Typical Valuation Approaches and How to Deal With Them

January, 2018

Anthony F. DellaPelle, Esq., CRE
Shareholder, McKirdy, Riskin, Olson & DellaPelle, P.C.
Morristown, New Jersey
Christian F. Torgrimson, Esq.
Managing Partner, Pursley Friese Torgrimson
Atlanta, Georgia

Just & Adequate Compensation

For the taking and damaging of property rights and interests

Intended to make the owner "whole"

Measured by
Fair Market Value:

the price a willing buyer and willing seller come to when neither is being compelled to act

Elements of Just and Adequate Compensation

YES	NO
❖Land	❖Temporary damage
❖Buildings	❖Contract Rights
❖Improvements	❖Supplier Claims
❖Trade Fixtures	❖Loss of income/sales
❖FF&E	❖Loss of customers
❖Leasehold/Fee	❖Traffic patterns
❖Easements & Rights	❖Medians
	❖Sentimental value

The Three Approaches to Value

Sales Comparison or Market Data Approach

Cost Approach

Income Approach

Applying Approaches to Value

Highest and Best Use drives the approach:

- ✓Is if physically possible?
- ✓Is it legally permissible?
- ✓Is it financially feasible?
- ✓Is it max productive?

Sales Comparison Approach

No. & Location	*Date*	*No. Houses*	*Yr. Built*	*Price/House w/o Land*	*Price/Sf*
1. 656 Hyde Rd; Resaca	9/2012	4	2003	$105,000	$5.25
2. 1487 Maple Grove; Resaca	5/2012	4	2005	$151,250	$7.56
3. Maple Grove Rd	3/2012	4	2007	$167,250	$8.36
4. 3943 Bandy Rd; Ringgold	2/2012	4	1994	$128,750	$6.44
5. 7800 Bowman Hwy	3/2012	4	2007	$255,000	$12.75
6. Alvin York Hwy; Whitwell	5/2012	4	2000/ 2005	$178,375	$8.70

