

GENERAL APPRAISAL AND ASSESSMENT

GLOSSARY OF TERMS

Accrued Depreciation – The amount of depreciation, from any and all sources, that is affecting the value of a property. It represents the difference between reproduction cost new or replacement cost new of the improvements and the present worth of those improvements, both measured as of the date of the appraisal. Accrued depreciation is sometimes referred to as diminished utility.

Actual Age – The total number of years that have lapsed since the original date of construction and the effective valuation date. Sometimes referred to as historical or chronological age.

Ad Valorem Tax – A tax levied against taxpayers in proportion to the value of the goods or commodities being taxed. The property tax is an ad valorem tax.

Aerial Photo Overlap – The amount by which one photograph covers the same area as covered by another, customarily expressed as a percentage. The overlap between aerial photographs in the same flight line is called end lap, and the overlap between photographs in adjacent parallel flights is called side lap.

Aerial Photography – A photograph of a part of the earth's surface taken by special cameras mounted in aircraft or satellite.

Age-Life Method – A method of estimating accrued depreciation as a percentage. The percentage reflects the relationship of the estimated effective age to total economic life.

Aggregate Ratio – A measure of the level of assessment within a taxing jurisdiction reflecting the relationship of the total assessed value to the total market value of the total population or a sampled part thereof.

Agricultural/Horticultural Property – All real property used for agricultural purposes and devoted primarily to the raising and harvesting of crops; to the feeding, breeding and management of livestock; to dairying; or to any other agricultural or horticultural use or combination thereof; and the buildings and structures customarily associated with agricultural and horticultural uses. Agricultural and horticultural property shall also include land devoted to and qualifying for payments or other compensation under an agreement with any agency of the federal government.

Agricultural Use Value – A value estimate premised on the income approach based on the productive capability of the land.

Anticipation, Principle of – It affirms that value is created by the anticipation of future benefits. The value may be defined as the present worth or all rights to future benefits.

Appraisal – An estimate or opinion of value supported by the presentation and analysis of relevant data.

Appraisal/Assessment Date – The date being ascribed to an appraisal/assessment. Every appraisal must be made as of a specific date in order to identify the market forces and conditions which affect value. In Missouri, the effective date of assessment is January 1.

Appraisal Process – A systematic and orderly approach by which the problem of real estate valuation is defined; the work necessary to solve the problem is planned; and the data involved is acquired, classified, analyzed and interpreted into an estimate of value.

Approaches to Value – The traditional methods or techniques by which market data may be processed into an indication of value. The three approaches to value include the Direct Sales Comparison Approach, commonly referred to as the Market Data Approach or Market Approach; the Cost Approach, sometimes referred to as the Summation Approach; and the Income Approach, sometimes referred to as the Income Capitalization Approach.

Assessment Level – The percent of “true value in money” of property for ad valorem tax purposes upon which the property taxes are paid.

Average Deviation – A Measure of assessment quality reflecting the average amount of deviation of all the values from the mean or median value. It is the total of the individual deviations from the mean or median divided by the total number of observations.

Balance, Principle of – It holds that value is created and maintained in proportion to the equilibrium attained in the amount and location of essential uses of real estate. The degree of value of a property is governed by the balance or apportionment of the four factors in production; land, labor, capital and management.

Building Capitalization Rate – A rate which includes return on and return of capital invested in the improvements which is used in the residual techniques to value the improvements by segregating the property’s income into component incomes attributable to land and to the improvements.

Building Residual Technique – The process of estimating the contributory value of the improvements to the present worth or value of the entire property, over and above the value of the site, in which (1) the return attributable to the land, valued independently of the building, is deducted from the net operating income and (2) the residual income which represents the return to the building is capitalized into an indication of value attributable to the improvements.

Bundle of Rights Theory – The ownership of a parcel of real estate encumbers a great many rights. The rights of real estate ownership include the right to its occupancy and use; the right to sell it; the right to lease or rent it; the right to enter upon it; the right to give it away; or the right to refuse to do any of the above.

Cadastral Base Map – A map that shows the size, shape, and the extent of each land parcel in a prescribed geographical or map area. The map shows the boundaries of the subdivisions of land, usually with the bearings and the length thereof and the areas of individual tracts, for the purpose of describing and recording ownership. A cadastral map may also show culture, drainage, and other features relating to the value and use of land.

Capitalization – The process of converting into present value, or the present worth of, a series of anticipated future periodic installments of net income. In real estate appraising, it usually takes a form of discounting.

Capitalization Rate – The rate used to convert an estimate of net income into an estimate of market value. The rate reflects the relationship of normal net income to market value and is a summation of a discount rate, a capital recapture rate, and for assessment purposes and effective tax rate.

Change, Principle of – It holds that economic and social forces are constantly at work and changes brought about by these forces affect real property. The appraiser views real property and its environment as in transition and observes evidence of trends which may affect the property in the future. The law of change is fundamentally the law of cause and effect.

Coefficient of Dispersion – A relative measure of variability in a given distribution that describes the distribution of individual ratios in relationship to the mean or median ratio of a sampled grouping. It is calculated by dividing the average absolute deviation from the mean or median by the appropriate measure of central tendency being utilized. The resultant Coefficient of Dispersion is the percentage by which the various individual ratios differ, on average, from the mean or median.

Commercial Property – SEE Utility, Industrial, Commercial, and Railroad Property

Comparative Unit Method – A method of estimating replacement cost in which all the direct and indirect costs of a structure are aggregated and quantified with reference to a unit of comparison basis such as cost per square foot of building, cost per square foot of foundation, cost per cubic foot of building, etc.

Competition, Principle of – It holds that profit tends to breed competition and excess profit tends to breed ruinous competition.

Conformity, Principle of – It holds that the maximum value of a property is realized when a reasonable degree of sociological and economic homogeneity is present.

Contribution, Principle of – A valuation principle which states that the value of an item in production is measured by its contribution to the net return of the enterprise.

Controlled Mapping – A system whereby the relative positions of points and lines which are used as fixed references in positioning and correlating map features, are carefully determined and plotted from reliable survey data onto maps. Control is generally classified in four orders (with the first order denoting highest quality) according to the precision of the methods and instruments used in establishing the accuracy of the resultant positions and elevations. The lines on the control map control other smaller surveys, and they control property boundaries plotted from deeds.

