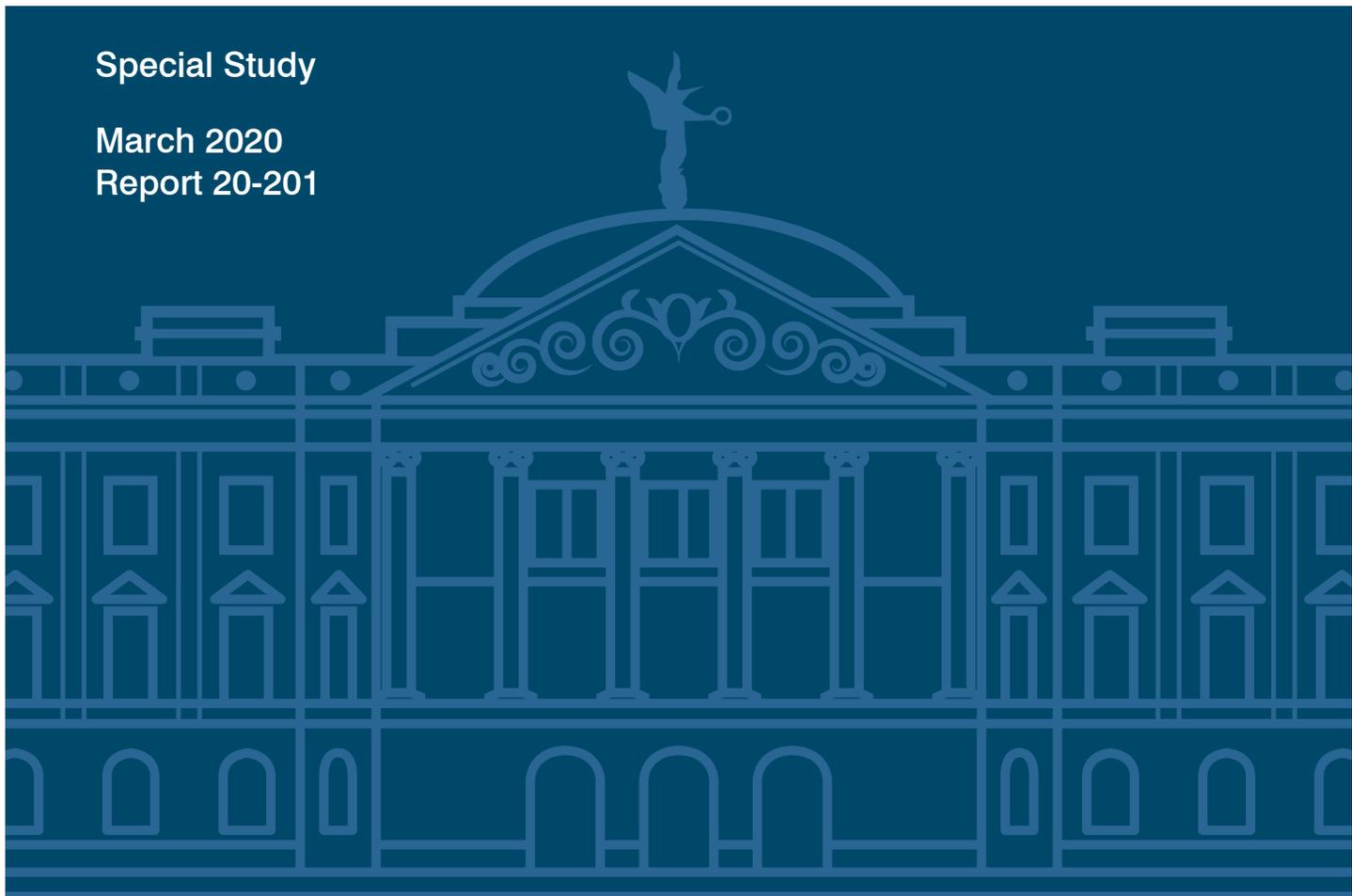


Arizona School District Spending Fiscal Year 2019

Special Study

March 2020
Report 20-201



A Report to the Arizona Legislature

Lindsey A. Perry
Auditor General





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March 4, 2020

Members of the Arizona Legislature

The Honorable Doug Ducey, Governor

I am pleased to present our report, *Arizona School District Spending, Fiscal Year 2019*, prepared in response to the Arizona Revised Statutes §41-1279.03 requirement to determine the percentage of every dollar Arizona school districts spend in the classroom. The report analyzes instructional spending as well as noninstructional spending, which includes administration, plant operations, food service, transportation, student support, and instruction support. It also includes analyses of nonoperational spending, which includes the acquisition of capital assets, interest, and programs outside the scope of preschool through grade 12 education. Further, the report contains a 1-page summary for each district and the State showing their performance on various financial and student measures. To provide a quick summary for your convenience, I am also including a copy of the Report Highlights.

In fiscal year 2019, Arizona districts spent 54.7 percent of available operating dollars on instruction, marking the third consecutive year with an increase in the instructional spending percentage in 15 years. However, since its peak in fiscal year 2004, the State's instructional spending percentage has declined 3.9 percentage points, while the percentages spent on most other operational areas have increased. Between fiscal years 2018 and 2019, districts' operational spending increased by \$475 million with \$310 million of the increase spent on instruction. During this same time period, the State's average teacher salary increased \$3,490, or 7.1 percent, to \$52,441. Compared to national averages, in fiscal year 2019, Arizona districts spent approximately \$3,100 less per pupil and allocated their resources differently, spending a lower percentage of resources on instruction and administration and a greater percentage on all other operational areas.

Although factors outside a district's control—such as district size, type, and location—can affect its efficiency in noninstructional areas, some districts operate efficiently and have lower costs despite these factors, while others do not. As a result, there are wide ranges of costs within peer groups of similar districts. Our performance audits of school districts have identified practices efficient districts use, as well as practices that make other districts less efficient.

Finally, as part of the electronic version of this report available on our website, we present for the third year a Microsoft Excel data file, which contains the numbers and other information presented in the graphics on the school district and State summary pages.

My staff and I will be pleased to discuss or clarify items in the report.

Sincerely,

Lindsey Perry, CPA, CFE
Auditor General



Arizona School District Spending Fiscal Year 2019

CONCLUSION: In fiscal year 2019, Arizona districts spent 54.7 percent of available operating dollars on instruction, marking the third consecutive year with an increase in the instructional spending percentage in 15 years. However, since its peak in fiscal year 2004, the State's instructional spending percentage has declined 3.9 percentage points, while the percentages spent on most other operational areas have increased. Between fiscal years 2018 and 2019, districts' operational spending increased by \$475 million with \$310 million of the increase spent on instruction. During this same time period, the State's average teacher salary increased \$3,490, or 7.1 percent, to \$52,441. Although factors outside a district's control—such as district size, type, and location—can affect its efficiency in noninstructional areas, some districts operate efficiently and have lower costs despite these factors, while others do not. Finally, Arizona school districts spent about \$3,100 less per pupil than the national average and allocated their resources differently, spending a lower percentage of resources on instruction and administration and a greater percentage on all other operational areas.

Instructional spending increased to 54.7 percent but remains lower than highest level spent since monitoring began in 2001

In fiscal year 2019, instructional spending percentage increased 0.7 percentage points, representing the largest single year increase since monitoring began—In fiscal year 2019, Arizona school districts spent 54.7 percent of available operating dollars on instruction. This is a 0.7 percentage point increase over the 54 percent spent on instruction in fiscal year 2018 and is the largest single year increase since we began monitoring instructional spending in fiscal year 2001. In that year, Arizona districts spent 57.7 percent of available operating dollars on instruction. Then in fiscal year 2002, districts began receiving Classroom Site Fund monies intended to increase instructional spending. Soon after, in fiscal years 2003 and 2004, the State's instructional spending percentage reached its highest level at 58.6 percent. However, the percentage of monies spent on instruction declined nearly every year between fiscal years 2004 and 2016, before increasing 3 years in a row.

District operational spending increased \$475 million between fiscal years 2018 and 2019 with \$310 million of the increase spent on instruction—Since fiscal year 2016, Arizona school districts' operational spending increased by approximately \$936 million, or \$1,159 per pupil. Slightly over half of this increase, or \$475 million of it, equaling \$609 per pupil, occurred between fiscal years 2018 and 2019. These increases were predominately the result of additional monies districts received from Proposition 123 and for teacher salary increases through the State budget. Although it cannot be determined how districts spent these additional monies, districts spent approximately \$310 million, or \$389 per pupil, more on instruction in fiscal year 2019 than in fiscal year 2018, which resulted in an increase to the State-wide instructional spending percentage.