Sales Comparison Approach
Elements of Comparison

Real property rights conveyed

Financing terms

Conditions of sale

Physical characteristics and condition of property

Market conditions at time of sale

Location

Use/zoning/approvals – highest and best use of the sale vs. subject

Sales Comparison Approach: Apples to Apples

Comparable 1

Sales Comparison Data Sheets

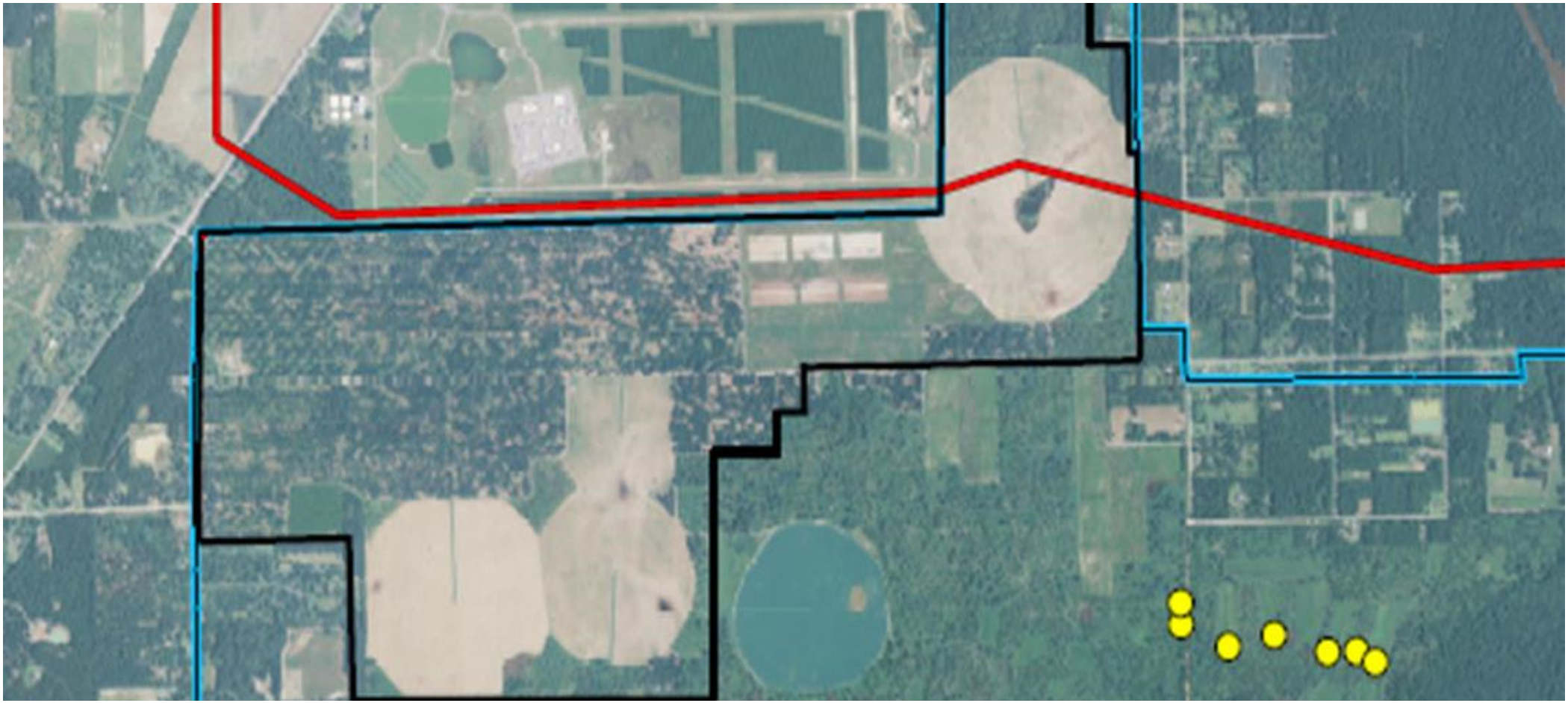
Transaction			
ID	7097	**Date**	9/21/12
Address	656 Hyde Road	**Price**	$550,000
City	Resaca	**Price Per SF**	$8.98
State	GA	**Transaction Type**	Closed
Tax ID	029 183	**Financing**	Conv
Grantor	Randy Holland	**Property Rights**	Fee Simple
Grantee	Blackberry Spring Farm, LLC,	**Days on Market**	Unknown
Legal Description	Land Lots 316, 13th District,	**Verification Source**	DB 1792 P 246, Appraisal
County	Gordon		

Site			
Acres	51.250	**Topography**	Part wooded
Land Value	$130,000	**Zoning**	Agricultural
Road Frontage	Shared access easement	**Flood Zone**	None
Shape	Irregularly shaped	**Encumbrance or Easement**	Shared access easement
Utilities	Water, Power	**Environmental Issues**	--

Improvements & Financial Data			
GBA	80,000	**No. of Buildings**	4
Year Built	2,003	**PGI**	$173,594
Building Effective Age	10.00	**Expense Ratio**	36.00%
Equipment Effective Age	14.00	**NOI**	$110,871
Dwellings Mob Homes	None	**Cap Rate**	15.44%
Barns Sheds Other	None		

Comments

The contract price is $550,000 with the buyer paying an additional $168,260 to upgrade the houses. The property is a 51.25 acre agricultural tract located off Hyde Road in Gordon County, Georgia. The property is improved with four 40' x 500' Class B broiler houses that were constructed in 2003 to Pilgrim Pride specifications. The poultry houses are to be upgraded with new equipment to Koch specifications as Class A houses. The property is also improved with four 8 x 10 equipment sheds, one 40 x 50 stack house and one 28 x 52 generator room with storage area. The site has a limited access drive from Hyde Road. The sale is considered distressed because the seller could not afford the required upgrades to continue operation of the houses.



