



# Financial Benchmarking Initiative

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## **Executive Summary**

Our study was commissioned by the executive leadership within Athens State University to focus on general inquiries concerning the institution's financial condition and viability. To address such questions we examined seven years of independently audited financial statements for Athens State. A ratio analysis was performed on this fiscal data to identify targets and trends. Additionally, this data was benchmarked to seven universities of a similar size and scope. Based on this analysis, we conclude Athens State is being managed in a fiscally sound manner, in many cases, surpassing its peer group. The University maintained healthy ending reserves, experienced favorable financial trends moving into the current fiscal period, avoided significant reliance upon a single external funding source, and received no audit findings. While the current financial position of the institution is sound, there are potential risks that should be actively monitored. More specifically, the university should continue efforts to seek greater diversification in revenue sources, cap debt financing activities to appropriate levels, officially communicate financial management targets, and demand financial viability of all auxiliary activities.

## I. Introduction

This report examines the financial condition of Athens State University (ASU) in relation to comparable institutions. As public management expert Robert Behn (2002) has observed, various strategies involving the use of performance measures in budgeting and financial management are motivated by a fundamental purpose: to improve the performance of public agencies; to enhance the results and value produced by public institutions (pg. 6). The purpose of this study is to serve as a supplemental resource of other financial studies, including the *Comparators and Financial Indicators* study published by Dr. Toutkoushian in January 2015. This analysis has been authored by two ASU faculty specializing in accounting and finance. While the authors are not independent of the institution, their objectivity was not influenced or restricted in any manner by the ASU administration. Exclusive reliance has been placed upon audited financial data; however, this report does not constitute an independent audit or review of the institution's accounts.

This study attempts to answer the following primary and secondary research questions:

- **Are there any immediate threats to the going concern of Athens State University?**
  - Is the university experiencing cash flow problems?
  - Does the university maintain sufficient liquid resources to meet growth in liabilities?
  - Are there any alarming revenue or expense trends?
  
- **In relation to institutions of comparable size and scope...**
  - What is the financial position of Athens State University?
  - What is the fiscal capacity of the institution?
  - To what extent can the university leverage existing revenues to pay current obligations?
  
- **What opportunities for improvement in financial management practices or policies exist?**

## II. Methodology

One of the primary goals of this research effort was to evaluate the overall financial condition and performance of the University. In order to carry out this task, a survey of accounting literature was performed to identify the key elements of financial soundness. Ammons (2001) identifies six general criteria for financial and performance benchmarks: 1) validity- they measure what they purport to measure; 2) reliability- the measure is accurate and highly objective; 3) understandable- each measure has an unmistakably clear meaning; 4) comprehensive- the most important performance dimensions are reflected; 5) resistant to undesired behavior- little vulnerability manipulation; and 6) focused on controllable facets of performance- controlled by management action (p. 15). Many public entities, including universities, have adopted performance management tactics (Melkers and Willoughby, 1998).

Benchmarking using common-size analysis is among the most popular methods used by internal and external stakeholders to evaluate public finances. According to Mead (2012), common-size ratios serve two valuable purposes: "First, they can provide a quick overview of the finances of a [university] and how they have changed since last year. Did assets grow or shrink? Were [tuition] revenues a larger or smaller share of revenue? Second, they put the financial data of an organization in a form that can be compared with other organizations, regardless of their size" (p. 279).

We applied two traditional methods of common-size analysis: 1) percentage change and 2) percentage distribution. Percentage change represents the magnitude of change in a particular item, rather than the aggregate dollar difference from one year to the next. Percentage distribution shows the portion of a financial statement total represented by individual elements. After normalizing the data using these two techniques, key performance indicators were deployed to address specific research questions. We calculated financial ratios commonly leveraged by major rating agencies to evaluate the risk associated with a bond offering. After calculating the ratios for Athens State, the financial results were benchmarked against comparable institutions applying a composite average.

Using the institution's annual financial statements that had been subjected to an independent audit, we analyzed seven years of data for Athens State University, between the years 2008 through 2014. An attempt was made to compare these results with comparable institutions across the United States. In selecting our comparison sample, we relied upon the work of a previous study. In his 2015 study *Comparators and Financial Indictors*, Toutkoushian identified thirteen peer institutions for ASU, which became the basis for our sample.

### *Data Limitations*

Our research team attempted to secure audited financial reports for all of the peer institutions; however, we only attained detailed annual financial reports for seven of the thirteen comparators originally identified in Toutkoushian's study. In the states of Montana, Minnesota, Maine, Hawaii, and South Carolina, regional public universities are consolidated into a single audit report for the state university system. By blending financial results across multiple universities, researchers are unable to assess the financial performance of any one regional organization. As such, only discretely presented component units (DCUs) of the state government were used for the purpose of our analysis. Among the DCUs that were used for the study, we also encountered additional limitations with respect to the data:

- In two cases, the FY2014 audit had not yet been performed.
- In all cases, one or more reports were missing between the periods: FY 2008-2010.
- In the case of the Texas A&M campuses, the annual financial reports were not audited.

Although there are plenty of "rules of thumb" to which one might choose to compare a public university, these approaches should be handled prudently. The circumstances of universities can vary greatly depending on local conditions. Financial statements are a key source of information, but they are not the only source of information. Strategic planning documents, operational plans, budgets, cash flow forecasts, and bond issuance documents all provide other important insights. While much of the information needed to analyze fiscal capacity can be found in an institution's audited financial statements, most of the information necessary to evaluate service capacity and operational performance is found by referring to these secondary materials. This higher order analysis was beyond the scope of this study.

Table 1 highlights the quality and extent of financial data identified for each comparator institution. An "X" denotes that a financial report was secured in a given fiscal period. As reflected, we were able to obtain most data between the periods FY2011-2013. When examining benchmark data, readers should take note that this period is the most representative. Due to this fact, we focus on fiscal period 2013 in many cases.

Table 1: Quality and Extent of Data Available from the Comparison Group

Institution	DCU*	Independent Audit	'14	'13	'12	'11	'10	'09	'08
Athens State	Yes	Yes	X	X	X	X	X	X	X
Oklahoma Panhandle	Yes	Yes	X	X	X	X	X	X	
Dickenson State	Yes	Yes	X	X	X	X			
Mayville State	Yes	Yes	X	X	X	X			
Lewis & Clark	Yes	Yes		X	X	X	X	X	
Glenville State	Yes	Yes		X	X	X	X	X	X
Texas A&M- San Antonio	Yes	No	X	X	X	X	X		
Texas A&M- Central Texas	Yes	No	X	X	X				
University of Minnesota-Crookston	No	Yes	X	X	X	X	X	X	X
University of Hawaii- West Oahu	No	Yes	X	X	X	X	X		
University of South Carolina-Beaufort	No	Yes		X	X	X	X	X	X
University of Maine at Fort Kent	No	Yes		X	X	X	X	X	X
University of Maine at Presque Isle	No	Yes		X	X	X	X	X	X
University of Montana- Western	No	Yes		X	X	X	X	X	X

\*Discretely presented component unit of the State government or University system.

### III. Financial Stability Review

Based upon the financial statement analysis and review of audit reports, the researchers could find no evidence of any immediate threats to Athens State University's ability to endure over an extended period. The institution's financial condition is stronger than several of its peers. For instance, Athens State is not plagued with declining tuition revenues or enrollment and the institution does not find itself with a negative unrestricted net position balance. Athens State has differentiated itself, from a financial management perspective, in the following important respects. Financial strengths:

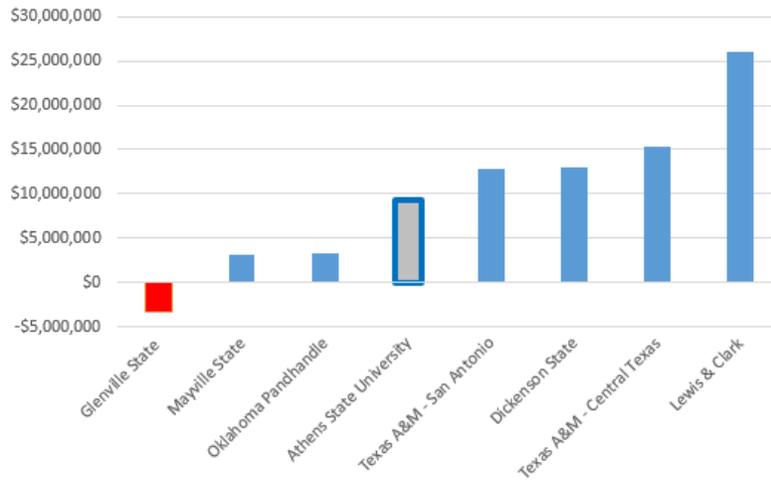
- Strong ending reserves (aka net position);
- Higher levels of self-sufficiency;
- Favorable financial trends going into FY 2014, including cash reserves; and,
- No significant audit findings.

#### *Net Position*

Net position, at a theoretical level, represents the resources a university has left over for use to provide services after the institution's debts have been settled. A more complicated view entails examining the balance as the residual equity of the entity. From both perspectives, these definitions can be misleading and complicated by the fact that many resources are not always available in a spendable form. For example, Founders Hall may be completely paid off; however, the building could not be readily sold off to a private party for non-educational use, nor would this be in the best interest of the community. Outside of capital assets, such as Founders Hall, there can be restrictions placed on how some resources are used. A classic example would be a restricted library donation. The donation can only be used to buy books, not an alternative purpose, such as paying off debt or funding student scholarships. For these reasons, unrestricted net position is often focused on in lieu of total net position. This account measures all remaining resources

that are neither capital assets nor restricted by external parties. In general, these resources can be used for any purpose. With that said, they are not readily in a spendable form, like cash. As reflected in Figure 1, Athens State maintains a healthy available “unrestricted” net position reserve, higher than three institutions and a balance appropriate for its size.