Year-to-year increase in instruction and total operational spending, in total and per pupil Fiscal years 2016 through 2019

Operational area	2016 to 2017 increase		2017 to 2018 increase		2018 to 2019 increase		2016 to 2019 increase	
	Total	Per pupil						
Instruction	\$200,897,408	\$232	\$82,400,199	\$103	\$310,599,040	\$389	\$593,896,647	\$724
Total (all areas)	\$341,775,606	\$395	\$118,580,956	\$155	\$475,676,545	\$609	\$936,033,107	\$1,159

With increased spending on instruction, State-wide average teacher salary increased \$3,490, or 7.1 percent, between fiscal years 2018 and 2019 with districts employing 678 additional teachers—

Districts increased the State’s average teacher salary by \$3,490, or 7.1 percent, to \$52,441 between fiscal years 2018 and 2019. Additionally, districts employed a total of 678 additional teachers, which resulted in a slight reduction in the State’s students per teacher ratio. Between fiscal years 2017 and 2019, the State’s average teacher salary increased by \$4,069 or 8.4 percent. These increases were reflective of the additional instructional spending in fiscal years 2018 and 2019, as well as additional monies provided to districts with the intention of increasing the average teacher salary by 10 percent. There are various reasons that may explain why the State-wide average teacher salary has not met the goal of increasing by 10 percent between fiscal years 2017 and 2019, including that districts were not required to spend the additional monies on teacher salaries, and some districts may have received less than they would have needed to provide all their teachers with a 10 percent increase.

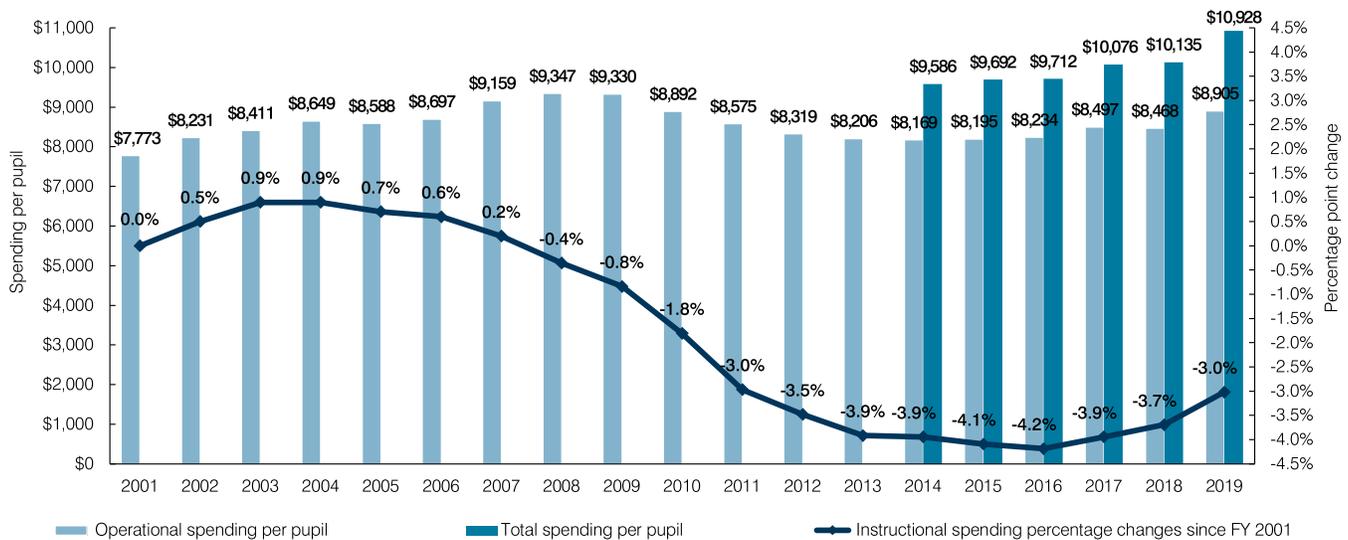
**State-wide average teacher salary increases
By fiscal year**

Fiscal year	Intended salary increase percentage	State-wide average teacher salary	State-wide average teacher salary increase from prior year		State-wide average teacher salary increase from fiscal year 2017	
			In dollars	By percentage	In dollars	By percentage
2017	Base year	\$48,372				
2018	1%	\$48,951	\$579	1.2%	\$579	1.2%
2019	9%	\$52,441	\$3,490	7.1%	\$4,069	8.4%

Percentage of monies spent on instruction remains lower than peak since monitoring began, and spending has shifted to other areas—

Since fiscal year 2001, after controlling for inflation, Arizona school districts’ operational spending per pupil has increased 14.6 percent, from \$7,773 (\$5,374 unadjusted) in fiscal year 2001 to \$8,905 in fiscal year 2019. However, the State’s fiscal year 2019 instructional spending percentage was 3 percentage points lower than in fiscal year 2001 and 3.9 percentage points lower than the fiscal year 2004 peak. The State-level decline in the instructional spending percentage is indicative of fewer dollars being spent on instruction. After controlling for inflation, total per pupil operational spending increased \$256 per pupil, or 3 percent, between fiscal years 2004 and 2019 while spending on instruction decreased \$197 per pupil, or 3.9 percent. At the same time, the percentage of available operating dollars spent on most other operational areas has increased, meaning that districts shifted spending from instruction to other areas.

**Arizona’s operational and total spending per pupil and change in instructional spending percentage since fiscal year 2001 (inflation adjusted to fiscal year 2019 dollars)
Fiscal years 2001 through 2019**



Within Arizona, districts spent at widely differing levels and operated at varying degrees of efficiency

Districts spent at widely differing levels—In fiscal year 2019, as in prior years, there was a wide range in total per pupil operational spending among Arizona districts. Even when excluding Arizona’s very small districts, which have highly variable spending patterns, fiscal year 2019 operational spending by district ranged from \$6,810 per pupil to \$19,970 per pupil. On average, the 30 highest-spending districts spent \$14,080 per pupil, \$6,309 more than the \$7,771 the 30 lowest-spending districts spent per pupil. The districts with the highest and lowest per pupil spending also differed in certain characteristics, with the highest-spending districts generally being smaller, rural districts with higher poverty rates. Districts also varied greatly in their nonoperational spending, which includes costs incurred to acquire capital assets, interest, and programs such as adult education and community service that are outside the scope of preschool through grade 12 education. In fiscal year 2019, after excluding Arizona’s very small districts, nonoperational spending by districts ranged from \$280 per pupil to \$14,958 per pupil.

Arizona’s school-district-funding formula provides similar districts with a similar amount of basic funding. However, after basic funding, districts may receive additional revenues through various funding formulas that are designed to offset expected higher costs. For example, districts receive additional monies for special needs students and if they are located in isolated areas or have more experienced teachers.

Districts may also qualify for federal impact aid or State or federal grants, and some districts may also receive monies as a result of a desegregation agreement or court order, a small school adjustment, or a voter-approved budget override.

Wide range of costs among similar districts indicates potential for improved efficiency at some districts

Although a district’s efficiency can be affected by its size, type, and location, wide ranges of costs among districts grouped by these factors indicate that some districts have achieved lower costs than other districts of similar size, type, and location. Our performance audits have identified a variety of efficient and inefficient district practices. For example, more efficient districts monitored performance measures, used staffing formulas, had energy conservation plans, maximized the use of free federal food commodities, limited waste by closely monitoring meal production, and adjusted bus routes to ensure that buses were filled to at least 75 percent of capacity. In contrast, less efficient districts had costly benefit packages and higher noninstructional staffing levels, operated schools far below designed capacity, had poorly written vendor contracts, and paid bus drivers for time not spent working.

Districts that operate efficiently allocate more of their resources to instruction—Districts that operate efficiently have more dollars available to spend on instruction, such as to increase teacher salaries, hire additional teachers, or purchase instructional supplies. Our performance audits of individual districts have found that efficient districts—those that perform better than their peers on performance measures of operational efficiency—tend to have higher instructional spending percentages. The broader analysis conducted across all districts for this report showed a similar result. When performance measures were compared across all districts in each operational peer group, districts that outperformed their peers tended, on average, to spend higher percentages of available operating dollars on instruction.

Comparison of operational spending per pupil for Arizona’s highest- and lowest-spending districts Fiscal year 2019

	Highest-spending districts’ average	Lowest-spending districts’ average	Difference
Instructional spending percentage	47.0%	55.7%	(8.7)%
Total operational spending	\$14,080	\$7,771	\$6,309
Instruction	6,621	4,325	2,296
Student support	1,046	588	458
Instruction support	657	388	269
Administration	1,933	863	1,070
Plant operations	2,211	845	1,366
Food service	684	405	279
Transportation	928	357	571

Cost-variance examples

- A very large, urban, unified district spent \$654 per pupil for administration; another spent \$895 per pupil.
- A medium-sized, rural, unified district spent \$3.15 per square foot for plant operations; another spent \$11.09 per square foot.

