

# Book Review

## ***Valuation: The Art and Science of Corporate Investment Decisions***

**By Sheridan Titman and John Martin, Pearson Education: 2007, 556 pages**

■ In *Valuation: The Art and Science of Investment Decisions*, co-authors Sheridan Titman and John Martin have provided a tool kit for students and practitioners of financial analysis and valuation to implement successful techniques for project and enterprise valuation. The authors succeed in providing fundamental knowledge to a broad audience of readers that is grounded in industry practice and recent advances in valuation methods. The text directs readers to relevant examples and provides the methodology necessary for the reader to ask relevant questions in their approach to any decision involving valuation.

The book is accessible to a wide audience – from business professionals working within companies in strategic planning or corporate finance and accounting functions to valuation professionals, and in an academic setting the text is appropriate for business students from the undergraduate to executive MBA levels. Unlike other comprehensive valuation texts, it provides accessibility to readers who lack strong foundations in corporate finance because it provides a review of important concepts and theories where necessary. The text also does a great job in reviewing the mechanics of important calculations and provides an explanation of how to utilize the excel spreadsheet support to perform analysis. There are several applications for this text in a classroom environment. It is well suited for use in courses on valuation and corporate financial strategy and is also extremely relevant in Executive MBA coursework.

A common theme in several parts of the text is how firms might be able to incorporate best practices to avoid the downfall of wasted time and resources resulting from agency or “influence” costs. The text does a good job explaining

how these influence costs arise and how to implement the appropriate valuation tools to minimize and control these costs.

The text is well written and explains terminology and concepts clearly and is organized into four parts: I. Project Analysis Using Discounted Cash Flow Analysis; II. Cost of Capital; III. Enterprise Valuation; Futures, Options & Valuation of Real Investments.

### **I. Part I. Project Analysis using DCF**

This section does a nice job picking up where many introductory corporate finance texts leave off with capital budgeting. Many texts fall short of providing an understanding of the practical application of the discounted cash flow model. However, the Titman/Martin text refreshes users on the basics of the technique and provides a straightforward three-step approach that addresses various nuances of practical application that are encountered in the real world.

### **II. Part II. How to Estimate Cost of Capital For the Firm As a Whole and For Individual Investment Projects or Proposals**

This section discusses how to estimate cost of capital for the firm as a whole and for individual investment projects or proposals. Other valuation texts can be overly theoretical on this topic and fail to explain how real time market

considerations must be factored into both firm and project discount rates. One example is in the approach to the cost of debt capital. In the absence of a market yield to maturity, the text explains how to assign a cost of capital based on a market driven, risk-adjusted methodology (e.g., Figure 4.3, “Reuters Corporate Spreads”). This section could be strengthened with the addition of a financial statement analysis section so that students could tie this back to the assessment of firm credit quality. This section also addresses the cost of preferred equity, and hybrid securities - whereas many corporate finance texts fail to explain this in any level of detail or to allow the reader to practice the application of these forms of capital in the capital structure. Another strong point in this section is the appendix which provides additional “extensions and refinements of WACC estimation,” and discusses important topics such as estimating the cost of debt capital for below-investment grade debt financing and factoring in default rates, recovery rates and yields on corporate debt (e.g., Table 4A-2, “Estimating the Expected Cost of Debt on a Long-Term Bond (Rated Caa/CCC)”). This section is particularly useful as the reader continues into the section III topics of leveraged buyouts.

### III. Part III. Enterprise Valuation

This section provides the bulk (pages 213-404) of the material that would typically be covered in a course on enterprise valuation. The authors apply a combination of market and income (DCF) approaches and also address the problems of enterprise valuation through the eyes of a private investor; this includes venture capitalists and investors participating in leveraged buyouts. Chapter 8 on “Valuation in a private Equity Setting” does a better job than any that I have seen on the market in terms of its explanation of the Market for private equity (Figure 8-1).

### IV. Part IV. Real Options at an Operational Level

This section features a three-part treatment of real options and how they can be used at an operational level to value project cash flows for capital budgeting decisions and at the strategic level where investments in new businesses are evaluated. The text covers the rapid development of markets for financial derivatives products and concludes with a comprehensive section on the valuation of investments when management has flexibility with implementation. This section is supported by relevant excel spreadsheet examples of the applications of real option analysis. Another unique feature of this text and bonus to the reader is

the complimentary trial of Crystal Ball® software and comes with spreadsheet support to allow the use of Monte Carlo simulation.

Each section of the text is outlined with a series of visual diagrams, tables and examples to aid the reader in the practical application of the techniques described in the text. The materials are presented thoughtfully through a combination of industry, technical, behavioral and practitioner insights included in each chapter to correspond to the core explanation of concepts and theory. It is as though the co-authors opened a vast Rolodex of academic experts and industry practitioners and invited contributions of best practices so that the reader could benefit from a vast source of collective and complimentary perspectives. For example, refer to the Chapter 4 interview with a partner at a major consulting firm about their approach to estimating the market risk premium for CAPM, the Chapter 7 interview with an investment banker about the approach to enterprise valuation on Wall Street, and the Chapter 8 Industry Insight about the “Biggest Buyout Deals in 2006”. Chapter 8 also includes an interview with a chief investment officer of a major university Endowment about approaching investing in private equity. There are many other interviews and insights included in the book. These are welcome additions to a text on valuation that allow the reader to understand how one can bridge the gap between theory and practice in valuation. Students appreciate this real-world perspective and the many real-world case studies and practice examples included throughout the text.

If the reader was focused on capital budgeting decisions and long term strategic planning they could utilize both sections I and IV. Similarly if the reader was only interested in enterprise valuation and application of valuation techniques for equity and asset valuation, they could utilize sections II and III on a standalone basis.

The end-of-the-chapter practice problems for students are comprehensive and complete. The authors excelled in pooling materials from both academics and valuation practitioners to provide a robust qualitative and conceptual review of materials in addition to quantitative questions and mini-cases.

There are several key appendices throughout the text that provide extra detail or explanation of special circumstances. For example, refer to Chapter 3 Introduction to Simulation Analysis and Crystal Ball, Chapter 4 Extension and Refinements of WACC Estimation, and Chapter 10 comprehensive appendices related to options.

## V. Conclusion

The greatest weakness with the first edition of this text is that it lacks a section on forecasting and financial statement analysis. The second edition could be improved with the addition of these topics plus some additional discussion of how valuation varies across countries and more international perspective.

The book is especially relevant to international users, as it is one of the few valuation texts to offer a comprehensive approach to project finance techniques, which could be extremely useful to managers in Asia and Australia, for

example, where investments in mining and natural resources will continue to be a focus in the near-term. ■

- **Bonus materials & other: 140 day trial of Crystal Ball® software, Excel supplements. The text is supported by instructor resources including PowerPoint and Excel solutions.**

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