**Figure 1: Unrestricted Net Position (FY 2013)**

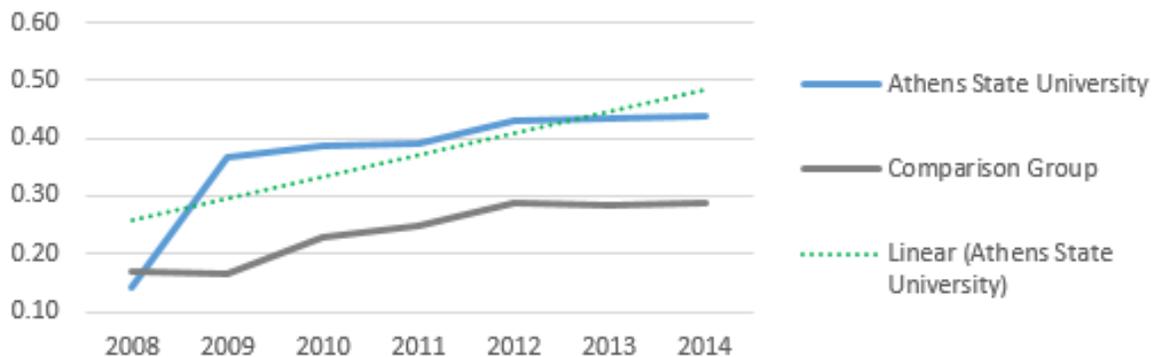


**Note:** negative net position (denoted in red) occurs when institutions finance long-term obligations and pay on a year-to-year basis as obligations come due, rather than setting aside resources as the liabilities are incurred. Consequently, liabilities grow each year, but assets do not.

### Self-Sufficiency

One measure of fiscal independence is the extent to which an institution relies upon own-source revenues as a percentage of total revenue. In relation to its peers, the institution is more self-sufficient and continues to become more independent as time passes (see Figure 2). Over 40% of the institution’s revenues come from student tuition, a revenue stream that can be controlled in part through the actions of the institution’s leadership. The green line represents the forecasted trend using linear regression modeling. Meanwhile, the gray line in the figure represents the average score of the seven comparators.

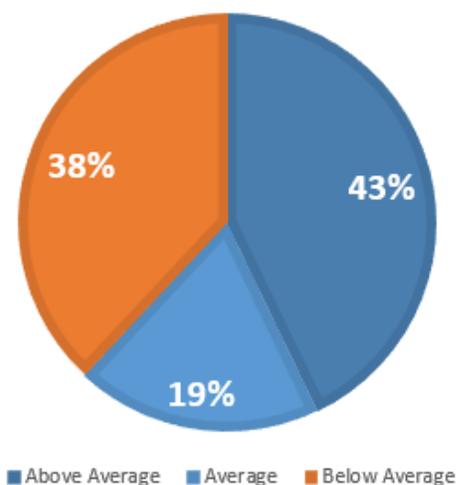
**Figure 2: Self-Sufficiency**



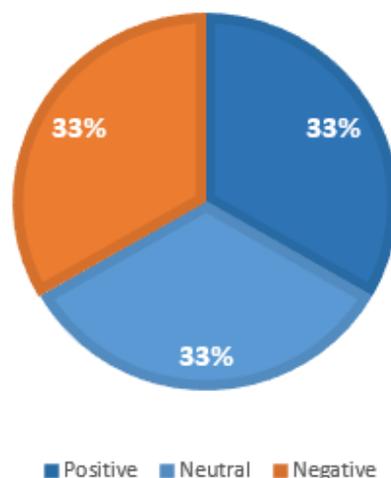
## Financial Trends and Outlook

Figure 3 reflects a summary of major findings discussed later in this study (see Table 5). When performing a longitudinal analysis of financial trends and comparisons, a few items become evident. First, the organization's overall financial condition has improved since fiscal year 2013. Second, the institution's financial performance met or exceeded its peers for 62% of the financial indicators evaluated (see Figure 3- left chart). Finally, the long-range trend for 66% of the financial indicators measured is favorable (see Figure 3- right chart). These observations are not to suggest that the organization does not face risks. While isolated threats need to be addressed and opportunities for improvement exist, on the whole, the institution is financially sound and becoming healthier over time.

Figure 3: Peer Comparison (21 KPIs)



ASU Financial Trends (21 KPIs)



## Audit Results

Outside of the observations expressed in this report, it is important to note the organization is subject to an annual audit in which independent professionals carry out similar analytical techniques used in this study. As part of this process, external auditors are required to assess whether there is a substantial doubt about the institution's ability to continue as a going concern for at least one year beyond the fiscal year end. Generally Accepted Auditing Standards require assessments to be made as a part of planning process. Analytical procedures are one of the most important types of evidence used to assess going concern, as well as discussions with management and reviews of future operational or debt issuance plans. When the auditor has reservations about the going-concern assumption (aka potential bankruptcy), they are required to disclose such known facts in their audit opinion letter (AU Section 341). The absence of such a disclosure in the audit opinion rendered the past seven years suggests that the independent financial auditors do not have substantial doubts about the institution's ability to remain a going concern. We have confidence that the institution's unmodified (aka clean) audit report serves as one of the best sources of evidence the current financial condition of the entity is sound.

When comparing financial statements and notes with comparator institutions, Athens State often possessed higher levels of disclosure and detail that surpassed many peer institutions. While transparent financial disclosures do not demonstrate sound financial condition in and of themselves, the fact that ASU has fully adopted GASB standards facilitates our ability to better assess such questions.

## Financial Risks and Threats

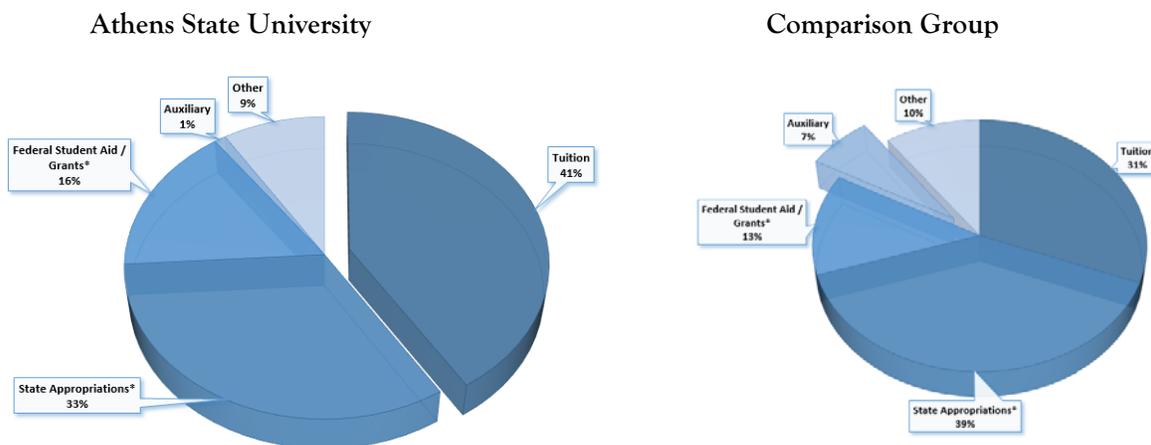
While the financial position of the institution is sound, there are some potential threats that should be considered for strategic planning purposes. Left unchecked, these items may result in adverse consequences in the future. Risks that should be actively monitored and mitigated:

- Revenue sources less diversified;
- Declining levels of federal and state aid;
- Growing debt burden in relation to the institution’s aging assets; and,
- Cash reserve vasillations.

## Revenue Diversification

Percentage distribution is a key technique for determining a university’s level of revenue dispersion. An organization “dependent on one or a few revenue providers is vulnerable to declines in the economic health or changes in the preferences of those providers” (Trussel & Parsons, 2008, p.4). Examining the individual components of total revenues, an individual may find the entity relies on a narrow range of revenues to support its activities and, therefore, is more likely to be dramatically affected if one type of revenue does not meet expectations. While the size and structure of the comparison group was similar to ASU, there were notable distinctions between the comparators and ASU in terms of funding structure and trends. Figure 4 highlights the major sources of revenue for ASU versus the Comparison Group.

Figure 4: Major Sources of Revenue by Percentage (FY2013)



As highlighted above, ASU is more self-sufficient in that the institution relies more heavily upon direct contributions (aka tuition and fees) to fund operations. Meanwhile, the comparator institutions receive a larger component of their revenue from federal and state funding sources. The peer group is more diversified in terms of the extent of revenue sources. Gifts and research revenue is a larger component to their funding structure. Moreover, nearly 7% of peer institution’s revenues came from auxiliary activities, such as athletics, housing, lifelong learning, food services, book stores, etc., compared to less than 1% at Athens State (see Appendix A- Auxiliary Activities). Based on data furnished by ASU’s financial office, currently five of the seven auxiliary business units are losing money. Overall, auxiliary activities faced an \$85,000 net operating loss in 2014, a manageable figure given the total net position of the institution.

## Federal and State Aid

A concerning observation from this study was the fact intergovernmental revenue sources have been declining the past seven years. Intergovernmental funding represents the largest source of funding at Athens State, as well as the peer group at-large. “Educational funding after our near Depression of 2008-09 was cut more [in Alabama] than anywhere in America.” (Bronner, 2015, pg. 2). In the case of the peer group, state legislators have been increasing, not decreasing, educational funding. In some states, such as North Dakota, increasing funding at a rate of 10% or higher on an annual basis. However, both federal and state funding to Athens State University has been in significant decline the past seven years. As such, ASU has been forced to raise tuition and cut some programs in order to offset losses in intergovernmental revenues; thereby, placing greater financial pressures on the student.

