McGill

Strategic Aspects of Accounting 2– ACCT 664

Intro to Business Valuations & Asset Based Valuation Approaches

Marc Deegan, MBA, CBV

McGill

What we will see over the next three weeks

Week 1

- General Introduction
- Asset based valuation approaches
  - Going concern
  - Liquidation (not covered in class)

Week 2

- Capitalized Earnings Method
- Cost of capital (determining the multiple)

What we will see over the next three weeks

Week 3

- Discounted Cash flow method
- Market Comparables
- Wrap up

McGill

My goals for the next three weeks

- You become familiar with the different approaches and methods to valuing a business
- You gain a high level understanding of the key drivers that impact business valuations
- You are prepared for your exams
- I provide you with insights into your career path

McGill

Outline – This Evening

- CICBV – Canadian Institute of Chartered Business Valuators
- Factors to consider in valuing a business
- Key concepts
- Principles of Business Valuations
- Asset Based Valuation Approach

McGill

Canadian Institute of Chartered Business Valuators (CICBV)

- www.cicbv.ca
- CBV is the premier credential for business valuations in Canada/USA
- Only 1,800 members in Canada
- 200 + members in Quebec
- Curriculum based on correspondence/distance learning
- 6 courses with assignments and case studies
- 6 National exams + 1 National final exam
- 1,500 hours of practical work experience

McGill

Canadian Institute of Chartered Business Valuators (CICBV)

- CBV is a leading curriculum in the global business valuations practice
- 95% of CBV's are chartered professional accountants (CPA) and chartered financial analysts (CFA)
- CBV's work in accounting firms, investment banking, government ie (Revenue Canada), Venture capital, Private Equity etc..
- CFA = general designation, CBV = focus on valuations
- CBV still relatively unknown in the finance world

What is business valuations ?

“Quantifying the value of a business based on the ***present value of future cash flows*** *generated from the business’ assets and liabilities* ***at a specific point in time****.”*

McGill

Reasons to Value a Business

Reasons to value a business

- Mergers and acquistions, divestitures
- Litigation- shareholder disputes, divorces etc..
- Tax purposes – reorganizations , freezes
- Financial statement purposes – Fair value of intangible assets and goodwill
- To obtain financing
- Investing in a company
- Others

McGill

SEEKING $400,000 FOR 25% OF MY PRIVATE COMPANY. WE MANUFACTURE HEALTHY GRANOLA

McGill

Factors to consider when valuing or investing in a business

- Management and employees
  - Strength
  - Depth
  - Personal goodwill – owner
  - Experienced employees (low vs. high turnover)

- Products and services
  - Breadth
  - Depth
  - Intellectual property
  - Positioning within the product/service life cycle

McGill

Factors to consider when valuing or investing in a business

- Financials
  - History of profitability and growth
  - Strong cash flow with adequate debt coverage
  - Balance sheet supported by strong working capital and debt to equity ratios
- Sales and Marketing
  - Client base – diversity vs. concentration
  - Brand – is it recognized in the marketplace
  - Effective advertising and promotion strategy (web/social media)
  - Extensive knowledge of the target market

McGill

Factors to consider when valuing or investing in a business

- Information Technology
  - Age and condition of IT infrastructure
  - Efficiency and accuracy of reporting
  - Use of technology in the production process

- Economy and Industry
  - Strength and number of competitors
  - Local vs. Global competition
  - Growth prospects for both the economy and industry
  - Overall economic conditions

McGill

Factors to consider when valuing or investing in a business

- General Business
  - Age, condition and investment required in capital assets
  - Supplier base – many vs. few
  - Opportunities for synergies or economies of scale
- Strategy
  - Differentiation vs. Low cost
  - Clear business model with a sustainable competitive adantage
  - Barriers to entry
  - Strategic posture vis-à-vis competition
  - Critical success factors

McGill

Factors to consider when valuing or investing in a business

- Legal
  - Any contingent liabilities (ie . Lawsuits)
  - Environmental issues
  - What are my rights as a shareholder (minority vs. majority)
  - Shareholders agreement
  - Any regulatory or government issues

- Smell test /gut check
  - Does this make sense
  - What does my gut tell me
  - Putting the pieces of the puzzle together

McGill

What are the Risks?
What are the Opportunities?

