2018
JEFFERSON COUNTY
PROPERTY ASSESSMENT
STUDY

WILDROSE
APPRAISAL, INCORPORATED
Audit Division

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APPRAISAL, INCORPORATED
Audit Division

September 15, 2018

Mr. Mike Mauer
Director of Research
Colorado Legislative Council
Room 029, State Capitol Building
Denver, Colorado 80203

RE: Final Report for the 2018 Colorado Property Assessment Study

Dear Mr. Mauer:

Wildrose Appraisal Inc.-Audit Division is pleased to submit the Final Reports for the 2018 Colorado Property Assessment Study.

These reports are the result of two analyses: A procedural audit and a statistical audit.

The procedural audit examines all classes of property. It specifically looks at how the assessor develops economic areas, confirms and qualifies sales, develops time adjustments and performs periodic physical property inspections. The audit reviews the procedures for determining subdivision absorption and subdivision discounting. Valuation methodology is examined for residential properties and commercial properties. Procedures are reviewed for producing mines, oil and gas leaseholds and lands producing, producing coal mines, producing earth and stone products, severed mineral interests, and non-producing patented mining claims.

Statistical audits are performed on vacant land, residential properties, commercial/industrial properties and agricultural land. A statistical analysis is performed for personal property compliance on the eleven largest counties: Adams, Arapahoe, Boulder, Denver, Douglas, El Paso, Jefferson, Larimer, Mesa, Pueblo and Weld. The remaining counties receive a personal property procedural study.

Wildrose Appraisal Inc. – Audit Division appreciates the opportunity to be of service to the State of Colorado. Please contact us with any questions or concerns.

Harry J. Fuller
Project Manager
Wildrose Appraisal Inc. – Audit Division

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INTRODUCTION

Colorado

The State Board of Equalization (SBOE) reviews assessments for conformance to the Constitution. The SBOE will order revaluations for counties whose valuations do not reflect the proper valuation period level of value.

The statutory basis for the audit is found in C.R.S. 39-1-104 (16)(a)(b) and (c).

The legislative council sets forth two criteria that are the focus of the audit group:

To determine whether each county assessor is applying correctly the constitutional and statutory provisions, compliance requirements of the State Board of Equalization, and the manuals published by the State Property Tax Administrator to arrive at the actual value of each class of property.

To determine if each assessor is applying correctly the provisions of law to the actual values when arriving at valuations for assessment of all locally valued properties subject to the property tax.

The property assessment audit conducts a two-part analysis: A procedural analysis and a statistical analysis.

The procedural analysis includes all classes of property and specifically looks at how the assessor develops economic areas, confirms and qualifies sales, and develops time adjustments. The audit also examines the procedures for adequately discovering, classifying and valuing agricultural outbuildings, discovering subdivision build-out and subdivision discounting procedures. Valuation methodology for vacant land, improved residential properties and commercial properties is examined. Procedures for producing mines, oil and gas leaseholds and lands producing, producing coal mines, producing earth and stone products, severed mineral interests and non-producing patented mining claims are also reviewed.

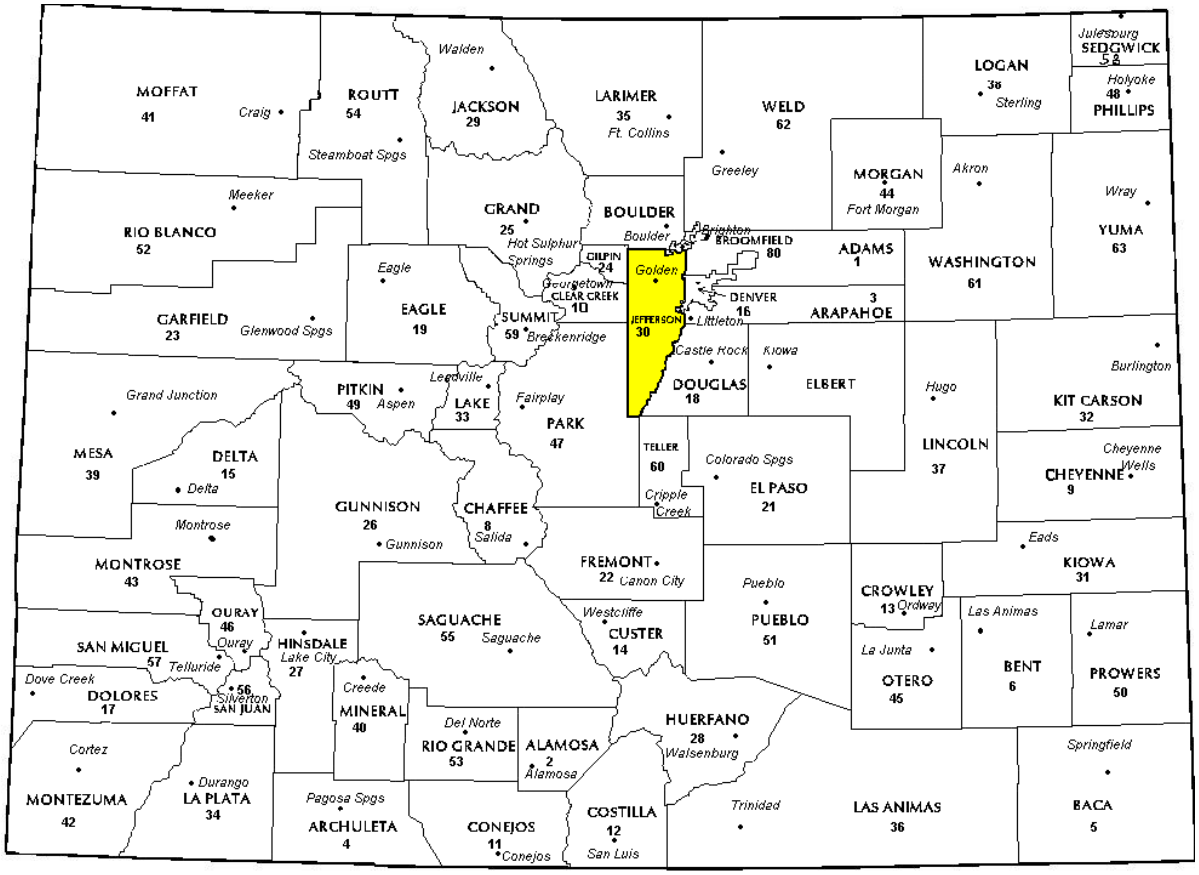
Statistical analysis is performed on vacant land, residential properties, commercial/industrial properties, agricultural land, and personal property. The statistical study results are compared with State Board of Equalization compliance requirements and the manuals published by the State Property Tax Administrator.

Wildrose Audit has completed the Property Assessment Study for 2018 and is pleased to report its findings for Jefferson County in the following report.

REGIONAL/HISTORICAL SKETCH OF JEFFERSON COUNTY

Regional Information

Jefferson County is located in the Front Range region of Colorado. The Colorado Front Range is a colloquial geographic term for the populated areas of the State that are just east of the foothills of the Front Range. It includes Adams, Arapahoe, Boulder, Broomfield, Denver, Douglas, El Paso, Jefferson, Larimer, Pueblo, and Weld counties.



Historical Information

Jefferson County had an estimated population of approximately 571,837 people with 748.48 people per square mile, according to the U.S. Census Bureau's 2016 estimated census data. This represents a 6.98 percent change from April 1, 2010 to July 1, 2016.

Jefferson County is one of the seventeen original territorial counties. On August 25, 1855, the Kansas Territorial Legislature created Arapahoe County to govern the entire western portion of the territory. The county was named for the Arapaho Nation of Native Americans that lived in the region.

In July 1858, gold was discovered along the South Platte River in Arapahoe County (in present day Englewood). This discovery precipitated the Pike's Peak Gold Rush. Many residents of the mining region felt disconnected from the remote territorial governments of Kansas and Nebraska, so they voted to form their own Territory of Jefferson on October 24, 1959. The following month, the Jefferson Territorial Legislature organized 12 counties for the new territory, including Jefferson County. Jefferson County was named for the namesake of the Jefferson Territory, Thomas Jefferson, the principal author of the Declaration of Independence and the nation's third president. Golden City served as the county seat of Jefferson County. Robert Williamson Steele, Governor of the Provisional Government of the Territory of Jefferson from 1859 to 1861, built his home in the county at Mount Vernon and later at Apex.

The Jefferson Territory never received federal sanction, but during his last week in office, President James Buchanan signed an act which organized the Territory of Colorado on February 28, 1861. That November 1, the new Colorado General Assembly organized the 17 original counties of Colorado, including a new Jefferson County. In 1908, the southern tip of Jefferson County was transferred to Park County, reducing Jefferson County to its present length of 54 miles. Several annexations by the City & County of Denver and the 2001 consolidation of the City & County of Broomfield removed eastern portions of the county.

