Gender Impact on small firms in Latin America

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Motivation

• Productivity
• Survival Rate
• Operation Efficiency
• Cash management
• Gender Impact

The Productivities of Different Size Business in Different Countries

- 25%~40%
- ~15%
Problems

Gender impact on cash management and business operation?

Correlation between cash management and business operation?

What is our advice?
Cash Management Efficiency Indicator – CCC

\[ CCC = DIO + DPO + DSO \]
Methodology

- Days of Inventory Outstanding (DIO)
- Days of Sales Outstanding (DSO)
- Days of Payable Outstanding (DPO)
- CCC of companies

Yes/No Questions:
- Inventory Management Scores: 12
- Customer/Sales Management Scores: 12
- Suppliers Management Scores: 16
- Total Relevant Scores: 40
Methodology

Data Collection
Statistic Analysis

Scenario 1
Yes

Scenario 2

CCC exist
Differences?

Yes

Women < Men?

Yes

Scenario 3

Breakdown
Analysis

DSO,DIO,DPO

Gender Impact
Analysis

DSO,DIO,DPO

Which Parts
Women did
Better?

Advices

Which Parts
men did
Better?

Advices for men

Advices for
women

No

No

Scenario 4

No

There is no
significant
difference

No

DSO,DIO,DPO

Structure
Differences?

No

Yes

Analyze why
there are
differences

Improvement
Advices
Hypotheses

Hypothesis 1: Operation Performance Significant Difference

Hypothesis 2: Operation Performance Female did better

Hypothesis 3: Correlation Strong
Hypotheses Visualization

Total Relevant Scores

Cash Management Efficiency

Inventory Management Scores

Customer/Sales Management Scores

Suppliers Management Scores

DIO Inventory Management Efficiency

DSO Sales Management Efficiency

DPO Suppliers Management Efficiency
Data

**Gender**
- Female: 6
- Male: 12

**Sector**
- Primary: 2
- Secondary: 8
- Tertiary: 8

**Country**
- Mexico: 10
- Columbia: 8

**Size**
- Micro: 8
- Small: 10
Comparison

Cash Management Efficiency

Total Relevant Scores

Inventory Management Scores

DIO

Inventory Management Efficiency
Comparison

Customer/Sales Management Scores vs DSO

Suppliers Management Scores vs DPO

Suppliers Management Efficiency
## Statistical Analysis

### Hypothesis 1

<table>
<thead>
<tr>
<th>Indicators</th>
<th>p-value</th>
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<tbody>
<tr>
<td>CCC</td>
<td>0.2547</td>
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<tr>
<td>DIO</td>
<td>0.0676</td>
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<tr>
<td>DSO</td>
<td>0.6178</td>
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<tr>
<td>DPO</td>
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<table>
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<tr>
<th>SCM practices</th>
<th>p-value</th>
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<td>Total Relevant Score</td>
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<tr>
<td>Inventory Management Scores</td>
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<tr>
<td>Customer/Sales Management Scores</td>
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<td>Supplier Management Scores</td>
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### Hypothesis 2

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<td>DIO</td>
<td>0.0338*</td>
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<td>DSO</td>
<td>0.3089</td>
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<tr>
<td>DPO</td>
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<table>
<thead>
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<tbody>
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<tr>
<td>Inventory Management Scores</td>
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<tr>
<td>Customer/Sales Management Scores</td>
<td>0.4049</td>
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Statistical Analysis

Financial Indicators Comparison:
- CCC: Female 17.7, Male 27.16
- DIO: Female 14.6, Male 27.16
- DSO: Female 19.36, Male 15.1
- DPO: Female 16.27, Male 15.1

The SCM Practices Scores:
- Total Relevant Score: Female 23.17, Male 24
- Inventory Management Scores: Female 8, Male 7.5
- Customer/Sales Management Scores: Female 6, Male 6.16
- Supplier Management Scores: Female 9.16, Male 10.33
Statistical Analysis

Hypothesis 3

Correlation among main variables

<table>
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<th>Variable 1</th>
<th>Variable 2</th>
<th>Correlation Coefficient</th>
<th>t-value</th>
<th>p-value</th>
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<tr>
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<td>Inventory Management Scores</td>
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<td>DPO</td>
<td>Supplier Management Scores</td>
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<td>DIO</td>
<td>0.79</td>
<td>5.15</td>
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Recommendations

• First Priority – Inventory Management

• Reason:
  a) Strong relationship with CCC
  b) Relatively easy to execute

• How:
  • Build up relevant inventory records
  • Build up basic inventory management policy such as base policy
Recommendations

• Second priority - Supplier Management
  • Reason:
    • a) Somewhat relationship with CCC
    • b) Relatively hard to execute
  • How:
    • Review the payment term policy in the contracts with main suppliers.
    • Consider approaches to extend the payment term.
Further Research Suggestion

• Adding more relevant cash management assessment

• For DSO/DPO:
  • Does the company negotiate payment terms with your suppliers or customers?

• For DIO:
  • Did the company initiate any activities this year to reduce the purchasing cost or storage cost?
Q&A