McGill

Valuation – $400,000 for 25%

What type of financial information do you need for your analysis?

McGill

VALUATION APPROACHES
Going Concern vs. Liquidation Value

McGill

Going Concern Approach

- Used when a company is a viable operating concern earning an economic return on capital
- The asset values ascribed under this approach are established in the context of their value in use.
- Most of the valuations that you will work on will be for going concern companies – hopefully !!

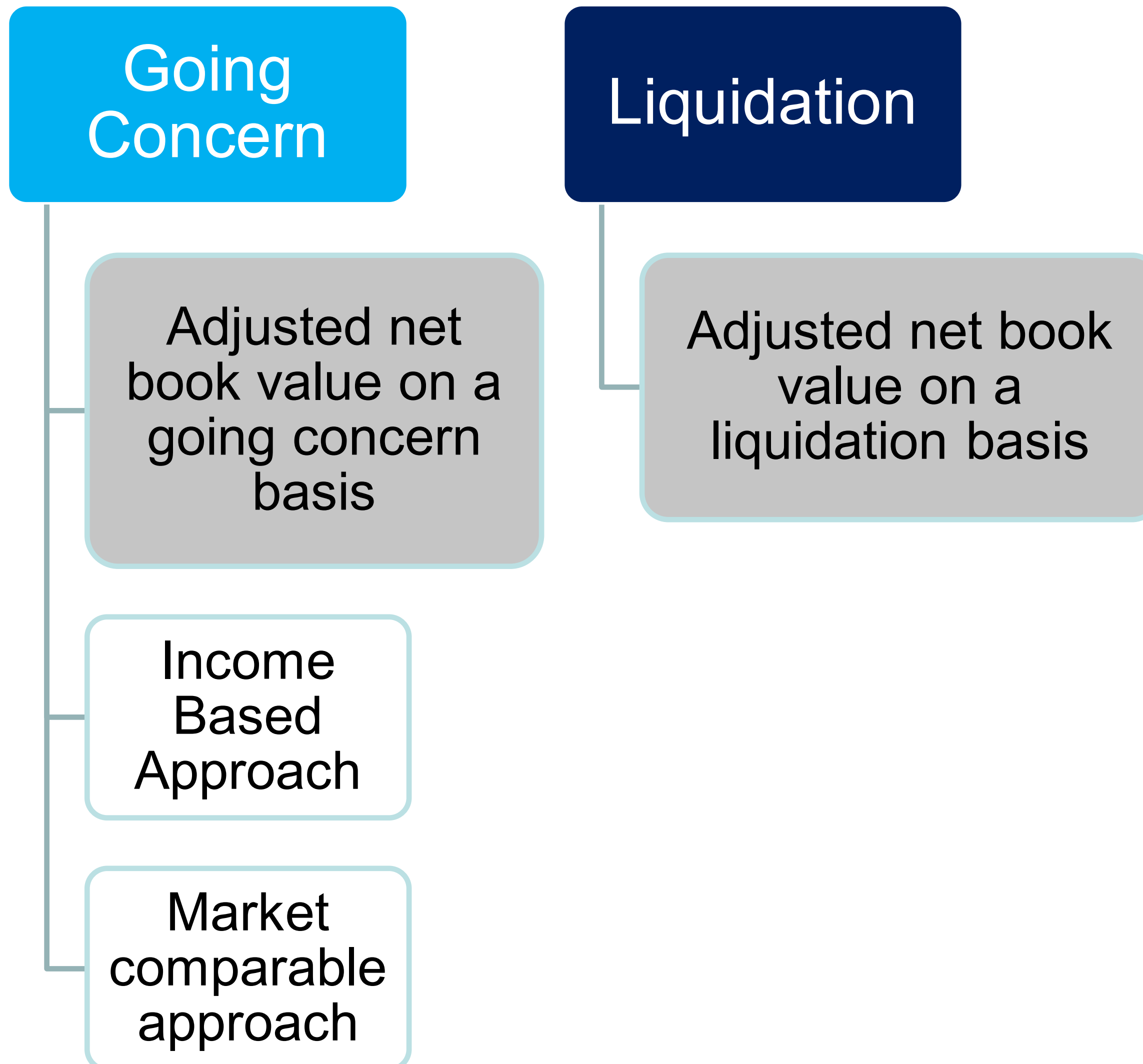
McGill

Liquidation Value Approach

- This is the net amount of money available to equity owners following:
  - a voluntary liquidation, a reorganization of a business pursuant to creditors or
  - a liquidation of a business pursuant to a receivership or other bankruptcy proceeding.

McGill

Going Concern vs. Liquidation Approach



McGill

Valuation Approaches and Methods

- Asset Based Approach
  - Based on the Fair Market Value of assets and liabilities
- Income Based Approach
  - Capitalized/multiple of earnings
  - Capitalized/multiple of cash flows
  - Discounted cash flow
- Market Based Approach
  - Comparables
  - Previous transactions
  - Market transactions

McGill

Fair Market Value vs. Price

McGill

Definition of FMV

« The highest price available in an open and unrestricted market between informed and prudent parties, acting at arm’s length and under no compulsion to act, expressed in terms of cash »

Often used in a **notional context,** where there is no open market transaction.

McGill

Notional Market