Arizona school districts spent less per pupil overall and spent differently than districts nationally

Arizona school districts spent less than national averages in nearly all operational areas

In fiscal year 2019, Arizona school districts spent approximately \$3,100 less per pupil than the 2017 national average (most recent national data available). This lower spending is seen in instruction, as well as every noninstructional operational area except student support, which was slightly higher than the national average. Arizona districts spent more in nonoperational areas compared to the national average, spending less per pupil on interest and more on land and buildings, equipment, and other programs, such as adult education and community service programs that are outside the scope of preschool through grade 12 education.

Arizona school districts allocated their resources differently than national averages

Compared to national averages, Arizona school districts spent a lower percentage of their available resources on instruction and administration and a greater percentage on all other operational areas. In fiscal year 2019, Arizona districts spent 54.7 percent of available operating dollars on instruction, 6 percentage points below the national average of 60.7 percent. Many factors may account for Arizona's lower percentage of instructional spending, one of which is average teacher salary. Compared to the fiscal year 2018 national average (most recent year national data available), Arizona's average teacher salary was \$48,951 that year, while the national average was \$60,477. Another factor that may account for Arizona's lower percentage of instructional spending is class size. In

Comparison of Arizona and U.S. per pupil spending by area Fiscal years 2019 (Arizona) and 2017 (U.S.)

Spending by area	Arizona average 2019	National average 2017	Difference
Instruction	\$ 4,869	\$ 7,445	\$(2,576)
Student support	754	712	42
Instruction support	497	602	(105)
Administration	903	1,383	(480)
Plant operations	1,027	1,137	(110)
Food service	438	477	(39)
Transportation	417	502	(85)
Total operational	8,905	12,258	\$(3,353)
Land and buildings	1,086	995	91
Equipment	496	222	274
Interest	261	363	(102)
Other	180	171	9
Total nonoperational	2,023	1,751	272
Total per pupil spending	\$10,928	\$14,009	\$(3,081)

fiscal year 2018, Arizona's class size was 18.4 students per teacher compared to the national average of 16 students per teacher. The relatively low instructional spending percentage was not the result of high administration costs because Arizona districts allocated a smaller percentage of resources for administration than the national average. However, Arizona districts allocated a larger percentage of resources to all the other operational areas.

Comparison of Arizona and U.S. spending by operational area Fiscal years 2019 (Arizona) and 2017 (U.S.)

Operational area	AZ	U.S.
Classroom spending	68.8%	71.4%
Instruction	54.7	60.7
Student support	8.5	5.8
Instruction support	5.6	4.9
Nonclassroom spending	31.2%	28.6%
Administration	10.1	11.3
Plant operations	11.5	9.3
Food service	4.9	3.9
Transportation	4.7	4.1

Individual district information

In addition to the State-wide information discussed earlier, this report also contains a 1-page summary for each district showing performance on various financial and student measures, including operational and nonoperational spending, operational measures compared to peer averages, student test scores, and average teacher salary and other measures.



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INTRODUCTION AND OBJECTIVES

Arizona Revised Statutes §41-1279.03 requires the Auditor General to monitor school districts to determine the percentage of every dollar spent in the classroom by a school district and conduct performance audits of Arizona's school districts. This report, the 19th annual report analyzing school district spending, has 2 main objectives:

- It analyzes State-wide operational spending trends in instruction and 6 noninstructional categories—administration, plant operations, food service, transportation, student support, and instruction support—since monitoring began in fiscal year 2001. It also identifies differences between district peer groups' spending within Arizona and compares Arizona and national spending levels. This report also analyzes nonoperational spending both within Arizona and between Arizona and the nation.¹
- It presents a 1-page summary of the State's performance on various financial and student achievement measures and a 1-page summary for each of Arizona's school districts. Specifically, each district's expenditure information, including instructional and noninstructional spending, and operational measures are compared with State averages and averages of operational peer groups, which include either districts of similar size, type, and location or, for evaluating transportation programs, districts with similar numbers of miles per rider and locations. In addition, each district's percentage of students who passed State assessments are compared with State averages and averages of a student achievement peer group, which includes districts with similar poverty rates and of similar type and location. Each district page also includes a trend of average teacher salary and other measures.

The appendices provide lists of districts in each operational and student achievement peer group (Appendix A, see pages a-1 through a-18); reference information, including definitions, sources, and methodology (Appendix B, see pages b-1 through b-8); graphical representations of cost ranges by operational peer group for administration, plant operations, food service, and transportation (Appendix C, see pages c-1 through c-3); and Arizona's operational and total spending per pupil for fiscal years 2001 through 2019 unadjusted and inflation adjusted to fiscal year 2019 dollars (Appendix D, see page d-1).

The information used to prepare this report was not subjected to all the tests and confirmations that we would normally perform during an audit. However, to help ensure that information used in this report was complete and reasonable, we performed certain quality control procedures, such as year-to-year comparisons of district-reported data and interviews with school district officials about anomalies and variances. Additionally, we reviewed the reasonability of changes in related measures, such as whether a district's square footage increased after opening a new school. Further, prior to the report's issuance, we provided each Arizona school district the opportunity to review most of the numbers that we planned to present for the district and inform us of any issues with the data.

We express our appreciation to the Superintendent of Public Instruction and the staffs of the Arizona Department of Education, the Arizona School Facilities Board, the County School Superintendents' offices, and the Arizona public school districts for their cooperation and assistance during this study.

¹ Nonoperational spending includes costs incurred to acquire capital assets (such as purchasing or leasing land, buildings, and equipment), interest, and programs such as adult education and community service that are outside the scope of preschool through grade 12 education.

Instructional spending increased to 54.7 percent but remains lower than highest level spent since monitoring began in 2001

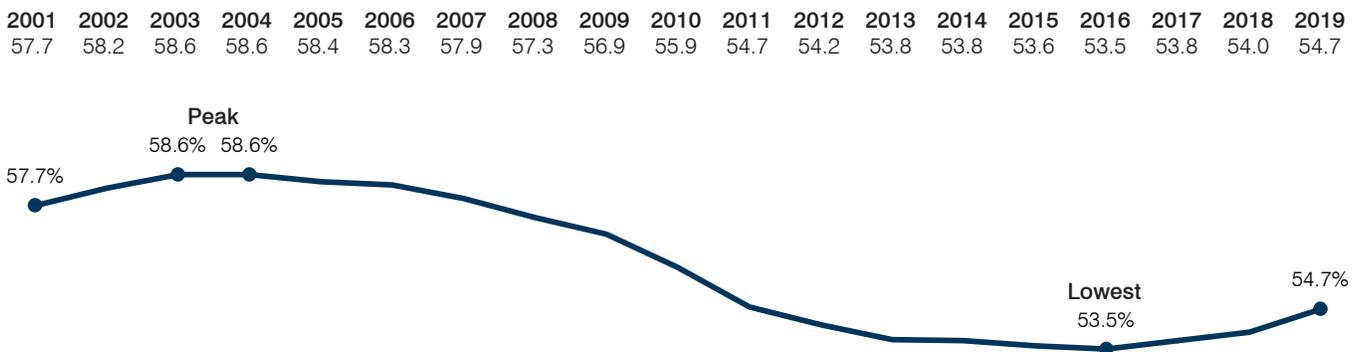
Instructional spending percentage increased 0.7 percentage points, representing the largest single year increase since monitoring began

As shown in Figure 1, in fiscal year 2019, Arizona school districts spent 54.7 percent of available operating dollars on instruction.² This is a 0.7 percentage point increase over the 54 percent spent on instruction in fiscal year 2018 and is the largest single year increase since we began monitoring instructional spending in fiscal year 2001. Specifically, in that year, districts spent 57.7 percent of available operating dollars on instruction. Then in fiscal year 2002, districts began receiving Classroom Site Fund (CSF) monies intended to increase instructional spending.³ Soon after, in fiscal years 2003 and 2004, the State's instructional spending percentage reached its highest level during this 19-year period at 58.6 percent. However, the percentage of

Instruction

Salaries and benefits for teachers and instructional aides; costs related to instructional supplies, such as pencils, paper, and workbooks; instructional software; athletics; cocurricular activities, such as band or choir; and tuition paid to private institutions.

Figure 1
Arizona's instructional spending percentages
Fiscal years 2001 through 2019



Source: Auditor General staff analysis of Arizona school district-reported accounting data for fiscal years 2001 through 2019.

