Methods for Valuing Customer Relationships

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Mr. Patel is an active member of the Appraisal Industry Task Force (AITF).

He is a member of the Appraisal Foundations Working Group preparing an industry Practice Aid for valuing customer related assets.

Mr. Patel is a frequent presenter on valuation issues for financial reporting purposes and has recently presented on valuation issues relating to ASC 805 (SFAS141R), ASC 350/360 (SFAS142/144), ASC 820 (SFAS157) and other emerging issues. In addition, Mr. Patel was on the Fair Value Panel at the 2008 AICPA SEC Conference. He has been quoted numerous times in the press regarding valuation issues.

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Topics Covered in the Valuation Advisory

- Accounting background and overview
- Identification of customer-related assets and valuation considerations
- Valuation methodologies
- Valuation methodology selection
- Other considerations
- Appendix on attrition rate calculations
- Appendix of case studies
Customer Assets Evolve Out of Other Activities

- Brands
- Technology (including R&D)
- A&P
- Customer Service
- Sales & Marketing
- Quality Control

Customer Relationships
Continuum of Customer Assets

Customer lists

Transactional purchase order based customers

Transactional customer relationships with MSAs

Recurring customer relationships with switching costs

Customers with long term contracts

Take or pay contracts
Determining the cash flow related to customer relationships is difficult and is the input that has the biggest impact on customer value.
Identification of Customer-related Assets and Valuation Considerations

- Qualitative understanding of the relative importance of the customer-related asset being valued:
  - Industry characteristics
  - Company characteristics
  - Product/service characteristics
  - Customer-related asset characteristics

- Other key factors to consider:
  - Barriers to change
    - Stickiness of customer relationships
    - Switching costs

- Qualitative attributes are just as important as quantitative attributes in determining the value of customer relationships.
Valuation Approaches

- Income Approach
  - Multi-Period Excess Earnings Method
  - Distributor Method
  - With-and-Without Method
  - Cost Savings Method

- Cost Approach
- Market Approach
Summary of Methods: MPEEM

MPEEM based customer cash flow
Company revenue/earnings
Less: Taxes
Less: Charges for contributory assets
Equals: Cash flows related to customer relationships

• Residual cash flow model
• Best used when:
  • Customers are the primary assets or
  • Margins are within a reasonable range of normal industry levels
Sample MPEEM Cash Flow Calculation

Revenue Adjusted for Growth $100,000
Remaining After Attrition 95.0%
Revenue After Attrition 95,000
EBITA 19,000

Less: Royalty for use of Trademark (9,500) 10.0%
Adjusted EBITA 9,500

Less: Income Taxes 3,800
Debt Free Net Income 5,700
Debt Free Net Income Margin 6.0%

Contributory Asset Charges
Normal Working Capital (1,425)
Property, Plant & Equipment (1,900)
Workforce (1,045)
Return on Supporting Assets (4,370)

Return on Supporting Assets -4.6%
Residual Income 1,330
**Summary of Methods: Distributor Method**

**Distributor Method based customer cash flow**

Company revenue
Earnings of market proxy
Less: Taxes
Less: Charges for contributory assets (based on market proxy)
Equals: Cash flows related to customer relationships

- Residual cash flow model but isolates cash flows relating to customer relationships
- Best used when:
  - Customers are NOT the primary assets or
  - A reasonable market proxy exists for the customer relationships
### Sample Distributor Method Cash Flow Calculation

<table>
<thead>
<tr>
<th>Description</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>Revenue Adjusted for Growth</td>
<td>$100,000</td>
</tr>
<tr>
<td>Remaining After Attrition</td>
<td>95.0%</td>
</tr>
<tr>
<td>Revenue After Attrition</td>
<td></td>
</tr>
<tr>
<td>EBITA</td>
<td>3,895</td>
</tr>
<tr>
<td>Less: Royalty for use of Trademark</td>
<td>0</td>
</tr>
<tr>
<td>Adjusted EBITA</td>
<td>3,895</td>
</tr>
<tr>
<td>Less: Income Taxes</td>
<td>1,558</td>
</tr>
<tr>
<td>Debt Free Net Income</td>
<td>2,337</td>
</tr>
<tr>
<td>Debt Free Net Income Margin</td>
<td>2.5%</td>
</tr>
<tr>
<td>Contributory Asset Charges</td>
<td></td>
</tr>
<tr>
<td>Normal Working Capital</td>
<td>(684)</td>
</tr>
<tr>
<td>Property, Plant &amp; Equipment</td>
<td>(238)</td>
</tr>
<tr>
<td>Workforce</td>
<td>(95)</td>
</tr>
<tr>
<td>Return on Supporting Assets</td>
<td>(1,017)</td>
</tr>
<tr>
<td>Net After Tax Cash Flows</td>
<td>1,321</td>
</tr>
</tbody>
</table>