- A term used to describe circumstances where it is necessary to determine Fair Market Value, Fair Value or another definition of value in the absence of « Open Market Transactions »

Examples:

- A divorce case that requires the valuation of the shares of a company at a specific point in time
- A tax driven valuation whereby the value of certain shares are frozen at a specific point in time
- A company grants shares(share ownership plan) to certain key employees

McGill

Definition of Price

« The consideration paid in a negotiated open market transaction involving the purchase or sale of an asset »

(refer to word document for key differences between notional fmv and price)

McGill

Open Market

- A term used to describe the market in which arm’s length, negotiated transactions take place

Examples:

- The sale of shares of a company
- The purchase of shares of a company
- The stock market

McGill

Price vs. FMV

Price is what a buyer will pay for something, while value (FMV) is what it is actually worth!

McGill

Principles of Business Valuations

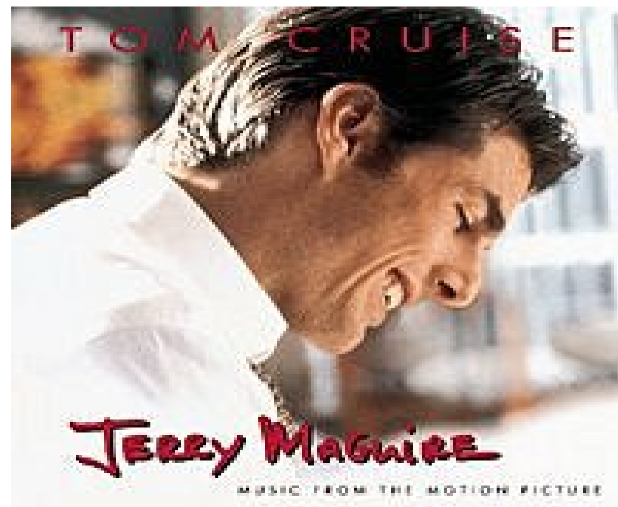
McGill

1 Value is point in time specific

- Typically a notional market concept
- Determined at a specific point in time, the Valuation Date
- It is a function of facts known and expectations made at a point in time
- Value is time-specific but will change as the circumstances of companies change
- Hindsight (or retrospective) evidence is generally not considered

2 Value is principally a function of prospective discretionary cash flow

- Value varies directly with the ability of a business to generate prospective cash flow
- Cash is King !!!



