

# CFE SDM – Strategic Decision Making Exam Spring/Fall 2017

## Important Exam Information:

Exam Registration	Candidates may register online or with an application.
Order Study Notes	Study notes are part of the required syllabus and are not available electronically but may be purchased through the online store.
Introductory Study Note	The Introductory Study Note has a complete listing of all study notes as well as errata and other important information.
<u>Case Study</u>	This case study will also be provided with the examination. Candidates will not be allowed to bring their copy of the case study into the examination room.
Past Exams	Past Exams from 2000 - present are available on the SOA website.
<u>Updates</u>	Candidates should be sure to check the Updates page on the exam home page periodically for additional corrections or notices.

## 1. Topic: Accounting and Value Measures / Managerial Accounting

## Learning Objectives

The candidate will understand measures of corporate value and their uses in risk management.

#### Learning Outcomes

The Candidate will be able to:

- a) Assess accounting concepts used in the production of financial statements
- b) Explain how economic capital and related concepts can be used as the building block of value measure in any industry
- c) Evaluate various financial reporting metrics for use in corporate decision-making.

- SDM-100-13: Managerial Accounting for CERAs and FSAs, 2013
- SDM-105-13: The European Insurance CFO Forum Market Consistent Embedded Value Principles
- SDM-129-14: The Impact of Capital Structure on Economic capital and Risk Adjusted Performance
- SDM-132-14: There's More to Life than Solvency II
- SDM-133-14: Solvency II: Rainmakers and the Elements of Risk
- SDM-145-16: A comparison and economic analysis of international solvency regimes for life annuity markets
- SDM-147-16 Berkshire Hathaway 2014 Annual Report (pp. 7-11 and 121)
- SDM-166-17: Global Insurance Capital Standards: Origin, Perspectives and Impact on US Markets

## 2. Topic: Credit and Liquidity Risk

#### Learning Objectives

The candidate will be able to identify the presence of liquidity & counterparty credit risk, critique approaches to measure and manage these risks, and identify second order impacts of mitigating these risks

## Learning Outcomes

The Candidate, for a given situation, will be able to:

- a. Identify counterparty credit and liquidity risks concepts that arise from specific business activities
- b. Assess the critical nature of counterparty credit risk exposure and the specific situations where liquidity risk exposure also becomes critical
- c. Critique the applicability and relevance of various counterparty credit and liquidity measurement and management techniques, as well as the associated impacts
- d. Qualify the impact of various regulatory requirements on exposure, capital, and the management of counterparty credit and liquidity risk

- The xVA Challenge: Counterparty Credit Risk, Funding, Collateral and Capital, Gregory, Jon, 3rd edition, 2015
  - Ch. 1-3 (Background)
  - Ch. 4, 5.1.1-5.2.7, 5.4.1-5.5, 6.1.1-6.2.9, 6.6.1-6.6.6, 9.1.1-9.2.1, 9.2.4-9.4, 7.1.1-7.4.4, 8.1.1-8.7.6, 10.4.1-10.5.4, 12.1.1-12.2.5, 13.1.1-13.3.1, 14.1.1-14.5.2, 17.1.1-17.4.7, 18.1.1-18.3.9
- SDM-106-13: Chapters 5-6 of *Credit Risk Measurement In and Out of the Financial Crisis,* 3<sup>rd</sup> Edition by Saunders and Allen
- SDM-107-13: Chapter 17 of *Financial Institutions Management: a Risk Management Approach,* 2010 7<sup>th</sup> edition, by Saunders and Cornett.
- SDM-108-13: Chapters 2 and 3 of *Liquidity Risk Measurement and Management*, Matz and Neu
- SDM-148-16: Counterparty Risk FAQ: Credit VaR, PFE, CVA, DVA, Closeout, Netting, Collateral, Rehypothecation, WWR, Basel, Funding, CCDS and Margin Lending . Brigo
- SDM-149-16: Basel Committee on bank supervision: liquidity risk management framework, pp.1-31
- SDM-150-16: Management Solutions: Liquidity Framework and impact on management
- SDM-164-16: Counterparty Credit Risk, Impact on Collateral Flows and Role for Central Counterparties, Singh and Aitken
- SDM-165-16: CVA the wrong way, pp.350-358- Dan Rowen and David Saunders
- SDM-167-17: Bagehot was a Shadow Banker: Shadow Banking, Central Banking, and Future of Global Finance

3. Topic: Capital Management and ERM Process

#### **Learning Objectives**

The candidate will understand ERM processes and Capital Management and their use in setting a risk-return strategy in any industry.

#### **Learning Outcomes**

The Candidate will be able to:

- a) Explain ERM principles and frameworks
  - Evaluate a company's ERM processes in its ability to adapt to emerging issues and identify risk opportunities.
  - Critique the direction of new regulation and industry standards in risk governance.
  - Describe the components of a risk appetite statement. Design and develop a risk appetite statement and risk-return strategy.
- b) Explain ERM and capital management concepts to evaluate and recommend corporate financial and ERM decisions
  - Apply capital allocation models to a multi-line organization.
  - Compare and contrast various ERM and Capital Management frameworks as to their ability to assess value and articulate the risk-return strategy of an organization.
  - Evaluate the value added for an organization by jointly evaluating risk measurement and capital allocation.
  - Assess how an ERM process can improve capital efficiency and articulate the risk return strategy.