A major employer in Jefferson County is the large Coors Brewing Company in Golden. Also, the state-supported Colorado School of Mines is located in Jefferson County, offering programs in mining and engineering. The county seat is Golden and the most populous city is Lakewood.
(www.wikipedia.org)

RATIO ANALYSIS

Methodology

All significant classes of properties were analyzed. Sales were collected for each property class over the appropriate sale period, which was typically defined as the 18-month period between January 1, 2015 and June 30, 2016. Counties with less than 30 sales typically extended the sale period back up to 5 years prior to June 30, 2016 in 6-month increments. If there were still fewer than 30 sales, supplemental appraisals were performed and treated as proxy sales. Residential sales for all counties using this method totaled at least 30 per county. For commercial sales, the total number analyzed was allowed, in some cases, to fall below 30. There were no sale quantity issues for counties requiring vacant land analysis or condominium analysis. Although it was required that we examine the median and coefficient of dispersion for all counties, we also calculated the weighted mean and price-related differential for each class of property. Counties were not passed or failed by these latter measures, but were counseled if there were anomalies noted during our analysis. Qualified sales were based on the qualification code used by each county, which were typically coded as either "Q" or "C." The ratio analysis included all sales. The data was trimmed for counties with obvious outliers using IAAO standards for data analysis. In every case, we examined the loss in data from trimming to ensure that only true outliers were excluded. Any county with a significant portion of sales excluded by this trimming method was examined further. No county was allowed to pass the audit if more than 5% of the sales were "lost" because of trimming. For the largest 11 counties, the residential ratio statistics were broken down by economic area as well.

Conclusions

For this final analysis report, the minimum acceptable statistical standards allowed by the State Board of Equalization are:

ALLOWABLE STANDARDS RATIO GRID		
Property Class	**Unweighted Median Ratio**	**Coefficient of Dispersion**
Commercial/Industrial	Between .95-1.05	Less than 20.99
Condominium	Between .95-1.05	Less than 15.99
Single Family	Between .95-1.05	Less than 15.99
Vacant Land	Between .95-1.05	Less than 20.99

The results for Jefferson County are:

Jefferson County Ratio Grid					
Property Class	Number of Qualified Sales	Unweighted Median Ratio	Price Related Differential	Coefficient of Dispersion	Time Trend Analysis
Commercial/Industrial	428	0.984	1.127	13.3	Compliant
Condominium	N/A	N/A	N/A	N/A	N/A
Single Family	23,027	0.985	1.012	8.6	Compliant
Vacant Land	452	0.973	1.055	19.3	Compliant

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion
1	.976	1.008	.077
2	1.000	1.018	.096
3	.985	1.012	.087
4	.981	1.010	.072
5	.977	1.013	.078
6	.986	1.008	.109
7	.992	1.026	.112
8	.988	1.013	.101
9	.986	1.013	.100
11	1.019	.997	.027
12	.997	1.123	.053
20	1.089	1.118	.341
22	1.012	1.012	.040
23	.993	.979	.071
26	1.022	.991	.027
33	1.031	1.037	.036
44	1.001	.955	.126
58	1.098	1.056	.086
99	.982	1.017	.090
Overall	.985	1.012	.086

After applying the above described methodologies, it is concluded from the sales ratios that Jefferson County is in compliance with SBOE, DPT, and Colorado State Statute valuation guidelines.

Recommendations

None

TIME TRENDING VERIFICATION

Methodology

While we recommend that counties use the inverted ratio regression analysis method to account for market (time) trending, some counties have used other IAAO-approved methods, such as the weighted monthly median approach. We are not auditing the methods used, but rather the results of the methods used. Given this range of methodologies used to account for market trending, we concluded that the best validation method was to examine the sale ratios for each class across the appropriate sale period. To be specific, if a county has considered and adjusted correctly for market trending, then the sale ratios should remain stable (i.e. flat) across the sale period. If a residual market trend is detected, then the county may or may not have addressed market trending adequately, and a further examination is warranted. This validation method also considers the number of sales and the length of the sale period. Counties with few sales across the sale period were carefully examined to determine if the statistical results were valid.

Conclusions

After verification and analysis, it has been determined that Jefferson County has complied with the statutory requirements to analyze the effects of time on value in their county. Jefferson County has also satisfactorily applied the results of their time trending analysis to arrive at the time adjusted sales price (TASP).

Recommendations

None

SOLD/UNSOLD ANALYSIS

Methodology

Jefferson County was tested for the equal treatment of sold and unsold properties to ensure that "sales chasing" has not occurred. The auditors employed a multi-step process to determine if sold and unsold properties were valued in a consistent manner.

We test the hypothesis that the assessor has valued unsold properties consistent with what is observed with the sold properties based on several units of comparison and tests. The units of comparison include the actual value per square foot and the change in value from the previous base year period to the current base year. The first test compares the actual value per square foot between sold and unsold properties by class. The median and mean value per square foot is compared and tested for any significant difference. This is tested using non-parametric methods, such as the Mann-Whitney test for differences in the distributions or medians between sold and unsold groups. It is also examined graphically and from an appraisal perspective. Data can be stratified based on location and subclass. The second test compares the difference in the median change in value from the previous base year to the current base year between sold and unsold properties by class. The same combination of non-parametric and appraisal testing is used as with the first test. A third test employing a valuation model testing a sold/unsold binary variable while controlling for property attributes such as location, size, age and other attributes. The model determines if the sold/unsold variable is statistically and empirically significant. If all three tests indicate a significant difference between sold and unsold properties for a given class, the Auditor may meet with the county to determine if sale chasing is actually occurring, or if there are other explanations for the observed difference.

If the unsold properties have a higher median value per square foot than the sold properties, or if the median change in value is greater for the unsold properties than the sold properties, the analysis is stopped and the county is concluded to be in compliance with sold and unsold guidelines. All sold and unsold properties in a given class are first tested, although properties with extreme unit values or percent changes can be trimmed to stabilize the analysis. The median is the primary comparison metric, although the mean can also be used as a comparison metric if the distribution supports that type of measure of central tendency.

The first test (unit value method) is applied to both residential and commercial/industrial sold and unsold properties. The second test is applied to sold and unsold vacant land properties. The second test (change in value method) is also applied to residential or commercial sold and unsold properties if the first test results in a significant difference observed and/or tested between sold and unsold properties. The third test (valuation modeling) is used in instances where the results from the first two tests indicate a significant difference between sold and unsold properties. It can also be used when the number of sold and unsold properties is so large that the non-parametric testing is indicating a false rejection of the hypothesis that there is no difference between the sold and unsold property values.

These tests were supported by both tabular and graphics presentations, along with written documentation explaining the methodology used.

Sold/Unsold Results	
Property Class	**Results**
Commercial/Industrial	Compliant
Condominium	N/A
Single Family	Compliant
Vacant Land	Compliant

Conclusions

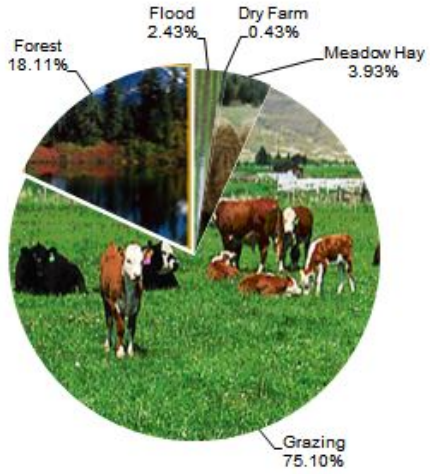
After applying the above described methodologies, it is concluded that Jefferson County is reasonably treating its sold and unsold properties in the same manner.

Recommendations

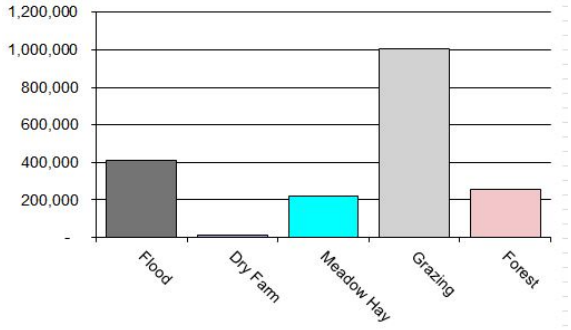
None

AGRICULTURAL LAND STUDY

Acres By Subclass



Value By Subclass



Agricultural Land

County records were reviewed to determine major land categories such as irrigated farm, dry farm, meadow hay, grazing and other lands. In addition, county records were reviewed in order to determine if: Aerial photographs are available and are being used; soil conservation guidelines have been used to classify lands based on productivity; crop rotations have been documented; typical commodities and yields have been determined; orchard lands have been properly classified and valued; expenses reflect a ten year average and are typical landlord expenses; grazing lands have been properly classified and valued; the number of acres in each class and subclass have been determined; the capitalization rate was properly applied. Also, documentation was required for the valuation methods used and any locally developed yields, carrying capacities, and expenses. Records were also checked to ensure that the commodity prices and expenses, furnished by the Property Tax Administrator (PTA), were applied properly. (See Assessor Reference Library Volume 3 Chapter 5.)

Conclusions

An analysis of the agricultural land data indicates an acceptable appraisal of this property type. Directives, commodity prices and expenses provided by the PTA were properly applied. County yields compared favorably to those published by Colorado Agricultural Statistics. Expenses used by the county were allowable expenses and were in an acceptable range. Grazing lands carrying capacities were in an acceptable range. The data analyzed resulted in the following ratios:

Jefferson County Agricultural Land Ratio Grid						
Abstract Code	Land Class	Number Of Acres	County Value Per Acre	County Assessed Total Value	WRA Total Value	Ratio
4117	Flood	1,797	227.07	408,072	409,494	1.00
4127	Dry Farm	318	37.99	12,094	11,962	1.01
4137	Meadow Hay	2,904	76.81	223,017	223,017	1.00
4147	Grazing	55,522	18.09	1,004,182	1,004,182	1.00
4177	Forest	13,389	19.14	256,267	256,086	1.00
Total/Avg		**73,930**	**25.75**	**1,903,631**	**1,904,741**	**1.00**

Recommendations

None

Agricultural Outbuildings

Methodology

Data was collected and reviewed to determine if the guidelines found in the Assessor's Reference Library (ARL) Volume 3, pages 5.74 through 5.77 were being followed.