McGill

3 The market dictates the appropriate rate of return (multiple)

- Market rates of return provide important benchmark indicators

- Factors that influence multiples are dictated by the market
  - Growth rates (industry, company)
  - Equity risk premium (premium that we receive for investing in equities vs. Risk free investments T-bills, GIC's)
  - General business and economic conditions

4 Value may be influenced by underlying net assets

- The higher the asset value (tangible assets + identifiable intangible assets less the liabilities) lends support to a higher going concern value and reduces the risk associated with a business

- Assets - liabilities = SH equity

- The higher the asset value the lower the amount of goodwill there will be in a FMV calculation
- FMV = Assets + intangible assets + goodwill - liabilities

5 In some cases the value of a business is not transferable

- In certain cases, the value of a business is simply not transferable to a third party
- The « Key Person » in a business may be the driving force behind the sales and profitability resulting in « Personal Goodwill »
- This is the case in many small and medium sized privately held businesses
- In this case, the value of the shares of the Company is worth more to the owner than to a third party

McGill

6 Value is influenced by liquidity

- In general, the greater the liquidity of a business interest, defined in terms of the number of prospective purchasers, the greater the value of the business
- With more buyers present, the seller is typically in a better position to negotiate
- Liquidity is often a problem with minority interests (less than 50% stake) in private companies

McGill

7 The value of a minority interest may be worth less than the pro-rata value

- A 40% stake in a company valued at $1,000,000 may be worth less than $400,000.
- Minority shareholders generally do not have control over decision making, dividend policy, elect board members etc..
- As such, in some cases, a discount is applied to the pro-rata value.

