TOPIC 6 Appraisal: Valuation & Market Analysis



EXAM TOPICS:

A. Appraisals

- 1. Purpose and use of appraisals for valuation (pp. 6-1~ 6-2)
- 2. General steps in appraisal process (pp. 6-9~ 6-10) (pp. 6-17~6-18)
- 3. Situations requiring appraisal by certified appraiser (pp. 6-2~ 6-3)

B. Estimating Value (pp. 6-3)

- 1. Effect of economic principles and property characteristics (pp. 6-3~ 6-4)
- 2. Sales or market comparison approach (pp. 6-10~ 6-12)
- 3. Cost approach (pp. 6-12~ 6-14)
- 4. Income analysis approach (pp. 6-14~ 6-15)
- C. Competitive/Comparative Market Analysis (pp. 6-25)
 - 1. Selecting comparables (pp. 6-25)
 - 2. Adjusting comparables (pp. 6-25)

Appraisal Industry

- A. Property appraisals came into question and were in part causation of unsound real estate investments surrounding the Savings and Loan Association crisis collapse. The 1989 1,000+ Savings and Loan Bank Crisis and failures were one of the most significant collapses since the 1929 Great Depression and the FSLIC (Federal Savings & Loan Insurance Corporation) paid S&L's some \$20 billion to depositors before going bankrupt. This S&L collapse contributed to the unsound home investments and questionable real property appraisals.
- B. Appraisal regulation was introduced by Congress via passing FIRREA, the Financial Institutions Reform Recovery and Enforcement Act of 1989 in the wake of the savings and loan crisis which also established the Resolution Trust Corporation (RTC) and closing hundreds of insolvent S&Ls funding payout insurance to depositors.

- C. Appraisals performed as part of a federally related transaction must comply with state standards and must be performed by a state-certified or state-licensed appraiser.
- D. State appraiser licensing requirements and appraisal standards must meet minimu levels set by the **Appraisal Standards Board** and **Appraisal Qualifications Board** of the Appraisal Foundation, a national group of representatives of major appraisal and related organizations.
- E. **Appraisal Foundation**, a national group of representatives of major appraisal and related organizations.

Appraisal Industry

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investments were at least partly the consequence of questionable property appraisals.

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Appraisal Purpose & Use of Appraisals for Valuation

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Situations Requiring Appraisal via Certified Appraiser (Residential | General)

- A. All transactions of \$ 1,000,000 or more
- B. Non-residential and residential (other than one- to four-family) trans- actions of \$250,000 or more
- C. Complex residential transactions of \$250,000 or more

- 1. A regulated institution may presume that appraisals of one- to four-family residential properties are not complex, unless the institution has readily available information that a given appraisal will be complex.
- 2. The regulated institution is responsible for making the final determination of whether the appraisal is complex.

EXAMPLE: An example of a complex appraisal would be an appraisal of a commercial property in the center of a residential neighborhood.

EFFECT OF ECONOMIC PRINCIPLES AND PROPERTY CHARACTERISTICS PHYSICAL CHARACTERISTICS AFFECTING VALUE

1. **DURABILITY: (INDESTRUCTIBLE)** Although improvements depreciate physically over time, land does not.

Example: Buy some land and let it sit for 30 years and then come back to check on it, it still looks the same. Even a brick building may still look the same. This feature increases the value of real estate.

2. **IMMOBILITY:** Real estate is not movable.

Example: have you heard that the 3 most important aspect of real estate value is location, location, location. Immobility can be good or bad because if your property is in a good location, that will bring its value upwards. But if it's in a bad location, you cannot move it elsewhere.

3. **HETEROGENEITY (UNIQUE)** (non-homogeneity): Every property is Unique; No two parcels are alike.

Even when you have two adjacent lots in the subdivision that would seem to be of the same size and value, they still have two different legal descriptions; one is lot #17 while the other is lot #18.

ECONOMIC CHARACTERISTICS AFFECTING VALUE (D.U.S.T)

1. **DESIRABILITY (DEMAND):** Whether or not there are possible buyers interested in the property that are willing, able, and have the financial means to purchase.

Example: 200-unit condominium complex is built on a waterfront; some units are not facing the water. Chances are that the units facing the water will sell at a higher price because they are more desirable, i.e. there is more —demandl on them.

2. **SCARCITY (SUPPLY):** Whether or not there are other similar properties of a comparable nature within the same general area that will compete with the subject property.

Example: a 200 unit condominium complex was pre-sold before construction; finally one buyer canceled his purchase agreement because he was being transferred out of town. When your buyer wants to make an offer on the last remaining unit, it will be

very hard to bargain on the price because of scarcity. Had it been the other way around, for example, if only 50 units were sold and there were 150 units left on the market, there will be some room for bargaining and the price may go down.

3. **UTILITY:** The type of use that the subject property is most suitable for, and whether or not it satisfies the needs of a certain buyer.

Example: a small town known for its large retirement community has a new subdivision being built with mostly one-story Ranch homes. This design will probably prove to be popular with the majority of people in the city, because those of a retirement age may have issues with climbing too many stairs, therefore they will be able to —utilizell this type of design much better than a two-story home, especially with bedrooms located upstairs.

4. TRANSFERABILITY: The ability to sell, lease, will property to another person. The more the restrictions on the sale, lease or transfer of property, the less the value. Example: Property may be the subject of a dispute between partners, or certain action taken by a government entity such as the IRS or DEA, therefore, unless these restrictions are lifted, property will either have a lower value or no value at all.

Appraisal Definition

Real estate appraisal, property valuation or land valuation is the process of developing an opinion of value, for property (usually market value) by a state licensed appraiser. Real estate transactions often require appraisals because they occur infrequently and every property is unique (especially their condition, a key factor in valuation), unlike corporate stocks, which are traded daily and are identical. The location also plays a key role in valuation. However, since property cannot change location, it is often the upgrades or improvements to the home that can change its value. Appraisal market valuation reports form the basis for mortgage loans, settling estates and divorces, taxation, and so on. Sometimes an appraisal report is used to establish a sale price for a property.

D. Value

1. **Definition** - the present worth of future benefits arising from the ownership of real property.