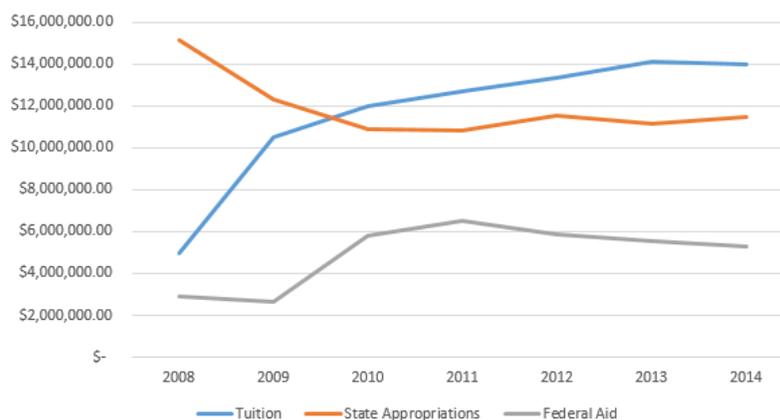
Table 2: Increase/Decrease in Revenue Sources for FY 2013

Factor	Athens State	Comparison Group
Tuition	6%	3%
State Appropriations	-3%	3%
Federal Aid	-6%	-3%
Auxiliary Enterprises (AE)	-2%	-1%
<i>Inc. in AE Operating Loss</i>	70%	

Note: While ASU experienced funding declines in most categories in FY 2013, it should be noted that modest funding increases occurred in many of these categories in FY 2014. FY 2013 data was used due to the fact that all institutions had reported financial data for this period.

Figure 5 highlights the general funding trend for the top three ASU funding sources the past seven years. Federal funding spiked during the American Reinvestment and Recovery Act era, but is now in decline. While state funding declined until FY2011, the cuts appear to have stabilized the past three years as there was a modest funding increase last year. As reflected, tuition increases have been instituted to offset these losses in other funding sources.

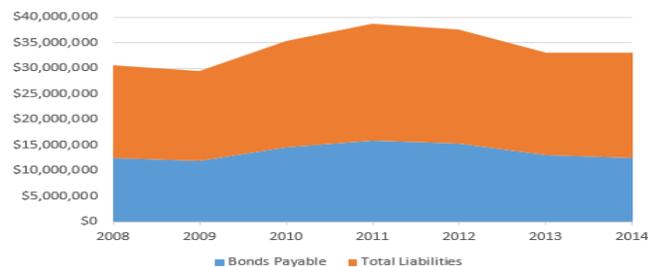
Figure 5: Major Funding Sources for Athens State (2008-2014) – Real Dollars



## Debt Burden

In a joint effort with Calhoun Community College to build a 44,000 square foot facility dedicated to the visual arts in Decatur, Athens State issued bonds. This action has increased the debt of the institution; thereby its total liabilities (see Figure 6). While the debt burden is currently at a sustainable level, leadership should carefully review the impact of issuing additional debt. As reported within the Athens News Courier (2015), under the current Phase II plan for the Alabama Center of the Arts, a second facility will be built to include a 200-seat black box theater, classroom space, and large recital room. Overall, the institution intends to make a \$6 million dollar investment into these new \$25 million dollar facilities. Of this investment, \$2 million will be coming from the Tennessee Valley Authority in lieu of tax funds earmarked for that project. According to the Vice President of Financial Affairs, there is no plan to issue additional debt for Phase II activities. In addition to constructing new facilities, the university should carefully consider deferred maintenance and capital upgrade needs of existing facilities.

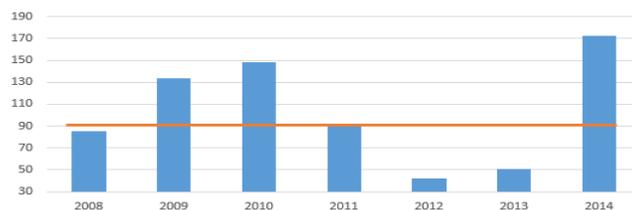
Figure 6: Athens State Debt Burden to Total Liabilities



## Cash Reserve Vacillations

Figure 7 reflects the number of days the university could cover operating expenses at the end of each respective fiscal period based on cash reserves. Lower targets raise concerns about an entity's ability to pay its bills, whereas higher reserves suggest the entity has excess cash on hand that could be invested. While most universities target three months of cash reserves, Athens has experienced fluctuations year to year. In 2012 and 2013, the university had a little over one month of cash reserves. One major factor giving rise to this condition included drawing down on existing cash reserves to pay off the remaining debt on the College Street Center property. During this same period, the University had invested in \$5,000,000 in municipal general obligation debt. While not considered a current asset, the investment was virtually risk-free and could have been readily converted to cash in the event of an institutional emergency. The institution has since sold this investment and currently stands at six months of cash reserves.

Figure 7: Days Cash on Hand



## IV. Benchmarking

Financial benchmarking, it has been suggested, brings performance information to the table “where resource allocation decisions are being made” (Lu, 2008, p. 3). However, many scholars suggest that the greatest effects of performance measurement occur at the early stages of strategic formulation (Melkers and Willoughby, 1998). “It is a piece of the process—not a panacea. Merely, one of many analytical activities to serve as a guide in planning” (Snell, 2000, p. 6). Financial measurement has most thrived where it has been built into important managing-for-results processes and where leadership support has been strong.

As noted previously, several authorities have highlighted the basic characteristics of a good set of financial measures to be used for benchmarking (Hatry, 2006; Poister, 2003; Ammons, 2001). A good set includes measures that are valid and reliable; the meaning of each measure is clear; the measures can be compiled in a timely fashion in order to be of value to operating managers; the measures are sensitive to data collection costs; they are designed in a manner that minimizes vulnerability to undesired behavior; the set of measures avoids redundancy; and they address the most important dimensions of an agency’s performance. Further, “GASB employs a concept that describes a broad measurement of financial health, encompassing both financial position and condition: economic condition.” (Mead, 2012, p. 286). From this perspective, economic condition collectively represents: service capacity, fiscal capacity, and financial position. This general criterion was applied when selecting 21 core measures used to compare ASU to the peer group.

Table 3: 21 Core Financial Indicators

Indicator	Formula
Resource Availability	Net Position / Total Expenses
Unrestricted Resource Availability	Unrestricted Net Position / Total Expenses
Equity Ratio	Net Position / Total Assets
Return on Net Position	Change in Net Position / Net Position, Beg.
Capital Asset Condition	Accumulated Depreciation / Capital Assets
Intergovernmental Revenue Ratio	Total Intergovernmental Revenue / Total Revenue
Quick Ratio	(Cash and Current Investments) / Current Liabilities
Current Ratio	Current Assets / Current Liabilities
Days Cash on Hand	(Cash & Equivalents) / (Oper. Exp. - Depr.) x 365
Debt to Net Position	(Total Liabilites - Def. Outflows) / Total Net Position
Debt to Total Assets	(Total Liabilities - Def. Outflows) / Total Assets
Times Interest Earned	(CF- Oper. + Interest Expense) / Interest Expense
Debt Service Coverage	(CF- Oper.) / (Interest Expense + Principal)
Debt Services to Total Expenses	(Principal and Interest Expense) / Total Expenses
Current Assets to Total Assets	Current Assets / Total Assets
Debt to Student Enrollment	Total Long-term Debt / FTE student enrollment
Tuition Revenue to Student Enrollment	Tuition Revenues / FTE student enrollment
Viability Ratio	Unrestricted Net Position / Total Liabilities
Self-Sufficiency	Tuition and Fees / Total Expenses
Net Position to Bonds Payable	Net Position / Total Bonds Payable
Total Liabilities to Net Position	Total Liabilities / Net Position

One method of assessing financial comparability includes a simple analysis of total assets, total revenues, and total expenses. When conducting this review, we validated previous research findings concerning the suitability of using the seven institutions for the purpose of comparing to ASU. The institutions in our sample were of a similar size and operational scope to ASU. Athens ranked fifth in total assets and third in total revenues and expenses, essentially serving as the median of the sample. As reflected in Table 4, the average assets, revenues, and expenses of the sample was similar to ASU. This provides a higher degree of confidence that the average financial indicator score of the peer group is an effective benchmark to use against ASU’s financial trends.

**Table 4:** Financial Composition of Peer Group (FY2013)

Institution	Total Assets	Rank	Total Revenue	Rank	Total Expenses	Rank
<b>Glenville State</b>	\$91,851,837	1	\$26,189,895	6	\$26,706,581	6
<b>Lewis &amp; Clark</b>	\$83,447,283	2	\$50,504,244	1	\$48,102,713	1
<b>Texas A&amp;M - San Antonio</b>	\$78,462,677	3	\$39,755,983	2	\$39,785,607	2
<b>Texas A&amp;M - Central Texas</b>	\$60,404,634	4	\$29,372,205	4	\$28,784,418	4
<b>Athens State University</b>	\$53,507,085	5	\$33,797,098	3	\$31,876,920	3
<b>Dickenson State</b>	\$45,434,801	6	\$26,888,054	5	\$28,376,344	5
<b>Oklahoma Panhandle</b>	\$31,940,413	7	\$20,100,084	7	\$21,953,229	7
<b>Mayville State</b>	\$30,509,577	8	\$19,394,991	8	\$17,966,270	8
<b>Mean</b>	\$59,444,788		\$30,750,319		\$30,444,010	

Objectives suitable for managing performance typically declare targets. Occasionally, professional standards will suggest an appropriate target; however, in most cases targets are tied to relative performance—perhaps setting a target of performing at a level greater than the median institution’s performance on some important financial metric. Often, targets are based on an institution’s own performance in the past. Although managers hope to improve performance every year and might be inclined to target improvement every year, a wiser move might be to tie their objective to a “moving average,” such as the most recent three-year average. That way, a slight drop-off from an excellent year could still be regarded as a successful continuation of a positive trend.