Control Point – A reference point precisely located on a photograph and on the ground; used in assembly of photographs for map compilation.

Coordinate System – A system of locating any geographic point by determining its North-South and East-West distance from some known base point. For tax mapping purposes, it is a system for identifying each assessable parcel of real estate by means of coordinate system, usually by recording the coordinates of the center of each parcel.

Correlation Process – The process by which the appraiser reviews, evaluates, and selects from two or more alternative indicators and arrives at a single conclusion. In the appraisal process, during correlation or reconciliation, the appraiser examines the value indications of the cost, market, and/or income approaches to arrive at the final estimate of value.

Cost Approach – One of the three traditional approaches used in the valuation of real property and involves estimating a value attributable to the land, a replacement or reproduction cost new for the improvements, and an amount of accrued depreciation attributable to the improvements. The land value estimate is then added to the depreciated value of the improvements to arrive at an estimate of property values.

Cost Adjustment Factor – A factor or multiplier applied to a replacement or reproduction cost to account for variations in location and time, as well as for other elements of construction cost not otherwise considered.

Curable Depreciation – Those items of physical deterioration and functional obsolescence which can be reversed by corrective maintenance and remodeling to relieve the functional obsolescence. Curable depreciation is usually computed as the dollar amount equal to the cost-to-cure and is reimbursable in the marketplace.

Deed – A written legal instrument which conveys an estate or interest in real property.

Depreciation – A loss in value caused by deterioration and/or obsolescence. In appraising, it may be further classified as physical deterioration, functional obsolescence, and economic obsolescence.

Depth Factor – A factor or multiplier applied to a unit of land value, usually front foot value, to adjust the value in order to account for variations in depth from and established standard depth.

Design Factor – A factor or multiplier applied to a computed replacement cost as an adjustment to account for cost variations attributable to the particular design of the subject property which were not accounted for in the base cost tables.

Direct Capitalization – A conversion of net income into an indication of value by dividing the estimated net income by an appropriate rate which reflects the prevailing relationship of net income to the selling price of comparable properties currently being sold in the marketplace.

Discount Rate – An annual percentage rate which reflects the competitive rate of return on an investment and is not to be confused with the rate of interest or interest rate on borrowed funds.

Dispersion – A statistical term used to describe the extent to which a set of data is clustered, either tightly or loosely, around its measure of central tendency.

Economic Life – A period of life expectancy during which a property can be expected to be profitably utilized. Sometimes used synonymously with Total Economic Life (TEL).

Economic Obsolescence – Obsolescence caused by impairment of desirability or usefulness arising from factors external to the property. Also referred to as locational obsolescence.

Economic Rent – The rent which a property can be expected to bring in the open market as opposed to contract rent which is the rent the property is actually realizing at a given time. It is the market rent that a property should most probably command on the open market as of the effective date of the appraisal. Used synonymously with market Rent.

Effective Age – An age assigned to a structure based upon its condition, utility and remaining life expectancy as of the effective valuation date. It may be greater or less than the structure's actual or chronological age.

Effective Gross Income – An estimate of residual gross income remaining after an allowance for vacancy and collection losses has been deducted from the estimated potential gross income plus other miscellaneous incomes.

Effective Tax Rate – A Rate which indicates the relationship of the annual property tax of a property to the market value of that property. Simply, property taxes expressed as a percentage of full value. To

compute the effective tax rate, you must know the level or percentage of assessment and the official tax levy rate.

Eminent Domain – The right or power of governmental or quasi-governmental body to acquire private property for public or quasi-public use upon payment of a reasonable compensation.

Encroachment – It involves the gradual or partial displacement of an existing use by another use.

Equalization Program - A mass appraisal or reappraisal of all property within a given taxing jurisdiction with the goal being the equalization of all values in order to assure that each taxpayer is bearing only his fair share of the tax load.

Equity – In reference to value, it is that value of the property remaining after deducting all liens and charges against it.

Equity Yield Rate – An annual rate of return that is applicable to equity capital. It is a component of the capitalization rate (discount rate or mortgage-equity overall rate) that must be separately specified in band-of-investment analysis and mortgage-equity analysis.

Escheat – The ownership of property reverts to the state when an owner dies without leaving a will or heirs.

Exempt Property – Property owned by governmental, educational, charitable, religious and similar non-profit organizations that is granted a total or partial freedom from taxation.

Fee Simple Title – In real property ownership, it consists of complete ownership interest (bundle of rights) in a property subject only to the limitations of eminent domain, escheat, police power and taxation.

Forest Cropland – Lands devoted exclusively to growing wood and timber. Real property classified as forest croplands shall not be classified as agricultural or horticultural property so long as it is classified as forest croplands and shall be taxed in accordance with the laws enacted to implement Section 7 of Article X of the Missouri Constitution.

Front Foot Value – A unit of value for a parcel of real estate that is expressed in terms of front foot units. A front foot unit being a land measure equal to one foot in width along the frontage of a property and extending to the rear of the parcel.

Functional Obsolescence – A loss in value which is due to the impairment of a property's functional utility which is the ability of the property to perform the function for which it is intended. This utility is considered with respect to current market standards. For a residential property, elements of functional utility may include architectural type, design and layout, traffic pattern, size and types of rooms, etc. Functional obsolescence may be considered to be curable or incurable. Whether the cost-to-cure is greater than or less than the anticipated increase in value, due to the increase in utility resulting from the correction of the obsolescence, determines whether the obsolescence is curable or incurable.

Geodetic Survey System – The United States Coast and Geodetic Survey System consists of a network of benchmarks, each located by its latitude and longitude, which covers the entire country. This system is used to locate and identify tracts of land.

Governmental Survey System – Often referred to as the Rectangular Survey System, it is a method of ground survey authorized by the Continental Congress in 1785 which divides land into townships approximately six miles square. Each township normally contains thirty-six sections with each section

containing approximately six hundred forty acres and being one mile square. Most legal descriptions in the State of Missouri are based upon the Governmental Survey System.

Grantee – The person(s) to whom property is transferred and property rights are granted by deed, trust instrument or other similar documents. The person(s) who buys the property.

Grantor – A person(s) who transfers property or grants property right by deed, trust, instruments or other similar documents. The person(s) who sells the property.

Gross Floor Area – It consists of the total floor area of a building as calculated from measurements taken of the exterior walls of the building.

