

IMA's Certification for Accountants and Financial Professionals in Business

CMA EXAM 注册管理会计师考试 RATIO DEFINITIONS 比率定义(2024年)

## <u>Part 1 Financial Reporting, Planning, Performance, and Control 财务报告,规划,业绩和控制</u> Section C Performance Management 绩效管理

#### Section C.3 Performance measures 绩效考核

- e\*. ROI = Income of business unit / Assets of business unit 投资回报率 = 业务单元的利润/业务单元的资产
- g. Residual Income (RI) = Income of business unit (Assets of business unit x required rate of return) 剩余收益(RI)= 业务单元的利润 (业务单元的资产 X 要求报酬率)

Note: "Income" means operating income unless otherwise noted

注释:除非另外说明,利润是指营业利润

## Part 2 Financial Decision Making 财务决策

Section A Financial Statement Analysis 财务报表分析

### Section A.1 Basic Financial Statement Analysis 基本财务报表分析

- a. Common size statement = line items on income statement and statement of cash flows presented as a percent of sales; line items on balance sheet presented as a percent of total assets 同比财务报表 = 利润表和现金流量表上的各项以销售额的百分比列报;资产负债表上的各项以总资产的百分比列报
- b. Common base year statements = (new line item amount /base year line item amount) x 100% 共同基年报表 = (新的项目金额/基准年的该项目金额) X100%
- c. Annual growth rate of line items = (new line item amount old line item amount x 100%

项目年增长率 = (新的项目金额 - 旧的项目金额)/旧的项目金额 X100%

### Section A.2 Financial Ratios 财务比率

Unless otherwise indicated, end of year data is used for balance sheet items; full year data is used for income statement and statement of cash flow items.

除非另外说明,资产负债表项目使用年末数据;利润表和现金流量表项目使用全年数据

#### Liquidity 流动性

- a(1) Current ratio = current assets / current liabilities 流动比率 = 流动资产/流动负债
- a(2) Quick ratio or acid test ratio = (cash + marketable securities + accounts receivable) / current liabilities

速动比率或酸性测试比率 = (现金+有价证券+应收账款)/流动负债

- a(3) Cash ratio = (cash + marketable securities) / current liabilities 现金比率 = (现金+有价证券) /流动负债
- a(4) Cash flow ratio = operating cash flow / current liabilities 现金流量比率 = 经营性现金流量 / 流动负债

<sup>\*</sup> Letter references refer to subtopics in Learning Outcome Statements

a(5) Net working capital ratio = net working capital / total assets 净营运资本比率 = 净营运资本/总资产

### Leverage 杠杆

- f(2) Degree of operating leverage = % change in EBIT / % change in sales, or = contribution margin / EBIT 经营杠杆系数 = 息税前利润的变动百分比/销售额的变动百分比,或者= 边际贡献 / 息税前利润
- h. Financial leverage ratio = assets / equity 财务杠杆比率 = 资产/权益
- i(1) Debt to equity ratio = total debt / equity 负债权益比率 = 总负债 / 权益
- i(2) Long-term debt to equity ratio = (total debt current liabilities) / equity 长期负债与权益比率 = (总负债 流动负债)/权益
- i(3) Debt to total assets ratio = total debt / total assets 负债对总资产比率 = 总负债 / 总资产
- j(1) Fixed charge coverage = earnings before fixed charges and taxes / fixed charges\*
  \*fixed charges include interest, required principal repayment, and leases
  固定费用保障比率 = 扣除固定费用和税款之前的利润/固定费用,
  \*固定费用包括利息,需要偿还的本金,以及租赁费用
- j(2) Interest coverage (times interest earned) = EBIT / interest expense 利息偿付率(利息保障倍数) = 息税前利润/利息费用
- j(3) Cash flow to fixed charges = (cash from operations + fixed charges + tax payments) / fixed charges. Note: cash from operations is after-tax. 现金流量对固定费用比率 = (经营现金流量+固定费用+税款)/固定费用 注释: 经营现金为税后现金。

## Activity 活动性

- l(1) Accounts receivable turnover = credit sales / average gross accounts receivables 应收账款周转率 = 赊销额/平均应收账款额
- l(2) Inventory turnover = cost of goods sold / average inventory 存货周转率 = 销货成本/平均存货额
- l(3) Accounts payable turnover = credit purchases / average accounts payable 应付账款周转率 = 赊购额/平均应付账款额
- m(1) Days sales in receivables = average accounts receivable / (credit sales / 365), or = 365 / accounts receivable turnover 应收账款周转天数 = 平均应收账款额/(赊销额/365),或者 365 / 应收账款周转率

- m(2) Days sales in inventory = average inventory / (cost of sales / 365), or = 365 / inventory turnover 存货销售天数 = 平均存货额/(销货成本/365),或者 365/存货周转率
- m(3) Days purchases in payables = average payables / (purchase / 365), or
  - 25) Days purchases in payables = average payables / (purchase / 303), or = 365 / payables turnover