Table 5 provides a dashboard of financial trends and relative performance for the purpose of establishing institutional targets. In some cases, the trend is constant or performance is at average (reflected in gray). As highlighted in the table, financial performance is mixed. The institution is performing stronger than its peers across approximately half of the benchmark metrics. In many cases where the institution is below average, the long-term trend is positive suggesting improvement across this dimension.

Table 5: Summary Benchmarking Comparison

Indicator	Peer Comparison	Trend Analysis
Resource Availability		
Unrestricted Resource Availability		
Equity Ratio		
Return on Net Position		
Capital Asset Condition		
Intergovernmental Revenue Ratio		
Quick Ratio		
Current Ratio		
Days Cash on Hand		
Debt to Net Position		
Debt to Total Assets		
Times Interest Earned		
Debt Service Coverage		
Debt Services to Total Expenses		
Current Assets to Total Assets		
Debt to Student Enrollment		
Tuition Revenue to Student Enrollment		
Viability Ratio		
Self-Sufficiency		
Net Position to Bonds Payable		
Total Liabilities to Net Position		

	Above Average		Positive Trend
	Average		Neutral Trend
	Below Average		Negative Trend

## Financial Position

Financial position is the status of a university's assets, deferred outflows, and net position, as reflected in the basic financial statements. Figures 8 and 9 represent a comparison of the aggregate net position amount to the university's overall level of financial activity. In other words, this is basically a common-size ratio of financial position. Implicit in these types of comparisons is the conception of net position as a "reserve" that the university may draw down when needed to finance unplanned expenses or hedge against revenue shortfalls. When viewed from this context, it is most appropriate to focus on unrestricted resource availability (see Figure 9).

While Athens State falls below its peers when accounting for total net position, the institution is continuing to improve in this area. A below average score in this category is most likely a reflection of the fact Athens State possesses fewer physical buildings, land, and other capital assets in relation to other regional schools which are commonly integrated with a larger State public institution, such as the Texas A&M land-grant campuses. With that said, Athens State has been generally outpacing the peer group in building sufficient "unrestricted" resources, a factor arguably more important to monitor as these resources could most readily be used in the event of a rapid and unplanned event.

Figure 8: Resource Availability

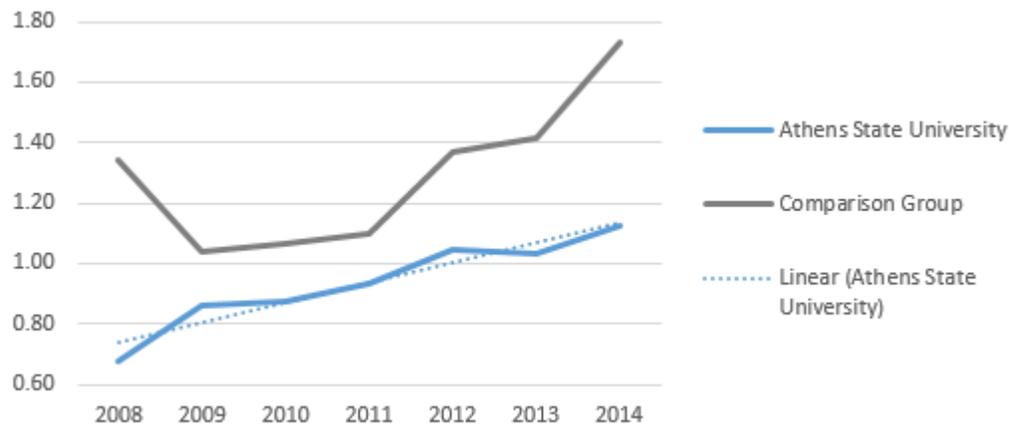
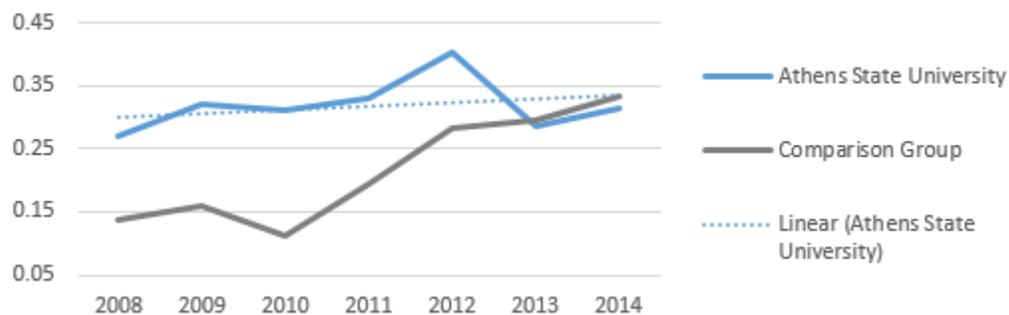


Figure 9: Unrestricted Resource Availability



n = 8 (unless otherwise stated)

The equity and return on net position indicators are similar to the widely applied return on investment or total assets metrics used within the private sector. Figure 10 and 11 essentially reflect how much residual resources, similar to a business profit, were generated from existing assets and reserves. While Athens State performed below their peers in both of these categories, the institution is maintaining sufficient reserves. Additionally, the graph may merely be a reflection of the fact that revenues are being reinvested into funding current capital projects and strategic initiatives, as opposed to building huge stockpiles of reserves. The spike in FY2012 in Figure 11 can be attributed to a major capital transfer into the Texas A&M system.

Figure 10: Equity Ratio

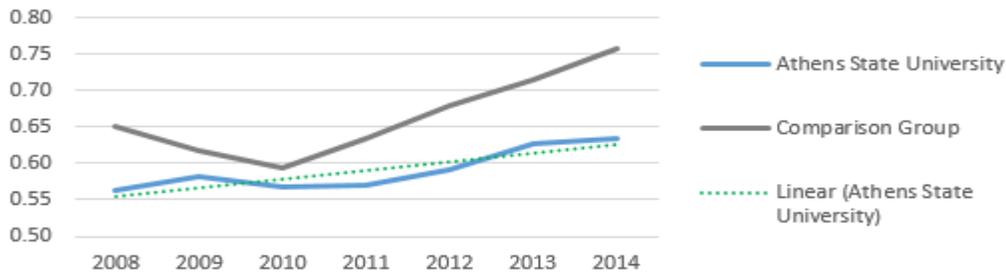
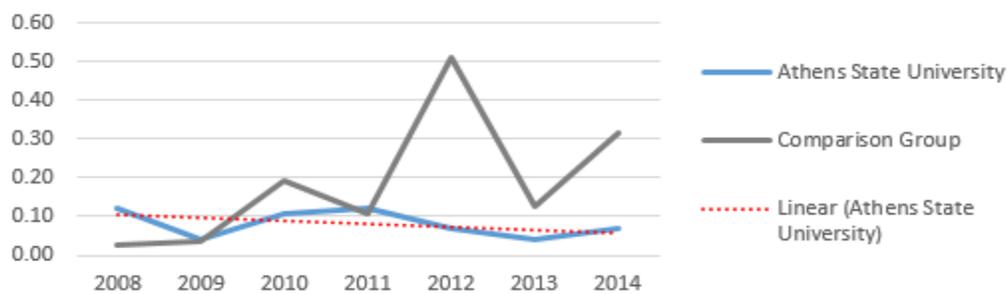
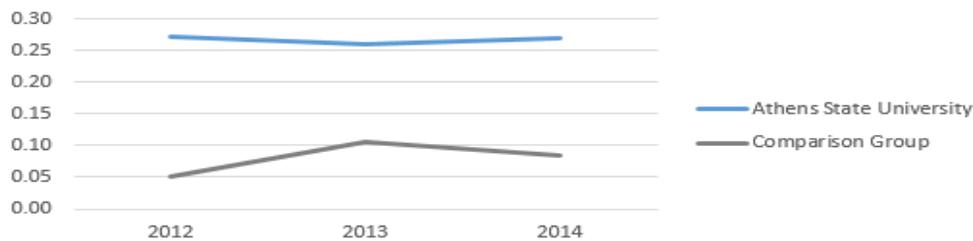


Figure 11: Return on Net Position



The capital asset condition ratio is a reflection of the extent to which capital assets, such as buildings, have been depreciated, a method of systematically assigning an asset's cost over a number of years. At a more simplified level, this is an indicator of age. Given the fact that some Athens State buildings date back to the 19<sup>th</sup> century, it should come as no surprise that the condition of many of these assets are near or have exceeded their useful life. Due to data disclosure limitations, only three institutions could be benchmarked, but the small sample suggests that Athens facilities are generally older than other campuses.

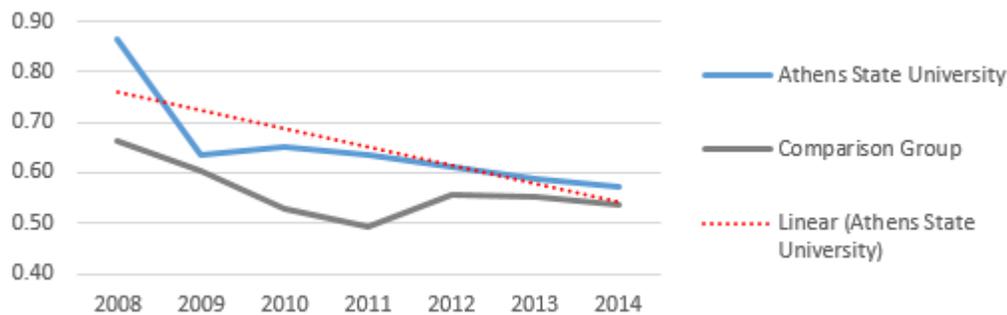
Figure 12: Capital Asset Condition Ratio



n = 3

While operating under the governance of the Alabama Community College System (ACCS), Athens State was more dependent upon federal and state aid to subsidize the cost of student tuition. Since attaining independence from ACCS, intergovernmental aid has been in steady decline (see Figure 13). Intergovernmental support is forecasted to fall below the comparison group in the future. If one is an advocate of the institution striving for privatization, this trend could be viewed favorably. Given the fact the institute is public with the aim of keeping the cost of tuition affordable, the trend was viewed unfavorably for the purpose of this study. As the institution caters to low-to-middle income students, a well-diversified revenue source will help ease unforeseen declines in enrollment or broader downturns in the regional or national economy.