² Available operating dollars are those used for a district's day-to-day operations. This operational spending excludes costs associated with acquiring capital assets (such as purchasing or leasing land, buildings, and equipment), interest, and programs such as adult education and community service that are outside the scope of preschool through grade 12 education.

³ In November 2000, voters passed Proposition 301, which increased the State-wide sales tax to provide additional resources for education programs. Under statute, these monies, also known as Classroom Site Fund monies, may be spent for specific purposes, primarily increasing teacher pay.

monies spent on instruction declined nearly every year between fiscal years 2004 and 2016 before increasing 3 years in a row. At the same time as the recent 3-year increase, districts received additional funding primarily through Proposition 123 and State budget increases intended for teacher salaries, which resulted in increased spending, mostly on instruction.⁴ During this same time period, the State-wide average teacher salary increased 8.4 percent between fiscal years 2017 and 2019. However, the State's instructional spending percentage remains 3.9 percentage points lower than its highest peak in fiscal years 2003 and 2004 because spending has shifted to noninstructional areas. There may be reasons that noninstructional costs necessarily increased at specific districts. However, other increases to noninstructional areas may have been more within districts' control.

District operational spending increased \$475 million between fiscal years 2018 and 2019 with \$310 million of the increase spent on instruction

Districts' operational spending has increased due to infusion of additional monies by voters and through State budget—As shown in Table 1 below and Table 2 on page 5, since fiscal year 2016, Arizona school districts' operational spending increased by approximately \$936 million, or \$1,159 per pupil. Slightly over half of this increase, or \$475 million of it, equaling \$609 per pupil, occurred between fiscal years 2018 and 2019. These increases were predominately the result of additional monies districts received from Proposition 123 and for teacher salary increases through the State budget. Although it cannot be determined how districts spent these additional monies, districts increased spending on all operational areas, with the majority of the increased spending on instruction. Specifically, districts spent approximately \$310 million, or \$389 per pupil, more on instruction in fiscal year 2019 than in fiscal year 2018, which resulted in an increase in the State-wide instructional spending percentage.

Table 1
Comparison of expenditures by operational area, in total and per pupil
Fiscal years 2016 through 2019

Operational area	2016		2017		2018		2019	
	Total	Per pupil						
Instruction	\$3,757,466,481	\$4,145	\$3,958,363,889	\$4,377	\$4,040,764,088	\$4,480	\$4,351,363,128	\$4,869
Student support	573,359,632	633	614,408,571	679	624,968,437	693	674,259,403	754
Instruction support	403,105,191	444	416,864,985	461	416,309,009	462	444,200,561	497
Administration	730,535,703	806	763,609,229	844	775,898,361	860	806,639,454	903
Plant operations	851,357,174	939	884,032,443	977	891,276,937	988	917,357,169	1,027
Food service	375,997,915	415	381,401,751	422	382,924,905	425	391,405,508	438
Transportation	329,849,846	364	344,766,680	381	349,886,767	388	372,479,826	417
Total	\$7,021,671,942	\$7,746	\$7,363,447,548	\$8,141	\$7,482,028,504	\$8,296	\$7,957,705,049	\$8,905

Source: Auditor General staff analysis of district-reported accounting data and Arizona Department of Education student membership data for fiscal years 2016 through 2019.

⁴ In May 2016, voters passed Proposition 123, which provided districts with additional funding each year by increasing State land trust distributions and State General Fund monies for education, starting in fiscal year 2016.

Table 2**Year-to-year increase in instruction and total operational spending, in total and per pupil
Fiscal years 2016 through 2019**

Operational area	2016 to 2017 increase		2017 to 2018 increase		2018 to 2019 increase		2016 to 2019 increase	
	Total	Per pupil						
Instruction	\$200,897,408	\$232	\$82,400,199	\$103	\$310,599,040	\$389	\$593,896,647	\$724
Total (all areas)	\$341,775,606	\$395	\$118,580,956	\$155	\$475,676,545	\$609	\$936,033,107	\$1,159

Source: Auditor General staff analysis of district-reported accounting data and Arizona Department of Education student membership data for fiscal years 2016 through 2019.

Proposition 123 provided districts additional monies starting in fiscal year 2016—Starting in fiscal year 2016, school districts received additional funding from the passage of Proposition 123. Those additional resources totaled approximately \$262 million in fiscal year 2016 and approximately \$263 million in fiscal year 2017. Because the monies were not available to districts until after the vote, it is likely that a large portion of the monies available in fiscal year 2016 were not spent that year and instead were carried forward into fiscal year 2017. Districts received approximately \$264 million in Proposition 123 monies in fiscal year 2018 and approximately \$266 million in fiscal year 2019. Proposition 123 monies are comingled with other district monies and are not separately identifiable from other district monies. Therefore, it cannot be determined whether and how the Proposition 123 monies were spent. Additionally, there was no requirement that districts had to spend these monies on instruction, and districts had the option of using the monies for operational or capital purposes.⁵

State budget has provided additional monies for teacher salary increases starting in fiscal year 2018—Arizona’s fiscal year 2019 budget included a plan to increase teacher pay 20 percent by fiscal year 2021.⁶ This plan included additional funding to increase the average teacher salary in Arizona by 9 percent in fiscal year 2019, 5 percent in fiscal year 2020, and 5 percent in fiscal year 2021. The funding provided for these increases coupled with the funding for an approximate 1 percent increase in fiscal year 2018 was intended to increase the State-wide average teacher salary by 20 percent between fiscal years 2017 and 2021.⁷ In fiscal year 2019, this plan provided school districts with approximately \$263 million. Similar to the Proposition 123 monies, these monies are comingled with other district monies and are not separately identifiable from other district monies. Therefore, it cannot be determined how the monies were spent. Additionally, although the additional monies that were provided beginning in fiscal year 2019 were provided to districts with the intention of increasing teacher salaries, there was no requirement that districts had to spend these monies on teacher salaries, and districts had the option of using the monies for operational or capital purposes.

⁵ Capital purchases are those costs associated with acquiring capital assets such as purchasing or leasing land, buildings, and equipment or purchasing certain supplies, including textbooks, library books, and instructional aids.

⁶ School districts operate on a fiscal year that begins in July and ends in June of the next calendar year. The plan to increase teacher salaries 20 percent by school year 2020 intends to provide the final 5 percent increase in fiscal year 2021, which begins in July 2020 and ends in June 2021. More specifically, if included in the fiscal year 2021 State budget, the final 5 percent increase will be provided to school districts in fiscal year 2021 (July 2020 through June 2021), which will be during the school year that starts in the Fall of 2020.

⁷ Laws 2017, Ch. 305, §33, required the Arizona Department of Education to allocate \$34 million to school districts and charter schools with the intention of increasing, by 1.06 percent, the salary of each teacher who taught at an Arizona school district or charter school during fiscal year 2017 and who would be teaching at a school district or charter school in fiscal year 2018. The salary increase was required to supplement and not supplant any salary increase that the district or charter would have provided to the teacher for fiscal year 2018, prior to the allocation. School districts requested and received approximately \$28 million of the \$34 million allocation.

With increased spending on instruction, State-wide average teacher salary increased \$3,490, or 7.1 percent, between fiscal years 2018 and 2019 with districts employing 678 additional teachers

As shown in Table 3, districts increased the State’s average teacher salary by \$3,490, or 7.1 percent, to \$52,441 between fiscal years 2018 and 2019. Additionally, districts employed a total of 678 additional teachers, which

resulted in a slight reduction in the State’s students per teacher ratio. As shown in Table 4, between fiscal years 2017 and 2019, the State’s average teacher salary increased by \$4,069 or 8.4 percent. These increases were reflective of the additional instructional spending in fiscal years 2018 and 2019, as well as additional monies provided to districts with the intention of increasing the average teacher salary by 10 percent. There are various reasons that may explain why the State-wide average teacher salary has not met the goal of increasing by 10 percent between fiscal years 2017 and 2019. For example, as previously discussed, districts were not required to spend the additional monies on teacher salaries and may have chosen to spend them on other district priorities, such as salaries for other

Table 3
Comparison of average teacher salary, teacher full-time equivalents (FTEs), and students per teacher Fiscal year 2018 versus 2019

	2018	2019	Increase/ (Decrease)
Average teacher salary	\$48,951	\$52,441	\$3,490
Teacher FTEs	48,828	49,506	678
Students per teacher	18.4	18.0	(0.4)

Source: Auditor General staff analysis of district-reported accounting data, district-reported teacher FTEs, and Arizona Department of Education student membership data for fiscal years 2018 and 2019.

employees, district supplies, or capital purposes. Additionally, the monies were distributed to districts based on their number of students, not on how much each individual district would need to achieve the desired teacher salary increase. Therefore, some districts may have received less than the amount they would have needed to provide all their teachers with a 10 percent increase while other districts may have received more than they would have needed. Further, turnover in more tenured teachers and employing additional less tenured teachers are among other possible reasons that the State-wide average teacher salary has fallen short of the intended 10 percent increase.

