Funding Distribution and Logistics Projects: What is the competition?

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WHAT IS ROI?

DEFINING RETURN ON INVESTMENT (ROI)

"Return on Investment (ROI) is a performance measure used to evaluate the efficiency of an investment or compare the efficiency of a number of different investments. ROI tries to directly measure the amount of return on a particular investment, relative to the investment's cost. To calculate ROI, the benefit (or return) of an investment is divided by the cost of the investment. The result is expressed as a percentage or a ratio." – definition via Investopedia

Does this definition fit for Distribution and Logistics projects?

RETURN ON INVESTMENT CALC (ROI)

$$ROI = \frac{\text{Net Return on Investment}}{\text{Cost of Investment}} \times 100\%$$

$$IVI = \$10,000 + \$50 = \$10,050$$
$$FVI = \$12,500 + \$500 - \$75 = \$12,925$$
$$ROI = \frac{\$12,925 - \$10,050}{\$10,050} \times 100\% = 28.60\%$$

$$ROI = \frac{\text{Final Value of Investment} - \text{Initial Value of Investment}}{\text{Cost of Investment}} \times 100\%$$

$$ROI = \frac{[(\$12.50 - \$10.00) \times 1{,}000] + \$500 - \$125 \times 100\%}{\$10.00 \times 1{,}000} = 28.75\%$$

$$\text{Annualized } ROI = [(1 + ROI)^{1/n} - 1] \times 100\%$$

where:

n = Number of years for which the investment is held

Which calculation do I use? Do I need a finance background to calculate ROI?

SIMPLE DEFINTIONS FOR NON-FINANCE FOLKS (ROI)

“How long will it take for me to re-coup the funds that I have invested in the project?”

OR

“How much money will I save tomorrow if I spend money on this investment today?”

SIMPLE ROI CALCULATION

SIMPLE PAYBACK FOR INCREMENTAL INVESTMENTS			
Vertical lift Modules (VLM)	Installed Cost Each	Quantity Required	Total Cost
Costs			
Vertical lift Modules (VLM)			
12'W x 30'H	$130,000	3	$390,000
			$390,000
Benefits			
	Lease Rate	Sq Ft	Annual Savings
Space Savings	$6.45	1620	$10,449
Labor Savings (reduced walking, searching - pick & putaway)	$44,000.00	1	$44,000
Ergonomics	$6,000.00	1	$6,000
Product Protection from humidity, temperature, dust	$12,000.00	1	$12,000
Security - shrinkage reduction, highly controlled access	$12,000.00	1	$12,000
Inventory control & stock rotation	$12,000.00	1	$12,000
Total Savings			$96,449
Simple Payback w/o Interest (years)			**4.0**

INVESTMENT

SAVINGS

EXPECTED RETURN

TYPICAL ROI CALCS FOUND IN DISTRIBUTION AND LOGITICS PROJECTS

Simple Payback in Years/Months — Most Common

- How long will it take to re-coup my savings?
- Calculated as Total Investment divided by Total Savings

Cost Avoidance — Hardest to Validate

- How much will my spend increase if I do not invest/change the operation?
- Calculated as the expected Total Spend divided by the Cost Avoided