Figure 13: Intergovernmental Revenue Ratio



### *Fiscal Capacity*

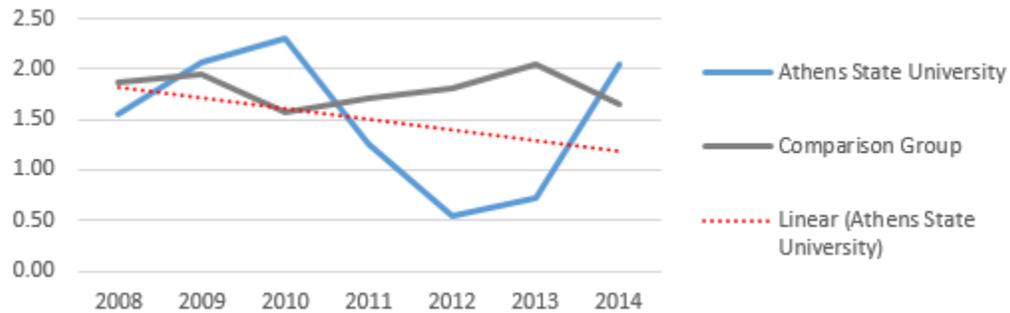
Fiscal capacity gauges the institution’s ability to address its financial obligations as they come due on a periodic basis. A university’s ability to meet its obligations can be examined on two levels: 1) short term using liquidity measures, 2) long term using solvency measures.

### *Liquidity Ratios*

Liquidity relates to the availability of resources to finance near-term obligations. In other words, these ratios are focused on the institution’s ability to pay for its most immediate obligations. Stated simply: does the university have enough cash on hand to pay the bills when they come due?

The quick ratio compares only the most liquid assets of a university, generally cash or cash equivalents or short-term investments (see Figure 14). This is a more conservative indicator of an institution’s ability to meet obligations, assuming implicitly that its current liabilities will come due so soon and that other current assets cannot be converted to cash (liquidated) quickly enough to pay for them. While other institutions have maintained quick ratios in the range of 1.5 to 2.0, Athens State has experienced higher levels of volatility the past seven years. For instance, between the years 2011 and 2013, the institution fell below the desired minimum threshold of 1.0, largely due to paying off outstanding debt with cash reserves and investing in municipal bonds. Although the institution has been trending towards less liquidity, the cash position improved notably in FY 2014 after these non-current investments were sold.

Figure 14: Quick Ratio



Another measure of liquidity is the current ratio, which relates all current assets, including inventory that can be sold, to current liabilities (see Figure 15). Athens State maintains a slightly lower current ratio from its peers averaging approximately 2.5 the past three years. In essence, this ratio suggests that for every dollar of current liabilities ASU has \$2.50 dollars in current assets. Some observers think that the smaller the liquid ratio is, the less likely the university will be able to cover its obligations as they become due or expected to be paid in the next year. On the other hand, others argue that a higher ratio suggests that more of a university's resources are in the form of cash or near-cash assets than is necessary to pay bills as they come due. In our opinion, the University should maintain resources at a level of 2.0 or higher given the long-term decline in this category.

Figure 15: Current Ratio

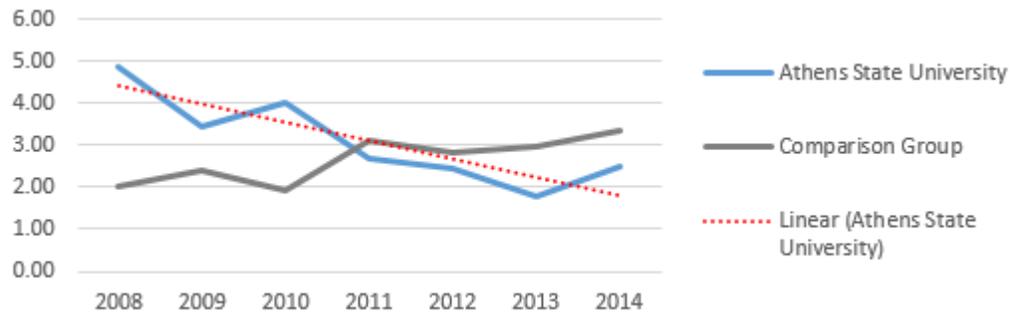
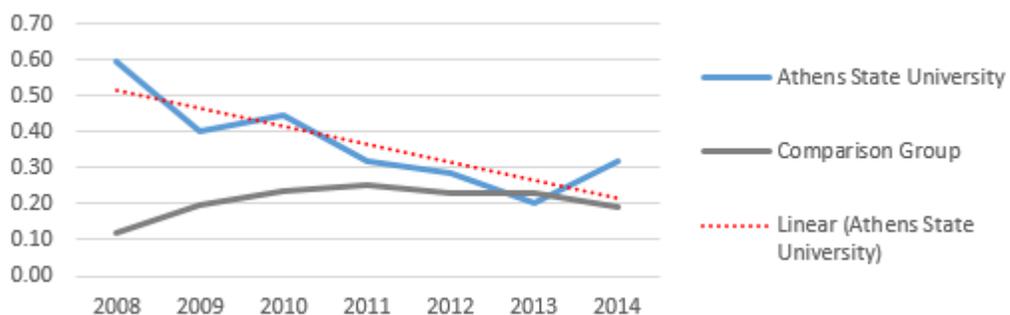
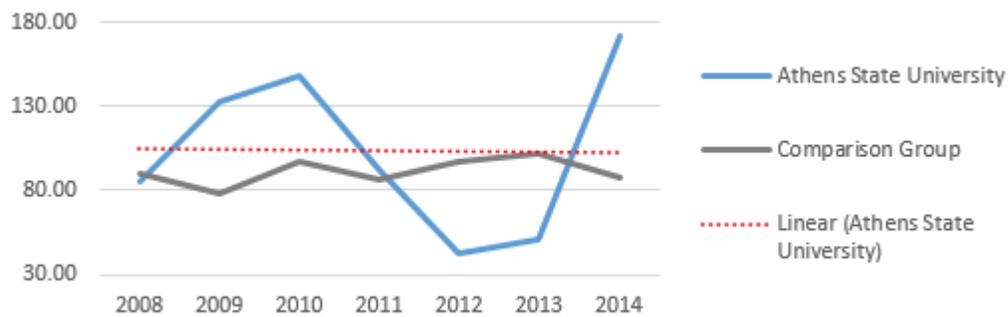


Figure 16: Current Assets to Total Assets



A final measure of liquidity commonly applied is the days cash on hand ratio (see Figure 17). This is a conservative ratio that focuses not on current assets, but cash and near-cash investments. For many individuals, this is a more intuitive indicator of the institution’s ability to pay current obligations. This indicator suggests the university currently has enough cash on hand to cover its operating expenses for almost six months. “The ratio can be interpreted much like other liquidity ratios – lower ratios may raise concerns about an organization’s ability to pay its bills on time, whereas higher ratios may indicate that a university has excess cash on hand that could be invested to produce additional reserves” (Mead, 2012, p. 298). As reflected in the figure, the average institution tends to maintain approximately 90 days (or three months) of cash reserves. In the case of Athens, these reserves have deviated significantly from this normal range, both up and down, largely due to debt management and investment practices.

Figure 17: Days Cash on Hand



**Solvency Ratios**

Like liquidity ratios, solvency ratios are used to examine a university’s ability to fulfill its obligations. But solvency ratios focus on an institution’s *long-term* obligations. Solvency ratios “alert an organization to trouble down the road and it may also shed light on why it is struggling in the short run” (Bowman, 2007, p.1). Solvency ratios come in two general forms: leverage and coverage. Leverage ratios measure the degree to which an institution’s assets are financed through borrowing and other long-term obligations. Two ratios that are variations of the basic accounting equation (assets + deferred outflows - liabilities - deferred outflows = net position) include debt-to-assets or debt to net position. At Athens State, over 35% of assets are financed with debt. This is about 40% higher than the average institution (see Figure 18). With that said, Athens State debt to net position ratio is more in line with the national average (see Figure 19). For every dollar of resources available for delivering instructional services, it owes just over 55 cents.

