

**15****ANALYSIS OF DIVIDENDS  
AND SHARE REPURCHASES**

1. Last year, Calfee Multimedia had earnings of \$4.00 per share and paid a dividend of \$0.30. In the current year, the company expects to earn \$5.20 per share. Calfee has a 30% target payout ratio. If the expected dividend for this year is \$0.51, what time period is Calfee most likely using in order to bring its dividend up to the target payout?
  - (A) 5 years.
  - (B) 6 years.
  - (C) 4 years.
2. When a firm pays a stock dividend, the dividend is most likely to:
  - (A) cause financial leverage ratios to increase.
  - (B) have no impact on financial leverage ratios and liquidity ratios.
  - (C) cause liquidity ratios to decrease.
3. Paying a cash dividend is most likely to result in:
  - (A) an increase in liquidity ratios.
  - (B) an increase in financial leverage ratios.
  - (C) the same impact on liquidity and leverage ratios as a stock dividend.
4. Which of the following is least likely to discourage a company from making high dividend payouts? The company's:
  - (A) bondholders are protected by strong debt covenants.
  - (B) flotation costs are high.
  - (C) shareholders are primarily tax-exempt institutions.
5. Dividend payments are most likely to be associated with:
  - (A) increased agency conflict between bondholders and managers.
  - (B) increased agency conflict between bondholders and shareholders.
  - (C) increased agency conflict between shareholders and managers.

6. Which of the following statements about a stock repurchase is least accurate?
- (A) Disgruntled stockholders are forced to sell their shares, improving management's position.
  - (B) A stock repurchase occurs when a large block of stock is removed from the marketplace.
  - (C) Management can distribute cash to shareholders at a favorable after-tax rate.
7. What is the impact on shareholder wealth of a share repurchase versus cash dividend of equal amount when the tax treatment of the two alternatives is the same?
- (A) A share repurchase will always lead to higher total shareholder wealth than a cash dividend of an equal amount.
  - (B) A share repurchase is equivalent to a cash dividend of an equal amount, so total shareholder wealth will be the same.
  - (C) A share repurchase will sometimes lead to higher total shareholder wealth than a cash dividend of an equal amount.
8. When a firm pays a cash dividend, the dividend payment is most likely to:
- (A) have no impact on financial leverage ratios and liquidity ratios.
  - (B) cause liquidity ratios to increase.
  - (C) cause financial leverage ratios to increase.
9. Global Development expects to earn \$6 million next year. 40% of this amount, or \$2.4 million, has been allocated for distribution to common shareholders. There are 2.4 million shares outstanding, and the market price is \$30 a share. If Global uses the \$2.4 million to repurchase shares at the current price of \$30 per share, its share price after the repurchase will be closest to:
- (A) \$31.00.
  - (B) \$30.00.
  - (C) \$29.00.
10. Which of the following statements about a stock repurchase is least accurate?
- (A) Disgruntled stockholders are forced to sell their shares, improving management's position.
  - (B) Management can distribute cash to shareholders at a favorable after-tax rate.
  - (C) A stock repurchase occurs when a large block of stock is removed from the marketplace.

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11. International Pulp, a Swiss-based paper company, has annual pretax earnings (in Swiss francs) of SF 600. The corporate tax rate on retained earnings is 55%, and the corporate tax rate that applies to earnings paid out as dividends is 30%. Furthermore, International Pulp pays out 30% of its earnings as dividends, and the individual tax rate that applies to dividends is 40%.

What is the effective tax rate on corporate earnings paid out as dividends?

- (A) 48%.
- (B) 70%.
- (C) 58%.

12. Hikaru Takei is the portfolio manager for the Reliant Dividend Focused Fund. Takei wants to add a firm to his portfolio that follows a stable dividend policy. Takei is considering investing in one of three companies:

- Kirk Beauty Supplies maintains a constant dividend payout of 25 to 30%.
- Kelley Medical Devices increases its dividend each year in accordance with the company's long run growth rate of 4%.
- Barrett Satellite Systems has maintained a dividend of \$2.00 per share over the last 6 years.