Gross Income - It embodies the gross possible income, also called Potential Gross Income that a property will produce at 100% occupancy and at a rental rate competitive with the market.

Gross Income Multiplier - A multiplier that represents the relationship between the gross income of a property and its estimated value. It is calculated by dividing the sales price of a property by its gross income at the time of sale. The multiplier to be used in an appraisal is developed through an analysis of a sufficient number of comparable properties which were rented at the time of sale. When the gross income multiplier, also called the gross rent multiplier, is applied to a property's potential gross income, an estimate of value is indicated.

Highest and Best Use - The use which will generate the highest net return to the property, as of the effective date of the appraisal, given probable legal, physical and financial constraints.

Homogeneous - A term that is used to describe an area or neighborhood in which property types and uses possess the quality of similarity and compatibility.

Horticultural Property - See Agricultural/Horticultural Property.

Income Approach - One of the three traditional approaches to value which measures the present worth of the future benefits of a property by the capitalization of the projected net income stream over its remaining economic life. The approach involves estimating the gross possible income; subtracting a reasonable vacancy and credit loss from the gross possible income to determine effective gross income; subtracting allowable operating expenses from effective gross income to determine net operating income; determining the proper capitalization method; computing the correct capitalization rate; and then capitalizing that projected net income into an indication of value.

Increasing and Decreasing Returns, Principle of - A theory that additional agents of production will produce an increase in value that exceeds the additional cost of production up to a certain point; at which point, the maximum true value in money is achieved and any additional investment of an agent of production will not produce an increase in "True Value in Money" equal to the cost of the additional agents.

Index Map - A map of smaller scale which is used to identify the area of coverage by each base tax map within an assessment mapping system.

Industrial Property - SEE Utility, Industrial, Commercial and Railroad Property.

Influence Factor - A factor serving to either devalue or enhance the value of a particular parcel of land, or portions thereof, relative to the norm from which the base unit values were established and is generally expressed in terms of a percentage adjustment.

Institutional Property - Land and improvements used in conjunction with providing public services and generally owned and operated by the government or other nonprofit organizations such as hospitals, schools, prisons, etc.

Interest Rate - The rate of return on a real estate investment which reflects the compensation necessary to attract investors. In this manner, it is often used synonymously with Discount Rate. It may also be used to indicate the rate of interest to be paid on borrowed funds.

Land Residual Technique - A valuation technique which presumes that the building and land each contribute to the total net income of a property. This technique requires that the value of the building be known. Through capitalization of a building value, the income stream attributable to the building is determined; then subtracted from total net income to produce the portion of the income stream attributable to the land. This residual income is then capitalized at an appropriate discount or land capitalization rate into an indication of land value.

Land Use Map - A map which indicates the type and distribution of individual land uses within a community or district.

Land Value Map - A map used in conjunction with mass appraising to show comparative unit land values relative to specific land areas. The sale prices of actual land transfers are converted into a unit of land value (front foot, square foot, acre, etc.) and are recorded on the land valuation map. Through analysis of these sale price units, base land unit values are developed and applied to the individual parcels contained thereon.

Lease - An agreement, usually in writing, which conveys the rights of use and occupancy of land and/or improvements of the owner (lessor) to another party (lessee) for a specified time and under specified terms and conditions.

Leasehold - The interest in a property that is held by the lessee or tenant as specified in the lease agreement.

Leasehold Value - The value of a leasehold interest. When current market rent exceeds the contractual rent, the present worth of the rental savings is considered to be the value of the leasehold interest.

Legal Description - The description of a parcel of land which serves to identify and distinguish that parcel from another in a manner sanctioned by law.

Local Multiplier - A factor applied to base cost schedules that provides an adjustment of these schedules to a particular location or district.

Market Data Approach - An appraisal valuation approach, also called the Sales Comparison Approach, which is used to develop an indication of value for a property by compiling data on properties which are comparable to the subject property and which recently sold. An adjustment is made to the selling price to account for differences in time, location and property characteristics between the comparables and the subject property. The adjusted sale prices should provide an indication of value for the subject property.

Market Price - It is the actual amount of money given in exchange for or paid for a property. It may or may not reflect market value.

Market Value - The highest price estimated in terms of money which a property will bring if exposed for sale on the open market for a reasonable length of time, providing there is a knowledgeable buyer and

seller both aware of all the uses to which a property is adapted and for which it is capable of being used. Used synonymously with True Value in Money.

Mass Appraisal - The process of appraising a large number of properties within a jurisdiction, generally for ad valorem tax purposes, which uses standardized appraisal techniques and procedures to affect uniform and equitable valuations within a limited time period.

Mean - Also called Arithmetic Average, it is a measure of central tendency for a group of individual numerical values equal to the sum of those values divided by the total number of value indications.

Median - A measure of central tendency, describing a group of numerical values, defined as the midpoint of the distribution. The median is that value that is located midway between the highest and lowest numerical value when ranked in order of magnitude of ascending or descending values.

Mortgage - A legal document by which the owner of a property, the mortgagor, pledges the property to a creditor, mortgagee, as security for the payment of a debt.

Mortgage-Equity - A capitalization or valuation technique which converts income into value by employing an overall capitalization rate in which the appraiser recognizes the influences of the mortgage terms, equity requirements, a typical holding period, and the expected depreciation or appreciation over the holding period on income-producing properties.

Most Probable Selling Price - The price at which a property would most probably sell if exposed to the market under prevailing market conditions as of the date of appraisal.

Neighborhood - A geographical area exhibiting a high degree of homogeneity in land use, grouping of inhabitants, buildings or business enterprises. Neighborhoods are delineated by three types of boundaries: (1) Natural barriers - rivers, lakes, etc.; (2) Man-made barriers - highways, railroads, etc.; and (3) Political boundaries - zoned land use areas, city limits, school districts, etc.

Neighborhood Life Cycle – As reflected by the Principle of Change, a neighborhood typically evolves through three discernible life patterns. The three stages in the lifecycle of a neighborhood include: (1) Growth – the period during which the neighborhood is characterized by development and growth; (2) Stability – the period of time characterized by an equilibrium or leveling off of values; and (3) Decline – the life stage characterized by diminishing demand and decay. Neighborhood renewal and rehabilitation may cause the life cycle of a neighborhood to be repeated.