- **Net After Tax Cash Flows**: $1,321
Value of business/entity with customer relationships
Less: Value of business/entity without customer relationships, where customer relationships are re-created
Equals: Value of the customer relationships

- Best used when:
  - Customers are NOT the primary assets or
  - Customer relationships can be re-created
  - Time to re-create the customer relationships is short and does not change the structure of the business
Cost Approach - Overview

- Premise is that a prudent investor would pay no more for an asset than the amount for which the utility of the asset could be replaced.
- May be appropriate when the customer related asset isn’t the primary asset and can be recreated in a short period of time.
- Time to recreate is critical – if time is significant may point to a value greater than an accumulation of costs.
- May be used for early-stage companies that are unable to forecast revenue with reasonable certainty or when other approaches are difficult or not possible.
Direct Costs
Plus: Indirect costs
Plus: Developer’s profit – Reflects the expected return on the investment. Should be a reasonable profit margin based on market inputs.
Plus: Opportunity costs – Profits lost while the asset is being created. Based on a reasonable rate of return on the expenditures while asset is being created. Applicable if asset cannot be used while being created.
Equals: Value of customer relationships

Taxes – Not tax affected. It is believed market participants view expenses on a pre-tax basis.
### Cost Approach - Example

#### Direct & Indirect Costs

<table>
<thead>
<tr>
<th>Costs</th>
<th>% of Total Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Direct Costs</td>
<td>15.0</td>
</tr>
<tr>
<td>Indirect Cost</td>
<td>6.0</td>
</tr>
<tr>
<td>Total Costs</td>
<td>21.0</td>
</tr>
</tbody>
</table>

#### Developer's Profit

| Developer's Profit Margin (1) | 20% |
| Developer's Profit            | 5.25 | 19.5% |

#### Opportunity Cost

<table>
<thead>
<tr>
<th># of Customers</th>
<th>1,000</th>
</tr>
</thead>
<tbody>
<tr>
<td>Average Lead Time (Months)</td>
<td>3</td>
</tr>
<tr>
<td>Required Return</td>
<td>12%</td>
</tr>
<tr>
<td>Investment per Customer (2)</td>
<td>0.021</td>
</tr>
<tr>
<td>Opportunity Cost per Customer (3)</td>
<td>0.00063</td>
</tr>
<tr>
<td>Total Opportunity Cost per Customer (4)</td>
<td>0.630</td>
</tr>
<tr>
<td>Total Opportunity Costs (4)</td>
<td>0.630</td>
</tr>
<tr>
<td>Total Cost</td>
<td>26.880</td>
</tr>
</tbody>
</table>

#### Calculations

1. \( \text{Profit} / (\text{Revenue}) = 5.25 / (21.0 + 5.25) = 20\% \text{ margin.} \)
2. \( \text{Profit} / (\text{Revenue}) = 5.25 / (21.0 + 5.25) = 20\% \text{ margin.} \)
3. \( \text{Total Costs} / \# \text{ of Customers} \)
4. \( \text{Opportunity Cost per Customer} \times \# \text{ of Customers} \)
## Valuation Methodology Selection