Figure 18: Debt to Total Assets

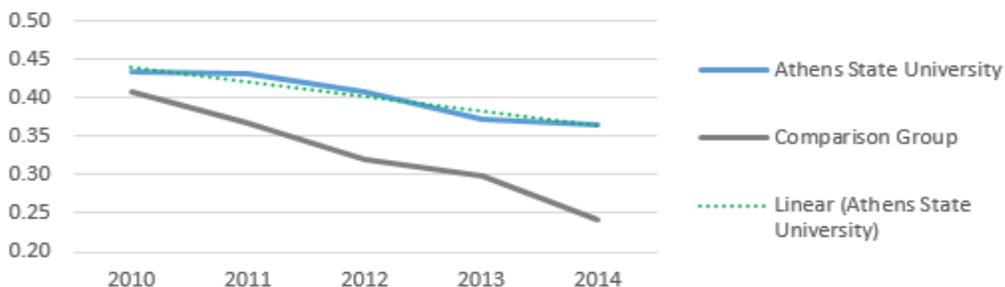
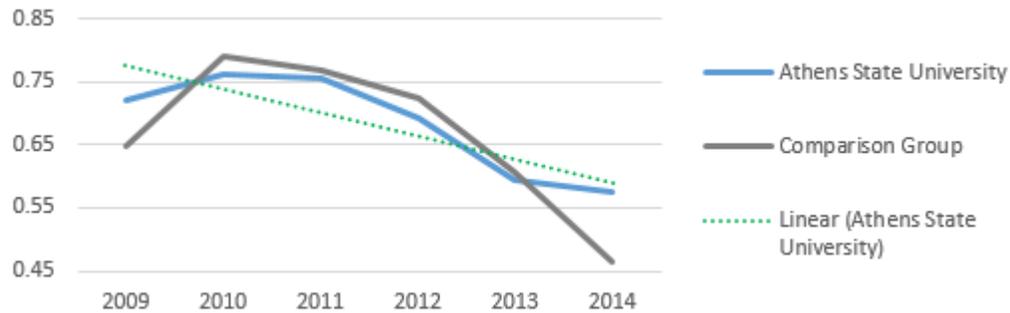


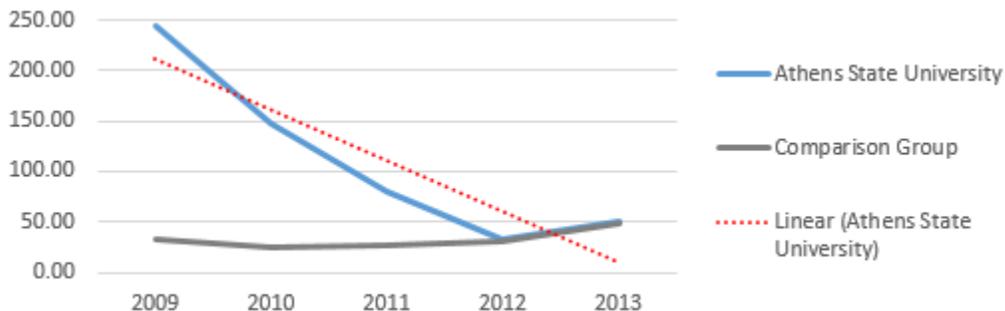
Figure 19: Debt to Net Position



*Coverage Ratios*

Coverage ratios are used to measure the ability of the institution to persist over prolonged periods. Debt holders are especially interested in the organization’s ability to pay interest and the face value of the bond near maturity. The interest coverage ratio in particular compares cash flows generated by operations to interest payments on debt (see Figure 20). A times-interest-earned ratio of 50 suggests the university will have about 50 times as much cash as will be needed to make its annual interest payments on long-term debt. Athens State interest payments in relation to cash have been falling over time, but are currently in line with the comparison group.

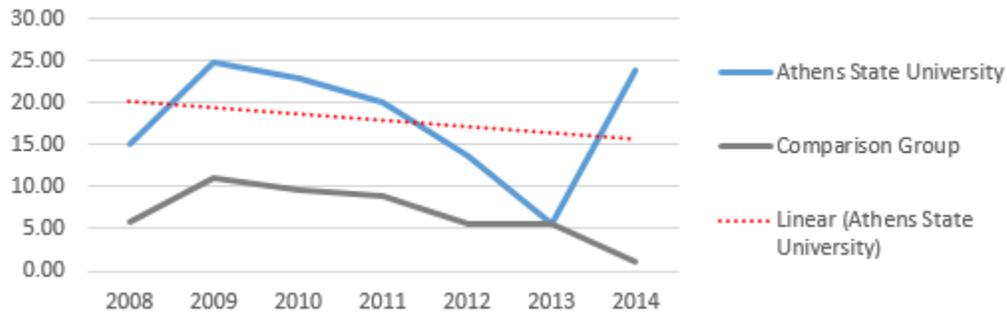
Figure 20: Times Interest Earned



n = 4

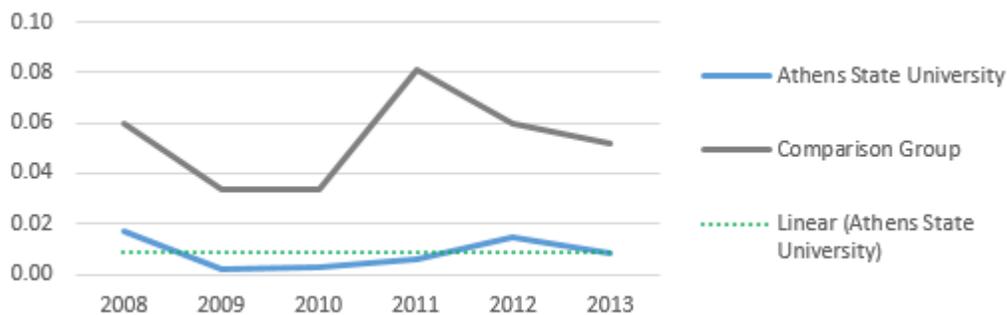
Debt service coverage compares the institution’s cash flows with organization’s entire debt repayments, both interest and principal (see Figure 21, 22, & 23). Anthony and Young (2005) highlight the importance of monitoring risk associated with carrying large levels of debt by watching solvency measures. A common problem is that principal repayments can differ year to year due to the structure of the bond, refunding, or defeasement. As such, it can prove difficult to benchmark institutions within this category. In order to calculate the ratio, the portion of the reduction related to the refunding should be removed because it is not a part of the typical, recurring annual principal repayment will face in future years. A variation of the coverage ratio is the debt service to total expenses ratio and net position (aka equity) to bonds payable. As reflected in both charts, Athens State has greater capacity to pay its debt obligations than its peers (albeit this unique position has been diminishing in recent years as the institution makes new capital investments).

Figure 21: Debt Service Coverage



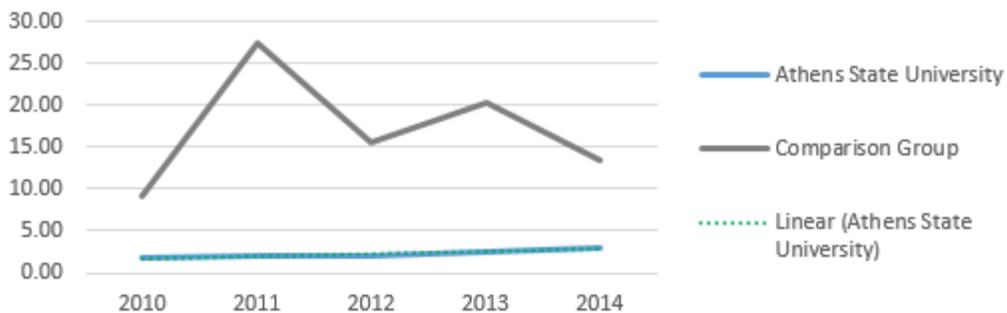
n = 3

Figure 22: Debt Service to Total Expenses



n = 6

Figure 23: Net Position to Bonds Payable



A final set of ratios commonly used to evaluate solvency within a university environment is the liabilities to net position and long-term debt to student enrollment ratios (see Figure 24 and 25, respectively). The total liabilities to net position ratio is in line with the comparison group and has been declining in recent periods. In a similar manner, “public universities debt is often compared to relevant indicators of activity” (Mead, 2012, p. 294). Unlike a government’s taxpayers, current students are not responsible for paying long-term liabilities. Of course, a portion of their tuition and fees are commonly used to pay current obligation on this debt. With that said, if an institution finds this ratio climbing (or much higher than its peers), this can be a red flag for the entity’s ability to survive over an extended period of time. Athens State carries low levels of debt in relation to its peers. This trend has been constant in relation to enrollment.

Figure 24: Total Liabilities to Net Position

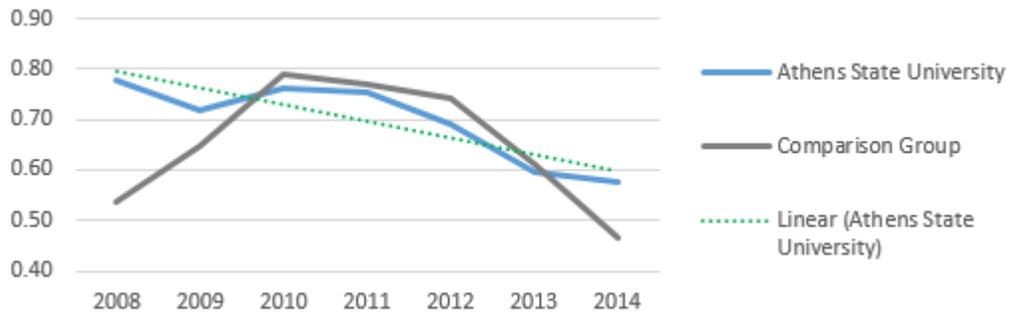
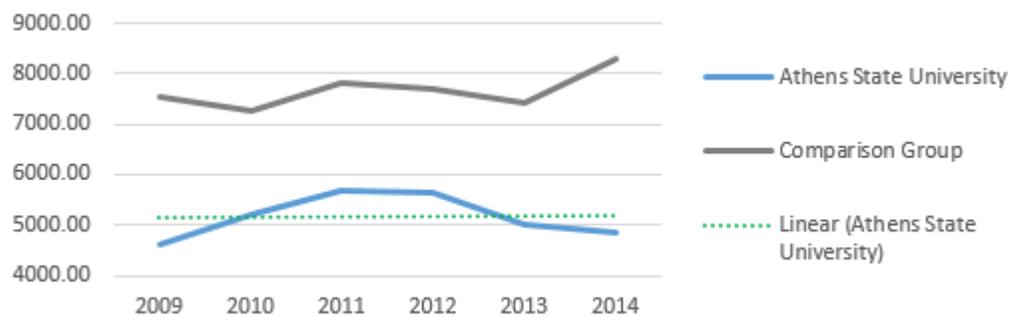


Figure 25: Long-term Debt to Student Enrollment

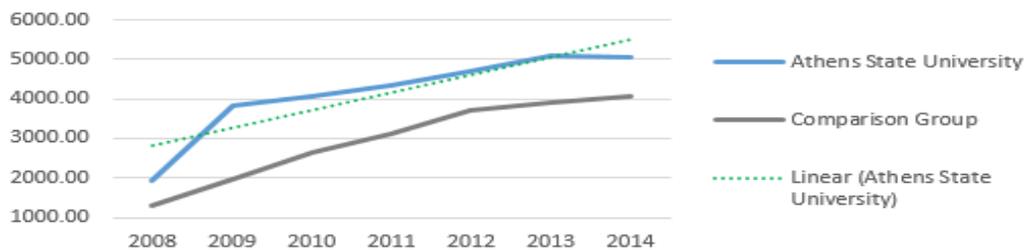


*Ability to Pay*

A set of ratios that address similar concerns as coverage ratios, or the ability to meet commitment to provide services on an on-going basis, are referred to as ability-to-pay ratios. “By combining financial statement information with certain nonfinancial data and comparing the resulting ratios over time and with other, similar institutions, one can gain insights into a university’s financial capacity” (Mead, 2012, p. 293). As a general rule, these ratios compare revenues, expenses, and outstanding debts with economic indicators.

