

UNDERSTANDING THE DEVELOPMENT PRO FORMA

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ULI Urban Leadership Program

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Pro forma

- Financial analysis based on
 - Revenues
 - Costs
 - Return rates
- Model future performance
- Informed assumptions
- Comparisons
- Opportunity costs and risks

Land Cost

- Economic value “highest and best use”
- Value directly impacted by planning outcomes
- Residual Land Value

Hard Costs

- Bricks and Mortar
 - Physical construction costs
 - All costs associated including labour and materials

Soft Costs

- Commonly estimated as % of hard cost
- Construction Financing
- Permits, Fees, Property Taxes
- Professional Services
 - Planners, Lawyers, Architects, Engineers
 - Project Management
 - Insurance

LAND		
Lot Size	sf	80,000
\$/SF		37.50
Land Acquisition		3,000,000
MAXIMIUM BUILDING SIZE		
Parcel	sf	80,000
FSI		4.0
Maximum GSF		320,000
Efficiency		90%
Rentable SF		288,000
Parking Spaces	space per 1000 GSF	320

PROJECT COSTS		
Land Cost		3,000,000
Hard Costs \$/gsf	\$85	27,200,000
Parking Costs \$/space	\$30,000	9,600,000
Soft Costs % of hard cost	30%	11,040,000
Developer Fee		
Development Fees \$/gsf		
Project Costs Before Interest		50,840,000
Construction Interest	6.0%	3,302,725
Total Project Costs		54,142,725

Financing

- Equity
 - From developer or backers
- Debt
 - Construction (accumulates interest through draws)
 - Permanent (amortized)

Equity and Loan Calculation

- Loan to Value Ratio (LTV)
- Loan to Cost Ratio (LTC)

Project Cost		54,142,725
Loan to Value Ratio		80%
Loan Amount		43,314,180
Equity		10,828,545
Interest Rate		5.0%
Term	YRS	25
Loan Payment (annual)		\$3,073,248

Multi-Period Cash Flow Analysis

- Evaluate project performance
- Pro Forma analysis focuses on the Present Value, to assess the project cash flow worth in **today's dollars**
- Assumptions
- Uncertainty and risk

Project Operation

- Revenues
- Expenses
- Project Performance

Project Operation Pro Forma

	0	1	2	3	4	5	6	7
REVENUES								
Base Rents		\$6,912,000	\$7,119,360	\$7,332,941	\$7,552,929	\$7,779,517	\$8,012,902	\$8,253,289
Parking Income		\$768,000	\$783,360	\$799,027	\$815,008	\$831,308	\$847,934	\$864,893
Potential Gross Income		\$7,680,000	\$7,902,720	\$8,131,968	\$8,367,937	\$8,610,825	\$8,860,836	\$9,118,182
Less: Vacancy		\$384,000	\$395,136	\$406,598	\$418,397	\$430,541	\$443,042	\$455,909
Effective Gross Income		\$7,296,000	\$7,507,584	\$7,725,370	\$7,949,540	\$8,180,284	\$8,417,795	\$8,662,273
EXPENSES								
Building Expenses		\$2,560,000	\$2,611,200	\$2,663,424	\$2,716,692	\$2,771,026	\$2,826,447	\$2,882,976
Parking Expenses		\$640,000	\$659,200	\$678,976	\$699,345	\$720,326	\$741,935	\$764,193
Reserves		\$218,880	\$225,228	\$231,761	\$238,486	\$245,409	\$252,534	\$259,868
Property Tax		\$100,000	\$103,000	\$106,090	\$109,273	\$112,551	\$115,927	\$119,405
Total Expenses		\$3,518,880	\$3,598,628	\$3,680,251	\$3,763,797	\$3,849,311	\$3,936,844	\$4,026,443
NET OPERATING INCOME		\$3,777,120	\$3,908,956	\$4,045,119	\$4,185,743	\$4,330,972	\$4,480,951	\$4,635,830
Debt Service		-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248
Before Tax Cash Flow		\$703,872	\$835,709	\$971,871	\$1,112,496	\$1,257,725	\$1,407,704	\$1,562,583
Building Sales Price							\$77,263,840	
Remaining Loan Amount							\$37,141,182	
Building Sale Proceeds							\$40,122,658	
BTCF including Building Sale		\$703,872	\$835,709	\$971,871	\$1,112,496	\$1,257,725	\$41,530,361	

Revenues

- Rents
 - Terms
 - Escalation
- Parking
- Other Income
- Vacancy Factor
 - Stabilized

Operating Revenues

Rent	\$/sf/yr		\$24.00
Rent Escalation	%/yr		3%
Vacancy Factor			5%
Parking	\$/space/yr		\$2,400