2.Characteristics necessary for a property to have value in the real estate market include "DUST":

- a.Demand—need supported by purchasing power.
- b. Utility—capacity to satisfy human wants and needs.
- c. Scarcity— finite supply.
- d. Transferability-transfer of ownership rights with relative ease.

E. Market value

1. Most probable price a property will bring in a competitive market, allowing for

reasonable time to find a knowledgeable purchaser.

- a. The buyer and seller are not under pressure to act.
- b. Payment is made in cash or equivalent.

2. Typical goal of an appraiser, although a property may have different values at the same time.

3. Estimated price (compare to market price, which is the actual selling price).

A. Market value and market price

1. Market value

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2. Market price

- a. Market price is the "last price the property sold for" which may be recent or serveral years in the past.
- b. Market price would be the same if the property was recently sold (last 6months ~1year) and is most relevant whereas properties sold 5~30 years ago would have a less relevant market price meaning, use and value.

MARKET VALUE or OMV (Open Market Valuation) is the price at which an asset would trade in a competitive auction setting. Market value is often used interchangeably with open market value, fair value or fair market value, although these terms have distinct definitions in different standards, and may or may not differ in some circumstances. Search Results

Open Market Value is the estimated amount that a property would exchange contracts at (sell for) between a willing buyer and a willing buyer on the date of the **valuation**. In the opinion of the valuer, it is the probable price which a property would be expected to achieve on the day in a **open** fair sale environment.

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Market value is the most commonly used type of value in real estate appraisal in the United States because it is required for all federally regulated mortgage transactions, and because it

has been accepted by US courts as valid. However, real estate appraisers use many other definitions of value in other situations.

OPEN MARKET VALUE (OMV) is an opinion of the best price at which the sale of an interest in an asset would have been completed unconditionally for cash consideration on the date of valuation, assuming:

a. willing seller;

b. that, prior to the date of valuation, there had been a reasonable period (having regard to the nature of the asset and state of the market) for the proper marketing of the interest, for the agreement of price and terms and for the completion of the sale;

c. that the state of the market, level of values and other circumstances were, on any earlier assumed date of exchange of contracts, the same as on the date of valuation;d. that no account is taken of any additional bid by a purchaser with a special interest; and

e. that both parties to the transaction had acted knowledgeably, prudently and without compulsion.

FAIR MARKET VALUE (FMV) is an estimate of the market value of a property, based on what a knowledgeable, willing, and unpressured buyer would probably pay to a knowledgeable, willing, and unpressured seller in the market. An estimate of fair market value may be founded either on precedent or extrapolation. Fair market value differs from the intrinsic value that an individual may place on the same asset based on their own preferences and circumstances.

A home's fair market value is the price it would sell for in a perfectly logical world—one where both home buyer and seller are acting of their own free will (in other words, they aren't desperate to make a sale) and are reasonably aware of a home's good and bad points, and where the buyer could just as easily choose a different house that suits her needs better.

In such a world, market forces reign. Buyers and sellers negotiate up or down from their various positions and agree on a home's price. Deal done. All is good!

A home's *fair market value* is comparable to a home's *market value*—what it would fetch on the open market—but is used in special circumstances where the concept of fairness is important to evoke so that the home's sales price carries more weight.

Here are some circumstances where you'll likely hear about the fair market value of a home:

- **Property tax assessments -** in a specific market are based on a home value and comparable properties.
- Home insurance claims—if a house suffers damage from a fire, flood, or other disaster, the insurer will look to the market value to determine a compensation estimate.

- **Refinancing a home loan**—the bank will typically use an appraisal of a home's current market value as a measure of the home value to determine refinancing terms for a mortgage.
- **Estate sales**—if the homeowner has died and a relative wants to purchase the property, the court will look at home value appraisal to determine a price for the sale.
- If the government wants to "buy out" a homeowner to use that land to, say, build a highway or school, the owner is typically entitled to be compensated at fair market value so that she will sell.
- <u>Short sale</u>—this is when a home is worth less than the owners owe on their mortgage. In this case, the owners must persuade the lender to let them sell the home for some amount that is less than the balance of the home loan they still owe. "When a bank does allow this, the bank wants to make sure that the short-selling purchase price is at least FMV for the property," says Pellegrini. Because, of course, no one likes a total loss on a home value!

FAIR MARKET VALUE DEFINITION AND USE

- The fair market value is the price an asset would sell for on the open market when certain conditions are met.
- The conditions are: the parties involved are aware of all the facts, are acting in their own interest, are free of any pressure to buy or sell, and have ample time to make the decision.
- Fair market value is different than market value and appraised value.
- Tax settings and the real estate market are two areas that commonly use fair market value.
- Insurance companies use fair market value in determining certain claim payouts.

ARM'S LENGTH TRANSACTION: A transaction that occurs in a competitive market that leads to a fair sale involving a willing buyer and seller, both acting with knowledge of the property under no duress and with no other intervening factors such as selling to a relative or friend.

An arm's length transaction, also known as the arm's length principle (ALP), indicates a transaction between two independent parties in which both parties are acting in their own self-interest. ... In contract law, from the opposing party, and are acting in their own self-interest to attain the most beneficial deal.

- The parties involved in an arm's length sale usually have no pre-existing relationship with each other.
- These types of deals in real estate help ensure that properties are priced at their fair market value.

• Deals between family members or companies with related shareholders are not considered arm's length transactions.

Types of Appraisals (Broker | Agents and Appraisers)

A. **Appraisal**—an opinion of value; a detailed estimate of a property's value by a professional appraiser.

B. Competitive/Comparable market analysis (CMA)—used by the broker or the salesperson to help the seller determine a listing price for the property; basically, a comparison of prices of recently sold and currently for sale properties that are similar in location, style, and amenities to the property of the listing seller. CMA will generally estimate market value as likely to fall within a range of figures. CMAs can also guide a purchaser in formulating an offer.

C. Broker Price Opinion (BPO)—similar to a CMA but different in that it is usually more detailed because it is used by a third party (e.g., a relocation company) to provide a basis for negotiation of a purchase price or a buyout in the case of a company employee being transferred to another city. The BPO is generally more detailed because the third party knows very little about the neighborhood in which the property is located. Real estate brokers are paid to complete BPOs.