Conclusions

Jefferson County has substantially complied with the procedures provided by the Division of Property Taxation for the valuation of agricultural outbuildings.

Recommendations

None

Agricultural Land Under Improvements

Methodology

Data was collected and reviewed to determine if the guidelines found in the Assessor's Reference Library (ARL) Volume 3, pages 5.19 and 5.20 were being followed.

Conclusions

Jefferson County has used the following methods to discover land under a residential improvement on a farm or ranch that is determined to be not integral under 39-1-102, C.R.S.:

- Field Inspections
- Phone Interviews
- In-Person Interviews with Owners/Tenants
- Written Correspondence other than Questionnaire
- Personal Knowledge of Occupants at Assessment Date
- Aerial Photography/Pictometry

Jefferson County has used the following methods to discover the land area under a residential improvement that is determined to be not integral under 39-1-102, C.R.S.:

- Property Record Card Analysis
- Field Inspections
- Phone Interviews
- In-Person Interviews with Owners/Tenants
- Written Correspondence other than Questionnaire
- Aerial Photography/Pictometry

Jefferson County has substantially complied with the procedures provided by the Division of Property Taxation for the valuation of land under residential improvements that may or may not be integral to an agricultural operation.

Recommendations

None

SALES VERIFICATION

According to Colorado Revised Statutes:

A representative body of sales is required when considering the market approach to appraisal.

(8) In any case in which sales prices of comparable properties within any class or subclass are utilized when considering the market approach to appraisal in the determination of actual value of any taxable property, the following limitations and conditions shall apply:

(a)(I) Use of the market approach shall require a representative body of sales, including sales by a lender or government, sufficient to set a pattern, and appraisals shall reflect due consideration of the degree of comparability of sales, including the extent of similarities and dissimilarities among properties that are compared for assessment purposes. In order to obtain a reasonable sample and to reduce sudden price changes or fluctuations, all sales shall be included in the sample that reasonably reflect a true or typical sales price during the period specified in section 39-1-104 (10.2). Sales of personal property exempt pursuant to the provisions of sections 39-3-102, 39-3-103, and 39-3-119 to 39-3-122 shall not be included in any such sample.

(b) Each such sale included in the sample shall be coded to indicate a typical, negotiated sale, as screened and verified by the assessor. (39-1-103, C.R.S.)

The assessor is required to use sales of real property only in the valuation process.

(8)(f) Such true and typical sales shall include only those sales which have been determined on an individual basis to reflect the selling price of the real property only or which have been adjusted on an individual basis to reflect the selling price of the real property only. (39-1-103, C.R.S.)

Part of the Property Assessment Study is the sales verification analysis. WRA has used the above-cited statutes as a guide in our study of the county's procedures and practices for verifying sales.

WRA reviewed the sales verification procedures in 2018 for Jefferson County. This study was conducted by checking selected sales from the master sales list for the current valuation period. Specifically WRA selected 60 sales listed as unqualified.

All but two of the sales selected in the sample gave reasons that were clear and supportable. Two sales had insufficient reason for disqualification.

For residential, commercial, and vacant land sales with considerations over $500, the contractor has examined and reported the ratio of qualified sales to total sales by class and performed the following analyses of unqualified sales:

> The contractor has examined the manner in which sales have been classified as qualified or unqualified, including a listing of each step in the sales verification process, any adjustment procedures, and the county official responsible for making the final decision on qualification.
>
> The contractor has reviewed with the assessor any analysis indicating that sales data are inadequate, fail to reflect typical properties, or have been disqualified for insufficient cause. In addition, the contractor has reviewed the disqualified sales by assigned code.

If there appears to be any inconsistency in the coding, the contractor has conducted further analysis to determine if the sales included in that code have been assigned appropriately.

Conclusions

Jefferson County appears to be doing a good job of verifying their sales.

Recommendations

None

ECONOMIC AREA REVIEW AND EVALUATION

Methodology

Jefferson County has submitted a written narrative describing the economic areas that make up the county's market areas. Jefferson County has also submitted a map illustrating these areas. Each of these narratives have been read and analyzed for logic and appraisal sensibility. The maps were also compared to the narrative for consistency between the written description and the map.

Conclusions

After review and analysis, it has been determined that Jefferson County has adequately identified homogeneous economic areas comprised of smaller neighborhoods. Each economic area defined is equally subject to a set of economic forces that impact the value of the properties within that geographic area and this has been adequately addressed. Each economic area defined adequately delineates an area that will give "similar values for similar properties in similar areas."

Recommendations

None

NATURAL RESOURCES

Earth and Stone Products

Methodology

Under the guidelines of the Assessor's Reference Library (ARL), Volume 3, Natural Resource Valuation Procedures, the income approach was applied to determine value for production of earth and stone products. The number of tons was multiplied by an economic royalty rate determined by the Division of Property Taxation to determine income. The income was multiplied by a recommended Hoskold factor to determine the actual value. The Hoskold factor is determined by the life of the reserves or the lease. Value is based on two variables: life and tonnage. The operator determines these since there is no other means to obtain production data through any state or private agency.

Conclusions

The County has applied the correct formulas and state guidelines to earth and stone production.

Recommendations

None

VACANT LAND

Subdivision Discounting

Subdivisions were reviewed in 2018 in Jefferson County. The review showed that subdivisions were discounted pursuant to the Colorado Revised Statutes in Article 39-1-103 (14) and by applying the recommended methodology in ARL Vol 3, Chap 4. Subdivision Discounting in the intervening year can be accomplished by reducing the absorption period by one year.

Conclusions

Jefferson County has implemented proper procedures to adequately estimate absorption periods, discount rates, and lot values for qualifying subdivisions.

Recommendations

None

POSSESSORY INTEREST PROPERTIES

Possessory Interest

Possessory interest property discovery and valuation is described in the Assessor's Reference Library (ARL) Volume 3 section 7 in accordance with the requirements of Chapter 39-1-103 (17)(a) (II) C.R.S. Possessory Interest is defined by the Property Tax Administrator's Publication ARL Volume 3, Chapter 7: A private property interest in government-owned property or the right to the occupancy and use of any benefit in government-owned property that has been granted under lease, permit, license, concession, contract, or other agreement.

Jefferson County has been reviewed for their procedures and adherence to guidelines when assessing and valuing agricultural and commercial possessory interest properties. The county has also been queried as to their confidence that the possessory interest properties have been discovered and placed on the tax rolls.

Conclusions

Jefferson County has implemented a discovery process to place possessory interest properties on the roll. They have also correctly and consistently applied the correct procedures and valuation methods in the valuation of possessory interest properties.

Recommendations

None

PERSONAL PROPERTY AUDIT

Jefferson County was studied for its procedural compliance with the personal property assessment outlined in the Assessor's Reference Library (ARL) Volume 5, and in the State Board of Equalization (SBOE) requirements for the assessment of personal property. The SBOE requires that counties use ARL Volume 5, including current discovery, classification, documentation procedures, current economic lives table, cost factor tables, depreciation table, and level of value adjustment factor table.

The personal property audit standards narrative must be in place and current. A listing of businesses that have been audited by the assessor within the twelve-month period reflected in the plan is given to the auditor. The audited businesses must be in conformity with those described in the plan.

Aggregate ratio will be determined solely from the personal property accounts that have been physically inspected. The minimum assessment sample is one percent or ten schedules, whichever is greater, and the maximum assessment audit sample is 100 schedules.

For the counties having over 100,000 population, WRA selected a sample of all personal property schedules to determine whether the assessor is correctly applying the provisions of law and manuals of the Property Tax Administrator in arriving at the assessment levels of such property. This sample was selected from the personal property schedules audited by the assessor. In no event was the sample selected by the contractor less than 30 schedules. The counties to be included in this study are Adams, Arapahoe, Boulder, Denver, Douglas, El Paso, Jefferson, Larimer, Mesa, Pueblo, and Weld. All other counties received a procedural study.

Jefferson County is compliant with the guidelines set forth in ARL Volume 5 regarding discovery procedures, using the following methods to discover personal property accounts in the county:

- Public Record Documents
- Chamber of Commerce/Economic Development Contacts
- Local Telephone Directories, Newspapers or Other Local Publications
- Personal Observation, Physical Canvassing or Word of Mouth

The county uses the Division of Property Taxation (DPT) recommended classification and documentation procedures. The DPT's recommended cost factor tables, depreciation tables and level of value adjustment factor tables are also used.

Jefferson County submitted their personal property written audit plan and was current for the 2018 valuation period. The number and listing of businesses audited was also submitted and was in conformance with the written audit plan. The following audit triggers were used by the county to select accounts to be audited:

- Accounts with obvious discrepancies
- New businesses filing for the first time
- Incomplete or inconsistent declarations
- Accounts with omitted property
- Same business type or use
- Non-filing Accounts - Best Information Available
- Accounts protested with substantial disagreement

Jefferson County's median ratio is 1.00. This is in compliance with the State Board of Equalization (SBOE) compliance requirements which range from .90 to 1.10 with no COD requirements.