Table 4
State-wide average teacher salary increases By fiscal year

Fiscal year	Intended salary increase percentage	State-wide average teacher salary	State-wide average teacher salary increase from prior year		State-wide average teacher salary increase from fiscal year 2017	
			In dollars	By percentage	In dollars	By percentage
2017	Base year	\$48,372				
2018	1%	\$48,951	\$579	1.2%	\$579	1.2%
2019	9%	\$52,441	\$3,490	7.1%	\$4,069	8.4%
Future increases						
2020	5%	Future increase to be determined				
2021	5% (anticipated)					

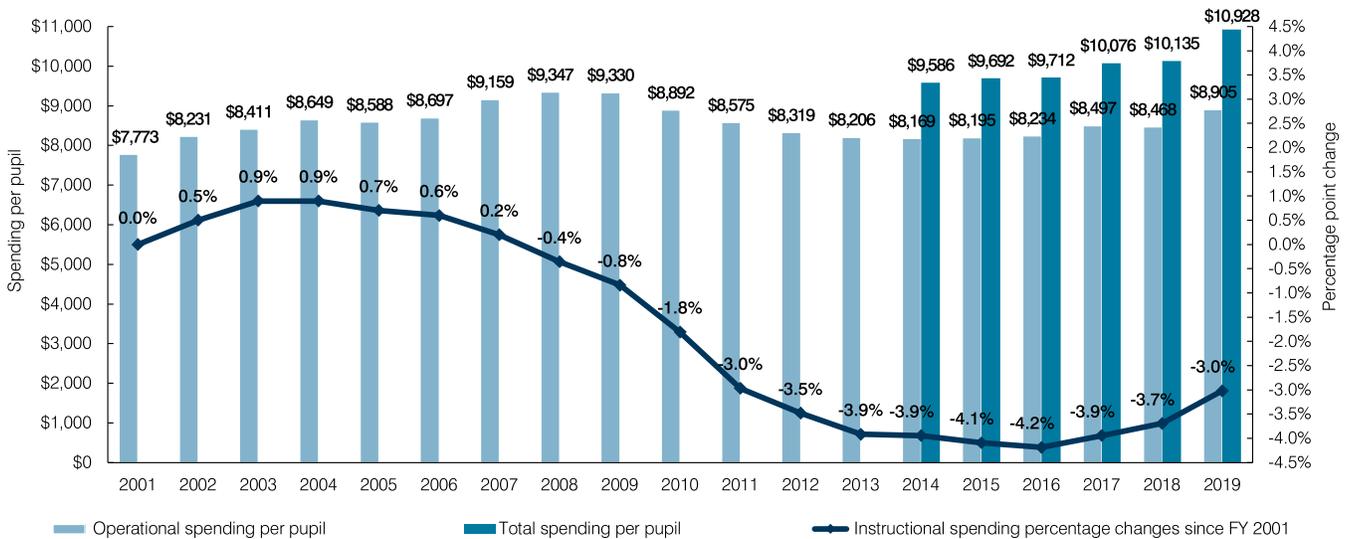
Source: Auditor General staff analysis of district-reported accounting data and district-reported teacher FTEs for fiscal years 2017 through 2019.

Percentage of monies spent on instruction remains lower than peak since monitoring began, and spending has shifted to other areas

Percentage of monies spent on instruction remains lower than peak since monitoring began—

Although the State’s instructional spending percentage increased in fiscal years 2017, 2018, and 2019, the percentage remains lower than in fiscal year 2001 when monitoring began and lower than fiscal years 2003 and 2004 when the percentage reached its peak. As shown in Figure 2, since fiscal year 2001, after controlling for inflation, Arizona school districts’ operational spending per pupil has increased 14.6 percent, from \$7,773 (\$5,374 unadjusted) in fiscal year 2001 to \$8,905 in fiscal year 2019.⁸ As discussed earlier, districts began receiving CSF monies in fiscal year 2002, which contributed to a \$458 per pupil increase and a 0.5 percentage point increase to the State-wide instructional spending percentage. The instructional spending percentage reached its peak in fiscal years 2003 and 2004, but then, between fiscal years 2004 and 2016, the percentage of monies spent on instruction declined, both during times when operational spending decreased as well as times when it increased. Since its peak, the instructional spending percentage has declined 3.9 percentage points. Specifically, although districts spent slightly more per pupil in fiscal year 2019 than they did in fiscal year 2004 when adjusted for inflation, districts spent only 54.7 percent on instruction in fiscal year 2019 compared to 58.6 percent in fiscal year 2004, which was the peak percentage since monitoring began.

Figure 2
Arizona’s operational and total spending per pupil¹ and change in instructional spending percentage since fiscal year 2001 (inflation adjusted to fiscal year 2019 dollars)
Fiscal years 2001 through 2019



¹ Total spending per pupil was not presented prior to the fiscal year 2015 report. For that report, we validated the nonoperational portion of total spending for fiscal years 2014 and 2015. Therefore, total spending per pupil is presented for only fiscal years 2014 through 2019.

Source: Auditor General staff analysis of district-reported accounting data inflation adjusted to fiscal year 2019 dollars and Arizona Department of Education student membership data for fiscal years 2001 through 2019.

⁸ See Appendix D, page d-1, for a table showing operational and total spending per pupil unadjusted and adjusted for inflation.

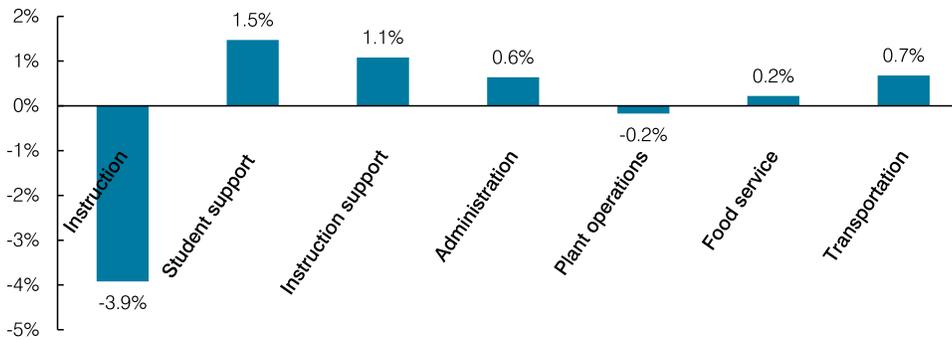
Table 5
Comparison of per pupil expenditures by operational area (inflation adjusted to fiscal year 2019 dollars)
Fiscal year 2004 versus 2019

Operational area	2004	2019	Increase/ (Decrease)
Instruction	\$5,066	\$4,869	\$(197)
Student support	603	754	151
Instruction support	390	497	107
Administration	819	903	84
Plant operations	1,017	1,027	10
Food service	408	438	30
Transportation	346	417	71
Total	\$8,649	\$8,905	\$256

Source: Auditor General staff analysis of district-reported accounting data inflation adjusted to fiscal year 2019 dollars and Arizona Department of Education student membership data for fiscal years 2004 and 2019.

impact of a declining instructional spending percentage varies depending on the cause of the decline. For example, by not operating efficiently in noninstructional areas, a school district will have a lower instructional spending percentage and will have fewer dollars to spend on instruction. This can result in having less money available to increase teacher salaries, maintain or reduce class sizes, continue special programs, or offer new programs. On the other hand, all else being equal, a district that receives and spends additional revenues that are specifically

Figure 3
Percentage point change in spending by operational area
Fiscal year 2004 versus 2019



Source: Auditor General staff analysis of district-reported accounting data for fiscal years 2004 and 2019.

costs because many of these services are directed toward these student populations. Also, some district officials have stated that they believe food costs have increased since fiscal year 2004 because of implementation of the nutrition standards required by the federal Healthy, Hunger-Free Kids Act of 2010. This act, which took effect in fiscal year 2013 and which some districts implemented early, established more stringent nutritional requirements that include an increase in the amount of fruits, vegetables, and whole grains included in meals. Additionally, in

State-level decline in instructional spending percentage indicative of fewer dollars being spent on instruction—

At a State level, the decline in the instructional spending percentage between fiscal years 2004 and 2019 is indicative of fewer actual dollars being spent on instruction. As shown in Table 5, after controlling for inflation, total per pupil operational spending increased \$256 per pupil, or 3 percent, between fiscal years 2004 and 2019. At this same time, spending on instruction decreased \$197 per pupil, or 3.9 percent, while spending on all other operational areas increased or remained relatively steady. Therefore, on a State-wide basis, it does not appear that the decline in instructional spending was due to an increase in monies required to be spent outside instruction, but rather represents districts shifting monies from instruction to other operational areas.

