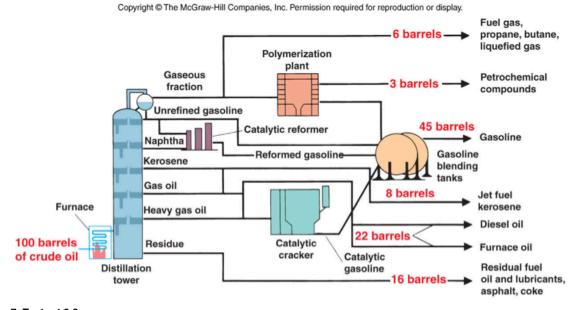
4. Table 9.2: Explain the change in hydrogen and oxygen content in these, and its cause.

TABLE 9.2 Coal Formation—Changes in Carbon Content				
	Carbon Content	Physical Characteristics		
Peat	5%	Recognizable plant material		
Lignite	25-46%	Brown and crumbly		
Subbituminous	46-60%	Black and crumbly		
Bituminous	60-86%	Black and soft		
Anthracite	86–98%	Black and hard		

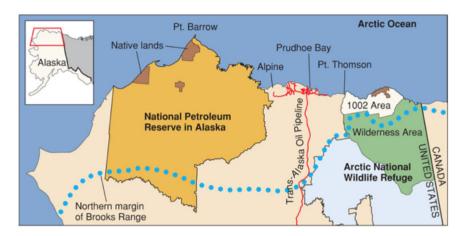
5. Figure 9.05: Movies often depict a "gusher" with black oil coming out first. Use this diagram to explain why this is not accurate.



6. Figure 9.14:Study the diagram, and explain why gasoline might be so expensive here in Hawaii (hint: how far is it to the nearest airport?)



7. Text art 9.2: Study the diagram and give reasons on both sides of the ANWR debate.



- 8. Crude oil is now at about \$80 per barrel. When oil hits \$150 per barrel, how will your life here at HPA change? How will life in Hawaii change?
- 9. How did the Grameen bank project help protect a poor country from ecological predation?
- 10. How did the Grameen bank project change the role of women in the workforce, while respecting the religious rules there?