The Not So Easy Comparable

Sales Comparison Approach: Adjusting the Comps

- Quantitative vs. Qualitative Adjustments?
- What is the basis for the adjustments? Are they net opinions?
- Does the size of each adjustment matter?
- How is FMV derived from the range of adjusted sales?
- Do adjustments reflect true nature of the subject property?

LAND SALES ADJUSTMENT SUMMARY

		Sale #1	Sale #2	Sale #3	Sale #4	Sale #5
Unit of Comparison	Pricer Per Acre	$4,500.00	$5,850.01	$4,993.57	$4,508.09	$4,350.60
	Gross Adjustment	12.73%	7.42%	19.43%	7.48%	13.36%
	Net Adjustment	-12.73%	-7.42%	19.43%	-7.48%	7.36%
	Adjusted Price	*$3,927.15*	*$5,415.82*	*$5,963.57*	*$4,171.11*	*$4,670.59*

High	$5,963.57		RECONCILED (rounded)	$220,000
Avg	$4,829.65			
Low	$3,927.15			
	Acres	46.660		
	Reconciled Unit of Comparison	$4,800.00		
	Subtotal	$223,968		

Sales Comparison Approach

Cost Approach

The cost approach is based on the understanding that market participants relate value to cost.

Value of a property is derived by adding the estimated value of the land to the current cost of constructing a reproduction or replacement for the improvements, and then subtracting the amount of depreciation in the structures from all causes.

Entrepreneurial profit and/or incentive may be included in the value indication.

Land value is derived through a comparable sales/market approach

Source(s) of current cost -- cost estimators, cost manuals, builders and contractors.

- Not “replacement value”

Depreciation - physical deterioration, functional obsolescence and external obsolescence

- measured through market research and the application of specific procedures.

Cost approach is particularly useful in valuing new or nearly new improvements and “special purpose” properties that are not frequently exchanged in the market.

Can also be employed to derive information needed in the sales comparison and income capitalization approaches to value, such as an adjustment for the cost to cure items of deferred maintenance.

Cost Approach

Replacement costs

Less depreciation

Plus value of land as vacant

Cost Analysis - "As Is"

Cost Source: Contractor Estimates

Building Improvements

Item	Unit Type	Cost	Quantity	Multiplier	Total	Depr
Poultry House	Sq. Ft.	$5.60	79,200	1.000	$443,520	3%
Control Rooms	Sq. Ft.	$4.50	256	1.000	$1,152	3%
Gen Shed	Sq. Ft.	$8.50	128	1.000	$1,088	3%
Poultry House	Sq. Ft.	$5.20	80,000	1.000	$416,000	17%
Control Rooms	Sq. Ft.	$4.50	512	1.000	$2,304	17%
Stack House	Sq. Ft.	$11.88	6,500	0.915	$70,672	10%
Gen / Off Bldg	Sq. Ft.	$24.55	800	0.915	$17,975	27%
Mobile Home	Sq. Ft.	$38.19	1,320	0.915	$46,136	45%
				Total Building Improvement Costs	**$998,846**	
				Price per SF of Building Area	$5.95	

Equipment

Existing Equipment	Sq. Ft.	$4.75	79,200	1.000	$376,200	33%
Existing Equipment	Sq. Ft.	$4.75	80,000	1.000	$380,000	7%
100 KW Generator	Lump Sum	$29,000	1	1.000	$29,000	33%
150 KW Generator	Lump Sum	$38,000	1	1.000	$38,000	13%
				Total Equipment Costs	**$823,200**	

Site Improvements

Item	Unit Type	Cost	Quantity	Total
Pads	Lump Sum	$0.85	159,200	$135,320
Roads, Gravel	Lump Sum	$12,500	1	$12,500
Utilities	Lump Sum	$15,000	1	$15,000
Wells	Lump Sum	$10,000	1	$10,000
			Total Site Improvement Costs	**$172,820**
			Subtotal: Building & Site Costs	**$1,994,866**
			Price per SF of Building Area	$11.88

Soft Costs

Item		Percent Type	Total
Engineering	1.0%	% of Building Cost	$9,988
Const Soft Cost and Interest			$90,000
		Total Soft Costs	**$99,988**