District spending shifted from instruction to other areas—

As shown in Figure 3, at the same time the State's instructional spending percentage declined, the percentage of available operating dollars spent on most other operational areas increased. The

earmarked for purposes outside instruction, such as National School Lunch Program monies, will also have a lower instructional spending percentage, but it will not spend less on instruction because of having these monies.

There may be reasons that noninstructional costs necessarily increased at specific districts. For example, increases in a district's poverty rate or the percentage of students with special needs could increase student support

November 2016, Arizona voters passed Proposition 206, which incrementally increased the State's minimum wage from \$8.05 per hour in 2016 to \$12 per hour in 2020.⁹ The minimum wage increase affected individual districts differently, as some districts may have had more minimum wage positions in instruction (such as teacher aides or instructional assistants), while others may have had more minimum wage employees in positions outside of instruction (such as bus drivers, food service workers, or custodians). Additionally, some districts may have already been paying their employees more than minimum wage, while other districts had to increase the hourly rate of some employees.

Some operational spending changes may be due to revisions in expenditure-reporting requirements or clarifications. Effective July 1, 2007, the Uniform Chart of Accounts for Arizona School Districts was revised to comply with changes made to the federal chart of accounts issued by the National Center for Education Statistics, which revised how some expenditures should be classified. The instruction support area was revised to include some costs that previously had been classified as administration. This revision accounts for some of the increase in instruction support spending. Additionally, a revision to the Uniform Chart of Accounts for Arizona School Districts effective July 1, 2015, added detailed reporting of some costs based on newly provided federal guidance. That revision did not change how expenditures are classified but may have resulted in districts reviewing and more accurately reporting related expenditures, which may have increased their administrative costs while decreasing costs in other operational areas.

However, other increases to noninstructional areas may have been more within districts' control. For example, our performance audits of school districts have identified districts with higher staffing levels in administration, plant operations, food service, or transportation when compared to peer districts' averages. Additionally, we have identified districts that did not have proper food production controls resulting in meal overproduction and waste and districts that did not maximize cost savings by planning meals around available United States Department of Agriculture food commodities. Our performance audits have also identified districts operating with excess building capacity and higher spending on general transportation supplies and fuel. Chapter 2 of this report discusses practices that efficient and inefficient districts use (see pages 11 through 14).

The 2 areas that saw the largest increases between fiscal years 2004 and 2019 were student support and instruction support. Classroom spending includes spending for instruction, student support, and instruction support. In fiscal year 2019, Arizona school districts' classroom spending accounted for 68.8 percent of available operating dollars. However, this is 1.3 percentage points below classroom spending in fiscal year 2004 and 1.7 percentage points below classroom spending in fiscal year 2006, when classroom spending reached its peak at 70.5 percent.

⁹ Arizona's minimum wage increased to \$10.00 per hour on January 1, 2017; \$10.50 per hour on January 1, 2018; \$11.00 per hour on January 1, 2019; and \$12.00 per hour on January 1, 2020. It also required all school districts to provide paid sick time to employees.



Within Arizona, districts spent at widely differing levels and operated at varying degrees of efficiency

Districts spent at widely differing levels

In fiscal year 2019, as in prior years, there was a wide range in total per pupil operational spending among Arizona districts. Even when excluding Arizona’s very small school districts, which have highly variable spending patterns, fiscal year 2019 operational spending by district ranged from \$6,810 per pupil to \$19,970 per pupil. As shown in Table 6, on average, the 30 highest-spending districts spent \$14,080 per pupil, \$6,309 more than the \$7,771 the 30 lowest-spending districts spent per pupil. The districts with the highest and lowest per pupil spending also differed in certain characteristics, with the highest-spending districts generally being smaller, rural districts with higher poverty rates.

Districts also varied greatly in their nonoperational spending. Nonoperational spending includes costs incurred to acquire capital assets (such as purchasing or leasing land, buildings, and equipment), interest, and programs such as adult education and community service that are outside the scope of preschool through grade 12 education. In fiscal year 2019, after excluding Arizona’s very small districts, nonoperational spending by districts ranged from \$280 per pupil to \$14,958 per pupil. Large nonoperational spending differences between districts, as well as year-to-year differences for the same districts, are to be expected because nonoperational spending includes costs for building schools and large equipment purchases that generally do not occur every year and can be costly.

Arizona’s school-district-funding formula provides similar districts with a similar amount of basic funding. However, after basic funding, districts may receive additional revenues through various funding formulas that are designed to offset expected higher costs. For example, districts receive additional monies for high school students and special needs students. Districts also receive additional funding if they have fewer than 600 students, are located in isolated areas, or have more experienced

Table 6
Comparison of operational spending per pupil for Arizona’s highest- and lowest-spending districts
Fiscal year 2019

	Highest-spending districts’ average ¹	Lowest-spending districts’ average ¹	Difference
Instructional spending percentage	47.0%	55.7%	(8.7)%
Total operational spending	\$14,080	\$7,771	\$6,309
Instruction	6,621	4,325	2,296
Student support	1,046	588	458
Instruction support	657	388	269
Administration	1,933	863	1,070
Plant operations	2,211	845	1,366
Food service	684	405	279
Transportation	928	357	571

¹ Dollar amounts shown are averages of the 30 highest and 30 lowest per pupil operational spending districts in Arizona, excluding very small districts.

Source: Auditor General staff analysis of fiscal year 2019 district-reported accounting data and Arizona Department of Education student membership data.

Table 7
Comparison of revenue sources per pupil for
Arizona’s highest- and lowest-spending districts
Fiscal year 2019

Revenue source ¹	Highest-spending districts’ average ²	Lowest-spending districts’ average ²	Difference
Federal impact aid	\$4,141	\$ 9	\$4,132
Transportation funding	1,536	310	1,226
Federal grants	1,691	622	1,069
Additional budgetary funding	1,861	1,403	458
Small school adjustment	446	0	446
Desegregation	130	0	130
Voter-approved budget overrides	364	308	56
Tax credits	31	45	(14)

¹ See Appendix B, pages b-2 and b-3, for descriptions of each listed revenue source.

² Dollar amounts shown are averages of the 30 highest and 30 lowest per pupil operational spending districts in Arizona, excluding very small districts.

Source: Auditor General staff analysis of fiscal year 2019 district-reported accounting and budget data and Arizona Department of Education student membership and budget data.

more per pupil in transportation funding, and \$1,069 more per pupil in federal grants than the 30 lowest-spending districts. To a lesser extent, the highest-spending districts also received more monies through additional budgetary funding and the small school adjustment, and because of desegregation agreements or court orders, than the lowest-spending districts. The difference in spending was not primarily caused by differences in the amount of voter-approved budget overrides or tax credit monies received.

teachers. Additionally, districts receive transportation funding based on a formula that primarily uses the number of miles traveled to transport students. Districts may also qualify for federal impact aid or State or federal grants. Federal impact aid monies are provided to districts that have been impacted by the presence of tax-exempt federal lands, and State and federal grants are often provided to districts with higher poverty rates and are generally for specific purposes. Some districts may also receive tax credit monies and donations, monies from voter-approved budget overrides, monies as a result of a desegregation agreement or court order, or monies from a small school adjustment. See Appendix B, pages b-2 and b-3, for more detailed revenue source descriptions.

The highest-spending districts, on average, received more monies than the lowest-spending districts, primarily from federal impact aid, transportation funding, and federal grants. As shown in Table 7, on average, the 30 highest-spending districts received \$4,132 more per pupil in federal impact aid, \$1,226

Wide range of costs among similar districts indicates potential for improved efficiency at some districts

Within Arizona, a district’s efficiency can be affected by its size, type, and location. For example, administrative costs per pupil are associated with district size. That is to say larger districts tend to have lower administrative costs per pupil, primarily because of their economies of scale and abilities to spread some costs over more students. As district size increases, administrative costs per pupil tend to decrease. Additionally, a district’s type can impact its plant operations and food service costs. For example, because high schools generally have more square footage per student and different types of building space than elementary schools, they typically have higher plant operation costs per pupil. Similarly, food costs per meal may be higher for districts serving high school students because of larger meal portions. Finally, location is an important factor affecting a district’s cost per mile. For example, in fiscal year 2019, the average cost per mile for urban districts traveling between 231 and 290 miles per rider was \$4.60, while rural districts traveling a similar range of miles per rider averaged \$3.70 per mile. Rural district buses likely travel on roads with higher speed limits and travel greater distances between stops, thereby traveling more miles in less time. This would result in lower salary and benefit costs per mile.