Conclusions

Jefferson County has employed adequate discovery, classification, documentation, valuation, and auditing procedures for their personal property assessment and is in statistical compliance with SBOE requirements.

Recommendations

None

WILDROSE AUDITOR STAFF

Harry J. Fuller, *Audit Project Manager*

Suzanne Howard, *Audit Administrative Manager*

Steve Kane, *Audit Statistician*

Carl W. Ross, *Agricultural/Natural Resource Analyst*

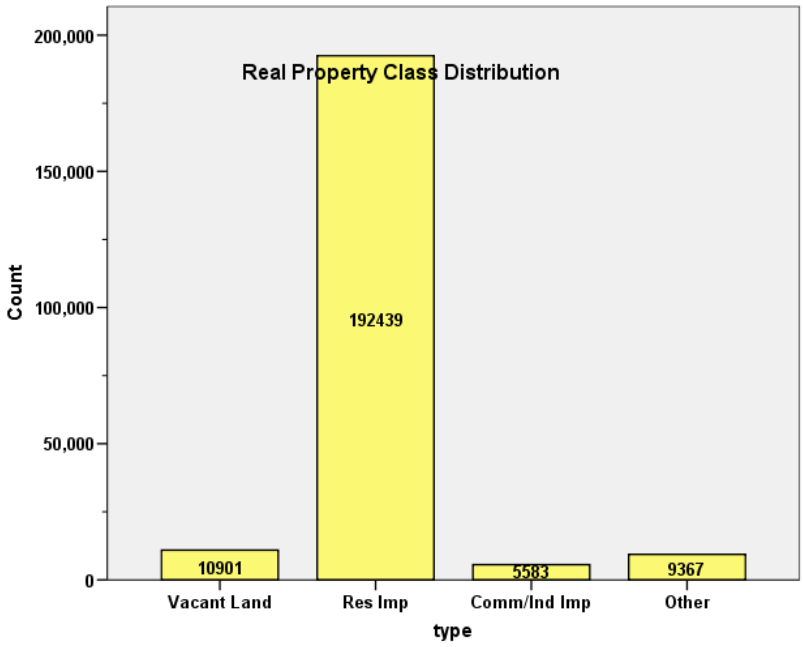
J. Andrew Rodriguez, *Field Analyst*

APPENDICES

STATISTICAL COMPLIANCE REPORT
FOR JEFFERSON COUNTY
2018

I. OVERVIEW

Jefferson County is an urban county located along Colorado's Front Range. The county has a total of 218,290 real property parcels, according to data submitted by the county assessor's office in 2018. The following provides a breakdown of property classes for this county:



The vacant land class of properties was dominated by residential land. Residential lots (coded 100 and 1112) accounted for 75.0% of all vacant land parcels.

For residential improved properties, single family properties accounted for 91.0% of all residential properties.

Commercial and industrial properties represented a much smaller proportion of property classes in comparison. Commercial/industrial properties accounted for 2.6% of all such properties in this county.

II. DATA FILES

The following sales analyses were based on the requirements of the 2018 Colorado Property Assessment Study. Information was provided by the Jefferson Assessor's Office in June 2018. The data included all 5 property record files as specified by the Auditor.

III. RESIDENTIAL SALES RESULTS

There were 23,027 qualified residential sales in the 24 month period ending June 30, 2016. The sales ratio analysis results were as follows:

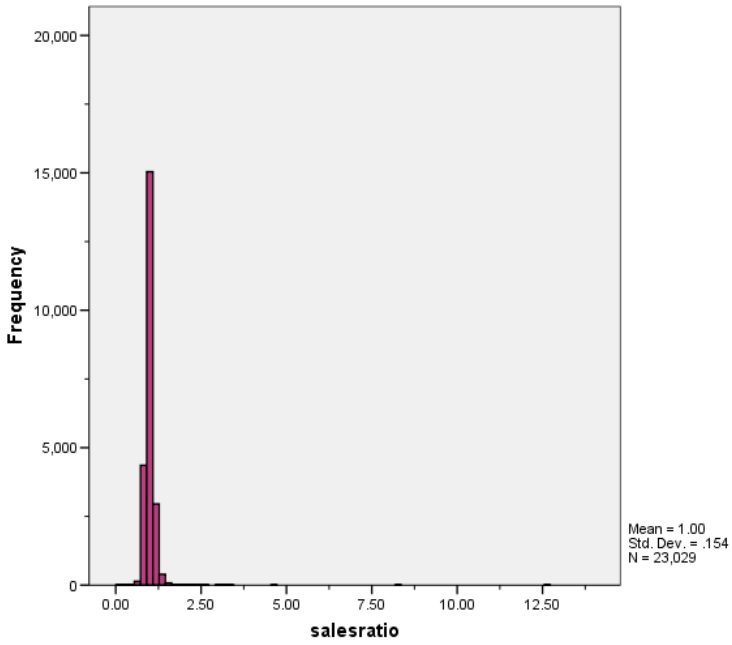
Case Processing Summary

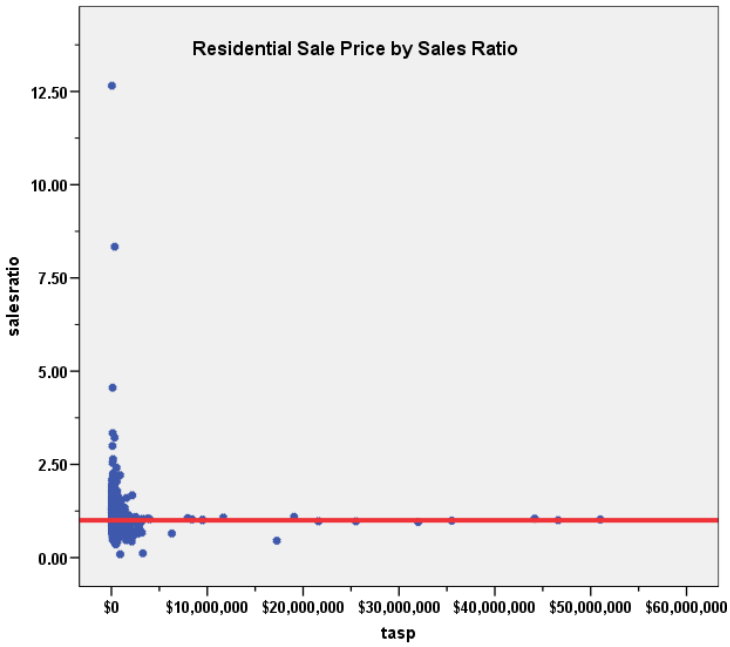
		Count	Percent
econarea	1	3265	14.2%
	2	3771	16.4%
	3	4193	18.2%
	4	4345	18.9%
	5	1987	8.6%
	6	653	2.8%
	7	106	0.5%
	8	981	4.3%
	9	1034	4.5%
	11	2	0.0%
	12	36	0.2%
	20	2	0.0%
	22	53	0.2%
	23	46	0.2%
	26	6	0.0%
	33	5	0.0%
	44	4	0.0%
	58	4	0.0%
	99	2535	11.0%
Overall		23028	100.0%
Excluded		1	
Total		23029	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion
1	.976	1.008	.077
2	1.000	1.018	.096
3	.985	1.012	.087
4	.981	1.010	.072
5	.977	1.013	.078
6	.986	1.008	.109
7	.992	1.026	.112
8	.988	1.013	.101
9	.986	1.013	.100
11	1.019	.997	.027
12	.997	1.123	.053
20	1.089	1.118	.341
22	1.012	1.012	.040
23	.993	.979	.071
26	1.022	.991	.027
33	1.031	1.037	.036
44	1.001	.955	.126
58	1.098	1.056	.086
99	.982	1.017	.090
Overall	.985	1.012	.086

The above ratio statistics were in compliance with the standards set forth by the Colorado State Board of Equalization (SBOE) for the overall residential sales. Economic areas with ratios statistics out of compliance had very low sale totals. The following graphs describe further the sales ratio distribution for these properties:





The above graphs indicate that the distribution of the sale ratios was within state mandated limits.