CMA – Comparable or Competitive Market Analysis - A comparative market analysis

is an examination of the prices at which similar properties in the same area recently sold. Real estate agents perform a comparative market analysis for their clients to help them determine a price to list when selling a home or a price to offer when buying a home. Since no two properties are identical, agents make adjustments for the differences between the sold properties and the one that is about to be purchased or listed to determine a fair offer or sale price. Essentially, a comparative market analysis is a less-sophisticated version of a formal, professional appraisal.



BPO – Broker Price Opinion - + When doing a BPO, the real estate pro researches the 'subject property,' they take pictures of it, they also scope out the neighborhood as well as pull 6 comparable properties (3 Active Comps and 3 Sold Comps) in their MLS (Multiple Listing Service). They then take all of this information, the pictures they took of the subject and their knowledge of the local real estate market and they input it into a BPO form. The final BPO is used to support their professional opinion that will help determine the potential selling price[1] or estimated value[2] of a real estate property.

Steps in the Appraisal Process

Purpose. The first step in the process is to define the appraisal problem and the purpose of the appraisal. This involves

- identifying the subject property by legal description
- specifying the interest to be appraised
- specifying the purpose of the appraisal, for example, to identify market value for a purchase, identify rental levels, or establish a value as collateral for a loan
- specifying the date for which the appraisal is valid
- identifying the type of value to be estimated

Data Collection. The second step is to collect, organize and analyze relevant data about the subject property. Information relevant to the property includes notes and drawings from physical inspection of the subject, public tax and title records, and reproduction costs. Relevant information about the market includes environmental, demographic, and economic reports concerning the neighborhood, community, and region. **Highest and best use.** The third step is to analyze market conditions to identify the most profitable use for the subject property. This use may or may not be the existing use.

Land value. The fourth step is to estimate the land value of the subject. An appraiser does this by comparing the subject site, but not its buildings, with similar sites in the area, and making adjustments for significant differences.

Three approaches. The fifth step is to apply the three basic approaches to value to the subject: the sales comparison approach, the cost approach, and the income capitalization approach. Using multiple methods serves to guard against errors and to set a range of values for the final estimate.

Reconciliation. The sixth step is to reconcile the value estimates produced by the three approaches to value into a final value estimate. To do this, an appraiser must:

• weigh the appropriateness of a particular approach to the type of property being appraised

• take into account the quality and quantity of data obtained in each method Summary Report. The final step is to present the estimate of value in the format requested by the client.

APPRAISAL - A real estate appraisal that must comply with the **Uniform Standards of Professional Appraisal Practice (USPAP)** is a standard procedural component of the real estate transaction enabling both parties in the real estate transaction to understand the fair market value of the real property. The real property 'value' determined is often used for property financing or refinancing, home equity loans and credit lines. There are three primary types of real estate appraisals that may be used, including the **"sales comparison**



approach", the "cost approach", and the "income capitalization approach".

In the process of buying or selling a home, you may hear some strange and vaguely familiar terms. One of these terms is the "real estate appraisal report." This is a written report that estimates the current fair market value of the property that you are buying or selling.

What Information Determines the Report?

The price given in the appraisal is determined by several factors:

- Recent sales of similar properties in the area
- Current condition of the property
- The neighborhood and its impact on future value

These terms are just vague enough to be difficult for many buyers and sellers to understand.

Recent Sales

An appraiser will review the records of nearby properties sold from the last few weeks or months to find three or four that are similar in size, style and layout. The selling prices of those homes will help determine the value of the home being appraised. Many buyers and sellers want to know how recently the comparable homes were sold, and what is defined as "within the same area."

The parameters vary between homes in a metropolitan area and in a rural community. In a larger city, the appraiser could find similar homes that sold in the last month and within one mile of the home that is for sale. In a small town or rural community, that appraiser may have to consider sales over several months or widen the perimeter to encompass the entire town or several miles.

Current Condition

An appraiser must evaluate the current condition of the selling property to determine its value. He or she will inspect the home for any health and safety issues. Any violations or risks will be noted in the final report. These may include old wiring, a lack of railing along stairs and many other conditions. In addition, the appraiser will evaluate the overall design of the home. Is it comparable to others in the neighborhood or is it above or below them? A home that needs serious updating will have a lower appraisal value than one that has recently been renovated.

The Neighborhood

The surrounding neighborhood also plays a part in the appraisal. The appraiser must determine the current state of the neighborhood and where it is headed in the future. For instance, a home in a new or up-and-coming subdivision will have a higher value today, because it is expected to increase in the future. On the other hand, a home in a tired-looking neighborhood that is declining instead of growing doesn't have the same potential for value.

SALES COMPARISON APPROACH METHOD

The "SALES COMPARISON" real estate appraisal approach is more typically performed on residential type properties. This approach compares the price per unit area of similar properties in the surrounding area. The price variations are generally averaged to create a fair market value for the property being appraised. This type of real estate appraisal is considered to be the most accurate appraisal as it utilizes recent market values on comparable properties.

B. Market/data approach (sales comparison or direct sales)

- A value estimate is obtained by comparing the subject property with recent sales of comparable properties through adjustment of sales prices of comparables. Comparable properties used in an analysis should be "arm's length" or a normal market transaction involving willing buyers and willing sellers, as opposed to a foreclosure sale, an auction, or a sale to a relative.
- 2. Four areas of adjustment:
 - a. Date of sale
 - b. Location
 - c. Physical characteristics
 - d. Terms of the sale
- 3. The adjustment process involves three basic steps:
 - Adjust the price of the comparable for any difference between the comparable and the subject property (the property being appraised).
 With your dollar adjustments remember to always mirror your subject property.
 - b. **C.B.S.** Comparable better subtract from the comparable the difference between the comparable and the subject property.
 - c. **S.B.A.** Subject better add to the comparable the difference between the comparable and the subject property.
- 4. Considered the most reliable of the three approaches in appraising residential property.

SALES OR MARKET COMPARISON APPROACH

- A. Also known as THE MARKET DATA APPROACH
- B. Most suitable for PRE-OCCUPIED HOUSES AND VACANT LAND.
- C. Value is estimated by using other comparable property that has been recently sold in the same general area. If the sold comparable has a superior feature in comparison to the subject property, then it is adjusted downwards, but if it has an inferior feature then it is adjusted upwards.
- D. Appraiser gives emphasis to normal inflation, age of improvements, square footage, any good or bad features such as a garage, basement, bathrooms, fireplace, cracked foundation, evidence of termite infestation, etc.