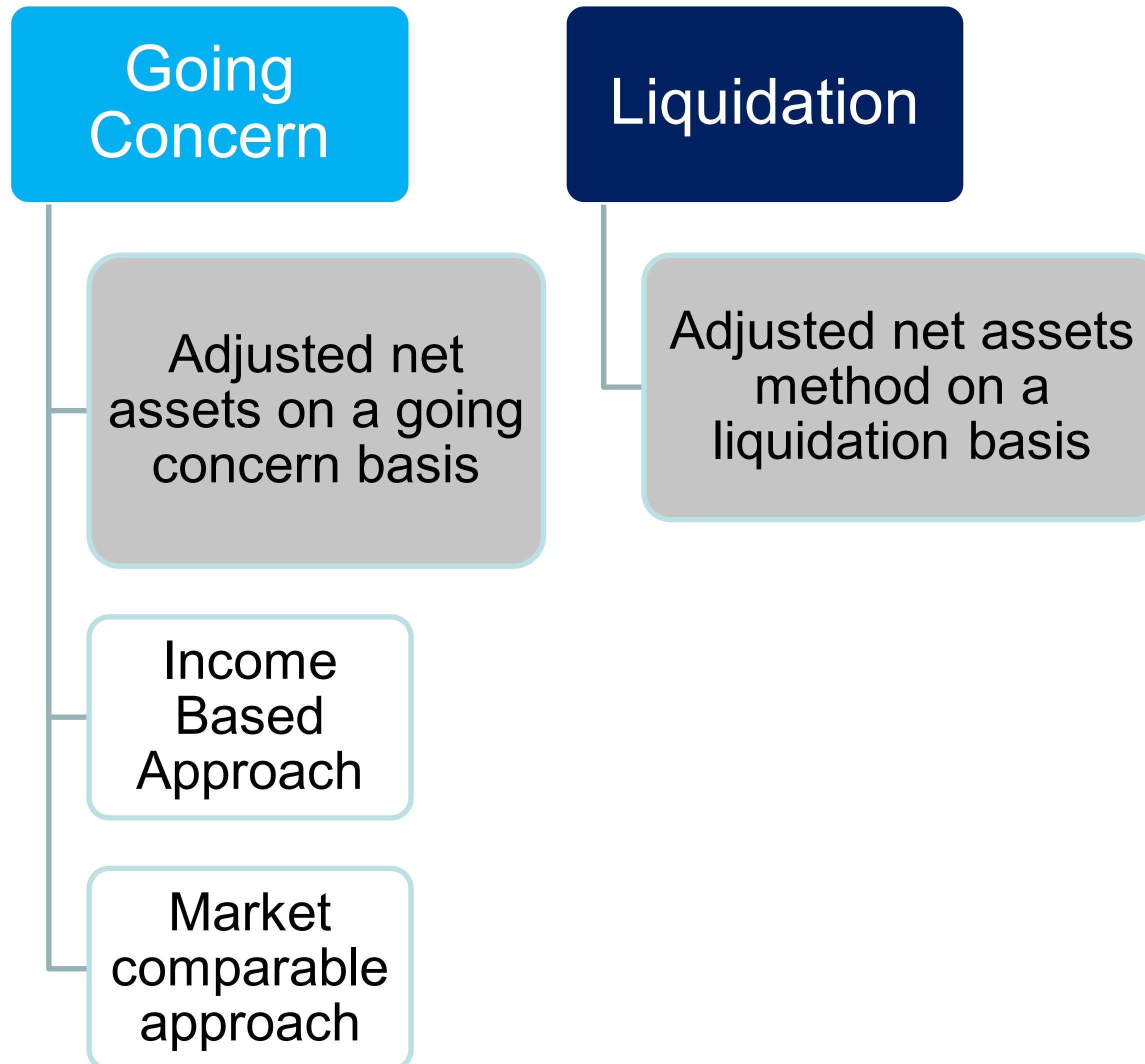
Asset Based
Valuation Approaches

Asset Based Valuation Approaches

- Going concern vs. Liquidation
- Typical adjustments to arrive at Fair Market Value

McGill

Going Concern vs. Liquidation Method



McGill

Going Concern vs. Liquidation Approach ?

Going Concern

- A Company that is both conducting operations at a given date and has every reasonable expectation of doing so for the foreseeable future

Liquidation Value

- Where a Company is not believed to be viable as a going concern (ie bankrupt or soon to be bankrupt)

Asset Based Approach

- Focus on the Fair Market Value of the **assets and liabilities** of a Company.
- The Balance Sheet !
- Need to make adjustments to reflect the FMV of the assets and liabilities such as:
  - Real Estate
  - Equipment
  - Marketable securities
  - Others

McGill

Asset Based Approach

- In most cases the assets on a balance sheet are shown at the lower of cost (less depreciation) and fair market value (FMV)
- This is a conservative accounting rule
- We are more interested in FMV
- We are Valuators not Accountants **(at least for tonight !!)**

McGill

Example

Current Assets	Book value	FMV
Marketable securities	$400,000	**$900,000**
Accounts receivable	1,000,000	1,000,000
Inventory	3,000,000	3,000,000
Prepaid expenses	50,000	50,000
	4,450,000	4,950,000
Properties	550,000	**3,000,000**
Equipment	1,000,000	**1,500,000**
	6,000,000	9,450,000
Liabilities	(4,000,000)	(4,000,000)
Shareholders Equity	$2,000,000	**$5,450,000**

McGill

When to use this approach ?

- Valuation of a holding company (ie. Company that does not have any operating income)
- Company that has significant assets such as real estate or marketable securities
- When the FMV under this approach is greater than the Income Based Approach
- To corroborate an Income Based Approach

Asset Based Approach is greater than Income Based Approach

- Income Based Approach = $1,500,000
- Asset Based Approach = $2,000,000
- You would retain the value of $2,000,000 obtained under the Asset Based Approach

Asset Based Approach – Going Concern Adjusted Net Assets Method

Deduct the net book value of goodwill*

Step # 1 – Shareholder’s Equity

- This is the starting point
- No adjustment to make
- Start with shareholder’s equity as per financial statements (assets – liabilities)

Step # 2 – Adjust for the FMV of the assets and liabilities

- In most cases, the assets are shown as historical cost (amount originally paid) less depreciation = book value not FMV
- Need to adjust assets and liabilities to their respective FMV
- Always try and back up the FMV of the assets with a third party valuation ie – equipment, real estate or brokers statement for marketable securities
- **Unavailable Tax Shield – See appendix (not considered in our examples)**

Step # 3 – Deduct the book value of the Goodwill

- We have to deduct the book value of the goodwill
- The goodwill on a balance sheet is typically the result of an acquisition whereby the company paid an amount in excess of the Target's adjusted net assets and identifiable intangible assets.
-

Purchase price =	$5,000,000
Adjusted net assets @ FMV=	3,000,000
Contracts and patents =	1,500,000
Goodwill amount =	$500,000