- The Failure of Risk Management, Why It's Broken and How to fix it, 2009, Hubbard, D, 2009
  - Chapters 6-12
- Strategic Management: Competitiveness and Globalization, Concepts, Hitt, Michael, Ireland, Duane, and Hoskisson, Robert, 11<sup>th</sup> Edition.
  - Ch. 10, Corporate Governance
- SDM-111-13: Quantitative Risk Management
  - o Chapter 2.2 (Risk Measurement) background
  - Chapter 6.1 (Coherent Measures of Risk)
  - Chapter 6.3 (Capital Allocation)
- SDM-113-13: Revisiting the Role of Insurance Company ALM within a Risk Management Framework
- SDM-141-15: Managing the Invisible: Identifying Value-Maximizing Combinations of Risk and Capital
- SDM-147-16: Berkshire Hathaway 2014 Annual Report, pp. 7-11 and p.121
- SDM 151-16: Risk Appetite Framework: How to spot the genuine article, Deloitte

- SDM 152-16: The final Countdown Solvency II/ORSA, The Actuary Feb. 2015
- SDM-153-16: Exploring Risk Appetite and Risk Tolerance
- SDM-168-17: Risk Management and the Rating Process for Insurance Companies
- SDM-169-17: ORSA Quantifying Risk Exposure for Own Risk and solvency Assessment Reports
- <u>Risk Appetite: Linkage with Strategic Planning</u>

## 4. Topic: The Decision Making Process

#### **Learning Objectives**

The candidate will understand organizational behavioral concepts and apply strategic management frameworks to corporate financial and ERM business problems.

#### **Learning Outcomes**

The Candidate will be able to:

- a) Apply organizational behavior concepts
  - Describe the communication process and explain the strategic importance of communication to organizations
  - Describe the fundamentals of decision making and explain decision-making styles and influences
  - Assess how the behavior of individuals and groups in organizations drives organizational decisions and performance
  - Describe common types and causes of organizational conflict and apply the elements of a basic negotiation process
- b) Evaluate and apply the concepts of strategic management, recognizing the factors that affect the development and implementation of strategies:
  - Demonstrate the importance of analyzing the firm's external environment and the internal organization
  - Define types of business-level strategies and recommend an appropriate business-level strategy for a given situation
  - Explain the impact of competitive dynamics on strategic management
- c) Use organizational behavior and strategic management concepts to evaluate and recommend corporate financial and ERM decisions

- Organizational Behavior: A Strategic Approach, Hitt, Michael, Miller, C. Chet, and Colella, Adrienne, John Wiley & Sons, 4th Edition, 2015
  - o Ch. 9, Communication
  - Ch. 10, Decision making by individuals and groups
  - Ch. 11, Groups and Teams
  - o Ch. 12, Conflict, Negotiation, Power and Politics
- Strategic Management: Competitiveness and Globalization, Concepts, Hitt, Michael, Ireland, Duane, and Hoskisson, Robert, 11<sup>th</sup> Edition, 2015
  - Ch. 1, Strategic Management and Strategic Competitiveness
  - Ch. 2, External Environment: Opportunities, Threats, Industry Competition, and Competitor Analysis

## Corporate Finance & ERM Strategic Decision Making Spring 2017/Fall 2017

- Ch. 3, Internal Organization: Resources, Capabilities, Core Competencies and Competitive Advantages
- Ch. 4, Business-Level Strategy
- Ch. 5, Competitive Rivalry and Competitive Dynamics
- Ch. 6, Corporate-Level Strategy
- SDM-138-14: When and When *Not* to Vertically Integrate

## 5. Topic: Case Studies and Strategic Risk Management

#### Learning Objectives

The candidate will understand the decision making process and the lessons learned from the risk taking activities and experiences of other organizations. In particular, the candidate will be able to apply the learning objectives of all the prior sections of the syllabus to the risk management principles embodied within the case studies explored in this section.

#### **Learning Outcomes**

The Candidate will be able to:

- a) Critique financial models, assumptions and decisions including the impact of behavioral finance concepts
- b) Evaluate the robustness and flexibility of the risk management framework and recommend approaches for continual improvement in the framework and processes
- c) Assess the risk of the status quo alongside any other risky and or risk management decision
- d) Explain and apply concepts of innovation and market disruption
- e) Explain and apply best practices of product development

- Nudge: Improving Decisions about Health, Wealth and Happiness, Thaler, Richard and Sunstein, Cass
  Ch. 1-5
- SDM-121-13: British Petroleum (PLC) and John Browne: A Culture of Risk Beyond Petroleum
- SDM-126-13: Managing the Multiple Dimensions of Risk-Part II the Office of Risk Management
- SDM-135-14: Solving the Financial and Sovereign Debt Crisis in Europe
- SDM-136-14: The Common Link in Failures and Scandals at the World's Leading Banks
- SDM-155-16: Sybil Logic Bomb Catastrophe Scenario
- SDM-156-16: Why Data Breaches Don't Hurt Stock Prices
- SDM-157-16: Airbnb: A Spare Room for Debate
- SDM-158-16: How Uber and the sharing economy can win over regulators
- SDM-159-16: Alibaba: The First Real Test for Amazon's Business Model
- SDM-160-16: Why Tescos Strengths are no longer good enough
- SDM-161-16: Creating Bold Innovation in Mature Markets
- SDM-163-16: Identifying new Product Development Best Practice
- SDM-170-17: Fear and Respect: VW's culture under Winterkorn
- SDM-171-17: Five Leadership Lessons from BP Oil Spill