Although a district's efficiency can be affected by its size, type, and location, wide ranges of costs among districts grouped by these factors indicate that some districts have achieved lower costs than other districts of similar size, type, and location (see textbox). Appendix C (see pages c-1 through c-3) shows graphic representations of these cost ranges by operational peer group for administration, plant operations, food service, and transportation. Districts at the high end of the various cost ranges should work toward improving their operational efficiency. Doing so could allow more monies to be directed to instruction. Our performance audits of school districts have identified opportunities for improved efficiency at many districts. Additionally, these audits have identified a number of practices efficient districts use, as well as practices that make other districts less efficient. For example:

More efficient districts:

- Monitor performance measures to identify areas for improvement (see textbox).
- Use staffing formulas.
- Effectively use county services or partner with other local schools or governments.
- Have energy conservation plans and limit excess building space, including closing schools when necessary.
- Monitor food prices, maximize the use of food commodities provided by the U.S. Department of Agriculture, and modify menus appropriately.
- Limit food waste by using student input and daily production and usage information to determine meal production.
- Limit overtime and unproductive time by having employees perform other duties.
- Plan bus routes to ensure, where possible, the buses are filled to at least 75 percent of capacity.
- Ensure fuel pumps are secure, monitor fuel usage, and limit bus idling to lower costs.

Less efficient districts:

- Have costly benefit packages and higher noninstructional staffing levels.
- Operate schools far below designed capacity, fail to close schools when necessary, or close schools but do not fully reduce related positions.
- Fail to adjust staffing and salary levels based on similar districts' staffing and salary levels and market surveys.
- Spend more on meals and conference travel for employees and governing board members.
- Lack a preventative maintenance plan to maintain buildings and school buses.
- Have poorly written vendor contracts and fail to monitor vendors' performance and billing.
- Set meal prices too low to ensure program self-sufficiency.
- Fail to identify best prices, including failing to use or ineffectively using purchasing consortiums.
- Have excessive food waste due to poor inventory rotation and monitoring or overproducing meals.

Cost-variance examples

- A very large, urban, unified district spent \$654 per pupil for administration; another spent \$895 per pupil.
- A medium-sized, rural, unified district spent \$3.15 per square foot for plant operations; another spent \$11.09 per square foot.
- A medium-sized, rural, unified district spent \$2.80 per meal; another spent \$4.94 per meal.
- Two medium-large-sized, urban, elementary districts drove a similar number of miles per rider; 1 district spent \$6.47 per mile, and the other spent \$11.19 per mile.

Performance measures

- Students per administrative position.
- Cost per square foot.
- Building capacity utilization.
- Cost per meal.
- Meals per labor hour.
- Cost per mile and per rider.
- Bus capacity utilization.

- Operate universal free meal programs without a sufficient number of students eligible for federally reimbursed free and reduced-price meals.
- Pay bus drivers for time not spent working between routes.
- Rely on gas stations for fuel and do not negotiate discounts.
- Do not monitor or adjust bus routes for efficiency.

Districts that operate efficiently allocate more of their resources to instruction

Districts that operate efficiently have more dollars available to spend on instruction, such as to increase teacher salaries, hire additional teachers, or purchase instructional supplies. Our performance audits of individual Arizona districts have found that efficient districts—meaning districts that perform better than their peers on performance measures of operational efficiency—tend to have higher instructional spending percentages. The broader analysis conducted across all districts for this report showed a similar result. When performance measures were compared across all districts in each operational peer group, districts that outperformed their peers tended, on average, to spend higher percentages of available operating dollars on instruction. This result indicates that districts should be paying close attention to their efficiency in noninstructional areas not only to demonstrate good stewardship of public monies, but also to devote a higher percentage of their resources to instruction, which may impact student achievement.

Compared to national averages, Arizona school districts spent less per pupil overall and spent monies differently

Arizona school districts spent less than national averages in nearly all operational areas

As shown in Table 8, in fiscal year 2019, Arizona school districts spent approximately \$3,100 less per pupil in total than the 2017 national average—the most recent year for available national data. Arizona’s lower spending occurred in operational rather than nonoperational areas. This lower operational spending is seen in instruction, as well as every noninstructional operational area except student support, which was slightly higher than the national average. It is interesting to note that 63 Arizona districts spent more than the national per pupil operational average. Forty-six of these are very small districts (i.e., less than 200 students), and most of them received additional monies from a small school adjustment. Seventeen of the 63 districts received federal impact aid monies as a result of their location on tax-exempt federal lands.

As shown in Table 8, Arizona districts’ nonoperational spending was higher than the national average. Arizona districts spent less per pupil on interest and more on land and buildings, equipment, and other programs, such as adult education and community service that are outside the scope of preschool through grade 12 education.

Table 8
Comparison of Arizona and U.S. per pupil spending by area
Fiscal years 2019 (Arizona) and 2017 (U.S.)

Spending by area	Arizona average 2019	National average 2017	Difference
Instruction	\$ 4,869	\$ 7,445	\$ (2,576)
Student support	754	712	42
Instruction support	497	602	(105)
Administration	903	1,383	(480)
Plant operations	1,027	1,137	(110)
Food service	438	477	(39)
Transportation	417	502	(85)
Total operational	8,905	12,258	(3,353)
Land and buildings	1,086	995	91
Equipment	496	222	274
Interest	261	363	(102)
Other	180	171	9
Total nonoperational	2,023	1,751	272
Total per pupil spending	\$10,928	\$14,009	\$(3,081)

Source: Auditor General staff analysis of fiscal year 2019 district-reported accounting data, Arizona Department of Education student membership data, and National Center for Education Statistics *Revenues and Expenditures for Public Elementary and Secondary Education: FY 17*, February 2020.

Arizona school districts allocated their resources differently than national averages

Compared to national averages, Arizona school districts spent a lower percentage of their available resources on instruction and administration and a greater percentage on all other operational areas. As shown in Table 9, in fiscal year 2019, Arizona districts spent 54.7 percent of available operating dollars on instruction, 6 percentage points below the most recent national average of 60.7 percent. Many factors may account for Arizona’s lower percentage of instructional spending, one of which is average teacher salary. Compared to the fiscal year 2018 national average (the most recent year for available national data), Arizona’s average teacher salary was \$48,951 that year, while the national average was \$60,477. Another factor that may account for Arizona’s lower percentage of instructional spending is class size. Compared to the fiscal year 2018 national average (the most recent year for available national data), Arizona districts averaged 18.4 students per teacher that year, while the national average was 16 students per teacher. Having a lower class size may result in employing more teachers, which could increase the instructional spending percentage. The relatively low instructional spending percentage was not the result of high administration costs because Arizona districts allocated a smaller percentage of resources for administration than the national average. However, Arizona districts allocated a larger percentage of resources to all the other operational areas. For example, plant operations may have consumed a greater percentage of resources, in part because Arizona districts spent more on supplies, which are primarily for energy. As noted earlier, our performance audits of Arizona districts have identified the potential for improved efficiency and cost savings in plant operations.

When looking at the combined spending for instruction, student support, and instruction support (also known as “classroom spending”), compared to national averages, Arizona school districts spent a lower percentage of their available resources on classroom spending. In fiscal year 2019, Arizona school districts’ classroom spending accounted for 68.8 percent of available operating dollars, 2.6 percentage points below the most recent national average of 71.4 percent.

Table 9
Comparison of Arizona and U.S. spending by operational area
Fiscal years 2019 (Arizona) and 2017 (U.S.)

Operational area	AZ	U.S.	Description
Classroom spending	68.8%	71.4%	
Instruction	54.7	60.7	Teachers, teachers’ aides, substitute teachers, graders, guest lecturers, general instructional supplies, instructional aids, activities, and tuition
Student support	8.5	5.8	Counselors, audiologists, speech pathologists, nurses, social workers, and attendance services
Instruction support	5.6	4.9	Librarians, teacher training, curriculum development, and instruction-related technology services
Nonclassroom spending	31.2%	28.6%	
Administration	10.1	11.3	Superintendents, principals, business managers, clerical, and other staff who perform accounting, payroll, purchasing, warehousing, printing, human resource activities, and administrative technology services
Plant operations	11.5	9.3	Heating and cooling, equipment repair, groundskeeping, and security
Food service	4.9	3.9	Costs of preparing and serving meals and snacks
Transportation	4.7	4.1	Costs of transporting students to and from school and school activities

Source: Auditor General staff analysis of fiscal year 2019 district-reported accounting data and National Center for Education Statistics *Revenues and Expenditures for Public Elementary and Secondary Education: FY 17*, February 2020.