Note: The best comparable is a SOLD comparable

Example: You are required to evaluate the subject property that has 2,800 sq. ft. and is similar to the sold comparable. The subject property does not have a garage. One square foot is worth \$120 and a 2 car garage is worth \$10,000.

Has 300 sq. ft. extra 300 sq. ft. X \$120 = \$36,000 \$300,000 + \$36,000 = \$336,000

But it has NO garage \$336,000 - \$10,000 = \$326,000

Based on the sold property, **the subject property is worth \$326,000**



- E. When comparing property to others sold, at least 3 to 4 SOLD properties should be selected to compare instead of comparing to one only which may have been sold at exceptionally favorable terms or under duress.
- F. Always compare apples to apples. If one property is situated on a lakefront, do not use the comparable that is across the street with only "*lake access*". If you have a one-story home, do not compare it to a two-story or a quad level home.

COST MODEL | REPLACEMENT OR SUMMATION APPROACH

The "COST MODEL" method approach will take the value the land less any depreciated man-made or artificial improvements. Those man-made/artificial 'improvements' refer to the new construction costs of the improvements on the land. Typical real estate appraisals using this method begin with a replacement cost (or reproduction cost) and then subtract value for any encumbrances (burden's) relating to the land or the issues with the man made/artificial improvements. This method is typically performed on historical real properties, barns, other non-standard real properties.

A. Cost approach

- 1. Based on the principle of substitution
- 2. Steps of cost approach
 - a. Estimate the land value.
 - b. Estimate the replacement cost of the improvements.
 - c. Estimate the depreciation.
 - d. Deduct the depreciation from the replacement cost.
 - e. Add the land value to the depreciated cost of improvements—do not depreciate land.
- 3. Depreciation—generally applies to a wasting asset, such as a building

- a. Physical deterioration (wear, tear, poor maintenance)—may be curable
- b. or incurable.
- c. Functional obsolescence-may be curable or incurable (outdated
- d. items, poor design).
- e. **External obsolescence** (economic, environmental, or locational)—loss
- f. of value due to factors outside the property: is always incurable.
- g. Most reliable approach for special-purpose buildings such as churches
- h. and schools.

Most suitable for new property and property with little or no comparables, such as a museum, library, school, etc. In this method, the appraiser takes the following steps to appraise the property:

- A. Land is appraised without the building, using the market comparison approach.
- B. The cost of reconstructing the building as a new unit is estimated.
- C. The value of the land is then added to the value of the building.

D. **REPRODUCTION COST** - Is the cost to reproduce an exact duplicate of the same building using current materials and methods to produce a functional equivalent of the subject property.

E. **REPLACEMENT COST** - The cost of replacing a building with another that functions in a similar way but not a duplicate. This method is more suitable for appraising older structures since it may not be possible to find discontinued building material that would be used at the present time such as asbestos insulation or plumbing fixtures of a certain type.

F. **DEFERRED MAINTENANCE** - Existing maintenance and repair requirements that were due but put off.

G. **ACCRUED DEPRECIATION** - The amount of depreciation that has occurred between the time the improvement was built and the effective date of the appraisal.

F. **ECONOMIC LIFE** - Is the period of time during which the structure is expected to remain useful in its original function. This period is essential to calculating accrued depreciation.

The Cost Approach

Ex: New construction surrounded by existing older homes

Step:1 What is the land worth Without the house?

The market comparison (market data)approach is used to determine the land value.

For example: \$70,000



3,000 s.f. NEW home

We must determine The cost of **NEW Construction.** For example **\$120/s.f.**

3000 s.f. x \$120 = \$360,000 for the NEW construction + \$70,000 for land = \$430,000

METHODS OF DEPRECIATION (FOR MAN-MADE IMPROVEMENTS)

- 1. **PHYSICAL DETERIORATION:** Ordinary wear-and-tear such as roof leaks, problem with plumbing, electrical wiring, basement cracks, etc.
- FUNCTIONAL OBSOLESCENCE: Outdated design and layout inadequacy, property may have served its purpose in the past but does not meet modern requirements such as commercial building that lacks parking, 4-bedroom house with one bathroom, etc.
- 3. **EXTERNAL (economic, environmental) OBSOLESCENCE**: Loss of value due to changes in society and the surrounding area such as presence of crime in neighborhood, pollution from factories, noise from airport, high unemployment, etc.

CURABLE OBSOLESCENCE: Can be corrected. Example, a house with no garage may have a large enough lot to add a two-car garage.

INCURABLE OBSOLESCENCE: Cannot be or not economically feasible to be corrected or modified. External obsolescence is considered to be the hardest to cure.

INCOME ANALYSIS APPROACH METHOD

CAPITALIZATION METHOD (BROKER ONLY)

The **"income capitalization approach**" to real estate is primarily used for commercial properties and to a lesser extent industrial, mixed properties and is based on the expectation of future benefits. This appraisal method type utilizes models to predict the behavior of market participants, in particular with regard to income-producing commercial

properties. It is based on the expectation of future benefits. The "income capitalization approach" relates 'value' to 'market rent' that real property can be expected to earn and to the 'resale value'. In brief, this approach converts 'income' into value; the more the rent income, the more the property is worth.

Income capitalization approach

- 1. Based on the present value of the rights to future income
- 2. Steps in the income approach
 - a. Estimate the annual potential gross income.
 - b. Deduct the vacancy and rent loss to arrive at the effective gross
 - c. income.
 - d. Deduct the annual operating expenses to arrive at the annual net
 - e. operating income.
 - f. Estimate the capitalization rate.
 - g. Apply the capitalization rate to the annual net income.
- 3. Formula for capitalization rate: net income ÷ capitalization rate = value.
- 4. As risk increases, the rate of return increases and the value decreases, and as the risk decreases, the rate of return decreases, the value increases and vice versa.
- 5. Gross rent multiplier (GRM)
 - a. Used as a substitute for the income approach in appraising a single-family home.
 - b. Formula for GRM: sales price ÷ monthly rental income = GRM.
 - c. Monthly rental income × GRM = estimated market value.