A common ability-to-pay ratio for revenues compares specific revenues with the economic base they are derived from, such as tuition to student enrollment. When focusing on tuition trends, we find that Athens State has been able to collect more tuition revenue from their students than the peer group and the pace of tuition revenues continues to climb.

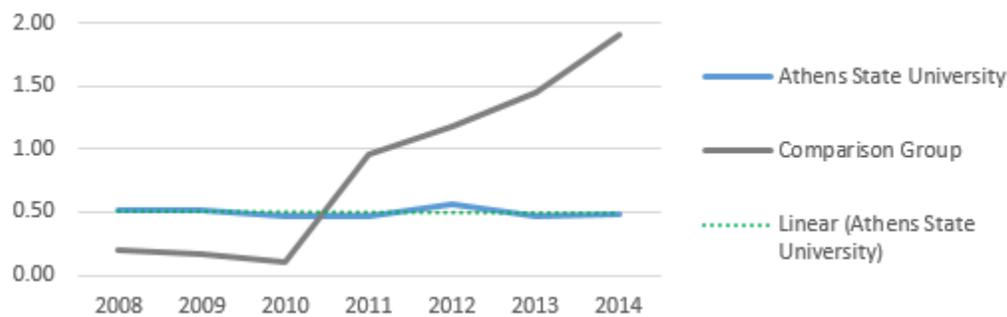
Figure 26: Tuition Revenue to Student Enrollment



Closely related to activity measure used above is the self-sufficiency ratio, which reflects the extent to which the institution relies upon own-source revenue (e.g., tuition and fees, auxiliary revenues, etc.). In relation to its peers, the institution is more self-sufficient and continues to become more independent as time passes (see Figure 2 - pg. 8).

The flip-side of ability-to-pay is exposure to risk (see Figure 27). The risk exposure ratio focuses on revenue sources that are potentially subject to large, abrupt changes, specifically investment income and intergovernmental aid. The ratio expresses the percentage increase in tuition hikes that would be required to make up for a one percent shortfall in those two sources of funding. In other words, a one percent shortfall in those revenues would require a 0.5% increase in the general tuition rate. Mead (2012) highlights “if the university does not have much available capacity to raise revenues or borrow because its taxes and debt are already relatively burdensome compared with other, similar governments, then a high risk exposure ratio could be a cause for concern. The entity may not have the financial wherewithal to effectively respond to a downturn in those revenue sources” (p. 300). As reflected in the figure below, the University’s viability is sound, which is certainly a positive indicator in light of on-going funding cuts from the federal and state government level in past years.

Figure 27: Viability Ratio

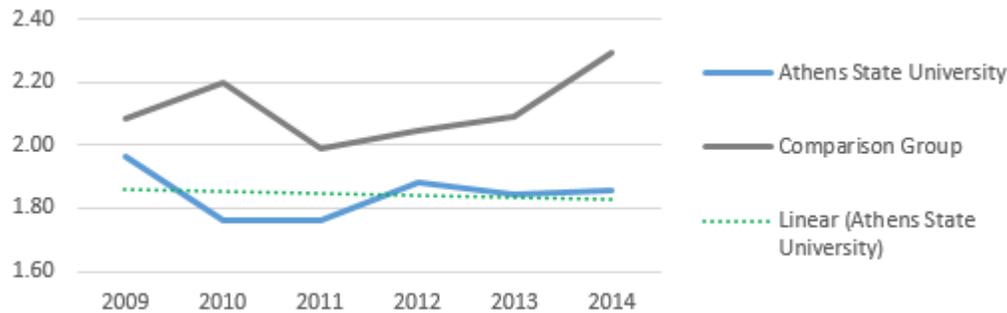


A final set of measures only briefly addressed in this study relates to efficiency. Common metrics in this family of measures, includes accounts receivable turnover, unpaid claims, days inventory, etc. Basically, these ratios are used to assess the efficiency with which an organization utilizes resources. While many measures can be appropriate for day-to-day business management purposes, we elected to focus on a more global efficiency measure. The operating expense ratio compares operating expenses, such as instruction and support services, in relation to operating revenues, as defined under NACUBO standards.

We find in relation to other institutions Athens State spends less of its operating revenues on operating expenses (see Figure 28). This can suggest a few trends: 1) certain business activities are losing money, as evidenced by the auxiliary units operating losses, 2) a higher percentage of operating revenues are used to offset non-operating activities, such as serving debt, 3) the institution is building reserves using operating revenue. This explains in part why the institution has a stable net position. Preserving operating revenues in a rainy day fund ensures a higher level of stability; on the flip side, supporting operating units unrelated to the core operations of the university that are losing money or using operating revenues to offset non-operating activities suggests current service recipients are paying for investments that will predominately benefit future service recipients. While this measure is neither good nor bad, the appropriate funding level

established should be largely established based on the strategic priorities of the institution and clearly communicated to relevant stakeholders.

Figure 28: Operating Expense Ratio



## V. Recommendations

Outstanding organizations in the private and public sectors have long been recognized for being extraordinarily mission-driven, focused on results, and committed to tracking and acting on financial data (Drucker 1975, Peters and Waterman 1982, Osborne and Gaebler 1992). Establishing a results orientation requires leadership, hard work, and persistence. The fact that Athens State executive leadership has commissioned this very study serves as a great example of such leadership. With that said, on-going monitoring of financial indicators and adoption of financial management best practices will serve as further evidence of a commitment being made towards maintaining long-term sustainability.

### Recommendation #1 - Diversify Revenue Streams

To address intergovernmental revenue declines Athens State should secure meaningful commitments from leading state officials—ideally, both executive and legislative—to provide the flexibility to expand existing academic programs and sustain or expand state appropriations. In effort to diversify revenue sources, greater attention and efforts should be placed on making all auxiliary programs profitable in the near term. These activities within the university should be evaluated as separate business units and held accountable for results. Faculty and student organizations could offer a wide range of training and support services at a variable rate (based on service demand). Serious performance management initiatives require unambiguous objectives that focus the efforts of management on important, realistic, and achievable results. This focus on results differs sharply from an approach focusing only or primarily on process—e.g., to offer a fixed number of training session without consideration to cost or engagement.

In addition to leveraging faculty expertise for auxiliary activities, the institution should incentivize existing faculty to pursue federal, state, and local research grants and/or consulting contracts. Using a pre-determined overhead rate, ASU employees that successfully secure outside resources should be incentivized and rewarded. One approach could be to pay above their standard salary for the amount earned, while the institution retains a portion of the grant or contract revenues. In essence, this would create a low risk revenue stream for the institution. If money is not secured, then the bonus is not received. If all full-time faculty were able to secure \$6,000 annually in outside grants or contracts at a 40% indirect rate, this would

generate over \$200,000 in profits for the institution and provide faculty with additional earnings at a time when salary increases have remained stagnant.

If the university achieved a high level of research grant and contract activities, a self-sustaining grant writer and contracts manager position may prove useful in coordinating and ensuring compliance with federal, state, and local laws and regulations. Given the volume of current sponsored research activities, such a position may not be warranted at this time. Accompanying this position, should be a strong institutional review board process. “Real development management requires an active strategy. It requires energetic leadership. It requires a leader, or a team of leaders, to make a conscious effort to change the behavior of the individuals who work for the organization and its collaborators” (Behn, 2002, 19).

### **Recommendation #2: Revise Budgeting Process and Expand Role of Budget Advisory Committee**

While the purpose of this study was to provide feedback on the institution’s financial condition and viability, a central tenet of sound fiscal management which ultimately supports a strong financial position is an effective and robust budgeting process. The purpose of budgeting is to allocate funds to achieve desired outcomes (Shim, Siegel, & Shim, 2012). Currently, the Budget Advisory Committee (BAC) at Athens State University operates in an advisory and recommendation mode only. The BAC utilizes a budget hearing process with budget managers making budget requests via pre-formatted worksheets for: (1) additional faculty or staff, (2) program review for requested new faculty, (3) department operating budget, and (4) critical needs. As such, the current budget process essentially utilizes an incremental approach to budgeting in which the prior year’s budget allotment is used by budget center managers as a baseline for determining the next upcoming fiscal year’s budget request.

It is recommended that a staggered zero-base budgeting process be implemented in order to provide a programmatic review of each budget manager’s area of responsibility. Using zero-base budgeting, “each manager must justify a budget request in detail, beginning with the zero balance. It can lower production, service, and operating costs” (Shim et al., 2012, p. 411). A staggered approach to zero-based budgeting could be utilized by the BAC in order to not require each budget manager to build their budget from zero each fiscal year. Zero-base budgeting is a priority form of budgeting that is used by budget managers to review programs in their entirety and results in an optimum allocation of resources (Shim et al., 2012). If necessary, reallocation of existing resources from weakest to strongest programs cannot be effectively accomplished “without rigorous, effective, and academically responsible prioritization” (Dickeson, 2010, p. 15). A staggered approach to utilizing zero-based budgeting would provide the means by which effective prioritization and allocation of resources is gradually achieved at Athens State University.