Net Income - The annual residual income, before allowance for debt service, depreciation and taxes, which is capitalized into an estimate of value. Net income is that portion of gross annual income remaining after an allowance for vacancy and collection losses and a deduction for all fixed and operating expenses related to the cost of ownership are applied to gross income. Net income is synonymous with Net Operating Income (NOI) and Net Income before Recapture (NIBR).

Obsolescence - That form of depreciation that reflects a loss due to the diminishing of a property's desirability and usefulness caused by either functional inadequacies or superadequacies inherent in the property itself, or adverse economic factors external to the property. Therefore, the obsolescence may be either functional or economic.

Operating Expense Ratio - A mathematical expression that reflects the relationship of annual operating expenses to annual effective gross income as a percentage.

Operating Expenses - The necessary charges or expenses incurred by ownership of or investment in income-producing property. Net operating expenses are those fixed expenses, variable operating costs and reserves for replacements which are required for the production of income from the operation of a property.

Overage Income - Rental income received over and above the minimum contract rent, payable under the terms of a lease based upon a specified percentage of a tenant's business receipts.

Overall Rate - A capitalization rate which represents the relationship of the annual net operating income before recapture of a property to its value or sale price.

Orthophotography – Aerial photography wherein most scale and position distortions, inherent in aerial photographs, have been eliminated.

Parcel - Any portion of land that is individually listed and described in the county's assessment records. A parcel must consist of all contiguous land owned by the same legal entity and of a single use within a section.

Parcel Identification Number - An individualized numerical description assigned to a parcel in order to distinguish that parcel from another. Parcel identification numbers, in order to perform their functions, possess a number of desirable characteristics uniqueness and permanence, simplicity, and convenience of use. The most common and recommended parcel identification systems include the Geographic Coordinate System, the U.S. Federal Rectangular Survey System and the Assessor's Map Book and Page System.

Performance Bond - A bond supplied by a contractor as clear evidence of its past performance and as a demonstration that it possesses the resources, both financial and technical, to successfully complete the project in accordance with the terms of the contract.

Personal Property - Any property that is not permanently affixed to or made a part of real estate. In determining whether an item is personal property, generally considered to be movable items, the appraiser/assessor should consider: (1) the manner in which the item is attached to the property, (2) the intentions of the party who made the attachments, and (3) the purpose for which the premises are used. In most instances, it is generally considered that an item remains personal property if it can be removed without serious injury either to the item itself or to the real estate.

Physical Deterioration - The loss in value due to the physical wear and tear experienced by the structure as reflected by its age and the actions of the elements on the improvements. Physical deterioration may be classified as either curable, sometimes referred to as deferred maintenance, and incurable.

Preferential Assessment - An assessing system which provides preferential treatment in the form of reduced rates to a particular class of property. As set out in Section 137.017 to 137.021, RSMo, the assessment of farm properties pursuant to these statutory guidelines is considered to be preferential assessment as farm properties are assessed in accordance to their value in use as opposed to their value in the open market.

Property Classification System - The classification of like properties as defined by its type (real property, personal property, etc.) or its use (residential, commercial and industrial, agricultural, utility, etc.). Pursuant to the Constitution of Missouri, property in Missouri shall be classified for tax purposes as follows: Class 1, Real Property; Class 2, Tangible Personal Property and Class 3, Intangible Personal Property. Property in Class 1 shall be subclasses as follows: (1) Residential Property, (2) Agricultural

and Horticultural Property, and (3) Utility, Industrial, Commercial, Railroad and all other properties not included in subclasses 1 and 2.

Property Classification Tax System - A taxing system as established by law where the various types and kinds of properties are assessed at different assessment levels.

Property Record Card - A document designed to record and process specified property data. The record card may serve as a source document, a processing form, and/or a permanent property record.

Property Residual Technique - A capitalization technique which provides an estimate of value applicable to the total property, without separation into land and building values. The property residual technique employs direct capitalization of the property's net income by an overall rate that may be developed from analysis of comparable sales. In annuity capitalization, the technique sums the present worth of the income stream and the present worth of any reversionary value to the property into an estimate of value for the property.

Price Related Deferral - A measurement, expressed as a percentage, between the mean and aggregate ratios for a group of properties that indicates the degree to which high value properties are over-assessed or under-assessed in relation to low value properties.

Quality Classification - It involves the subjective classification of a structure by an appraiser into any one of several standardized qualities or grades. A quality classification or grade is intended to describe a building and its improvements based upon its inherent features and degree of construction excellence quality of materials, workmanship, etc. Standardized quality classes or grades are keyed to the base cost schedules contained in any given cost manual.

Quantity Survey Method - The most detailed and comprehensive method of projecting an estimate of a reproduction cost. It involves the itemization and summation of all materials and their respective costs, labor hours and costs, and all indirect costs (permits, insurance, office expense, and other overhead plus a margin for profit) into a total cost estimate.

Railroad Property - SEE Utility, Industrial, Commercial and Railroad Property.

Range - A mathematical inference that expresses the difference between the highest value and the lowest value in an array of raw numerical data arranged in either ascending or descending order of magnitude.

Ratio - A mathematical inference, expressed as a percentage, that describes the degree of relationship between two similar things. For example, an assessment ratio expresses the relationship that exists between the assessed value and the true value (market value) for a property. An assessment ratio is determined by dividing the assessed value by either the indicated market value or the sales price of the property.

Ratioed Photography - Aerial photography developed through a photographic process that adjusts for the various sources of distortion or image displacement to form a single, two-dimensional representation of the ground's surface features through the application of an analytically developed ratio. Ratioed photography does not provide the degree of accuracy that is obtainable through the use of rectified photography or orthophotography and is therefore not suitable for tax mapping purposes.

Real Estate - This refers to the physical entity which is comprised of the land and all things of a permanent and substantial nature affixed thereto. The chief characteristics of real estate are its immobility and tangibility.

Real Property - A term which embraces the tangible or physical elements of real estate, the physical land and appurtenances affixed thereto, and the intangible characteristics, the bundle of rights with which ownership of real estate is endowed.

Reassessment - The process which employs the mass appraisal or revaluation of all properties contained within a given jurisdiction for the purpose of establishing a new and equitable tax base.