<table>
<thead>
<tr>
<th>Valuation Techniques</th>
<th>Pros</th>
<th>Cons</th>
<th>Best Used When</th>
</tr>
</thead>
</table>
| MPEEM                | - Consistent with PFI  
- Assumptions / inputs available | - Large number of assumptions needed, i.e. LTGR, attrition rate, other | - Customers are the primary asset of the business |
| Distributor Method   | - Inputs are available  
- Reduces reliance on CACs  
- Some portion of goodwill not included in value  
- Allows use of MPEEM to value primary asset | - Market inputs can be subjective and require valuer judgment  
- Requires availability of appropriate market inputs. | - Customers are not the primary asset |
| With-and-Without Method | - Underlying theory is intuitive | - Key assumptions are very subjective and difficult to support | - Customers are not the primary asset |
| Cost Approach        | - Objective, if good data is available  
- Goodwill not included in value estimate | - Data difficult to find  
- May understate the value | - Customers are not the primary asset and cost data is readily available |
Valuation Methodology Selection

• Method selection can be difficult
• The cost approach may not capture all future benefits
• The with and without method requires a significant number of inputs which are typically subjective
• The income approach methods tend to be the most commonly used methods in valuing customer relationships
• Value is based on the present value of expected future cash flows attributable to the asset being valued
• Three primary factors
  • Cash-Flow
  • Life
  • Discount Rate
• Attrition and economic life are typically based on historical observations and reflective of a market participant perspective as of the valuation date
• Many methods to calculate attrition
  • Customer churn
  • Revenue churn
  • % of revenue from existing customers to imply attrition
  • Impact of shock churn or migration churn
• Attrition rate may be stable or changing
• Economic life reflects attrition but also life of related product or technology
• Amortization life is an accounting concept not valuation issue
• Determining the straight line equivalent to the pattern of benefits may be difficult
Case Study 1 – Consumer Branded Product Company

**Acquirer** – Large publicly-held food & beverage producer

**Target** – Leading producer of branded snack products in the Southeast. Founded in 1905, its brands are iconic in the region

**Rationale** – Leading brands, immediate entry into region, ability to expand distribution, significant cost synergies, prevent another firm from acquiring.

**Approach**
- Income – MPEEM
- Income – Distributor Method
- Cost
- Income – With and Without
Case Study 2 – Government Contractor

**Acquirer** – Mid-cap, publicly traded, government contractor providing IT services to the federal government.

**Target** – Provider of IT services to certain intelligence entities

**Rationale** – Established relationships with agencies and departments with the US military and defense community and a highly qualified workforce of engineers and programmers with clearances.

**Approach**

- Income – MPEEM
- Income – Distributor Method
- Cost
- Income – With and Without
Case Study 3 – Packaging Solutions Provider

**Acquirer** – PE firm in conjunction with management.

**Target** – Leading regional provider of packaging solutions.

**Rationale** – Target is a well-run, mid-size company; leader in its region; strong reputation; customer relationships are stable and highly recurring.

**Approach**
- Income – MPEEM
- Income – Distributor Method
- Cost
- Income – With and Without
Case Study 4 – Hardware Company

**Acquirer** – Publicly-traded company focusing on developing hardware and software products

**Target** – Leading provider of hardware components which other manufacturers integrate into assembled systems.

**Rationale** – Strong existing technology platform and development platform as well as ongoing and recurring purchases by customers.

**Approach**
- Income – MPEEM
- Income – Distributor Method
- Cost
- Income – With and Without
Comments with Substantial Disagreement

Should the MPEEM (almost) always be used?

**Yes:** Subject entity financial performance is due to the assets in place.

**No:** Often performance is explained in part by aspects for which there is no identifiable intangible – scale, location, manufacturing expertise, other.
What is the appropriate framework for thinking about the value of customer relationship in a PPA?

a) TM/Tech valued based on market royalties and all residual income allocated to CR

b) TM/Tech valued based on contribution (simulated royalty rates) with residual income allocated to CR

c) TM/Tech valued based on market royalty rates. CR valued using a direct approach i.e. approach other than an MPEEM
• Customer value is minimal in most situations. Why would customers pay a premium? CRA is not controlled and is the result of other activities.
• Can the distributor method be used in all situations? Why should the MPEEM be used to value another asset?
• Should the distributor method be used only in situations where products are distributed by a distributor?
• Is there an industry bias to using the MPEEM to value CRA?
• What happens in situations where customer data shows no attrition?
• The discount rate cannot offset forecast risk relating to margin expansion
Conclusions

• Valuation methods converge
• Valuing CRA is not a mechanical process; it requires thought, qualitative and quantitative analysis
• Different schools of thought remain
• Best practices continue to evolve