As the institution seeks to expand the Alabama Center of the Arts through new capital expansions, such as Phase II development, careful consideration should be given to existing debt management practices. While the institution is less leveraged than many of its peers, this situation is quickly changing. Since the organization is not significantly diversified in funding sources, a downturn in enrollment could create fiscal strains in attempting to service mounting debt. Deferred maintenance needs will also need to be addressed due to the institution’s aging infrastructure. A conservative debt management plan is advised.

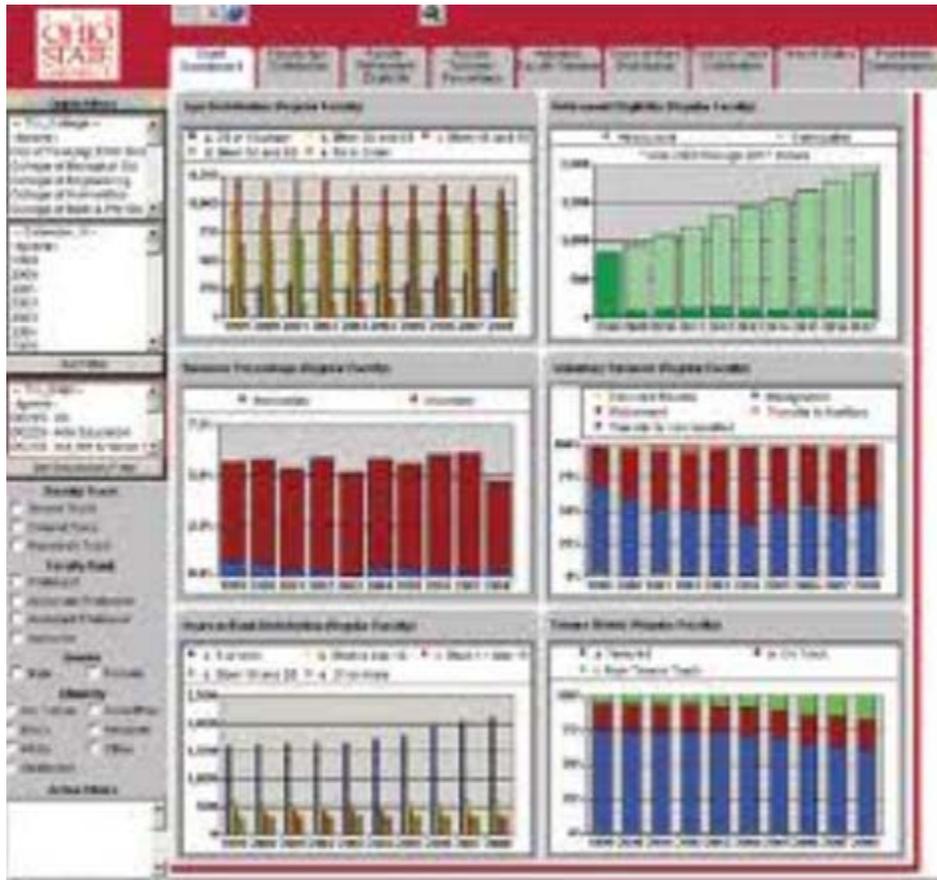
To ensure adequate debt management controls are in place we encourage executive leadership to either expand the BAC responsibilities to not only include operational budgeting oversight, but also capital budgeting activities. Alternatively, an ad hoc committee focused exclusively on debt management or investment management activities could be formed when needed. As part of this process, a more formal process of stakeholder involvement around bond offers, especially relating to the collection, reporting, feedback, audit, and pro forma use of information, should be established. Deciding who will be responsible for establishing debt thresholds and the frequency of updates will be important. Even more important are decisions about how debt decisions will be reviewed and by whom, how follow-up and feedback will be provided, how data will be periodically audited, how the organization will build financial and nonfinancial data into major management processes for the purpose of developing accurate debt service forecasts.

### **Recommendation #3: Update Financial Management Policies and Financial Dashboard**

Our study revealed high levels of liquid volatility. Such risks can be readily mitigated through the establishment of a cash management policy. While the Finance and Business operations unit has developed operating procedures that include, but are not limited to: job roles, procurement practices, accounting rules; formal financial management policies have not yet been adopted. For example, the institution could establish a formal policy for maintaining “rainy day” case reserves within a relevant minimum range, such as three months (which appears to be the average across other institutions). The institution could also clearly articulate standards for closing or eliminating unprofitable auxiliary operating units. As the finance office is currently in the process of updating accounting procedures, the establishment of financial goals and targets could be incorporated into the operating document (or highlighted elsewhere in the University’s strategic publications). Well-articulated objectives and targets have a further advantage, they usually make the design of performance measures and program evaluation simple.

As a closely interrelated step, the institution should seek continuous improvement benchmarking initiatives. Creating a dashboard of key indicators (see Figure 29), monitoring these indicators on an annual basis, and comparing performance to an expanding list of peers would serve the institution well. The organization should be encouraged to recognize that financial and performance benchmarking provides an opportunity to reassess goals and objectives, establish priorities, engage employees and students, influence performance improvements, and document the institution’s progress. Both financial and non-financial (e.g., service efforts and accomplishments) should be actively monitored on a single dashboard. Holzer and Yang (2004) perceive an added benefit when subjective opinions held both within and outside the agency are replaced by objective facts and figures. “Measurement provides an opportunity to present evidence that the public sector is a public bargain, to highlight the routine but important services that public servants quietly provide and to answer the public’s sometimes-angry questions and implicit suggestions on a dispassionate basis. Measurement helps to move the basis of decision-making from personal experience to proof of measurable accomplishment or lack thereof” (p. 16).

Figure 29: Illustrative Financial Indicators Dashboard (The Ohio State University)



Source: NACUBO (2014)

## VI. Appendix

Institution	Athletics	Housing	Food Services	Parking	Continuing Education	Library	Bookstore	Student Activities	Vending	Printing	Other
Athens State University			X		X		X	X	X	X	
Lewis & Clark	X	X	X		X		X	X	X		X
Texas A&M - San Antonio		F		X			X				X
Texas A&M - Central Texas	X	X	X				X				
Glenville State	X	X	X	X		X	X	X			X
Dickenson State	X	X	X	X		X	X				X
Oklahoma Panhandle	X	X	X	X	X		X		X		X
Mayville State	X	X	X		X	X	X				X

**X** - Evidence of Auxiliary activity based on financial notes or official University website.

**F** - Future auxiliary activity of the institution.

**Blank** - Research team could not find evidence of the activity, but this should not be construed as absolute evidence the university does not engage in the activity. Positive confirmations were beyond the scope of the study. As such, the chart is merely a reflection of “tentative” survey results.

## VI. References

- Ammons, D.N. (2001). *Municipal Benchmarks*, second edition. Thousand Oaks, CA: Sage.
- Anthony and Young (2005). *Financial accounting and financial management*. San Francisco, CA: Jossey-Bass.
- Athens State University Report of Independent Auditors (2008-2014)*.
- Behn, R. (September 2002). The Psychological Barriers to Performance Management. *Public Performance & Management Review*, 26(1), pp. 5-25.
- Bowman, W. (2007). *Beyond the Bottom Line: Understanding & Promoting Nonprofit Financial Sustainability*. DePaul University.
- Bronner, D. (March 2015). Hard Choices Ahead. *The Advisor*, Vol. XL, 9, pg. 2.
- Dickeson, R. C. (2010). Prioritizing academic programs and services: Reallocating resources to achieve strategic balance. San Francisco, CA: Jossey-Bass.
- Drucker, P. (1975). *Management: Tasks, Responsibilities and Practices*. New York: Harper Row.
- Glenville State College Report of Independent Auditors (2008-2013)*.
- Hatry, H.P. (2006), *Performance Measurement: Getting Results*, 2nd edition. Washington, D.C.: The Urban Institute Press.
- Holzer, M. and Yang, K. (2004). Performance Measurement and Improvement, *International Review of Administrative Sciences*, 70(1), pp. 15-31.
- North Dakota University System Report of Independent Auditors (2010-2014)*.
- Lewis-Clark State College Report of Independent Auditors (2009-2013)*.
- Mead, D. (2012). *An Analyst's Guide to Government Financial Statements*, second edition. Norwalk, CT: Government Accounting Standards Board.
- Melkers, Julia and Willoughby, Katherine. (March/April 2005), Models of Performance-Measurement Use in Local Governments, *Public Administration Review*, 65(2), pp. 180-190.
- Oklahoma Panhandle State University Report of Independent Auditors (2010-2014)*
- Osborne, D. and T. Gaebler (1992). *Reinventing Government*. Reading, MA: Addison-Wesley.
- News Courier (July 4, 2014). Alabama Center for the Arts to Break Ground on Phase II.
- Peters, T.J. and R.H. Waterman, Jr. (1982). *In Search of Excellence: Lessons from America's Best-Run Companies*. New York, NY: Harper & Row.

Poister, T.H. (2003). *Measuring Performance in Public and Nonprofit Organizations*. San Francisco, CA: Jossey-Bass.

Shim, J. K., Siegel, J. G., & Shim, A. I. (2012). *Budgeting basics and beyond*. (4<sup>th</sup> ed.). Hoboken, N. J.: John Wiley & Sons, Inc.

Snell, R.K. (August, 2000). "Lessons Learned: What Experience Teaches about Performance-Based Budgeting" National Conference of State Legislatures.

*Texas A&M University – Central Texas Annual Financial Report – Unaudited (2011-2014)*

*Texas A&M University – San Antonio Annual Financial Report – Unaudited (2011-2014)*

Trussel, J., and Parsons, L. (2008). Financial Reporting Factors Affecting Donations to Charitable Organizations. In Reckers (ed.), *Advances in Accounting*. 23, 263-285.