Recapture Rate - A component of the capitalization rate which provides for a return of the original capital investment in a wasting asset. The rate is equal to the annual amount of dollars to be returned to the investor over the life of the property divided by the amount of the original investment.

Rectified Photography - Aerial photography developed through a process so as to remove distortion or displacement due to the tilt of the aircraft when the picture was originally taken. The process involves the use of predetermined, identifiable and measurable ground control monuments. A certain amount of distortion will still exist as the photographic image is removed from these ground control points.

Remaining Economic Life - As of the date of the appraisal, it is the number of years that represents the economic usability left in the improvements, or components thereof. At the end of the remaining economic life, the improvements will not contribute to the value of the property.

Replacement Cost New - The cost new which represents replacement of the existing improvement with one having the same utility using current construction materials, design and workmanship. The use of replacement cost is presumed to eliminate or partially eliminate deficiencies or superadeguacies of an existing improvement.

Reproduction Cost New - The expenditure that reflects the cost new of duplicating an exact replica of the existing improvement using the same materials, design and quality of workmanship. Reproduction Cost New incorporates the inclusion of any functional obsolescence currently existing in the improvement.

Reserve for Replacement - An annualized expense allowance that provides for the eventual replacement of short-lived items of equipment and building components that wear out more rapidly and will require replacement before the end of the economic life of the building is reached.

Residential Property - All real property improved by a structure which is used or intended to be used for residential living by human occupants and which contains not more than four dwelling units or which contains single dwelling units owned as a condominium or in a cooperative housing association. The term "cooperative housing association" means an association organized for the purpose of owning and operating residential real property in Missouri, the shareholders or members of which are entitled to occupy a dwelling unit pursuant to the terms of proprietary lease or occupancy agreement. It also refers to vacant land whose highest and best use is for residential occupancy

Revaluation Program - SEE Equalization Program.

Sales/Appraisal Ratio Study - A statistical study concerned with the measurement of assessment accuracy. Assessment accuracy is concerned with the measurement of the assessment level and the uniformity of assessments. Statistical inferences are made regarding an entire population through analysis of a distribution of sales-assessment ratios of a sample population selected from the total population or universe of parcels for which the analysis is being conducted.

Sales-Assessment Ratio - A mathematical measure that expresses the relationship of the assessed valuation of a property to its total value as represented by a sales price or appraised value.

Sample - In statistics, a randomly selected portion of the entire population that is representative of that universe and will be the basis upon which statistical inferences will be made concerning the population from which it was abstracted.

Sample Size - This represents the actual number of individual observations that are analyzed. The size of a sample is based upon three major factors, of which the size of the population is not one. The factors are: (1) the degree of confidence" selected or desired; (2) the maximum allowable error considered acceptable; and (3) an estimate of the population's standard deviation. If the population's standard deviation is unknown, the standard deviation of a "sample" may be used as a representative of the population's standard deviation.

Soil Classification System - A system in which land is rated or graded according to its ability to produce. It considers not only the physical factors of soil but the availability of water, effects of climate and erosion, and soil management and conservation practices. There are eight descriptive land grades used for categorizing agricultural or horticultural land in Missouri.

Soil Productivity - This is the capacity of a soil to produce a crop in its present environment considering a typical management system.

Standard Deviation - An absolute measure of variability for describing the distribution or dispersion of individual observations in relation to the measure of central tendency represented by the mean. It is a measure of variability that is used as a common denominator to compare the representativeness of the means of two comparable populations and the distribution of the individual samples to which it belongs.

Standard Error of Mean Ratio - It is representative of the standard deviation of the population. If all possible samples of a certain size are drawn from the population, the mean of all the sample means would equal the population mean. The standard error of the mean would be the standard deviation of the individual sample means from the population mean.

Stratified Sample - A sample in which the population is divided up into subgroups or strata and the number of items in each stratum of the sample population will be in the same proportion as found in each of the population strata.

Sublease - An agreement, usually in writing, which sublets to a third party the rights of use and occupancy, or a portion thereof, that are currently subject to the terms of an existing primary lease. Under the terms of this secondary agreement, the lessee of the primary lease now becomes the lessor.

Substitution, Principle of - It affirms that value tends to be set by the cost of acquiring a substitute property that is equally desirable and provides similar utility. The principle assumes that there will be no costly delay in acquiring the substitute property, the property is available on the open market, and the actions would be those of a knowledgeable and prudent purchaser. This principle serves as a basis for all three approaches to value.

Supply and Demand, Principle of - It affirms, that as of a specific date, the interacting forces of supply and demand within a particular market have an effect on value. An increase in supply associated with a decrease in demand will decrease the price; while adversely, a decrease in supply and an increase in demand will cause an increase in price.

Surplus Productivity, Principle of - It states that the agents in production must be satisfied in the following order: (1) labor or wages, (2) management or coordination, (3) capital or improvements, and (4) land. This principle holds that any net income remaining after the cost of the first three agents of

production are paid is considered surplus productivity and is attributable to the land. Therefore, the value of the land tends to be established by the costs for these production agents.

Tax Base - This refers to the value unit upon which the amount of tax dollars is determined. In property taxation, it refers to the total amount of assessed valuation which may represent the total market value or fractional part thereof of all property in a jurisdiction.

Tax Map - A map that provides a graphic inventory of real property parcels and shows the individual property ownership boundaries in true relative size, shape and location for each with respect to all other parcels. The map also provides for the identification of each parcel with a unique numeric description.

Topographic Map - A map that charts the contours or surface gradations of the earth by showing the horizontal and vertical positions of the physical and cultural features of the earth's surface.

Township - Within the Rectangular Survey System, it is the basic unit of land description that is formed by the crossing of parallel township lines and range lines at approximately six mile intervals thereby forming an area that contains thirty-six square miles. A township is subdivided into thirty-six sections that are approximately one mile square and contain 640 acres each, more or less.

Uniformity of Assessments - An expression which implies that all the assessments on properties within a taxing jurisdiction have a common relationship to market value. When all assessments are at a uniform or common level, the tax burden is considered to be equally distributed.

Unit-in-Place Method - A method of cost estimating in which the costs of individual structural components (foundations, walls, roof, etc.) are specified in appropriate unit measurements (area, volume, length), multiplied by the estimated quantity of structural components contained within a particular structure, and summed to obtain an estimate of the cost of the entire structure.