Residential Market Trend Analysis

We next analyzed the residential dataset using the 24-month sale period for any residual market trending and broken down by economic area, as follows:

Coefficients[a]

econarea	Model		Unstandardized Coefficients B	Unstandardized Coefficients Std. Error	Standardized Coefficients Beta	t	Sig.
1	1	(Constant)	.982	.004		252.170	.000
		SalePeriod	.001	.000	.034	1.953	.051
2	1	(Constant)	1.006	.004		237.513	.000
		SalePeriod	.001	.000	.040	2.479	.013
3	1	(Constant)	.991	.004		277.827	.000
		SalePeriod	.000	.000	.028	1.844	.065
4	1	(Constant)	.986	.003		301.867	.000
		SalePeriod	.000	.000	.025	1.656	.098
5	1	(Constant)	.983	.011		87.553	.000
		SalePeriod	.000	.001	.005	.222	.824
6	1	(Constant)	1.025	.024		42.093	.000
		SalePeriod	-.001	.002	-.028	-.727	.468
7	1	(Constant)	.960	.032		29.930	.000
		SalePeriod	.004	.002	.177	1.836	.069
8	1	(Constant)	1.018	.008		125.563	.000
		SalePeriod	-.002	.001	-.119	-3.747	.000
9	1	(Constant)	1.012	.009		112.406	.000
		SalePeriod	-.001	.001	-.059	-1.898	.058
11	1	(Constant)	.969	.000		.	.
		SalePeriod	.005	.000	1.000	.	.
12	1	(Constant)	.957	.031		31.271	.000
		SalePeriod	.004	.003	.244	1.466	.152
20	1	(Constant)	1.647	.000		.	.
		SalePeriod	-.046	.000	-1.000	.	.
22	1	(Constant)	.983	.012		81.579	.000
		SalePeriod	.003	.001	.387	3.000	.004
23	1	(Constant)	.961	.039		24.757	.000
		SalePeriod	.005	.003	.279	1.927	.060
26	1	(Constant)	.974	.030		32.861	.000
		SalePeriod	.003	.002	.635	1.645	.175
33	1	(Constant)	1.024	.067		15.380	.001
		SalePeriod	.002	.005	.199	.352	.748
44	1	(Constant)	.849	.542		1.568	.257
		SalePeriod	.009	.056	.116	.166	.884
58	1	(Constant)	.912	.059		15.408	.004
		SalePeriod	.030	.009	.926	3.467	.074
99	1	(Constant)	.956	.005		192.041	.000
		SalePeriod	.003	.000	.153	7.782	.000

a. Dependent Variable: salesratio

There was no residual significant market trending present in the sale ratio data for any of the economic areas; economic areas with statistically significant trends were not significant in terms of magnitude. We concluded that the assessor has adequately addressed market trending in the valuation of residential properties.

Sold/Unsold Analysis

In terms of the valuation consistency between sold and unsold residential properties, we compared the median actual value per square foot for 2018 between each group. The data was analyzed both as a whole and broken down by economic area, as follows:

Report
VALSF

sold	N	Median	Mean
UNSOLD	169,412	$214.44	$226.92
SOLD	23,026	$214.32	$228.28

Report
VALSF

econarea	sold	N	Median	Mean
1	UNSOLD	23723	$198.96	$207.82
	SOLD	3265	$205.44	$215.06
2	UNSOLD	33378	$241.18	$245.96
	SOLD	3769	$245.05	$252.65
3	UNSOLD	33886	$217.46	$224.47
	SOLD	4193	$217.98	$228.72
4	UNSOLD	33387	$202.01	$210.70
	SOLD	4345	$208.27	$217.45
5	UNSOLD	7918	$214.35	$225.52
	SOLD	1987	$208.00	$215.33
6	UNSOLD	7234	$262.56	$274.80
	SOLD	653	$270.79	$282.85
7	UNSOLD	1119	$235.97	$252.61
	SOLD	106	$243.96	$261.51
8	UNSOLD	7955	$264.15	$277.04
	SOLD	981	$279.17	$289.05
9	UNSOLD	8836	$243.60	$251.36
	SOLD	1034	$261.92	$266.48
11	UNSOLD	41	$155.26	$167.19
	SOLD	2	$184.62	$184.62
12	UNSOLD	261	$132.30	$172.24
	SOLD	36	$135.82	$140.87
20	UNSOLD	96	$138.20	$152.94
	SOLD	2	$112.73	$112.73
22	UNSOLD	396	$130.65	$149.89
	SOLD	53	$150.11	$154.17
23	UNSOLD	323	$132.15	$147.60
	SOLD	46	$133.81	$145.06
26	UNSOLD	145	$153.57	$296.35
	SOLD	6	$163.30	$184.72
33	UNSOLD	106	$136.25	$196.53
	SOLD	5	$162.89	$162.05
44	UNSOLD	43	$166.31	$165.52

	SOLD	4	$145.68	$141.08
58	UNSOLD	16	$156.44	$163.19
	SOLD	4	$219.23	$199.94
99	UNSOLD	10353	$179.20	$183.11
	SOLD	2534	$181.18	$187.34
	Total	12887	$179.51	$183.94
Total	Total	192350	$214.45	$227.11

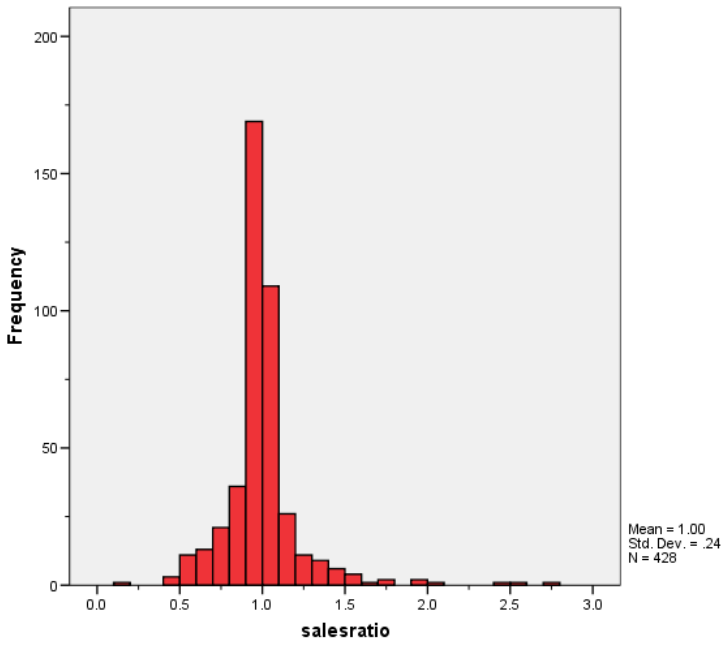
The above results indicate that sold and unsold residential properties were valued in a consistent manner.

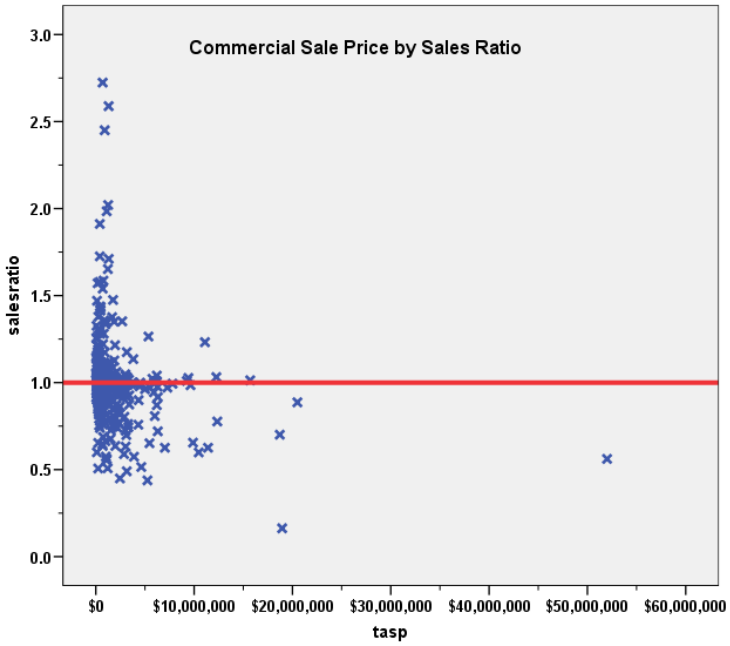
IV. COMMERCIAL/INDUSTRIAL SALE RESULTS

There were 428 qualified commercial/industrial sales in the 24 month period ending June 30, 2016. The sales ratio analysis was analyzed as follows:

Median	**0.984**
Price Related Differential	**1.127**
Coefficient of Dispersion	**13.3**

The above table indicates that the Jefferson County vacant land sale ratios were in compliance with the SBOE standards. The following histogram and scatter plot describe the sales ratio distribution further:





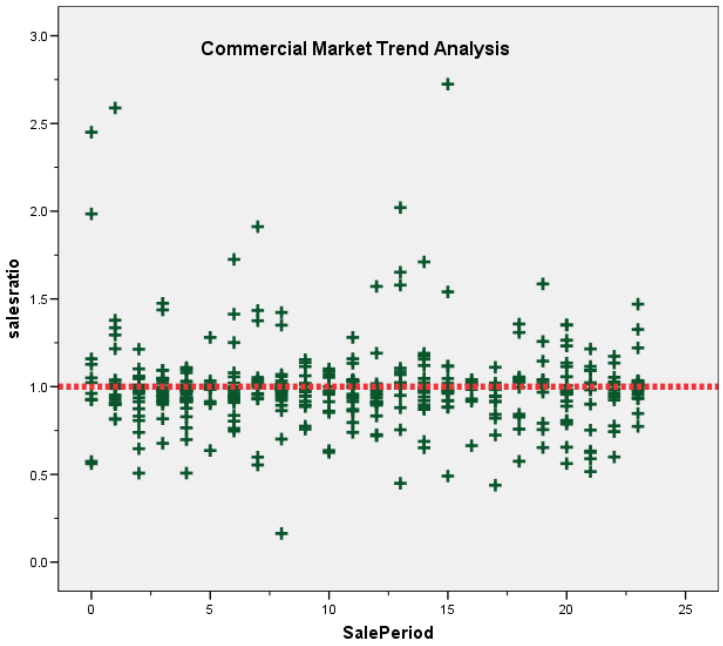
Commercial/Industrial Market Trend Analysis

The commercial/industrial sales were analyzed for residual marketing trending by examining the sale ratios across the 24 month sale period with the following results:

Coefficients[a]

Model		Unstandardized Coefficients B	Unstandardized Coefficients Std. Error	Standardized Coefficients Beta	t	Sig.
1	(Constant)	1.012	.022		46.297	.000
	SalePeriod	-.001	.002	-.043	-.882	.378

a. Dependent Variable: salesratio



There was no residual market trending present in the commercial sale ratios. We concluded that the assessor has adequately considered market trending adjustments as part of the commercial/industrial valuation.