Which stock best meets Takei's criteria?

- (A) Kirk Beauty Supplies.
- (B) Barrett Satellite Systems.
- (C) Kelley Medical Devices.

13. David Drakar and Leslie O'Rourke both own 100 shares of stock in a German corporation that makes €1.00 per share in pre-tax income. The corporation pays out all of its income as dividends:

Drakar is in the 30% individual tax bracket while O'Rourke is in the 40% individual tax bracket. The tax rate applicable to the corporation is 30%. Drakar and O'Rourke live in the United Kingdom, which uses an imputation tax system for corporate dividends. What is the effective tax rate on the dividend for each shareholder, assuming no effects from the exchange rate?

	Drakar	O'Rourke
(A)	30%	40%
(B)	40%	48%
(C)	38%	44%

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14. Which of the following statements about differences observed in payout trends in US and Europe is most accurate?
- (A) A higher proportion of US companies pay dividends as compared to their European counterparts.
  - (B) The percentage of companies making stock repurchases has been trending downwards both in the US and Europe.
  - (C) A lower proportion of US companies pay dividends as compared to their European counterparts.
15. Which of the following is most likely to prompt a company to increase dividend payments? A company's management foresees:
- (A) an immediate lack of profitable investment opportunities.
  - (B) reduced availability of credit in the market.
  - (C) continued volatility of the company's earnings.
16. Which of the following is most likely to be a symptom of a company that is able to sustain its cash dividend?
- (A) A low dividend yield compared to the company's historic average.
  - (B) Issuing new debt to fund projects and cover capital expenditures.
  - (C) A high dividend payout ratio compared to the industry average.
17. A periodic payment to shareholders in the form of additional shares of stock instead of cash is a:
- (A) stock dividend
  - (B) dividend reinvestment plan
  - (C) stock repurchase
18. Which type of cash dividend is most likely to be declared by a cyclical firm during good times?
- (A) Special dividend.
  - (B) Liquidating dividend.
  - (C) Stock dividend.
19. Belden Engineering Corporation (BEC) is considering a share repurchase program. David Gudzanski, the firm's executive vice president prepares a memo to the board of directors detailing reasons why a share repurchase would be favorable at this time. Reasons listed in the memo are as follows:

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<b>Reason 1:</b>	The resulting capital structure from the share repurchase would be more favorable for investors in BEC's bonds.
<b>Reason 2:</b>	BEC's stock is currently selling at \$37 in the marketplace. Our discounted cash flow analysis values the company at \$48 per share.
<b>Reason 3:</b>	The share repurchase could be used to offset dilution caused by the exercise of employee stock options.
<b>Reason 4:</b>	BEC can use the repurchase to send a signal to investors that management has a positive future outlook for the company.
<b>Reason 5:</b>	The share repurchase could be used to implement a residual dividend policy while diminishing the potential increase in perceived risk that such a policy would cause for investors.

Which of Gudzanski's reasons in favor of the share repurchase is most accurate?

- (A) Reasons 1 and 3 only.
- (B) Reasons 2 and 3 only.
- (C) Reasons 2, 3, 4, and 5.

20. Armsware Industries' board is debating whether to issue a cash dividend or a stock dividend. Director Jones states, "We should issue a cash dividend because our liquidity ratios will improve and the credit rating agencies will love it." Director Beane states, "A stock dividend will improve our leverage ratios by increasing contributed capital, which is what the rating agencies are looking for." Are the statements by Jones and Beane accurate?

- |     | Jones | Beane |
|-----|-------|-------|
| (A) | Yes   | Yes   |
| (B) | Yes   | No    |
| (C) | No    | No    |

21. According to Gordon, Litner, and Graham, what will be the impact of the dividend initiation on the cost of equity of Rainham Inc.?

- (A) It will increase.
- (B) It will decrease.
- (C) Unchanged.