Unit Value Method - It is an appraisal technique that produces a valuation of a whole property without geographical or functional division of the whole. This technique is most applicable in the valuation of public utility and railroad properties in which the operating property of the business enterprise in its entirety is valued as a unit. After the unit value is determined, each taxing jurisdiction is apportioned or allocated the portion of the unit value applicable to the amount of distributable property contained therein. The apportionment is made on a standard unit of measurement, such as mile of line (electric/telephone companies) or mile of track (railroads).

Universe - A statistical term that refers to the total population or entire group of relevant data upon which a statistical inference is being made based upon a sampled portion thereof.

Utility, Industrial, Commercial and Railroad Property - All real property of every kind used directly or indirectly, or held for use, for any commercial, mining, industrial, manufacturing, trade, professional, business, or similar purpose, including all property centrally assessed by the State Tax Commission. Except as may be determined pursuant to Subsection 2, 3 or 4 of Section 137.016(3) RSMo, all other real property not included in the property listed in subclasses (1) and (2) of Section 4(b) of Article X of the Missouri Constitution, as such property is defined in this section, shall also be deemed to be included in the term "utility, industrial, commercial and railroad property".

Value - It is an expression of the relationship between a thing desired and a potential purchaser. This relationship is expressed in terms of money and is reflective of the worth of an item in exchange. In the appraisal of real estate, it can be described as the present worth of future benefits to be derived from ownership.

Value in Exchange - The worth of property that reflects the actions of typical buyers and sellers in the marketplace, when all the conditions of market value are met. This value is synonymous with Market Value.

Value in Use - The worth of a property that is of a highly special design or use and is of a type that is not commonly bought or sold in the market because of its limited utility. The property is useful to its present owner and is usually designed for a particular use.

Warranty Deed - A legal instrument which conveys to the grantee the title to property wherein the grantor warrants that this title is free and clear of all encumbrances, except any that have been specifically set forth in the deed itself.

Wasting Asset - A property or resource whose value diminishes with the passage of time. Such assets include buildings, mineral deposits, etc.

Weighted Ratio - SEE Aggregate Ratio.

CABLE TELEVISION SYSTEM

GLOSSARY OF TERMS

Access Channels - Channels that are set aside for programming by groups or individuals from the community.

Addressable programming - Programming that is directed to specific television sets. This enables only certain TV sets to receive the programming.

Amplifier - An electronic device, mounted at prescribed distances along the cable that intensifies the signal (i.e. trunk amplifiers, line extender amplifiers).

Antenna - A metallic apparatus used for sending or receiving electromagnetic waves such as TV signals.

Basic Rate – The monthly fee that the subscriber pays for basic reception provided by a CATV system.

Cable - The medium used to carry signals to subscribers' homes; it consists of trunk cable and feeder cable.

Cable Operator - Any person (s) who owns or operates a cable system, and is responsible for its management and operation.

CATV - Community antenna television (cable TV). A system that is comprised of antennas, coaxial cable and various electronic equipment used to receive and distribute radio and/or television signals to subscribers for a fee.

Cable casting - All television programming that originates on a cable system.

Channel Capacity - The number of TV signals that a cable system is capable of receiving and distributing to subscribers.

Channel Utilization - The actual number of channels in use on the system.

Coaxial Cable - A copper wire covered with an insulator which is wrapped in aluminum and covered by a plastic coating, and is used by cable systems to transmit signals.

Connect Drops (also called Subscriber Drops) - The segment of the distribution system that connects the subscriber's home to the feeder line by means of a tap.

Converter - An electronic device that acts as a tuner, and receives additional channels that the set is not designed to receive. Converters can be addressable or nonaddressable {See addressable programming}.

Distribution System - The part of the CATV system used to carry signals from the Headend to the subscriber. It includes amplifiers, trunk and feeder cable, subscriber taps, connect drops and assorted equipment.

Dual System - A system that utilizes two cables to increase the channel capacity of a CATV system.

Earth Station - A facility that uses antennas and equipment to transmit, receive and process communications beamed via satellite.

Franchise - A license that is awarded to the cable TV company, by a locality, which governs the construction and operation of the system.

Franchise Fee - An amount paid to a municipality, usually from three (3) to five (5) percent of gross revenues. Such fees are for the right to operate the CATV system in a given locality.

Headend - The portion of a CATV system that includes the antenna (s) and a building housing electronic equipment. Five functions are performed at this site: (1) reception of the incoming signals; (2) pre-selection of the desired channels; (3) conversion of signals to proper channels; (4) process and amplify signal for sound and picture quality; and (5) combine all signals from each channel for distribution to subscribers.

House Drop - (See Connect Drop)

Line Extender Amplifiers - (See Amplifier)

Microwave Antennas - A Parabolic dish that acts as a collector which reflects the broadcast signal to a horn located at the center of the dish. The system can broadcast point to point transmission signals which can be located up to thirty (30) miles apart.

Modulator - An electronic device used to adjust the strength and quality of the signals.

Multi System Operator -MSO - A company or person that owns or operates more than one cable system.

Origination Equipment - The cameras, lights, video recorders, projectors, and other equipment that a cable system uses to telecast local programming, such as time-weather, news and local events.

Pay-Per-View - The ability to purchase cable programs on one or more channels on an individual basis. Subscribers are charged for a specific program that is viewed.

Pay TV - Special TV programming such as H.B.O. that has no commercials and is received and charged in addition to the regular subscriber fee.

Pole Rental - A fee paid to the utility company for the right to use the poles.

Premium Channel - (See Pay TV)

Public Access - The channel space available to individuals or community groups that wish to develop programming of their own, usually specified by the franchise agreement.

Satellite - A machine in orbit above an area on earth, used for relaying TV signals back to earth. Earth station antennas receive the satellite relayed TV signals.

Saturation Ratio - The percentage of cable subscribers to the total possible subscribers. Also called density factor.

Service and Test Equipment - A group of machines, including but not limited to oscilloscopes, field strength meters, spectrum analyzers and cable testing equipment.

Subscriber Drops - (See Connect Drops)

Superstation - An independent broadcast station whose signal is beamed to a satellite and then relayed to cable TV systems who receive the signal.

Tap - The device used to tap a signal off the feeder cable and send signals to the subscriber's home via flexible coaxial cable.