Sold/Unsold Analysis

We compared the 2018 median value per square foot between sold and unsold commercial/industrial properties to determine if they were valued consistently, as follows:

Report
VALSF

sold	N	Median	Mean
UNSOLD	5,161	$117	$154
SOLD	427	$143	$170

Given that there was some difference between sold and unsold commercial/industrial properties overall, we employed a second comparison analysis that compared the median change in actual value for taxable years 2016 and 2018 to determine if sold and unsold properties were valued consistently, as follows:

Report
DIFF

sold	N	Median	Mean
UNSOLD	4,344	1.18	1.23
SOLD	351	1.25	1.30

Report

DIFF

abstrimp	sold	N	Median	Mean	
2212	UNSOLD		1,177	1.19	1.22
	SOLD		76	1.30	1.34
2220	UNSOLD		510	1.22	1.28
	SOLD		53	1.31	1.34
2225	UNSOLD		41	1.05	1.10
	SOLD		6	.81	.90
2230	UNSOLD		950	1.16	1.24
	SOLD		51	1.45	1.42
2235	UNSOLD		552	1.31	1.35
	SOLD		42	1.36	1.41
2245	UNSOLD		409	1.01	.98
	SOLD		20	1.01	1.00
3215	UNSOLD		44	1.22	1.35
	SOLD		4	1.28	1.39
3230	UNSOLD		521	1.18	1.24
	SOLD		92	1.19	1.23

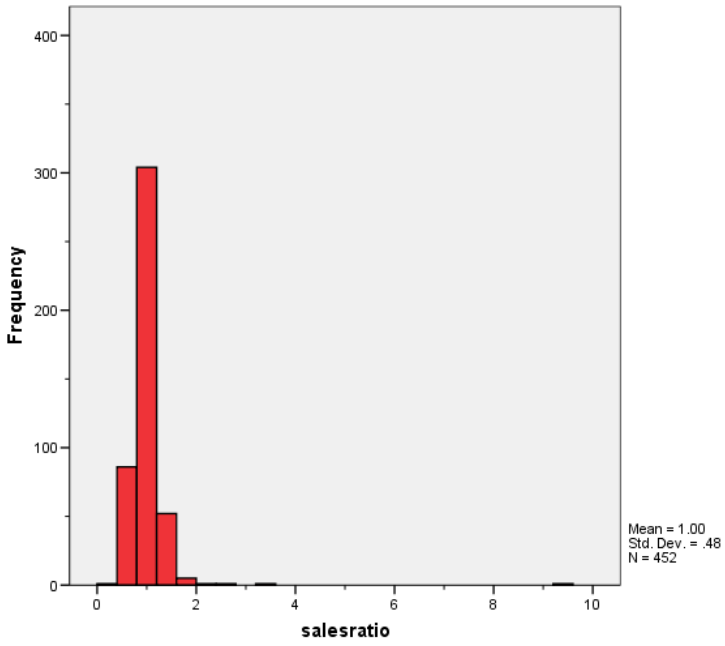
The above results indicated that sold and unsold commercial/industrial properties were valued consistently.

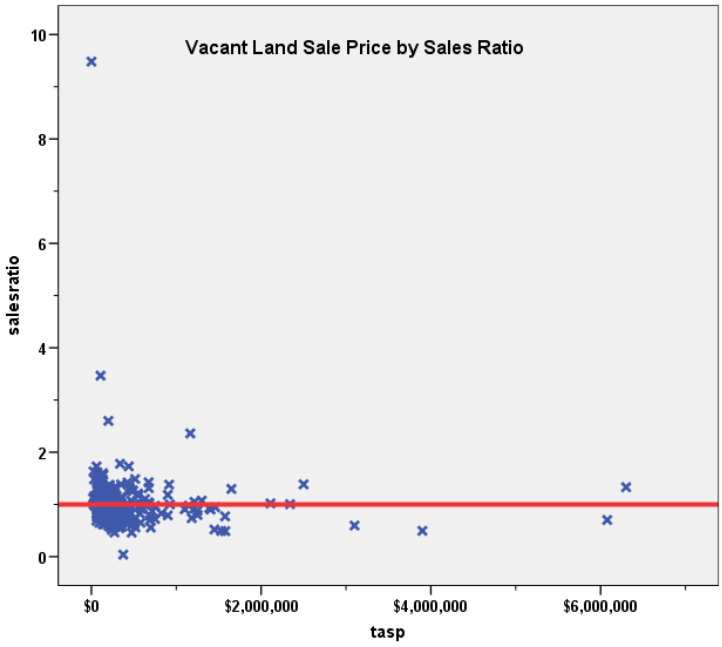
V. VACANT LAND SALE RESULTS

There were 452 qualified commercial/industrial sales for the 24 month period ending June 30, 2016. The sales ratio analysis results were as follows:

Median	**0.973**
Price Related Differential	**1.055**
Coefficient of Dispersion	**19.3**

The above ratio statistics were in compliance overall with the standards set forth by the Colorado State Board of Equalization (SBOE) for the overall vacant land sales. The following graphs describe further the sales ratio distribution for all of these properties:





The above charts indicate that the distribution of the vacant land sale ratios was within state mandated limits. No sales were trimmed.

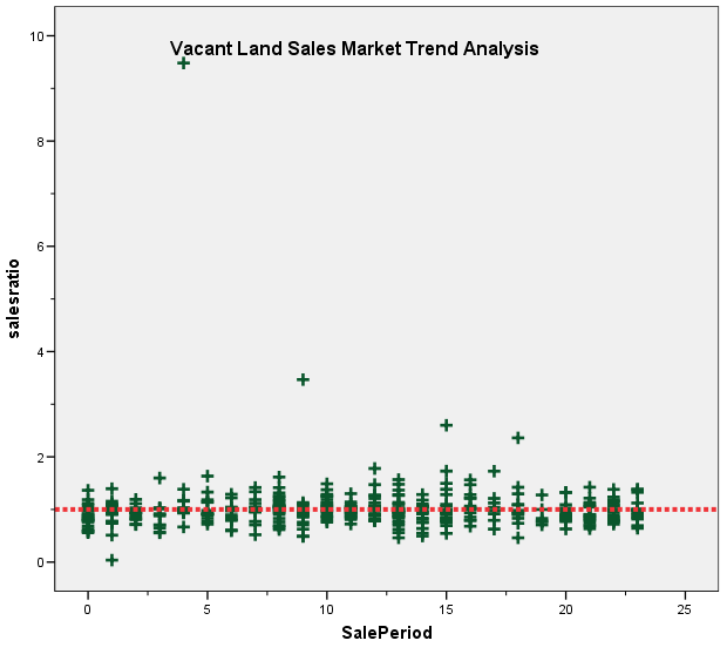
Vacant Land Market Trend Analysis

We next analyzed the vacant land dataset using the 24-month sale period, with the following results:

Coefficients[a]

Model		Unstandardized Coefficients B	Unstandardized Coefficients Std. Error	Standardized Coefficients Beta	t	Sig.
1	(Constant)	1.005	.044		23.041	.000
	SalePeriod	.000	.003	-.004	-.085	.932

a. Dependent Variable: salesratio



The above analysis indicated that there was no significant statistical trend. We therefore concluded that the assessor has adequately dealt with market trending for vacant land properties.

Sold/Unsold Analysis

In terms of the valuation consistency between sold and unsold vacant land properties, we compared the median change in actual value for taxable years 2016 and 2018 between each group, as follows:

Report

DIFF

sold	N	Median	Mean
UNSOLD	7,28	1.00	1.13
SOLD	386	1.25	1.28

We next performed the same comparison analysis by subdivision with at least 3 sales. This indicated that when broken down by subdivision, there was overall consistency between sold and unsold properties. The following table was developed using subdivision with at least 3 sales:

Report
DIFF

subdivno	sold	N	Median	Mean
36405	UNSOLD	2	1.33	1.33
	SOLD	5	.69	.72
93810	UNSOLD	2	1.00	1.00
	SOLD	5	1.28	1.31
108180	UNSOLD	3	1.00	1.00
	SOLD	3	1.59	1.56
163400	UNSOLD	6	1.25	1.24
	SOLD	3	1.17	1.03
186645	UNSOLD	3	.96	.99
	SOLD	5	1.21	1.18
198000	UNSOLD	2	1.47	1.47
	SOLD	4	1.87	1.84
277000	UNSOLD	3	1.00	.99
	SOLD	3	1.48	1.64
361635	UNSOLD	10	.57	.75
	SOLD	5	1.26	1.33
425400	UNSOLD	64	1.00	.92
	SOLD	3	1.14	1.05
615125	UNSOLD	16	1.18	1.16
	SOLD	3	1.08	1.14
615127	UNSOLD	6	1.05	1.05
	SOLD	3	1.05	1.05
636005	UNSOLD	10	1.05	1.16
	SOLD	8	1.09	1.09
638208	UNSOLD	2	1.84	1.84
	SOLD	3	1.57	1.64
688215	UNSOLD	1	1.00	1.00
	SOLD	3	1.35	1.39

Overall, we concluded that the county assessor valued sold and unsold vacant properties consistently.