Space — Growth Driven

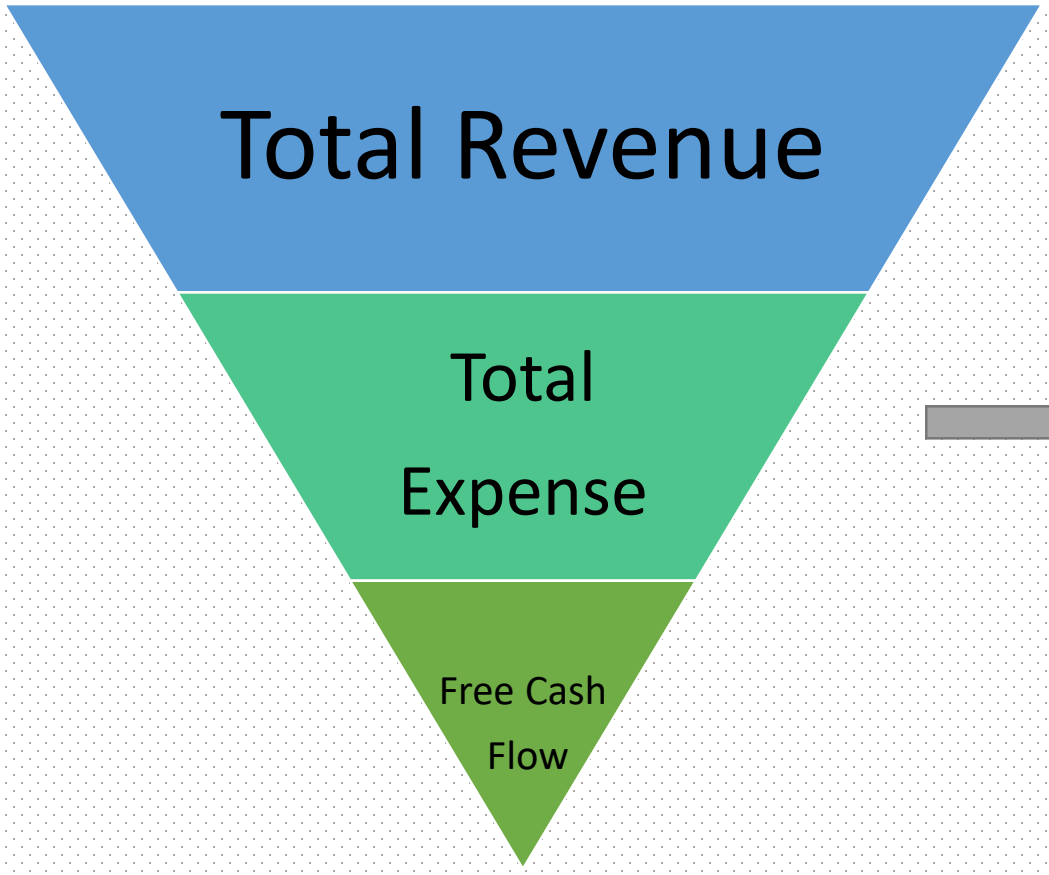
- How much space will I save if I invest/change the way I operate?
- Calculated as the Market Square Ft. cost (burdened) * Square Ft. Saved by new design

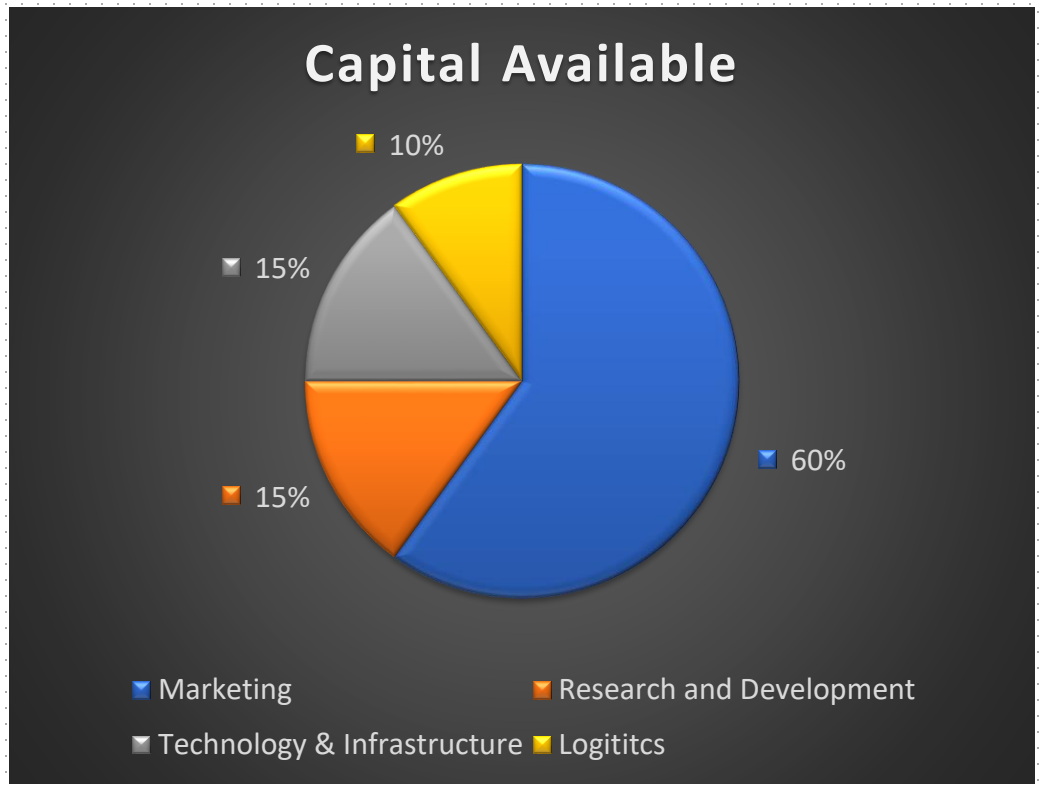
Revenue Growth/Business Expansion — Becoming Popular