22. Which of the following dividend policy is consistent with the Rainham Inc.'s proposed dividend policy of setting an initial dividend payout ratio to 30% and then increase this over the following five years to 70%?

- (A) Residual dividend model.
- (B) Target payout ratio.
- (C) Dividend stability.

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23. The Commercial Director has mentioned four out of six factors that influence dividend policy. Which of the following is least likely to be one of the remaining two factors not mentioned?
- (A) Taxation.
  - (B) Financial flexibility.
  - (C) Clientele effect.
24. Rainham Inc. pays 35% taxes based on the U.S. tax laws and pays a dividend of \$0.90 a share. Assuming that the investor who receives Rainham Inc.'s dividend is in the 15% tax bracket. The effective tax rate on a dollar of earnings paid out as dividends will be:
- (A) Equal to the investor's tax bracket of 15%.
  - (B) Higher than 35%.
  - (C) Equal to the corporate tax rate of 35%.
25. Pearl City Breweries has 8 million shares outstanding that are currently trading at \$34 per share. The company is choosing whether to distribute \$22 million as dividends or to use the same amount to repurchase its shares. Ignoring tax effects, what will be the amount of total wealth from owning one share of Pearl City Breweries under each of these alternatives?

	Cash dividend	Share repurchase
(A)	\$31.25	\$34.00
(B)	\$34.00	\$34.00
(C)	\$31.25	\$37.00

26. The following information is from the 10-k of Laura's Chocolates, Inc.(LC), a maker of nut-based toffees.

Cash	25,000,000
Share price	40.00
Shares outstanding (prior to transaction)	20,000,000

LC decides to spend \$20 million repurchasing common stock. What is the value of a share of stock after the share repurchase?

- (A) 45.00.
- (B) 40.00.
- (C) 35.00.

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27. Laura's Chocolates Inc. (LC) is a maker of nut-based toffees. LC is considering a cash dividend, but is concerned about the "double taxation" effect on their shareholders. If the corporate tax rate is 35%, and the tax on dividends is 20%, what is the effective tax rate on a dollar of corporate earnings?

- (A) 55%.
- (B) 42%.
- (C) 48%.

28. Pants R Us Inc.'s Board of Directors is considering repurchasing \$30,000,000 worth of common stock. Pants R Us assumes that the stock can be repurchased at the market price of \$50 per share. After much discussion Pants R Us decides to borrow \$30 million that it will use to repurchase shares. Pants R Us' Chief Investment Officer (CIO) has compiled the following information regarding the repurchase of the firm's common stock:

- Share price at the time of buyback = \$50
- Shares outstanding before buyback = 30,600,000
- EPS before buyback = \$3.33
- Earnings yield =  $\$3.33 / \$50 = 6.7\%$
- After-tax cost of borrowing = 6.7%
- Planned buyback = 600,000 shares

Based on the information above, what will be Pants R Us' earnings per share (EPS) after the repurchase of its common stock?

- (A) \$3.28.
- (B) \$3.40.
- (C) \$3.33.

29. Financial managers utilize stock splits and stock dividends because they perceive that:

- (A) investors will double the share price if there is a 20% stock dividend.
- (B) an optimal trading range exists.
- (C) brokerage fees paid by shareholders will be reduced.

30. A company is most likely to use a Dutch auction when repurchasing shares:

- (A) in the open market.
- (B) by direct negotiation.
- (C) with a tender offer.

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31. Stock splits:

- (A) are less common than stock dividends.
- (B) do not in and of themselves affect firm value.
- (C) increase firm value.

32. Grommetco produces plastic insulators for the electrical appliance industry. Excerpts from Grommetco's financial results for 2010 are as follows:

Net Income (earnings)	\$10
Free Cash Flow to Equity	\$8
Dividends Paid	\$1
Stock Repurchases	\$3

Which of the following statements is most accurate? Grommetco's:

- (A) dividend coverage ratio is 2.5.
- (B) FCFE coverage ratio is 2.0.
- (C) dividend payout ratio is 0.4.