VI. AGRICULTURAL IMPROVEMENTS ANALYSIS

Based on the parameters of the state audit analysis, this county was exempt from this analysis for 2018.

VII. CONCLUSIONS

Based on this 2018 audit statistical analysis, residential, commercial/industrial and vacant land properties were found to be in compliance with state guidelines.

STATISTICAL ABSTRACT

Residential

Ratio Statistics for CURRTOT / tasp

econarea	Mean	95% Confidence Interval for Mean		Median	95% Confidence Interval for Median			Weighted Mean	95% Confidence Interval for Weighted Mean		Price Related Differential	Coefficient of Dispersion	Coefficient of Variation
		Lower Bound	Upper Bound		Lower Bound	Upper Bound	Actual Coverage		Lower Bound	Upper Bound			Mean Centered
.	.831	.	.	.831	.	.	.	.831	.	.	1.000	.000	.
1	.989	.985	.993	.976	.972	.979	95.0%	.981	.978	.985	1.008	.077	11.8%
2	1.015	1.011	1.020	1.000	.998	1.003	95.3%	.997	.991	1.003	1.018	.096	13.6%
3	.996	.993	1.000	.985	.981	.989	95.2%	.985	.981	.988	1.012	.087	12.1%
4	.990	.987	.994	.981	.978	.984	95.1%	.981	.977	.984	1.010	.072	11.4%
5	.985	.973	.997	.977	.973	.983	95.2%	.972	.967	.978	1.013	.078	28.4%
6	1.010	.986	1.034	.986	.976	.996	95.6%	1.002	.985	1.020	1.008	.109	31.2%
7	1.011	.978	1.043	.992	.970	1.015	95.9%	.985	.950	1.021	1.026	.112	16.7%
8	.993	.984	1.001	.988	.979	.997	95.2%	.980	.970	.991	1.013	.101	14.1%
9	.998	.988	1.007	.986	.975	.995	95.7%	.985	.976	.994	1.013	.100	15.2%
11	1.019	.670	1.368	1.019	.992	1.046	100.0%	1.022	.677	1.367	.997	.027	3.8%
12	.994	.958	1.029	.997	.979	1.020	97.1%	.885	.689	1.081	1.123	.053	10.6%
20	1.089	-3.636	5.815	1.089	.718	1.461	100.0%	.974	-3.297	5.245	1.118	.341	48.3%
22	1.014	1.001	1.028	1.012	.986	1.024	97.3%	1.002	.974	1.029	1.012	.040	4.8%
23	1.025	.984	1.067	.993	.971	1.020	97.4%	1.047	.995	1.100	.979	.071	13.7%
26	1.018	.982	1.055	1.022	.964	1.060	96.9%	1.027	.997	1.058	.991	.027	3.4%
33	1.045	.967	1.123	1.031	.998	1.153	100.0%	1.008	.996	1.019	1.037	.036	6.0%
44	.936	.620	1.253	1.001	.648	1.096	100.0%	.981	.771	1.191	.955	.126	21.3%
58	1.097	.923	1.271	1.098	1.000	1.191	100.0%	1.039	.931	1.147	1.056	.086	9.9%
99	.989	.984	.994	.982	.979	.986	95.3%	.972	.966	.978	1.017	.090	13.1%

The confidence interval for the median is constructed without any distribution assumptions. The actual coverage level may be greater than the specified level. Other confidence intervals are constructed by assuming a Normal distribution for the ratios.

Commercial

Ratio Statistics for CURRTOT / tasp

Mean	95% Confidence Interval for Mean		Median	95% Confidence Interval for Median			Weighted Mean	95% Confidence Interval for Weighted Mean		Price Related Differential	Coefficient of Dispersion	Coefficient of Variation
	Lower Bound	Upper Bound		Lower Bound	Upper Bound	Actual Coverage		Lower Bound	Upper Bound			Mean Centered
.996	.973	1.019	.984	.978	.992	95.3%	.884	.814	.953	1.127	.133	24.1%

The confidence interval for the median is constructed without any distribution assumptions. The actual coverage level may be greater than the specified level. Other confidence intervals are constructed by assuming a Normal distribution for the ratios.

Vacant Land

Ratio Statistics for CURRLND / tasp

Mean	95% Confidence Interval for Mean		Median	95% Confidence Interval for Median			Weighted Mean	95% Confidence Interval for Weighted Mean		Price Related Differential	Coefficient of Dispersion	Coefficient of Variation
	Lower Bound	Upper Bound		Lower Bound	Upper Bound	Actual Coverage		Lower Bound	Upper Bound			Mean Centered
1.002	.958	1.046	.973	.948	.985	95.7%	.950	.889	1.011	1.055	.193	47.9%

The confidence interval for the median is constructed without any distribution assumptions. The actual coverage level may be greater than the specified level. Other confidence intervals are constructed by assuming a Normal distribution for the ratios.

Residential Median Ratio Stratification

Sale Price

Case Processing Summary

		Count	Percent
SPRec	$25K to $50K	2	0.0%
	$50K to $100K	137	0.6%
	$100K to $150K	689	3.0%
	$150K to $200K	1737	7.5%
	$200K to $300K	4744	20.6%
	$300K to $500K	10880	47.2%
	$500K to $750K	3640	15.8%
	$750K to $1,000K	850	3.7%
	Over $1,000K	350	1.5%
Overall		23029	100.0%
Excluded		0	
Total		23029	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
$25K to $50K	7.120	.974	.777	109.9%
$50K to $100K	1.058	1.008	.183	25.2%
$100K to $150K	1.043	1.003	.133	25.0%
$150K to $200K	1.001	1.001	.087	14.4%
$200K to $300K	.995	1.000	.090	12.7%
$300K to $500K	.981	1.002	.077	12.7%
$500K to $750K	.974	1.001	.079	10.9%
$750K to $1,000K	.951	1.000	.094	13.7%
Over $1,000K	.929	.979	.123	16.8%
Overall	.985	1.012	.086	15.7%

Subclass

Case Processing Summary

		Count	Percent
abstrimp	0	3	0.0%
	1212	20106	87.3%
	1214	1	0.0%
	1215	227	1.0%
	1220	93	0.4%
	1221	1	0.0%
	1225	62	0.3%
	1230	2534	11.0%
	1718	1	0.0%
	1879	1	0.0%
Overall		23029	100.0%
Excluded		0	
Total		23029	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
0	.598	1.194	.446	92.7%
1212	.985	1.013	.085	16.0%
1214	.834	1.000	.000	.
1215	.975	1.016	.111	15.7%
1220	1.001	.996	.048	6.3%
1221	1.000	1.000	.000	.
1225	1.000	1.019	.068	14.7%
1230	.982	1.017	.090	13.2%
1718	1.461	1.000	.000	.
1879	.718	1.000	.000	.
Overall	.985	1.012	.086	15.7%

Improvement Age

Case Processing Summary

		Count	Percent
AgeRec	0	3	0.0%
	Over 100	16	0.1%
	75 to 100	189	0.8%
	50 to 75	2298	10.0%
	25 to 50	11429	49.6%
	5 to 25	6699	29.1%
	5 or Newer	2395	10.4%
Overall		23029	100.0%
Excluded		0	
Total		23029	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
0	.598	1.194	.446	92.7%
Over 100	.800	1.028	.129	17.3%
75 to 100	.939	1.050	.190	29.1%
50 to 75	1.004	1.011	.106	15.1%
25 to 50	.990	1.006	.083	11.9%
5 to 25	.975	1.008	.078	12.2%
5 or Newer	.972	1.023	.088	31.4%
Overall	.985	1.012	.086	15.7%

Improved Area

Case Processing Summary

		Count	Percent
ImpSFRec	0	3	0.0%
	LE 500 sf	45	0.2%
	500 to 1,000 sf	3293	14.3%
	1,000 to 1,500 sf	7413	32.2%
	1,500 to 2,000 sf	5379	23.4%
	2,000 to 3,000 sf	5286	23.0%
	3,000 sf or Higher	1610	7.0%
Overall		23029	100.0%
Excluded		0	
Total		23029	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
0	.598	1.194	.446	92.7%
LE 500 sf	1.020	1.191	.163	25.6%
500 to 1,000 sf	.985	1.014	.096	14.1%
1,000 to 1,500 sf	.983	1.009	.085	12.3%
1,500 to 2,000 sf	.981	1.011	.080	11.2%
2,000 to 3,000 sf	.987	1.013	.082	20.6%
3,000 sf or Higher	.990	1.019	.098	23.7%
Overall	.985	1.012	.086	15.7%

Improvement Quality

Case Processing Summary

		Count	Percent
quality	0	12	0.1%
	1	86	0.4%
	2	3319	14.4%
	3	14172	61.5%
	4	4682	20.3%
	5	737	3.2%
	6	18	0.1%
Overall		23026	100.0%
Excluded		3	
Total		23029	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
0	.911	1.013	.160	22.5%
1	.984	1.032	.198	33.8%
2	.978	1.010	.095	14.4%
3	.986	1.008	.082	12.4%
4	.983	1.015	.082	20.6%
5	.995	1.024	.111	30.6%
6	.953	1.035	.140	19.0%
Overall	.985	1.012	.086	15.7%