Total Costs

Subtotal: Building, Site & Soft Costs		$2,094,855
Developer's Profit	3.0%	$62,846
Total Cost		**$2,157,700**
Price per SF of Building Area		$12.85

Depreciation

Component	Eff. Age	Life	Percent	Amount
Physical Depreciation: Building				$282,442
Physical Depreciation: Site	3.01	25	12%	$21,432
Functional Obsolescence Building			0%	$0
External Obsolescence Building			0%	$0
			Total Depreciation	**$303,874**
			Depreciated Value of Improvements	**$1,853,826**
			Cost Per Square Foot Gross Building Area	$11.04

Land Value

Land Value		$220,000
	Cost Approach Value Indication	**$2,073,826**
	Rounded	**$2,070,000**
	Price per SF of Building Area	**$12.33**

Income Capitalization Approach

Based on conversion of income and capitalization into property value

Often summarized as "*the present value of future benefits*"

Example:

- An asset produces $5,000 of net income per year
- What is the value of that asset?
- If the rate of return is known to be 5%, then the value is $100,000
  - S5,000 income/ 5% = $100,000
- If the rate of return is known to be 10%, then the value is $50,000
  - $5,000 income/10% = $50,000

Income Capitalization Approach

Properties that generate positive cash flow/income can be appraised using a "*present value*" or "*time value of money*" concept. The income approach estimates the present value of (a) future income generated by a property and (b) its eventual resale value.

The term "capitalization" refers to the mechanism by which future income can be converted into a present value.

Direct capitalization: A capitalization rate or income multiplier is derived by considering the relationship between one year's income and value.

Yield capitalization: Uses yield rate to reflect determine present value by considering the relationship between several years' stabilized income and a reversionary value at the end of a designated period. Sometimes referred to as a "discounted cash flow" or DCF analysis.

Courts prefer direct capitalization over yield or DCF methods as the latter is deemed speculative

Income Capitalization Approach

Rental income key factors

- Contract rent vs. market rent
- Gross, modified gross, net, “triple” net
- Which are common for the type of real estate being appraised?
- Are there comps and what types of leases are they?
- Can you utilize both gross and net leases as comps?
- How do you handle comps with rent escalations? Options?
- Rent abatements/tenant improvements and impact upon “effective” rent

How to handle excess rent or percentage rents

Income Capitalization Approach

Potential Gross Income = total income based upon full occupancy before expenses

Effective Gross Income = total income adjusted for vacancy and collection losses

- How do you handle a property which is 100% occupied? 100% vacant?

Net Operating Income ("NOI") = anticipated net income after expenses

- This is the income which is then capitalized to derive FMV

Expenses – those necessary to maintain the property and continue income production

- Actual or economic?
- Fixed expenses
- Variable expenses
- Reserves and replacement allowance

Income Capitalization Approach

Capitalization rates – key factors

- Risk
- Prospective rate of return – basis therefor
- Financing available
- Economic issues/impacts

Direct Capitalization

- Value (V) = Income (I)/Capitalization Rate (R)
- Employs cap rates extracted from sales – preferred method
  - Use of market reports/investor surveys
  - Use of "band of investment" to identify equity capitalization rate vs. mortgage component
- Only first year of income is considered
- When market date scarce or unavailable, mortgage-equity techniques should only be used to TEST capitalization rates, not to develop them. Appraisal of Real Estate, CITE

Income Capitalization Approach

Direct Capitalization: technique is often referred to as "*Direct Cap*" or using a "*Cap Rate*".

Direct capitalization requires data concerning comparable sales and their income generation. Consider the following chart:

Comparable	Property A	Property B	Property C
Annual Income	$50,000	$25,000	$100,000
Sale Price	$500,000	$250,000	$1,000,000
Multiplier	10x	10x	10x

Each of the three sales sold for 10 times their annual income. Therefore the market recognizes values @ 10 times annual income for properties of this type.