33. Compared to a Dutch auction tender offer, when a firm uses a fixed price tender offer it is more likely that the fixed price tender offer will:

- (A) send a positive signal to investors.
- (B) result in a lower buyback price.
- (C) require a greater amount of time to complete.

34. Francis Investment Inc.'s Board of Directors is considering repurchasing \$30,000,000 worth of common stock. Francis assumes that the stock can be repurchased at the market price of \$50 per share. After much discussion Francis decides to borrow \$30 million that it will use to repurchase shares. Francis' Chief Financial Officer (CFO) has compiled the following information regarding the repurchase of the firm's common stock:

- Share price at the time of buyback = \$50
- Shares outstanding before buyback = 30,600,000
- EPS before buyback = \$3.33
- Earnings yield =  $\$3.33 / \$50 = 6.7\%$
- After-tax cost of borrowing = 4.0%
- Planned buyback = 600,000 shares

Based on the information above, after the repurchase of its common stock, Francis' EPS will be closest to:

- (A) \$3.41.
- (B) \$3.36.
- (C) \$3.39.

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35. If Modigliani and Miller's dividend irrelevancy theory is correct, what is the impact on a firm's cost of capital and stockholder wealth if its dividend payout increases?

**Cost of Capital**      **Stockholder wealth**

- (A) An increase      A decrease  
(B) None      None  
(C) None      A decrease

36. The share price of Winnipeg Auto Unlimited is \$5 per share. There are 50 million shares outstanding, and Winnipeg has a book value of \$900 million. What is the book value per share (BVPS) after the share repurchase of \$10 million?

- (A) \$14.76.  
(B) \$18.54.  
(C) \$21.24.

37. Laura's Chocolates, Inc. (LC), is a maker of nut-based toffees. LC is considering a share repurchase and prefers the "tender offer" method. Which of the following is also known as a "tender offer"?

- (A) Buying in the open market.  
(B) Buying a fixed number of shares at a fixed price.  
(C) Repurchasing by direct negotiation.

38. Dividend safety is most likely evidenced by:

- (A) Increase in dividend coverage ratio but not by FCFE coverage ratio.  
(B) Increase in FCFE coverage ratio but not by dividend coverage ratio.  
(C) Increase in dividend and FCFE coverage ratios.

39. The current stock price of Westkirk is \$50.00 per share. Book value of equity is \$200 million and 10 million shares are outstanding. If Westkirk repurchases \$25 million of their stock, the change in book value per share after the repurchase is closest to a(n):

- (A) increase of \$1.10.  
(B) decrease of \$1.60.  
(C) decrease of \$2.50.

40. The share prices of Solar Automotive Industries and Winnipeg Auto Unlimited are both \$50 per share, and each company has 50 million shares outstanding. On September 30, both companies announced a \$10 million stock buyback. Solar has a book value of \$500 million, while Winnipeg has a book value of \$900 million. How much did the book value per share (BVPS) of each company increase or decrease after the share repurchase?

**Solar Automotive  
Industries****Winnipeg Auto  
Unlimited**

- |                        |                    |
|------------------------|--------------------|
| (A) Decrease by \$0.16 | Decrease by \$0.13 |
| (B) Increase by \$0.13 | Increase by \$0.16 |
| (C) Decrease by \$0.13 | Decrease by \$0.13 |

41. Which justification for repurchasing stock is the least valid?
- (A) Shareholders prefer capital gains to cash dividends.
  - (B) A cash dividend increase, in response to short-term excess cash flows, may confuse investors.
  - (C) Repurchases offer shareholders more choices than cash dividends.
42. Which of the following statements about dividend policy and capital structure is most accurate?
- (A) Monte Carlo simulation is used to estimate market risks; scenario analysis measures stand-alone risk.
  - (B) Investors view a stock repurchase as a positive signal and a stock issue as a negative signal.
  - (C) A person who believes in the agency cost effect and a proponent of the "bird-in-hand" theory would have opposite views on dividend payout policy.
43. Which of the following would be least likely to prompt a decline in a company's overall payout ratio?
- (A) An increase in interest rates.
  - (B) A permanent decrease in company profitability.
  - (C) A decrease in the capital gains tax rate.
44. In a world with taxes and brokerage costs:
- (A) Modigliani and Miller say that dividend policy is relevant.
  - (B) Modigliani and Miller say that dividend policy is irrelevant.
  - (C) dividend policy may be relevant.
45. The share price of Solar Automotive Industries is \$50 per share. It has a book value of \$500 million and 50 million shares outstanding. What is the book value per share (BVPS) after a share repurchase of \$10 million?
- (A) \$10.12.
  - (B) \$9.84.
  - (C) \$10.00.