应付账款付款天数 = 平均应付款额/(赊销额/365),或者 365/应付账款周转率

- n(1) Operating cycle = days sales in receivables + days sales in inventory 营业周期 = 应收账款周转天数 + 存货销售天数
- n(2) Cash cycle = Operating cycle days purchases in payables 资金周转期 = 营业周期 应付账款付款天数
- o(1) Total asset turnover = sales / average total assets 总资产周转率 = 销售额/平均总资产
- o(2) Fixed asset turnover = sales / average net plant, property and equipment 固定资产周转率 = 销售额/ 平均固定资产净额

## Profitability 获利能力

- p(1) Gross profit margin percentage = gross profit / sales 毛利率 = 毛利/销售额
- p(2) Operating profit margin percentage = operating income / sales 营业利润率 = 营业利润/销售额
- p(3) Net profit margin percentage = net income / sales 净利率 = 净利润/销售额
- p(4) EBITDA margin = EBITDA / sales 息税折旧及摊销前利润率 = 息税折旧及摊销前利润/销售额
- q(1) ROA = net income / average total assets 资产回报率 = 净利润/平均总资产
- q(2) ROE = net income / average equity 权益回报率 = 净利润/平均权益

#### Market 市场

- r(1) Market-to-book ratio = current stock price / book value per share 市净率 = 当前每股市价/每股账面价值
- r(2) Price earnings ratio = market price per share / EPS 市盈率 = 当前每股市价/每股收益
- s. Book value per share = (total stockholders' equity preferred equity) / number of common shares outstanding 每股账面价值 = (总股东权益-优先股权益)/普通股流通数量
- u(1) Basic EPS = (net income preferred dividends) / weighted average common shares outstanding 基本每股收益 = (净利润 优先股股利) / 加权平均流通在外的普通股数量 (Number of shares outstanding is weighted by the number of months shares are outstanding) (流通在外的普通股数量需要根据流通在外的月份数进行加权)

u(2) Diluted EPS = (net income – preferred dividends) / diluted weighted average common shares outstanding

稀释后每股收益 = (净利润 – 优先股股利)/稀释后的加权平均流通在外的普通股数量 (Diluted EPS adjusts common shares by adding shares that may be issued for convertible securities and options)

(稀释后每股收益需要调整普通股数量,该调整涉及因可转换证券或期权而增发的普通股数量)

- v(1) Earnings yield = EPS / current market price per common share 收益率 = 每股收益/当前普通股每股市价
- v(2) Dividend yield = annual dividends per share / market price per share 股利收益率 = 每股年股利/每股市价
- v(3) Dividend payout ratio = common dividend / earnings available to common shareholders 股利支付率 = 普通股股利/可供普通股股东分配的利润

### Section A.3 Profitability Analysis 获利能力分析

- a(1) ROA = Net profit margin x total asset turnover; (net income / sales) x (sales / average total assets) = net income / average total assets 资产回报率 = 净利润率 \* 总资产周转率; (净利润/销售额) X (销售额/平均总资产) = 净利润/平均总资产
- b(2) ROE = ROA x financial leverage; (net income / average total assets) x (average total assets / average equity )= net income / average equity 权益回报率 = 投资回报率 X 财务杠杆; (净利润/平均总资产)X(平均总资产/平均权益) = 净利润/平均权益
- g(1) Operating profit margin percentage = operating income / sales 营运利润率 = 营业利润/销售额
- g(2) Net profit margin percentage = net income / sales 净利润率 = 净利润/销售额
- j. Sustainable growth rate = (1- dividend payout ratio) x ROE 可持续增长率 = (1-股利支付率) X 权益回报率

# Section B Corporate Finance 公司财务

# Section B.4 Working capital management 营运资本管理

b. Net working capital = current assets – current liabilities 净营运资本 = 流动资产 – 流动负债

## Section C Decision Analysis 决策分析

# Section C.1 Cost/volume/profit analysis 本量利分析

- f(1) Breakeven point in units = fixed costs / unit contribution margin 销售量保本点 = 固定费用/单位边际贡献
- f(2) Breakeven point in dollars = fixed costs / (unit contribution margin / selling price) 销售金额保本点 = 固定费用/(单位边际贡献/单价)
- i(1) Margin of safety = planned sales breakeven sales 安全边际 = 计划销售量 保本点销售量
- i(2) Margin of safety ratio = margin of safety / planned sales 安全边际率 = 安全边际/计划销售量

## Section C.3 Pricing 价格

- n. Elasticity is calculated using the midpoint formula. For price elasticity of demand E = [change in quantity / (average of quantities)] / [change in price / (average of prices)] 弹性是用中点公式来计算的。对于需求的价格弹性 E
  - =[需求的变化量/需求变化前后的平均需求量]/[价格的变化量/价格变化前后的平均价格]
  - = 需求量变动的百分比/价格变动的百分比

## Section E. Capital Investment Decisions 资本投资决策

### Section E.2 Capital investment analysis methods 资本投资分析方法

f. Profitability index = PV of future cash flow / Initial investment 盈利指数 = 未来现金流的现值/初始投资