The "*Cap Rate*" is the inverse of an income multiplier. If an income multiplier is 10x, which is the same thing as 10/1, then the cap rate is 10% (1 divided by 10).

Cap Rate = income/sale price(value)

Are the comparables truly comparable? How do you account for differences? What if there are insufficient comparables to derive a market rate?

Income Capitalization Approach

Consider the differences between multipliers and cap rates as follows for the same income stream:

Annual Income	Sale Price	Income Multiplier		Cap Rate
$50,000	$600,000	12x	=	8.3%
$50,000	$550,000	11x	=	9.1%
$50,000	$500,000	10x	=	10.0%
$50,000	$450,000	9x	=	11.1%
$50,000	$400,000	8x	=	12.5%
$50,000	$350,000	7x	=	14.3%
$50,000	$300,000	6x	=	16.7%
$50,000	$250,000	5x	=	20.0%

Income Capitalization Approach

Yield Capitalization – Mortgage Equity Formula

- Direct capitalization requires comparable sales AND only takes into account the investor's equity return based upon the first year's income
- No consideration given to future variability of income stream or potential change in value over time
- Mortgage Equity Formula – market yield rate should reflect net income over time to market value
- Called "Elwood" or "Akerson" formulaValue (V) = Income (I)/Capitalization Rate (R)
- Includes following variables – cap rate, yield rate, LTV ratio, percentage of loan paid off, sinking fund factor, mortgage constant, change in total property value, total ratio of change income, "J" factor – accounts for change in income during holding period
- HOW GOOD ARE ALL OF YOU AT MATH?

BUILD-UP OF THE OVERALL CAPITALIZATION RATE

M = Loan-to-Value Ratio			= 70%		
Eq = Equity			= 30%		
Ym = Interest Rate			= 6.25%		
Rm = Mortgage Constant			= 0.0792		
No. of Years in LMP			= 25		
P = Percentage Paid Off			= 0.2306		
Ye = Yield to Equity			= 10.00%		
SFF = Sinking Fund Factor			= 0.0627		
N = Holding Period			= 10		
APP = Appreciation (P/A)			= 3.00%		
Mortgage Component	0.70	x	0.0792	=	0.0554
Equity Component	0.30	x	0.1000	=	0.0300
			Weighted Average:		0.0854
Less: Equity Build Up					
0.70 x 0.2306 x 0.0627				=	0.0101
Basic Capitalization Rate (r)					0.0753
Less: Overall Appreciation					
0.30 x 0.0627				=	0.0188
Basic Cap Rate Adjusted for Overall Property Appreciation (i.e. Akerson Format') (Before Adjustments to Changing Income)					0.0565
Divided By: K-Factor					1.1203
Capitalization Rate					**0.0504**
			(Rounded)		**5.00%**

Income Capitalization Approach – Elwood Formula

Income Capitalization Approach

Yield Capitalization/DCF

- Converts future benefits to present value by applying yield rate
- Reflects investment's income pattern, change in value and yield rate over time
- "Discounting" is the process which converts periodic incomes, cash flows and reversions into present value on the basis that the benefits in the future are worth less than benefits received now
- Considered "speculative" by many courts
  - Too many variables
- Reversion – reflects anticipated return of capital sum at end of investment's life cycle

Reconciliation of Value Indications

If two or more approaches to value are used, the value indications must be reconciled

Are they averaged or weighted?

Do they indicate that more research is required?

What if the indications are disparate?

- Will this test the reliability of each approach?
- Quality and quantity of data used

Is a “range” an acceptable conclusion?

Final Thoughts

What are the factors that should be considered in deciding which approach(es) to value to employ?

Role of the attorney/appraiser/client

Verify the data!

Test the conclusions

Have confidence in the conclusions!

- Q&A?
- Thank you!

Anthony F. DellaPelle, Esq., CRE®
adellapelle@mckirdyriskin.com
www.mckirdyriskin.com

Christian F. Torgrimson, Esq.
CTorgrimson@pftlegal.com
www.pftlegal.com