- How much can I grow the business if I invest/change the operation?
- Calculated as Total Expected New Revenue divided by the Total Cost of the investment/change

ASKING FOR CAPITAL

ORGANIZATIONAL MONEY FLOW





***It is a critical operations component to understand the total amount of money available for investment on an annual basis**

FUNDING QUESTIONS – PRE PROJECT

- Why do I need a project?
- What is the expected outcome of the project (what is the goal)?
- What is my total operational cost?
- What operational costs do I expect to offset with a change/investment?
  - Labor?
  - Space?
  - Service?
- What is my total spend by targeted cost area (labor/spend/service)?
- What is the project timeline?
  - What fiscal year(s) will be impacted?
- Who/What function should lead the project?
  - Does the person/function have the bandwidth to support a project versus day-to-day workload?
- Does expertise in the project area exist in the organization?
  - Does the organization invest in a long-term resource?
  - Does the organization seek outside assistance (consultant)?
- What are the risks if the project?
  - Isn't approved?
  - Is approved?
- ***Is there capital in the budget for a project?***

CAPITAL BUDGETS

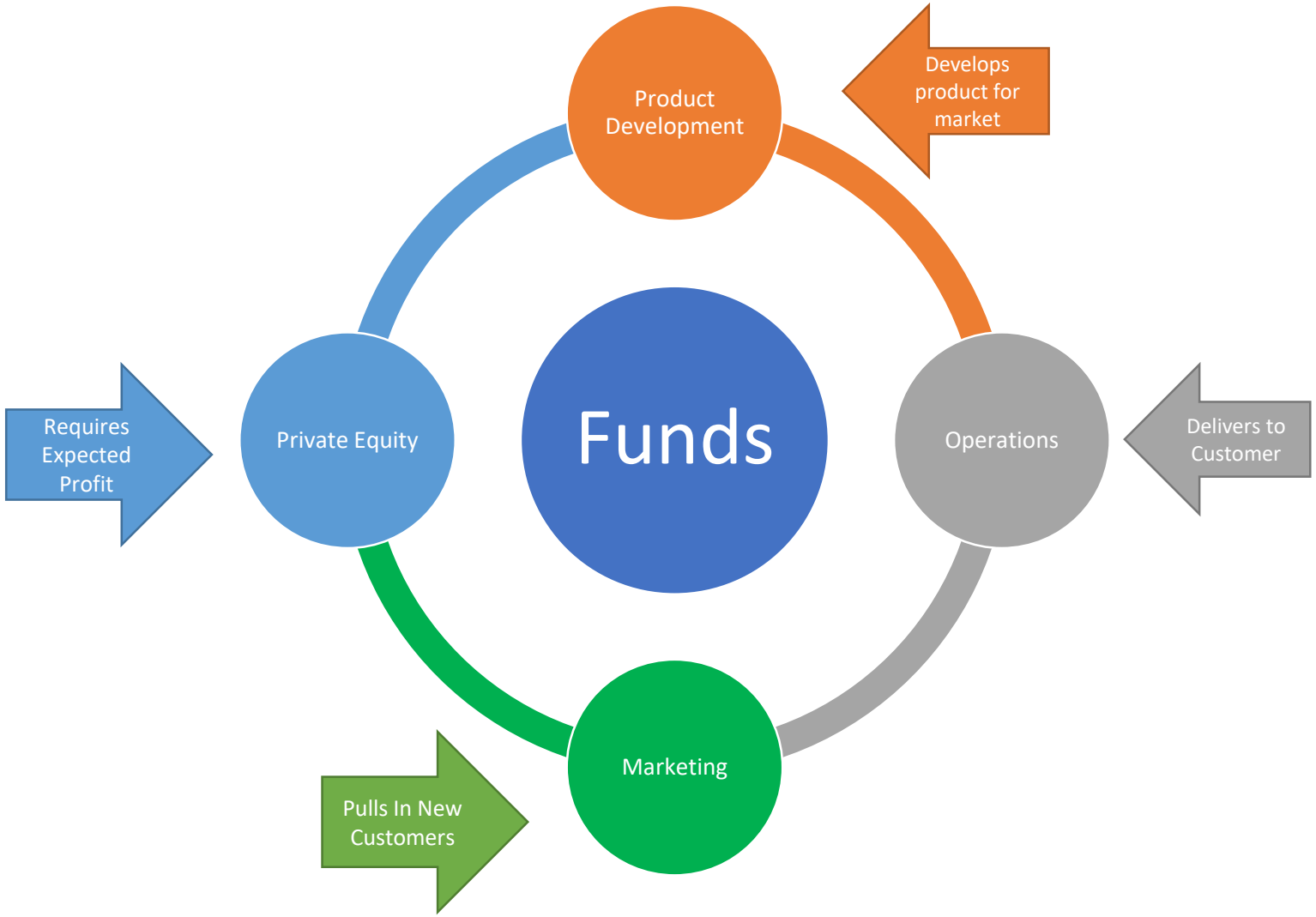
- How much capital budget exists in the organization?
- What is a reasonable expected savings/return from addressing the problem at hand?
- What are the financial hurdle rates necessary to ensure the project is funded?
  - Cash flow impact?
  - EBIDA/EBITA impact?
  - ROI?
  - Other Strategic Initiatives?

COMMON ROI “RULES OF THUMB/HURDLE RATES”

- 36 months or less payback most common expected simple ROI for large organizations
- 24 months or less payback most common expected simple ROI for smaller organizations/private equity
- 60 months or less payback becoming common for revenue growth projects in large organizations
- More organizations are understanding the positive EBIDA impact of new assets in the business valuation (still the minority)
- Many organizations do not have a hurdle rate to compare against – leads to “chasing projects”
- Cash flow is still a concern for many organizations (small and medium) despite low borrowing rates due to pressure from stakeholders (Private Equity)

FUNDING A PROJECT

WHO IS THE COMPETITION?



PREPARATION

What/Why is the project important?

- What improves?
- What are the impacts, both short and long term?
- Does the project fit the organization's strategy?

Understand the "asks" from the other functional areas within the organization

- Gain alignment when possible, never turn down allies for the cause

Understand the "pool" for capital funding

- If "pooled" by functional area, know how much is available for use
- Budget a study the prior year if possible
- Using outside experts can give more credence at senior levels
- Utilize 3/5-year planning/strategy window
- How much can be spent in total?