Project Operation Pro Forma

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Parking Income		\$768,000	\$783,360	\$799,027	\$815,008	\$831,308	\$847,934	\$864,893
Potential Gross Income		\$7,680,000	\$7,902,720	\$8,131,968	\$8,367,937	\$8,610,825	\$8,860,836	\$9,118,182
Less: Vacancy		\$384,000	\$395,136	\$406,598	\$418,397	\$430,541	\$443,042	\$455,909
Effective Gross Income		\$7,296,000	\$7,507,584	\$7,725,370	\$7,949,540	\$8,180,284	\$8,417,795	\$8,662,273

Operating Expenses

- Calculated based on a \$/GSF
- Take into account factors associated with building operation
- Utilities
- Property taxes
- Insurance
- Building maintenance
- Repairs
- Replacement Reserve (contingency)
- Management
- Other expenses

Expenses

Building Operation Expenses	\$/gsf/yr	\$8.00
Expenses Escalation Rate	%/yr	2%
Parking Expenses	\$/space/yr	\$2,000
Parking Escalation Rate	%/yr	3%
Property Tax		\$100,000
Property Tax Escalation Rate	%/yr	3.0%
Reserves	% of EGI	3.0%

Project Operation Pro Forma

EXPENSES									
	0	1	2	3	4	5	6	7	8
Building Expenses		\$2,560,000	\$2,611,200	\$2,663,424	\$2,716,692	\$2,771,026	\$2,826,447	\$2,882,976	\$2,940,635
Parking Expenses		\$640,000	\$659,200	\$678,976	\$699,345	\$720,326	\$741,935	\$764,193	\$787,119
Reserves		\$218,880	\$225,228	\$231,761	\$238,486	\$245,409	\$252,534	\$259,868	\$267,418
Property Tax		\$100,000	\$103,000	\$106,090	\$109,273	\$112,551	\$115,927	\$119,405	\$122,987
Total Expenses		\$3,518,880	\$3,598,628	\$3,680,251	\$3,763,797	\$3,849,311	\$3,936,844	\$4,026,443	\$4,118,160

Net Operating Income

- Project Performance Before Debt Service
- Project valuation
- $\text{NOI} = \text{Effective Gross Income} - \text{Total Operating Expenses}$
- Unleveraged project return

	0	1	2	3	4	5	6	7
Effective Gross Income		\$7,296,000	\$7,507,584	\$7,725,370	\$7,949,540	\$8,180,284	\$8,417,795	\$8,662,273
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NET OPERATING INCOME		\$3,777,120	\$3,908,956	\$4,045,119	\$4,185,743	\$4,330,972	\$4,480,951	\$4,635,830

Before Tax Cash Flow (BTCF) 'Cash Throw Off'

BTCF= Net Operating Income (NOI) - Debt Service

- Leveraged Project Return

	0	1	2	3	4	5	6	7
NET OPERATING INCOME		\$3,777,120	\$3,908,956	\$4,045,119	\$4,185,743	\$4,330,972	\$4,480,951	\$4,635,830
Debt Service		-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248
Before Tax Cash Flow		\$703,872	\$835,709	\$971,871	\$1,112,496	\$1,257,725	\$1,407,704	\$1,562,583

Return Rates

- Assess project performance
- Static based on single year cash flow
 - Rate of Return (ROR) based on project costs (unleveraged)
 - Return on Equity (ROE) based on cash invested (leveraged)
- Dynamic based on multi year cash flows
 - Internal Rate of Return (IRR) average annual return
 - Net Present Value (NPV) performance relative to discount rate

Dynamic Project Performance

- Two components in a revenue generating project performance that are assessed:
 - Operation Cash Flow
 - Asset value based on an assumed sale price, captures project value appreciation based on a Cap Rate
 - Value = Net Operating Income/Cap rate

Building Sale

- Assume a sale at the end of the 6th year cap rate 6.0%
- Use projected NOI in the 7th year as the basis for calculating the sale price

$$V = \text{NOI} / \text{cap rate}$$

$$V = 4,480,951 / .06 = \$77,263,840$$

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Project Return Rates

Use Excel built-in financial functions

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Debt Service			-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248	-\$3,073,248
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Building Sales Price								\$77,263,840	
Remaining Loan Amount								\$37,141,182	
Building Sale Proceeds								\$40,122,658	
BTCF including Building Sale	Leveraged	-\$10,828,545	\$703,872	\$835,709	\$971,871	\$1,112,496	\$1,257,725	\$41,530,361	
	IRR Leveraged	30.0%							
	Unleveraged	-\$54,142,725	\$3,777,120	\$3,908,956	\$4,045,119	\$4,185,743	\$4,330,972	\$81,744,791	
	Unleveraged IRR	12.7%							
	ROE		6.5%	7.7%	9.0%	10.3%	11.6%	383.5%	

Sensitivity Analysis

- Sensitivity analysis- what if...
 - How sensitive is return to assumption changes
 - Examine using IRR
- Change key variables to assess potential impacts
- Construct scenarios