6. Gross income multiplier (GIM)

- a. Used as a quick way to appraise commercial and industrial properties.
- b. **Formula for GIM**: sales price ÷ annual rental income = GIM.
- 7. Most reliable approach for income-producing property.

INCOME APPROACH DETAIL

- 1. Used to estimate value of income property.
- 2. VALUE = NET OPERATING INCOME + CAPITALIZATION RATE.

A. NET OPERATING INCOME (NOI) = GROSS RENT - OPERATING EXPENSES

- I. GROSS RENT: Potential annual projected gross income Vacancy and rent loss + Additional income
- II. OPERATING EXPENSES: Necessary annual costs to operate the project such as taxes, maintenance, insurance, utilities and management fees. Although interest is an expense, it is not considered an operating expense; neither are the vacancy factor, principal payments, capital improvements or special assessments.

Note: LOAN PAYMENTS are known as DEBT SERVICE, which include principal and interest. They are not included in calculating the net operating expenses.

B. **CAPITALIZATION (CAP) RATE:** The rate of return an investor would receive on investment.

Example (1): What is the NOI if the gross rent for the year was \$55,000 and the following expenses were considered:

Taxes: \$4000/year, Insurance: \$3000/year, Utilities: 500/month?

Answer: UTILITIES: \$500 X 12 = \$6000/YEAR \$55000 - \$4000 - \$3000 - \$6000 = \$42,000 **NOI**



Example (2): An investor is looking at a rate of return of 12% annually on his/her investment. The property has a gross income of \$26,000/yr. with estimated

expenses of 40% of gross/yr. How much should this investor pay for this property?

Answer: NOI = \$26,000 - 40% = \$15,600 \$15,600 ÷ 12% = \$130,000

Example (3): In the previous example, if the appraiser estimates that the Cap Rate in that market should be 10%, what would the value?

Answer: \$15,600 ÷ 10% = \$156,000

Example (4): in the previous example, if the appraiser estimates the Cap Rate to be 8%, what would the value be?

Answer: \$15,600 ÷ 8% = \$195,000

APPRAISAL PROCESS

A systematic procedure enables an appraiser to collect, organize and analyze the necessary data to produce an appraisal report.

_	DIFFERENCES BETWEEN CMA - BPO - APPRAISAL											
		Created by	Created or Positioned for	Purpose & Reason	Fee or Chargable	FAIR SUBJECTIVE OR OBJECTIVE	NUMBER OF PAGES	SPECIFIC FORMS	ORGANIZATIONAL CONTROL	МЕТНОВS	TIME TO CREATE / COMPLETE	
	CMA Comparable Market Analysis	Broker or Salesperson	Buyer or Seller	Solicit a Listing	Free (can Charge***)	Subjective and Biased	2-4 or 5-40 typical	None	NONE user discretion	One	20-min	
	BPO Broker Price Opinion	Broker or Salesperson	Lender	Solicit a Listing	~\$50-\$185 each	Subjective and Biased	2-4 pages total	2-page Lender form	Lender and Gov't	oOne	1-2 hours	
	APPRAISAL Market Valuation	Appraiser Only	Lender Buyer or Seller	Property Market Valuation	~\$400-\$1.2K (Res) \$800-\$3K (Com)	Objective Fair & Honest	30-40 pages typical	8 page USPAP Form	USPAP	All Three	1-1.5 weeks	
					*** if property is sold then Brokerage must refund fee							

Steps in the Appraisal Process

Purpose. The first step in the process is to define the appraisal problem and the purpose of the appraisal. This involves

- identifying the subject property by legal description
- specifying the interest to be appraised
- specifying the purpose of the appraisal, for example, to identify market value for a purchase, identify rental levels, or establish a value as collateral for a loan
- specifying the date for which the appraisal is valid
- identifying the type of value to be estimated

Data Collection. The second step is to collect, organize and analyze relevant data about the subject property. Information relevant to the property includes notes and drawings from physical inspection of the subject, public tax and title records, and reproduction costs. Relevant information about the market includes environmental, demographic, and economic reports concerning the neighborhood, community, and region.

Highest and best use. The third step is to analyze market conditions to identify the most profitable use for the subject property. This use may or may not be the existing use.

Land value. The fourth step is to estimate the land value of the subject. An appraiser does this by comparing the subject site, but not its buildings, with similar sites in the area, and making adjustments for significant differences.

Three approaches. The fifth step is to apply the three basic approaches to value to the subject: the sales comparison approach, the cost approach, and the income capitalization approach. Using multiple methods serves to guard against errors and to set a range of values for the final estimate.

Reconciliation. The sixth step is to reconcile the value estimates produced by the three approaches to value into a final value estimate. To do this, an appraiser must:

• weigh the appropriateness of a particular approach to the type of property being appraised

take into account the quality and quantity of data obtained in each method
 Summary Report. The final step is to present the estimate of value in the format requested by the client.

Types of Appraisers

There are three (3) types of real property appraisers which are **Provisional**, **Residential and General Appraiser**.

Provisional Appraiser is an apprentice and must work directly under supervision of the Residential or General Appraiser. This type of appraiser has only a four(4) year term and



must move to Residential Appraiser level to continue. Generally, most lending institutions do not accept Provisional Appraisals (without Residential/General co-sign the appraisal document).

Residential Appraiser is a one who has 250 hours of in class training and 2,500 hours of field work experience (provisional level typically) and performs 28-hour CE (Continuous Education) every two even years. Residential only properties such as single family, 2-3-4 unit properties are completed under this type of appraiser.

General Appraiser is a one who has 300 hours of in class training and 3,000 hours of field work experience (provisional level typically) and performs 28-hour CE (Continuous Education) every two even years. The General Appraiser can appraise any type of property including residential, commercial, industrial agricultural, mixed-use and special purpose (churches, cemeteries, schools, etc.)