Commercial Median Ratio Stratification

Sale Price

Case Processing Summary

		Count	Percent
SPRec	LT $25K	1	0.2%
	$25K to $50K	2	0.5%
	$50K to $100K	13	3.0%
	$100K to $150K	26	6.1%
	$150K to $200K	51	11.9%
	$200K to $300K	43	10.0%
	$300K to $500K	75	17.5%
	$500K to $750K	40	9.3%
	$750K to $1,000K	32	7.5%
	Over $1,000K	145	33.9%
Overall		428	100.0%
Excluded		0	
Total		428	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
LT $25K	1.053	1.000	.000	.
$25K to $50K	1.030	1.027	.113	15.9%
$50K to $100K	1.046	1.009	.080	12.2%
$100K to $150K	.941	1.003	.092	15.7%
$150K to $200K	.981	1.000	.046	10.1%
$200K to $300K	.987	1.000	.102	15.3%
$300K to $500K	.995	.997	.124	20.9%
$500K to $750K	.964	.997	.142	33.2%
$750K to $1,000K	.999	1.002	.150	31.5%
Over $1,000K	.971	1.106	.180	29.6%
Overall	.984	1.127	.133	24.5%

Subclass

Case Processing Summary

		Count	Percent
abstrimp	0	1	0.2%
	1712	1	0.2%
	1716	1	0.2%
	1879	1	0.2%
	1881	1	0.2%
	1976	1	0.2%
	2212	93	21.7%
	2215	1	0.2%
	2216	1	0.2%
	2220	62	14.5%
	2225	6	1.4%
	2230	73	17.1%
	2235	51	11.9%
	2245	20	4.7%
	3215	4	0.9%
	3230	111	25.9%
Overall		428	100.0%
Excluded		0	
Total		428	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
0	.698	1.000	.000	.
1712	1.069	1.000	.000	.
1716	1.335	1.000	.000	.
1879	.945	1.000	.000	.
1881	1.016	1.000	.000	.
1976	1.117	1.000	.000	.
2212	.953	1.132	.169	28.9%
2215	.971	1.000	.000	.
2216	.814	1.000	.000	.
2220	.989	1.098	.133	24.7%
2225	.693	.929	.260	33.3%
2230	.988	1.234	.161	34.9%
2235	.980	1.090	.158	22.0%
2245	.998	1.004	.160	23.5%
3215	1.166	1.187	.217	29.3%
3230	.981	1.009	.058	8.5%
Overall	.984	1.127	.133	24.5%

Improvement Age

Case Processing Summary

		Count	Percent
AgeRec	0	1	0.2%
	75 to 100	2	0.5%
	50 to 75	30	7.0%
	25 to 50	148	34.6%
	5 to 25	165	38.6%
	5 or Newer	82	19.2%
Overall		428	100.0%
Excluded		0	
Total		428	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
0	.698	1.000	.000	.
75 to 100	1.276	.990	.014	2.0%
50 to 75	.999	1.023	.076	13.3%
25 to 50	.978	1.055	.144	25.1%
5 to 25	.993	1.192	.156	27.3%
5 or Newer	.975	1.160	.080	19.6%
Overall	.984	1.127	.133	24.5%

Improved Area

Case Processing Summary

		Count	Percent
ImpSFRec	0	1	0.2%
	LE 500 sf	3	0.7%
	500 to 1,000 sf	39	9.1%
	1,000 to 1,500 sf	77	18.0%
	1,500 to 2,000 sf	28	6.5%
	2,000 to 3,000 sf	48	11.2%
	3,000 sf or Higher	232	54.2%
Overall		428	100.0%
Excluded		0	
Total		428	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
0	.698	1.000	.000	.
LE 500 sf	1.146	.970	.060	9.0%
500 to 1,000 sf	.973	1.044	.122	19.7%
1,000 to 1,500 sf	.982	1.022	.063	11.3%
1,500 to 2,000 sf	.985	1.021	.102	13.3%
2,000 to 3,000 sf	.980	1.032	.139	23.1%
3,000 sf or Higher	.984	1.138	.160	29.4%
Overall	.984	1.127	.133	24.5%

Improvement Quality

Case Processing Summary

		Count	Percent
quality	2	10	2.3%
	3	335	78.5%
	4	74	17.3%
	5	8	1.9%
Overall		427	100.0%
Excluded		1	
Total		428	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
2	1.119	1.052	.123	17.5%
3	.983	1.095	.137	25.7%
4	.983	1.094	.105	17.9%
5	.760	1.253	.127	19.4%
Overall	.984	1.127	.133	24.4%

Economic Area

Case Processing Summary

		Count	Percent
econarea	10	68	22.9%
	12	5	1.7%
	15	1	0.3%
	20	142	47.8%
	22	5	1.7%
	23	3	1.0%
	26	4	1.3%
	30	25	8.4%
	33	2	0.7%
	40	22	7.4%
	50	16	5.4%
	58	2	0.7%
	59	2	0.7%
Overall		297	100.0%
Excluded		131	
Total		428	

Ratio Statistics for CURRTOT / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion
10	.984	1.068	.177
12	.992	1.020	.096
15	.977	1.000	.000
20	.974	1.166	.156
22	.941	1.011	.057
23	.960	.987	.042
26	.963	1.137	.228
30	1.001	1.140	.159
33	1.187	1.005	.091
40	.987	1.092	.179
50	1.008	1.030	.132
58	1.115	1.107	.129
59	.816	.972	.221
Overall	.984	1.133	.160

Vacant Land Median Ratio Stratification

Sale Price

Case Processing Summary

		Count	Percent
SPRec	LT $25K	2	0.4%
	$25K to $50K	8	1.8%
	$50K to $100K	71	15.7%
	$100K to $150K	90	19.9%
	$150K to $200K	75	16.6%
	$200K to $300K	93	20.6%
	$300K to $500K	58	12.8%
	$500K to $750K	25	5.5%
	$750K to $1,000K	6	1.3%
	Over $1,000K	24	5.3%
Overall		452	100.0%
Excluded		0	
Total		452	

Ratio Statistics for CURRLND / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
LT $25K	5.300	3.779	.789	111.6%
$25K to $50K	1.144	1.016	.140	21.2%
$50K to $100K	1.005	1.004	.138	20.3%
$100K to $150K	.984	1.007	.183	34.0%
$150K to $200K	.980	.996	.140	25.2%
$200K to $300K	.950	1.004	.148	19.6%
$300K to $500K	.883	.997	.222	32.3%
$500K to $750K	.974	.999	.193	25.5%
$750K to $1,000K	.914	.989	.224	29.3%
Over $1,000K	.914	1.015	.273	43.3%
Overall	.973	1.055	.193	49.4%

Subclass

Case Processing Summary

		Count	Percent
abstrlnd	100	131	29.0%
	200	26	5.8%
	300	12	2.7%
	510	6	1.3%
	520	17	3.8%
	530	3	0.7%
	540	7	1.5%
	550	13	2.9%
	600	8	1.8%
	1112	191	42.3%
	1115	4	0.9%
	1120	2	0.4%
	1125	9	2.0%
	2112	4	0.9%
	2130	9	2.0%
	2135	8	1.8%
	2245	1	0.2%
	3115	1	0.2%
Overall		452	100.0%
Excluded		0	
Total		452	

Ratio Statistics for CURRLND / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion	Coefficient of Variation Median Centered
100	.973	1.136	.229	80.2%
200	.932	1.168	.221	28.4%
300	.930	.954	.177	21.3%
510	.728	1.093	.100	15.1%
520	.980	.939	.170	21.6%
530	.889	1.040	.130	25.9%
540	.949	.996	.107	14.5%
550	1.051	1.082	.103	14.7%
600	.779	1.073	.222	28.6%
1112	.973	1.022	.136	18.8%
1115	1.040	1.050	.177	29.2%
1120	.992	.998	.144	20.3%
1125	1.034	1.129	.332	41.3%
2112	.907	.975	.099	18.4%
2130	1.019	.943	.326	52.5%
2135	.994	1.174	.409	69.9%
2245	3.467	1.000	.000	.
3115	.828	1.000	.000	.
Overall	.973	1.055	.193	49.4%

Economic Area

Case Processing Summary

		Count	Percent
econarea	1	12	2.7%
	2	42	9.3%
	3	43	9.5%
	4	30	6.6%
	5	23	5.1%
	6	11	2.4%
	7	16	3.5%
	8	63	13.9%
	9	129	28.5%
	10	20	4.4%
	11	1	0.2%
	15	1	0.2%
	20	23	5.1%
	22	5	1.1%
	23	5	1.1%
	26	4	0.9%
	30	9	2.0%
	33	1	0.2%
	34	3	0.7%
	40	7	1.5%
	44	1	0.2%
	50	2	0.4%
	58	1	0.2%
Overall		452	100.0%
Excluded		0	
Total		452	

Ratio Statistics for CURRLND / tasp

Group	Median	Price Related Differential	Coefficient of Dispersion
1	.961	1.002	.092
2	.979	1.077	.137
3	.920	1.034	.167
4	.979	1.048	.128
5	1.023	1.008	.113
6	.982	1.020	.137
7	.922	1.110	.199
8	.973	1.176	.308
9	.985	1.025	.138
10	.962	.985	.229
11	1.380	1.000	.000
15	.929	1.000	.000
20	1.000	1.044	.229
22	.798	.995	.281
23	.828	1.294	.201
26	.949	.911	.120
30	.944	1.367	.422
33	1.034	1.000	.000
34	1.330	1.219	.270
40	.918	1.062	.655
44	1.134	1.000	.000
50	.767	.877	.177
58	.038	1.000	.000
Overall	.973	1.055	.193