Tower - The structure that supports antennas, ranging in height up to 400 feet. The tower can be self-supporting or guyed, depending on factors such as wind and antenna characteristics.

Trap - A device that is connected at the tap to prevent reception of pay TV (Negative trap). A positive trap performs the opposite function and is designed to allow reception of specific pay TV channels.

Trunk Line -The cable running from the Headend to the feeder line.

Two-Way Cable -A cable that has the ability to carry signals in two directions; from the Headend to subscribers, as well as from subscribers back to the Headend.

AGRICULTURAL/ HORTICULTURAL LAND

GLOSSARY OF TERMS &

AFFECTS ON SOIL CAPABILITIES WHERE APPLICABLE

Accretion Land - The increasing of dryland by the gradual depositing of water borne solid materials. It is the opposite of erosion.

Aeration - The exchange of air in soil with air from the atmosphere.

Affect: Poorly aerated soils are more compressed or compacted and contains less oxygen which is essential to plant growth. Excess water (water logging) or compaction of soil from heavy farm equipment compresses the soil and reduces the ability to acquire and store oxygen. Productive capability of poorly aerated soils is severely restricted.

Alkali Soil - A soil that has such high degree of alkalinity or high percentage exchangeable sodium that the growth of most crops is reduced.

Alluvial Soil - A soil formed from materials transported and deposited by flowing water.

Alluvium - Soil material such as silt, sand and clay that is carried by water and deposited on the land.

Available Water Capacity/Available Moisture Capacity - The capacity of soils to hold water available for use by most plants.

Affect: Simply put, this is the available water storage capacity of the soil. Soils with a limited ability to retain moisture in the plant rooting zone (upper 60 inches of soil) such as sandy, rocky or shallow soil severely limits production capability and is often referred to as a "doughty" soil. The condition is especially damaging during the dry hot months of late summer, causing plants to wilt and produce limited crop yields.

Basic Crops - Crops such as corn, wheat, and sorghum that are most important in the agricultural economy.

Chart – A very hard flint like type rock with sharp angular edges. Has splintery characteristics and resists decomposition. Chart normally ranges in size from golf ball size to the size of a double fist.

Affect: Provides no natural nutrients for plant growth, limits moisture retention and hampers seed bed preparation. In many cases chart is not visible on the surface, especially in hay and grasslands, but is immediately below the surface in the topsoil and becomes obvious when the soil is worked. A heavy concentration of chart in the footing zone of the subsoil will also affect production capabilities.

Clay – Commonly the finest or smallest particles of soil. Wet clay is sticky or gummy. Sometimes referred to as heavy soils or gumbo. Clay soils take water slowly and are slowly or very slowly permeable. See soil textures for clay size.

Clayey – Soils that are high in clay content. It includes the textures of clay, silty clay and sandy clay.

Claypan - A slowly permeable soil horizon that contains much more clay than the horizons above it. It is commonly very hard when dry and plastic or stiff when wet.

Affect: Claypan creates a parched water table or ponding problem in poorly drained or depressed areas and limits or restricts root penetration for deep rooting crops adversely affecting crop yields.

Compaction/Compression - An excessive decrease in volume of soil under load.

Affect: Results in decreased aeration and a reduced supply of oxygen. Lowers moisture retention capability and inhibits root development.

Consistency - The feel of the soil and the ease with which a lump of dirt can be crushed by the fingers. Terms commonly used to describe consistency are loose, friable, firm, plastic, sticky, hard, soft and cemented.

Affect: A soft, friable soil provides for greater water permeability, better root system development and normally indicates a higher organic matter content. A plastic, hard or cemented consistency that inhibits moisture penetration, restricts root system development, provides poor aeration and contains low organic matter content.

Cropland - That part of the farm acreage normally used for the production of crops or rotation pasture.

Crop Mix - Crop mix refers to the ratio of the different kinds of crops on the land on a farm or in a certain area. This ratio can be expressed in acres, percent or years.

Crop Rotation - The growing of different crops in recurring succession on the same land.

Depth (Soil) - Refers to root zone or rooting depth - not just top soil. The depth of soil, expressed in inches, that is capable of providing moisture, plant nutrients and root development for crops. It is normally divided into three classes: (1) Deep - more than 40 inches; (2) Moderately Deep - 20 to 40 inches; and (3) Shallow - 0 to 20 inches.

Affect: Deeper soils provide a much higher available moisture capacity, access to more of the natural soil nutrients and a capability to withstand longer periods of dry weather resulting in better productive capability.

Drainage (Natural) - Natural drainage refers to the frequency and duration of periods of saturation. Seven classes of drainage recognized: (1) excessively drained; (2) somewhat excessively; (3) well drained; (4) moderately well drained; (5) somewhat poorly drained; (6) poorly drained; and (7) very poorly drained.

Affect: Soils that are either excessively drained or somewhat excessively drained are normally either steep, sandy or shallow; and they have insufficient available water capacity to readily adapt to row crops. Poorly drained and very poorly drained soils remain wet for extended periods, limit seeding opportunities and inhibit aeration. Poor drainage also contributes to leaching of soil nutrients and compaction problems. Poor drainage is normally found in level or depressed areas or where seepage occurs. It may indicate a claypan subsoil. Artificial drainage may correct these drainage problems.

Draughty - These are soils that have an insufficient capacity for moisture retention or absorption deficiencies that cause the depletion of moisture retention necessary for plant growth during periods of limited rainfall. Factors contributing to draughty soils are slope (rapid runoff that limits moisture absorption), sandy soil (limited moisture retention), shallow soil depth, chert, rock, etc.

Affect: Crop selection and production is severely limited due to draughty soils. Insufficient moisture retention (draughtiness) restricts plant development and reduces crop yields. During the hot weather season, row crops wilt and become dormant and grasses and legumes turn brown and lose nutritional values. A draughty soil is poorly adapted to vegetation growth.

Dryland Farming - The practice of crop production in areas without irrigation.

Erosion - The wearing away of the land surface by wind, water or ice (primarily water and wind in our area). There are two types of erosion:

- Sheet erosion - the removal of a fairly uniform layer of soil from the land surface by runoff water or by wind.
- Gully erosion - occurs when water accumulated in narrow channels removes the soil from this area to a considerable depth (from 1 to 2 feet to a depth of several feet). Some conditions that contribute to erosion are slope, soil texture, flooding, etc.