Capitalization Rate

Capitalization rate or "*cap rate*" is a measure of the ratio between the net operating income produced by an asset (usually real estate) and its capital cost (the original price paid to buy the asset), or alternatively its current market value. The rate is calculated in a simple fashion as follows:

Calculating the Capitalization (Cap Rate)



GROSS INCOME:

\$270,000 per year (15 Apts @ \$1,500/mo. * 12 mo.) (this is 15-unit apartment building @ **\$875K**)



How to calculate Net Income:

\$270,000 (Gross Income annual) -\$15,000 (Taxes per year) -\$9,000 (Maintenance per year) -\$21,000 (Insurance) = \$225,000 (NET INCOME)



Typical Terms and definitions:

Market Price is the last price the real property has sold for which could be several years. When a real property has recently sold, the Market Price and the Selling price are the same. When a property is for sale, the Market Price is the price the property last sold for. When the property sells, the Selling Price is the recent sales price and at that time matches the Market price.

Selling Price is the price that a real property as most recently sold for. This term refers more exclusively the recent sale price of the real property. The previous sale price (generally 2-40 years) is the Market Price.

Asking Price is the price that a seller wishes to sell the real property for. This often differs from the actual 'list price' that is found on the listing, MLS (**Multiple Listing Service**) or fair open market listed price. The seller in many cases has a more sentimental and higher value opinion and this sometimes is referred to as the '*dream price'*.

List Price is the price of a real property for sale set by the seller and licensed real estate listing agent. The List Price is the agreed price between what the seller and CMA (comparative/comparable market analysis) price provides.

Comparative Market Analysis is an examination of the prices at which similar properties in the same area recently sold. Real estate agents perform a comparative/comparable market analysis for their clients (signed to listing agreement) to help them determine a price to list when selling a home or a price to offer when buying a home.

Selling Price is the price that a real property as most recently sold for. This term refers more exclusively the recent sale price of the real property. The previous sale price (generally 2-40 years) is the Market Price.

TYPES OF VALUE

The purpose of an appraisal influences an estimate of the value of a parcel of real estate. This is because there are different types of value related to different appraisal purposes. Some of the possibilities are listed below.

Types of Real Estate Value

- market
- reproduction
- replacement
- salvage
- plottage
- assessed
- condemned
- reversionary
- appraised

- rental
- leasehold
- insured
- reversionary
- appraised
- rental
- leasehold
- insured
- book value

Market value. Market value is an estimate of the price at which a property will sell at a particular time. This type of value is the one generally sought in appraisals and used in brokers' estimates of value.

Reproduction value. Reproduction value is the value based on the cost of constructing a precise duplicate of the subject property's improvements, assuming current construction costs.

Replacement value. Replacement value is the value based on the cost of constructing a functional equivalent of the subject property's improvements, assuming current construction costs.

Salvage value. Salvage value refers to the nominal value of a property that has reached the end of its economic life. Salvage value is also an estimate of the price at which a structure will sell if it is dismantled and moved.

Plottage value. Plottage value is an estimate of the value that the process of assemblage adds to the combined values of the assembled properties. This concept presupposes that two typc

Assessed value. Assessed value is the value of a property as estimated by a taxing authority as the basis for ad valorem taxation.

Condemned value. Condemned value is the value set by a county or municipal authority for a property which may be taken by eminent domain.

Depreciated value is a value established by subtracting accumulated depreciation from the purchase price of a property.

Reversionary value. Reversionary value is the estimated selling price of a property at some time in the future. This value is used most commonly in a pro-forma investment analysis where, at the end of a holding period, the property is sold and the investor's capital reverts to the investor.

Appraised value. Appraised value is an appraiser's opinion of a property's value. Rental value. Rental value is an estimate of the rental rate a property can command for a specific period of time.

Leasehold value. Leasehold value is an estimate of the market value of a lessee's interest in a property.

Insured value. Insured value is the face amount a casualty or hazard insurance policy will pay in case a property is rendered unusable.

Book value. Book value is the value of the property as carried on the accounts of the owner. The value is generally equal to the acquisition price plus capital improvements minus accumulated depreciation.

Mortgage value. Mortgage value is the value of the property as collateral for a loan.

ESTIMATING VALUE

Principles of Value

III. Principles of Valuation

A. **HIGHEST AND BEST USE -** most profitable use to which a property may be adapted, given legal constraints. (HABU)

B. **SUBSTITUTION -** the value of a property tends to be set by the cost of purchasing an equally desirable and similar property.

C. **SUPPLY AND DEMAND -** the price of a property will increase if the supply decreases and will decrease if the supply increases.

D. **CONFORMITY -** maximum value is realized if the land use conforms to existing neighborhood standards.

E. **INCREASING AND DECREASING RETURNS -** improvements to land and structures produce a proportionate increase in value until some point beyond which the impact of improvements begins to decrease, until improvements cause virtually no change in the property value.

F. **COMPETITION -** high levels of profits attract competitors into an industry; increase in competition results in decreased profits throughout the industry.

G. CHANGE - no economic or physical condition remains constant.

H. **CONTRIBUTION -** the value of any component of property consists of what its addition contributes to the value of the whole property.

I. **ANTICIPATION -** value can increase or decrease in anticipation of some future benefit or detriment that will affect the property.

J. **PLOTTAGE -** the principle of combining contiguous property, and, by doing so, increasing the value of the new property. The greater efficiency of land use allows the new value to exceed the combined values of the individual parcels. For example, a strip mall was created from three parcels of vacant land each worth \$50,000. After these contiguous properties were combined, the land value became \$200,000. The actual process of combining these properties into one is called assemblage.

K. BALANCE - is achieved when adding improvements to land and structures will increase the

property value.

L. **REGRESSION -** the principle between dissimilar properties: the worth of the better property

is affected adversely by the presence of the lesser-quality property.

M. **PROGRESSION** - the worth of a lesser property tends to increase if it is located among better properties.

CONFORMITY: Property achieves highest value by being located in harmony with other surrounding property.

For example, a home should be located in a single-family subdivision, not next to an industrial park.

PROGRESSION: A smaller and less expensive dwelling may gain value if it is located near much larger high-priced dwellings.

REGRESSION: A larger and more expensive dwelling may lose value if it is located near smaller low- priced dwellings.

CONTRIBUTION: Value added by one component or part of property as measured to the whole.

For example, how would an extra vacant lot added to a restaurant building as parking affect its value, or how would an added garage affect the value of a home?

