Chapter 3: Understanding financial statements (Numerical problems)

1. Consider the balance-sheet entries for War Eagle Corporation:

Balance Sheet Statement as of December 31, 2000		
Assets:		
Cash		$150,000
Marketable Securities		200,000
Accounts receivables		150,000
Inventories		50,000
Prepaid taxes and insurance		30,000
Manufacturing plant at cost	$600,000	
Less accumulated depreciation	100,000	
Net fixed assets		500,000
Goodwill		20,000
Liabilities and shareholders' equity:		
Notes payable		50,000
Accounts payable		100,000
Income taxes payable		80,000
Long-term mortgage bonds		400,000
Preferred stock, 6%, $100 par value (1,000 shares)		100,000
Common stock, $15 par value (10,000 shares)		150,000
Capital Surplus		150,000
Retained earnings		70,000

(a) Compute the firm's
 Current assets: $_____
 Current liabilities: $_____
 Working capital: $_____
 Shareholders' equity: $_____
(b) If the firm had a net income of $500,000 after taxes, what is the earnings per share?
(c) When the firm issued its common stock, what was the market price of the stock per share?

2. A chemical processing firm is planning on adding a duplicate polyethylene plant at another location. The financial information for the first project year is shown in the table below:
a) Compute the working-capital requirement during the project period.
(b) What is the taxable income during the project period?
(c) What is the net income during the project period?
(d) Compute the net cash flow from the project during the first year.

Sales		$150,000
Manufacturing costs		
Direct Materials	$150,000	
Direct Labor	200,000	
Overhead	100,000	
Depreciation	200,000	
Operating expenses		150,000
Equipment Purchase		400,000
Borrowing to finance equipment		200,000
Increase in inventories		100,000
Decrease in accounts receivable		20,000
Increase in wages payable		30,000
Decrease in notes payable		40,000
Income taxes		272,00
Interest payment on financing		20,000

3. Consider the following financial statements for Juniper Networks, Inc. The closing stock price for Juniper Network was $56.67 (split adjusted) on December 31, 1999. On the basis of the financial data presented, compute the various financial ratios and make an informed analysis of Juniper's financial health.

	Dec. 1999 U.S. $ (000) (Year)	**Dec. 1998 U.S. $ (000) (Year)**
Balance sheet		
Summary		
Cash	158, 043	20,098
Securities	285,116	0
Receivables	24,582	8,056
Allowances	632	0
Inventory	0	0
Current Assets	377,833	28,834
Property and Equipment, Net	20,588	10,569
Depreciation	8,172	2,867
Total Assets	513,378	36,671
Current Liabilities	55,663	14,402
Bonds	0	0
Prepared Mandatory	0	0
Preferred Stock	0	0
Common Stock	2	1
Other Stockholders' Equity	457,713	17,064
Total Liabilities and Equity	513,378	36,671
Income Statement		
Summary		
Total Revenues	102,606	3,807

Cost of sales	45,272	4,416
Other Expenses	71,954	31,661
Loss provision	0	0
Interest income	8,011	1,301
Income pretax	-6,609	-69
Income tax	2,425	2
Income continuing	-9,034	-30,971
Net Income	**-9,034**	**-30,971**
EPS primary	**-$0.1**	**-$0.80**
EPS diluted	-$0.10	-$0.80
	-$0.05	-$0.40
	(split adjusted)	(split adjusted)

(a) Debt ratio
(b) Times-interest-earned ratio
(c) Current ratio
(d) Quick (acid-test) ratio
(e) Inventory turnover ratio
(f) Day's sales outstanding
(g) Total assets turnover
(h) Profit margin on sales
(i) Return on total assets
(j) Return on common equity
(k) Price-to-earnings ratio
(l) Book value per share

4. The following financial statements summarize the financial conditions for Solectron, Inc., an electronic outsourcing contractor, for fiscal-year 1999. Unlike Juniper Network Corporation in Problem 3, the company made profits for several years. Compute the various financial ratios and interpret the firm's financial health during fiscal-year 1999.

	Aug. 1999 U.S. $ (000) (12-MOS)	**Aug. 1999 U.S. $ (000) (12-MOS)**
Balance Sheet		
Summary		
Cash	1,325,637	225,228
Securities	362,769	83,576
Receivables	1,123,901	674,193
Allowances	5,580	-3,999
Inventory	1,080,083	788,519
Current Assets	3,994,084	1,887,558
Property and equipment, net	1,186,885	859,831
Depreciation	533,311	-411,792
Total assets	4,834,696	2,410,568
Current Liabilities	1,113,186	840,834
Bonds	922,653	385,519
Preferred mandatory	0	0
Preferred stock	0	0
Common stock	271	117
Other stockholder's equity	2,792,820	1,181,209

Total liabilities and equity	4,834,696	2,410,568
Income Statement		
Summary		
Total revenues	8,391,409	5,288,294
Cost of sales	7,614,589	4,749,988
Other expenses	335,808	237,063
Loss provision	2,143	2,254
Interest expense	36,479	24,759
Income pretax	432,342	298,983
Income tax	138,407	100,159
Income continuing	293, 935	198,159
Discontinued	0	0
Extraordinary	0	0
Changes	0	0
Net income	293,935	198,159
EPS Primary	$1.19	$1.72
EPS diluted	$1.13	$1.65

(a) Debt ratio
(b) Times-interest-earned ratio
(c) Current ratio
(d) Quick (acid-test) ratio
(e) Inventory turnover ratio
(f) Day's sales outstanding
(g) Total assets turnover
(h) Profit margin on sales
(i) Return on total assets
(j) Return on common equity
(k) Price-to-earnings ratio
(l) Book value per share

5. J. C. Olson & Co. had earnings per share of $8 in year 2001, and it paid a $4 dividend. Book value per share at year's end was $80. During the same period, the total retained earnings increased by $24 million. Olson has no preferred stock, and no new common stock was issued during the year. If Olson's year-end debt (which equals its total liabilities) was $240 million, what was the company's year-end debt-to-asset ratio?