Affect: Erosion, either past or potential, is extremely important since loss of topsoil normally means that the most fertile soil has been removed thereby taking away the natural and valuable plant nutrients – minerals and organic matter. Equally important is the fact that the remaining exposed soil commonly has more clay. Severe erosion can also restrict the effective use of farm machinery.

Fallow - Allowing cropland to lie idle, either tilled or untilled, during the whole or greater portion of the growing season.

Farm Land - Land devoted to agricultural production, usually used to refer to the land comprising a farm. Such land includes both tillable and untiltable areas as well as any woodlot.

Fertility, Natural (Plant Nutrients) - The quality that enables a soil to provide plant nutrients, in adequate amounts and in proper balance, when light, moisture, temperature, tilth and other factors are favorable. Plant nutrients are mainly nitrogen, phosphorous potassium, calcium, magnesium, sulphur, iron, manganese, copper, boron and zinc obtained from the soil and oxygen, carbon and hydrogen obtained from the air and water. Natural fertility is normally described as low, medium or high.

Affect: Natural fertility not only reflects soil production capabilities prior to the use of soil amendments, but natural fertility is also important in indicating how effectively the soil responds to a reasonable and cost effective application of these fertilizers. In other words it just is not cost effective or profitable to apply 400 pounds of fertilizer per acre when you could not expect more than 50 bpa corn or 20 bpa beans or wheat.

Forest Land - Land which is wooded by nature or man and consisting of a dense growth of trees and underbrush.

Fragipan - A loamy, brittle subsoil horizon that is low in porosity, content of organic matter, and low or moderate in clay but high in silt or very fine sand. A fragipan appears cemented. When dry it is very hard and when moist it tends to rupture suddenly under pressure rather than deforming slowly. Coarse fragments may or may not be present in a fragipan.

Affect: Fragipan layers restrict movement of air and water in the soil. Root development is severely restricted and the high acid nature of a fragipan severely reduces plant growth.

Friable -A soil that is easily pulverized or crumbled.

Affect: A friable soil permits better moisture penetration, is more easily worked through a wider range of moisture content, provides better aeration and more readily releases plant nutrients.

Grazing Season -That portion of the year that livestock graze or are permitted to graze on a given range or pasture.

Hayland - Land used primarily for the production of hay from long-term stands of adapted forage plants.

Highest and Best Use - This is generally defined as that use which will generate the highest net return to the property over a period of time

Horticultural Land - Land which is used for the production of fruits, vegetables, flowers or ornamental plants.

Infiltration - The downward entry of water into the immediate surface of soil or other material, as contrasted with percolation, which is the movement of water through soil layers or materials.

Affect: Soils that have a rapid infiltration rate more readily absorb surface moisture thus reducing runoff and inhibiting erosion. It also provides a potential for increased available moisture capacity, depending on the subsoil characteristics.

Irrigable Lands – Lands having soil, topographic, drainage, and climatic conditions favorable for irrigation and located in a position where a water supply is or can be made available.

Irrigation - The artificial application of water to the soil for full crop production when the rainfall is not sufficient at the time of need or in arid regions.

Land Capability - The suitability of land for use without permanent damage.

Land Valuation Groups - Groups of soils that are similar in their productivity and their suitability for most kinds of farming. It is a practical classification based on the production and limitation of the soils; the risk of damage when they are used for the ordinary field crops, pastures, range and woodland; and the way they respond to treatment.

Land Classification - The arrangement of land units into categories based on the properties of the land or its suitability for some particular use.

Leaching - The removal of soluble material from the soil by percolating water.

Affect: Leaching rapidly depletes the natural chemical elements- (nitrogen, phosphorous, potassium, etc.) necessary for plant growth.

Loam - Soil that is seven to twenty-seven percent (7-27%) clay particles, twenty-eight to fifty percent (28-50%) silt particles and less than fifty-two percent (52%) sand particles.

Affect: That definition in itself does not tell much about production capability. A loam or silt loam texture has a more favorable mixture of silt, sand and clay. A moist loam has a smooth, velvety feel and will not slick out into a ribbon. From a crop production standpoint, loamy soils are more desirable than soils with a finer texture (clayey) or coarser texture (sandy). They are normally better aerated, have a higher natural fertility, better moisture availability and are more easily worked through a wider range of moisture.

Loamy - This refers to or includes a broad group or range of textures and includes silt loams, clay loams, sandy loams and loams. Generally, loamy soils range from moderately fine to medium to moderately coarse texture.

Loess - Areas of fine grained material, dominantly of silt sized particles, deposited by the wind.

Affect: Loess normally is considered a moderately fertile soil that consists of topsoil that has been blown from the surface of unprotected broad floodplain areas and deposited on higher lying areas. Natural fertility, soil texture and available water capacity normally result in a moderately productive soil.

Mass Appraisal - Mass appraisal of agricultural land refers to the process of valuing all the agricultural land at the same time in a uniform manner using a standard procedure and similar basic data.

Meadow - An area of natural or planted vegetation dominated by grasses and grass like plants used primarily for hay production.

Mellow Soil - A dirt that is a very friable, soft and porous soil, but is not hard or fine like clay systems.

Soil Survey Report - A written report with an accompanying map describing the area surveyed, the characteristics and capabilities for use of the soils, and the principal factors responsible for their formation.

Soil Texture - Refers to the relative proportion of sand, silt and clay particles in a mass of soil. Three principal sizes of particles are: (1) clay (less than .002 millimeters); (2) silt (0.002 to 0.05 millimeters) and (3) sand (0.05 to 2.0 millimeters). See "Clay", "Silt" and "Sand" for a general description of each.

Soluble - The ability of a soil to dissolve and release available nutrients from the soil for plant growth.

Swag - A depression in the earth surface. Sometimes causes a decrease in yields due to a standing water or a "ponding" problem in these areas.

Undulation - A series of wave type configurations in the surface of the soil. Sometimes causes wetness problems because of the inability of those areas to properly drain off excess water.

Wasteland - All areas that have insufficient value to be used economically due to inaccessibility, density of timber or sparseness of vegetative growth. Badlands, river wash, marshes and blowouts are examples.

Water Table - The upper surface of groundwater or that level below which the soil is saturated with water. The depth below the surface at which free water is found. Generally refers to the apparent water table, but can also be a perched or artesian condition.