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46. Which of the following is least likely a method by which firms repurchase their shares?
- (A) Tender offer.
  - (B) Direct negotiation.
  - (C) Exercise a call provision.
47. According to Modigliani and Miller's dividend irrelevancy theory, an investor in a firm that does not pay a dividend can still earn a "dividend" on that company by:
- (A) selling a portion of the company's stock each year.
  - (B) slowly liquidating the fixed income portion of the investor's portfolio.
  - (C) writing covered call options on the underlying stock.
48. At a recent conference, "Dividends - Are They Increasing?", several lecturers were discussing the signaling effect and their opinions on how changes in a company's dividend policy are often viewed by investors. Linda Travis, an equity analyst at Girthmore Capital Management and one of the guest lecturers at the conference, made the following observations:

<b>Observation 1:</b>	A dividend initiation is always viewed as a positive signal by investors. It is an indication that the company has so much cash at its disposal that it can afford to pay it out to shareholders.
<b>Observation 2:</b>	A dividend decrease is typically a positive signal by a company's management to its shareholders. It indicates that management has a variety of positive NPV projects in its capital budget and would like to finance as many of them as possible with retained earnings.

With respect to Travis' observations:

- (A) only one is correct.
  - (B) both are correct.
  - (C) both are incorrect.
49. Jim Davis and Thurgood Owen, two equity analysts at Ferguson Capital Management, were reviewing the financial statements of Peregrine Foodstuffs Ltd. Davis and Owen noticed that Peregrine has been repurchasing its common shares in the market over the past three years. Owen thought this was an important issue to look into in greater detail. Upon completion of his review, Owen made the following two statements:
- Statement 1** Peregrine has bought back shares in the open market during its repurchase program. This method of repurchase gave the company the flexibility to choose the timing of the transaction.
- Statement 2** Peregrine plans to buy back shares by making tender offers during the coming year. By making tender offers, the company will be able to repurchase shares at a discount to the prevailing market price.

With respect to Owen's statements:

- (A) both are correct.
- (B) only one is correct.
- (C) both are incorrect.

50. Dan Bridges, head of equity strategies for Paca Inc. a consultant to institutional investors makes the following statement:

Globally, the developed markets have seen a decline in proportion of companies paying cash dividends. Lately, we have also seen an increase in the proportion of companies engaging in share repurchases.

Bridges' statement is most likely:

- (A) Incorrect as to dividend payout ratios.
- (B) Incorrect as to companies engaging in share repurchases.
- (C) Correct.

51. Sinclair Construction Company's Board of Directors is considering repurchasing \$30,000,000 worth of common stock. Sinclair assumes that the stock can be repurchased at the market price of \$50 per share. After much discussion Sinclair decides to borrow \$30 million that it will use to repurchase shares. Sinclair's Chief Executive Officer (CEO) has compiled the following information regarding the repurchase of the firm's common stock:

- Share price at the time of buyback = \$50
- Shares outstanding before buyback = 30,600,000
- EPS before buyback = \$3.33
- Earnings yield =  $\$3.33 / \$50 = 6.7\%$
- After-tax cost of borrowing = 8.0%
- Planned buyback = 600,000 shares

Based on the information above, Sinclair's earnings per share (EPS) after the repurchase of its common stock will be closest to:

- (A) \$3.18.
- (B) \$3.23.
- (C) \$3.32.