SUBSTITUTION: A theory used to evaluate property that considers the cost of obtaining another comparable property. A buyer will not pay a higher price than what it would cost to purchase another similar property in the same real estate market area.

HIGHEST AND BEST USE: The use of land that produces the highest value, provided that it is legal, economical, and physically possible.

For example, a feasibility study is conducted to determine "**highest and best use**" on a vacant lot zoned commercial located off the expressway exit. The result of the study is that the highest and best use would be a service station accompanied by a coffee shop. The study considers the current or possible future zoning, as well as the market value of the land, cost of improvements, anticipated revenue, etc.

PROPERTY CHARACTERISTICS PHYSICAL CHARACTERISTICS AFFECTING VALUE

1. DURABILITY (INDESCRUCTABILITY:

Although improvements depreciate physically over time, land does not. **Example:** Buy some land and let it sit for 30 years and then come back to check on it, it still looks the same. Even a brick building may still look the same. This feature increases the value of real estate.



2. IMMOBILITY: Real estate is not movable.

Example: have you heard that the 3 most important aspect of real estate value is location, location, location. Immobility can be good or bad because if your property is in a good location, that will bring its value upwards. But if it's in a bad location, you cannot move it elsewhere.

3. **HETEROGENEITY (UNIQUE):** (non-homogeneity): Every property is UNIQUE; No two parcels are alike. Even when you have two adjacent lots in the subdivision that would seem to be of the same size and value, they still have two different legal descriptions; one is lot #12

while the other is lot #13.

ECONOMIC CHARACTERISTICS AFFECTING VALUE (D.U.S.T)

1. **DESIRABILITY (DEMAND):** Whether or not there are possible buyers interested in the property that are willing, able, and have the financial means to purchase. Example: 200-unit condominium complex is built on a waterfront; some units are not facing the water. Chances are that the units facing the water will sell at a higher price because they are more desirable, i.e. there is more —demand on them.

2. **SCARCITY (SUPPLY)**: Whether or not there are other similar properties of a comparable nature within the same general area that will compete with the subject property.

Example: a 300-unit condominium complex was pre-sold before construction; finally, one buyer canceled his purchase agreement because he was being transferred out of town. When your buyer wants to make an offer on the last remaining unit, it will be very hard to bargain on the price because of scarcity. Had it been the other way around, for example, if only 50-units were sold and there were 250-units left on the market, there will be some room for bargaining and the price may go down.

3. **UTILITY:** The type of use that the subject property is most suitable for, and whether or not it satisfies the needs of a certain buyer.

Example: a small town known for its large retirement community has a new subdivision being built with mostly one-story Ranch homes. This design will probably prove to be popular with the majority of people in the city, because those of a retirement age may have issues with climbing too many stairs, therefore they will be able to —utilizell this type of design much better than a two storey home, especially with bedrooms located upstairs.

4. TRANSFERABILITY: The ability to sell, lease, will property to another person. The more the restrictions on the sale, lease or transfer of property, the less the value. Example: Property may be the subject of a dispute between partners, or certain action taken by a government entity such as the IRS or DEA, therefore, unless these restrictions are lifted, property will either have a lower value or no value at all.

GROSS RENT / INCOME MULTIPLIER METHOD (BROKER ONLY)

• Mostly suitable for a small income property such as a house, duplex, etc.

Calculating Gross Rent Multiplier (G.R.M.)



- **G.R.M.** of 7.29 indicates 7 yrs 4 mo. to recover purchase price.
- G.R.M. ranges typically from 4~10
- G.R.M. of 12 is considered poor investment and 4 would be good investment opportunity.

Purchase Price	=>	\$280,000		
Monthly Rent (2 Tenants)	=>	\$3,200		
Annual Income (2 Tenants Monthly Rent * 12)	=>	\$38,400		
STEP 1: Formula Gross Rent Multiplier = STEP 2: Substitute Val Gross Rent Multiplier = STEP 3: Resulting G.R	Purchase Annual In UES 5280,000 \$38,400 .M.	Price come		

Gross rent multiplier (GRM)

- o G.R.M. Tool calculation allows investors to a quickly (roughly) estimate value of real estate property investment before considering operating expenses and taxes.
- o Used as a substitute for the income approach in appraising a single-family home. Rule of thumb calculation within Income Capitalization approach.

- Formula for GRM: Sales Price ÷ Monthly rental Income = GRM.
- Total Monthly Rental Income × GRM = Estimated Market Value.

• Gross income multiplier (GIM)

- o Used as a quick way to appraise commercial and industrial properties.
- o Rule of thumb calculation within the Income Capitalization approach.
- o **Formula for GIM:** Sales Price ÷ Annual Rental Income = GIM.

• The method applies a multiplier to the estimated gross income of the subject property; the income is either based on the current rent roll of the property or a projection of what the property should earn in a competitive market.

• Although the gross rent/income multiplier provides a fast and brief method of estimating the value, it does not take into consideration any operating expenses, vacancies, etc. therefore it may not be as reliable as the capitalization approach described earlier.

Value = GRM x Rent (Monthly or yearly)

Example: Property #1 was sold for \$100,000 and yielded gross ents in the amount of \$10,000/yr. What would property #2 be evaluated at with \$15,000/yr. in gross rents?

Solution: G.R.M. = \$100,000 / \$10,000 = 10 G.R.M for property #1 10 X \$15,000 = \$150,000 value for property #2

COMPETITIVE/COMPARATIVE MARKET ANALYSIS - CMA

- A. An estimate of property value (conducted usually by the real estate agent) used to assist the seller in determining a listing price for the property by relying on sale and leasing data of comparable properties.
- B. A CMA will not be relied upon by the lender in determining the amount of mortgage loan to be provided to the buyer.
- C. According to Connecticut state rules/regulations, an real estate licensed salesperson (agent) is authorized to provide the CMA only for the purpose of "**soliciting a listing**" and establishing a selling (or leasing) Listing Agreement agreed "List Price" for a property that the salesperson is preparing to place on the open market via MLS (Multiple Listing Service)
- D. **NOTE:** In Connecticut, a salesperson or Broker may charge for a CMA but will be required to refund to charge/cost if the property is sold by that salesperson or Broker/Brokerage.
- E. **Methods used for selecting and adjusting comparables** for many residential and some commercial properties are usually similar to those used by licensed appraisers, an agent who faces a complicated valuation task must seek an expert opinion from a licensed appraiser.