McGill

Intangible Assets

- A company may have intangible assets that would have a value under the Adjusted Net Assets Method

- These are often referred to as “Identifiable Intangible Assets” and include but not limited to:

  – Patents
  – Licenses
  – Customer lists
  – Contracts

- These assets are typically valued using a discounted cash flow calculation (we will see this later in the semester)

EXAMPLE – SUNGLASSES AT NIGHT

McGill

LIQUIDATION METHOD

McGill

Liquidation Approach

Forced Liquidation

- The sale of the assets where an immediate cessation of the business and disposition of assets is assumed on an "as is/where is" basis as quickly as possible – ie bankruptcy

Orderly Liquidation

- The sale of the assets over a reasonable period of time to maximize the proceeds

McGill

Liquidation Costs & Others

These costs need to be considered in a liquidation scenario

- Commissions on the sale of assets – ie. auction
- Legal and accounting fees
- Severance pay for employees
- Tax costs on the disposition of various assets
- WE DID NOT CONSIDER THESE COSTS UNDER THE GOING CONCERN APPROACH

McGill

YOU ARE THE OWNER OF A BUSINESS – WHEN DO YOU DECIDE TO LIQUIDATE ?

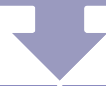
Warning Signs

- Reduced sales, profitability, gross margins
- Cash flow problems, not able to make payments
- Increased debt load and accounts payable (look to some ratio analysis to track the trends)
- Members of management team leaving the company
- Balance sheet in a deficit position – liabilities are greater than the assets

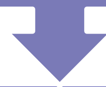
McGill

Asset Based Approach – Liquidation Value Method

Shareholder's Equity per financial statements

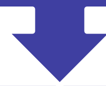


Adjust for the FMV of the assets and liabilities



Deduct the net book value of goodwill *

Liquidation and Severance Costs



Taxes on disposition of assets

What is the Difference between the two Methods

- Liquidation – **We assume liquidation costs (legal fees, severance and costs to sell assets) to wind down the business, not the case in a going concern scenario** whereby the business is expected to continue to operate

- Liquidation – We assume taxes on disposition of assets to bring it to the amount that the shareholders will receive in their pockets net of income taxes.

- For our examples **we will not take** into account taxes on disposition of assets or wind up of the business

McGill

EXAMPLE – STICKY GUM

McGill

Wrap Up

- Business Valuations is much more than just calculations and quantitative analysis
- You need to state your assumptions when performing a valuation calculation
- Cash Flow is a key driver in determining the value of a business
- Know when to use the asset based approach
- Asset Based Valuation Method provides you with the minimum valuation of a company ie – no goodwill

McGill

Wrap Up

- If you are in a scenario where you do not have all of the variables/information – then you must make assumptions and explain
- Read questions carefully for information/clues guiding you on which valuation method to use
- There will be more demand for CBV's and valuations as we move towards the baby boomers transfer of businesses to the next generation

McGill

APPENDIX

McGill

Unavailable Tax Shield

- **Nice to know but not obligatory**

- A BV calculation assumes the sale of shares

- In a share sale, the buyer does not get the opportunity to bump up the depreciable assets to their FMV

- As a result, there is a “lost” tax savings on the higher amortization amount that would have been deducted if the depreciable assets were bumped up

McGill

Unavailable Tax Shield

$$\text{Formula} = \frac{(\text{FMV} - \text{UCC}) \times \text{Tax rate} \times \text{CCA rate}}{\text{CCA rate} + \text{Rate of return}}$$

FMV = Fair Market Value of Asset

UCC = The Undepreciated Capital Cost of the Asset

Tax rate = Marginal corporate tax rate of the Company

CCA rate = The depreciation rate for income tax purposes

Rate of return = Usually risk free rate of return (ie. Gov't T-Bills or Bonds)

McGill

Unavailable Tax Shield

The Unavailable Tax Shield (UTS) is deducted from the FMV bump up of the asset.

Ex. Building FMV =	$1,000,000
UCC =	$700,000
Difference	$300,000
UTS example	($75,000)
Adjustment to FMV	$225,000