Commission an official study

- Budget 10 – 12 weeks of time for the study to be appropriately completed

UTILIZING SUPPORT

- Think like a CEO – why would I invest money in the project?
- Validation is a strong mechanism for change – having an outsidee opinion is extremely helpful
  - Does the problem really need solving?
- Understand the obstacles, challenges and potential costs
- Outside eyes may see things that are easily overlooked in the day-to-day business events
  - “Forest for the Trees” syndrome is real – organizational teammates have day jobs and tasks
  - Are there quick/low cost wins?
- Connect the team with the right resources for the right solution
  - Access to those who can provide value, not just those who are selling a solution
  - Ability to point out new market solutions that may not be known to internal teams
- Help is never a bad thing

PROJECTS AND ROI

EXAMPLES OF CAPITAL PROJECTS

EXAMPLE STUDY #1

$10B organization is running out of space in current Distribution facility, has expensive parcel spend

Rent in local area is skyrocketing and lease is coming due

Network Study reveals that moving to different geographic location would save $13M in transportation cost over 5 years

ROI Target – measured as a simple ROI – is less than 48 months

EXAMPLES OF CAPITAL PROJECTS

EXAMPLE STUDY #1

- Commonwealth recommended:
  - Staying in current facility
    - Had significant unused capacity that could be reconfigured through physical assets for additional space
  - Find temporary space to store slow moving/large SKUs while current facility is being retro-fitted
  - Negotiating a lease rate with somewhat longer terms to better absorb rising cost of rent

- Why?
  - Despite positive ROI and significant P&L savings, risk to the business was deemed to be high
    - New teammates, longer lead times to > 30% customers
  - P&L savings was < 0.05% of total annual revenue of product shipped from facility

EXAMPLES OF CAPITAL PROJECTS

EXAMPLE STUDY #2

$48M Company is having service challenges and losing inventory within the warehouse 4 walls

Space is not well

Orders are being cancelled due to being past due date

ROI Target – measured as a simple ROI – is less than 30 months

EXAMPLES OF CAPITAL PROJECTS

EXAMPLE STUDY #2

- Commonwealth recommended:
  - Implementing a solution that cost approximately $1.2M (storage and system)

- Why?
  - Despite a large investment for the size of the organization:
    - Reduction of warehouse headcount of 50% (12 FTE = $480K annually in cost)
    - Ability to free up 20K square ft. of a 90K square ft. operation for growth
    - Implementing a WMS to help track inventory throughout the process (Tier 3 system, less than $250K in total investment)
    - Hiring talent to manage the business properly - $150K loaded addition cost annually to the business
  - Hurdle rate was borderline due to cash flow – approved by PE Firm and implementation yielded extremely positive results

EXAMPLES OF CAPITAL PROJECTS

EXAMPLE STUDY #3

$4B Company is looking to add an ecommerce channel to offering

Space is owned and large – ability to scale a large system

Ability to generate additional revenue viewed as > than $500M annually

ROI Target – to expand business– is less than 60 months

EXAMPLES OF CAPITAL PROJECTS

EXAMPLE STUDY #3

- Commonwealth recommended:
  - Implementing a solution that would take advantage of current facility and allow for necessary throughput (theoretical)
  - Total cost of the system ~$40M

- What Happened?
  - Despite support for the system and new business channel, project has yet to be implemented
    - Project fell within all hurdle guidelines (total cost, ROI, strategic direction)
  - Senior leadership team was not aligned as a team with the direction – Distribution has spent >24 months working through studies and thoughts around the project

KEY TAKEAWAYS

THINGS TO REMEMBER

- Understand the problem to solve prior to solving the problem
- Know the organizations limits for spending capital and cash
  - There is a such thing as a cap regardless of return!
- Know the organizations hurdle rates for approval
- Partner with other functional areas – gain allies in the pursuit of change
- Plan appropriate – timeline expectations should be real
  - Manage those expectations upwards
- Utilize experts – do not go in alone – for validation

THANK YOU

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