Method for Sales Price Adjustments:

- The situations that appraisers most often have to deal with in applying the sales comparison approach are comparables that aren't identical to the subject property. Appraisers go through an adjustment process to compensate for the differences in the properties.
- Here's a simple example. The subject property is a three-bedroom, two-bath home. Joan the appraiser doesn't currently know the value of this house. A very similar house sold two months ago for \$275,000. The comparable house, called Comparable A, is the same in all respects as the subject property except that it has four bedrooms.
- Comparable A is superior to the subject property. Joan's research indicates that the value of the fourth bedroom is \$25,000. That means that the buyer of Comparable A paid \$25,000 more for that house than he or she would have for a three-bedroom house.
- Joan, when preparing her appraisal report, goes through the process of subtracting that \$25,000-bedroom value from the \$275,000 sales price of Comparable A. The resulting price of \$250,000 is the *adjusted sales price.*
- \$275,000 (sale price of Comparable A) \$25,000 (value of fourth bedroom) = \$250,000 (adjusted sales price)

END

NATIONAL TEST TOPIC #6 APPRAISAL | MARKET VALUATION #6 2020 Practice Classroom Quiz



1. An apartment building grosses \$2,000 per month with expenses averaging 35% of gross income. What is the net operating income (NOI) for the project?

- A. \$1,300
- B. \$24,000
- C. \$15,600
- D. \$8,400

2. Of the different methods of appraising property, which of the following is the most appropriate for appraising vacant land?

- A. The cost approach
- B. The gross rent multiplier approach
- C. The capitalization approach
- D. Market data (comparison) approach

3. When using the market/sales comparison approach, an appraiser takes the following into consideration:

- A. Income and expenses of property
- B. Capitalization expected by investors
- C. Features that the property has in comparison to other property sold in the neighborhood
- D. Depreciation on improvements
- 4. Property value is least affected by:
 - A. Supply and demand
 - B. Quality and features
 - C. Activity of buyers in an area
 - D. The owner's acquisition cost
- 5. Which of the following indicates functional obsolescence?
 - A. Leak in the roof
 - B. Sewage treatment plant next to the property
 - C. One-car garage in a neighborhood of mostly two-car garages
 - D. High property taxes

- 6. When a house is located in a neighborhood with several boarded-up houses and gangs on the street, this property loses value due to:
 - A. Physical deterioration
 - B. Functional obsolescence
 - C. Economic obsolescence
 - D. Crime effect on occupants
- 7. When appraising a brand new house surrounded by older houses, the best method used is the:
 - A. Income approach
 - B. Market comparison approach
 - C. Actual cash paid to the builder to erect improvements
 - D. Cost approach
- 8. Which of the following is true about income property evaluation?
 - A. The cost of land must be estimated separately and then the cost of improvements must be added to it.
 - B. Appraiser must look at acquisition cost when property was purchased.
 - C. The capitalization approach is the most suitable.
 - D. Expenses such as property taxes, maintenance and insurance are seldom taken into consideration.
- 9. All of the following are taken into consideration when using the market comparison approach except:
 - A. The price of the sold comparables in
 - the neighborhood.
 - B. The subject property features such as square footage, number of bathrooms, garage, central air conditioning, etc.
 - C. Property location and age in comparison to the sold comparables.
 - D. The capitalization rate an investor would reasonably accept.

10. The price that a willing buyer will most probably pay a willing seller under no pressure, and provided that property is available on the market for a reasonable length of time, is known as:

- A. Market price.
- B. Economic price.
- C. Market value.
- D. The buyer's value.
- 11. A factor which an appraiser multiplies gross income from property by to appraise its value is:
 - A. Capitalization factor
 - B. Rental factor
 - C. Expense factor
 - D. Gross rent multiplier

- 12. In estimating the square footage of a building for replacement purposes, an appraiser would use:
 - A. Interior dimensions of the structure.
 - B. Lot size dimensions.
 - C. Exterior dimensions.
 - D. Lot frontage dimensions.
- 13. To determine the value of a church, the appraiser will probably use:
 - A. The income capitalization approach.
 - B. The cost approach.
 - C. The market data approach.
 - D. The congregation approach.
- 14. A 10,000 sq. ft. mansion surrounded by 1,500 sq. ft. homes would most likely be appraised using:
 - A. Market comparison approach
 - B. The square foot approach
 - C. The cost approach
 - D. The gross living area approach
- 15. When comparing an appraisal report to a comparative market analysis, which of the following is
 - NOT a factor to consider?
 - A. An institutional lender will not rely on the market analysis to grant a loan

B. An appraisal is provided by a state licensed appraiser while the market analysis is provided by a broker.

C. An appraisal is a determination of value while the market analysis is a recommendation of listing price

D. An appraisal report is usually more detailed and must follow USPAP

- 16. The price received for sold property is
 - A. Market price
 - B. Market value
 - C. Arm's length transaction
 - D. Appraised price
- 17. When using the cost approach, an appraiser will consider all of the following factors except:
 - A. Economic life
 - B. Deferred maintenance
 - C. Accrued depreciation
 - D. NOI
- 18. All of the following are considered principles of value except:
 - A. Conformity
 - B. Substitution
 - C. Contribution
 - D. Acquisition cost

- 19. When a sale occurs in a competitive market and under no duress, this transaction is known as:
 - A. Fair market value transaction
 - B. Arm's length transaction
 - C. Highest and best value
 - D. Full anticipation transaction
- 20. Which of the following would have the least effect on property value?
 - A. Interest rates
 - B. Economic growth
 - C. Brokers' commissions
 - D. Loan availability

ANSWERS- VALUATION & MARKET ANALYSIS

- 1. C
- 2. D
- 3. C
- 4. D
- 5. C
- 6. C
- 7. D
- 8. C 9. D
- 9. D
- 10. C 11. D
- 12. C
- 13. B
- 14. C
- 15. C
- 16. A
- 17. D
- 18. D
- 19. B
- 20. C

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