SUMMARY OF SIGNIFICANT CHANGES TO STATE/DISTRICT PAGES

For this year's report on fiscal year 2019 school district spending, we streamlined the report by providing 1-page summaries for the State and each school district rather than 2-page summaries to reduce duplicating information that can be found elsewhere, such as on the Arizona Department of Education's (ADE) website, and to focus on providing users with the most relevant information related to our statutory requirement. We also added information to provide users with additional relevant information.

Added information:

- In the top section of the State's and each district's summary page, we added graduation, poverty, and free/reduced meal eligibility rates, along with percentages for special education and English learner populations and the 5-year change in students attending. Some of this information is new, while other information was previously reported in other graphics. On the State page, to provide further context for total operational spending, we added total nonoperational and total spending figures.
- We added the categories of classroom spending (includes instruction, student support, and instruction support spending) and nonclassroom spending (includes administration, plant operations, food service, and transportation spending) in the pie chart illustrating spending by operational area.
- We added a bar graph in the upper right portion of the State and district summaries that outlines the 5-year change in spending for each operational area.

Removed information:

- We removed the second page of the State and district summaries, which contained information relating to trends, financial stress assessments, and operational spending details. As a result, instructional spending percentages from fiscal year 2001 to the current fiscal year are now found near the top of each page below the demographic information. Our Office will assess districts' financial stress through a different, more informative process, the results of which will be available in December 2020.
- Page summaries no longer provide ADE-assigned school letter grade data. This information can be found on ADE's website at <https://azreportcards.azed.gov>.
- To focus on our statutory charge to monitor school district spending, we removed revenue information, which had provided detailed information for only select sources, from the State and individual district summaries. Revenue information is available in the Superintendent's Annual Report found on ADE's website at <https://www.azed.gov/finance/reports>.

Revised information:

- We revised the average teacher salary graphic to focus on a 3-year trend (fiscal years 2017 through 2019) because of additional monies provided to districts in fiscal years 2018 and 2019 with the intention of increasing the State-wide average teacher salary above the fiscal year 2017 average. We also revised the graphic to provide 3 years of data on students per teacher, average years of teacher experience, and percentage of teachers in first 3 years of teaching.

Aside from slight formatting changes, data and graphics concerning student achievement on State assessments as well as operational and nonoperational spending remain consistent in design from prior years.

State of Arizona

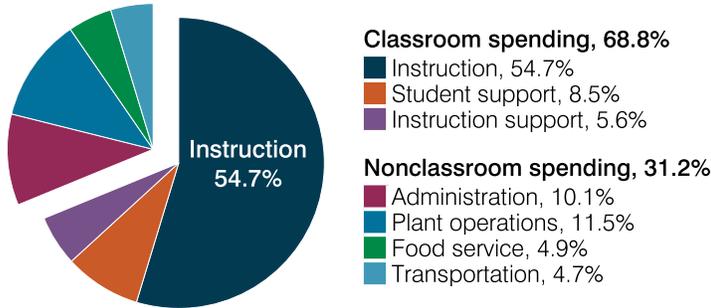
Total operational spending¹: \$7,957,705,049
 Total nonoperational spending: \$1,808,152,349
 Total spending: \$9,765,857,398
 Number of districts: 236
 Number of schools: 1,378
 Graduation rate (2018): 78%

Students attending: 893,636
 5-year change in students attending: 1% decrease
 Special education population: 12%
 English learner population: 6%
 Poverty rate (2018): 19%
 Free/reduced meal eligibility: 56%

Instructional spending percentage by year

2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019
57.7	58.2	58.6	58.6	58.4	58.3	57.9	57.3	56.9	55.9	54.7	54.2	53.8	53.8	53.6	53.5	53.8	54.0	54.7

Spending by operational area



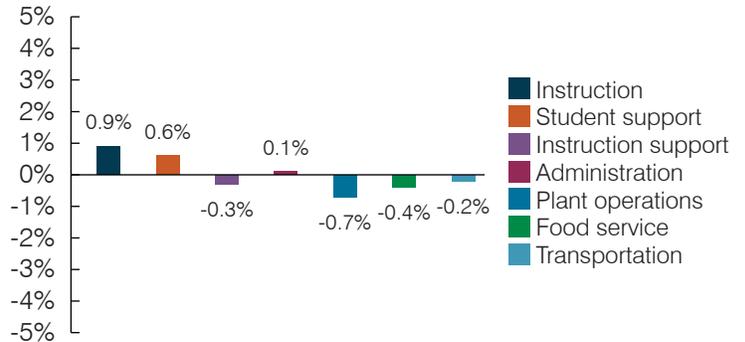
Operational measures

Operational area	Measure	2017	2018	2019
	Cost per pupil	\$844	\$860	\$903
Administration	Students per administrative position	67	66	66
Plant operations	Cost per square foot	\$6.30	\$6.34	\$6.49
	Square footage per student	155	156	158
Food service	Cost per meal	\$2.88	\$3.02	\$3.08
Transportation	Cost per mile	\$3.84	\$4.05	\$4.29
	Cost per rider	\$1,198	\$1,301	\$1,424

Per pupil spending

Spending by area	2017	State 2018	2019	National average 2017
Instruction	\$4,377	\$4,480	\$4,869	\$7,445
Student support	679	693	754	712
Instruction support	461	462	497	602
Administration	844	860	903	1,383
Plant operations	977	988	1,027	1,137
Food service	422	425	438	477
Transportation	381	388	417	502
Total operational	8,141	8,296	8,905	12,258
Land and buildings	691	827	1,086	995
Equipment	424	409	496	222
Interest	236	228	261	363
Other	161	169	180	171
Total nonoperational	1,512	1,633	2,023	1,751
Total per pupil spending	\$9,653	\$9,929	\$10,928	\$14,009

Percentage point change in spending by operational area (fiscal year 2014 versus 2019)

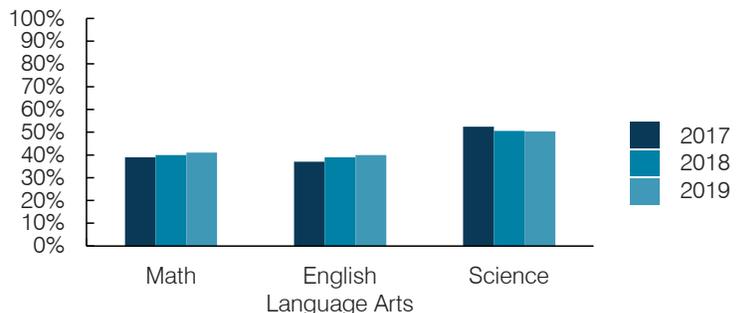


Average teacher salary and other measures



Measure	2017	2018	2019
Students per teacher	18.5	18.4	18.0
Average years of teacher experience	11.3	11.4	11.5
Percentage of teachers in first 3 years	19%	19%	19%

Students who passed State assessments



¹ See Appendix B for sources and methodology.



This appendix lists the 207 districts organized into operational, transportation, and student achievement peer groups. Table 10 (see pages a-1 through a-4) presents districts organized into operational peer groups based on district size, type, and location. Within each operational peer group, the districts are listed in order of their fiscal year 2019 instructional spending percentages. Table 11 (see pages a-5 through a-11) presents districts organized into transportation peer groups based on miles per rider and district location. Within each transportation peer group, the districts are listed in order of their fiscal year 2019 cost per mile and cost per rider difference from the peer group average equally considering each measure. Some districts in both groups are excluded from their peer average because extreme values in their costs would skew the peer average. Table 12 (see pages a-12 through a-18) presents districts organized into student achievement peer groups based on district type, poverty, and location. Within each student achievement peer group, the districts are listed in order of the percentage of their students who passed State assessments on the fiscal year 2019 Arizona’s Measurement of Educational Readiness to Inform Teaching (AzMERIT) test, the fiscal year 2019 Arizona’s Instrument to Measure Standards (AIMS) test, the fiscal year 2019 ACT test (if applicable), and the fiscal year 2019 SAT test (if applicable).

Table 10
Districts grouped by operational peer group and ranked by instructional spending percentage
Fiscal year 2019

Peer group		Instructional spending percentage		Instructional spending percentage	
Number	Description	District name	District name	District name	District name
1	Very large unified and union high school districts in cities and suburbs	Peer group average	57.4%		
		Gilbert USD	61.2	Dysart USD	57.2
		Chandler USD	60.9	Mesa USD	56.2
		Deer Valley USD	59.5	Scottsdale USD	56.0
		Paradise Valley USD	58.6	Phoenix UHSD	54.3
		Peoria USD	57.5	Tucson USD	52.1
2	Large unified and union high school districts in cities and suburbs	Peer group average	54.0%		
		Higley USD	59.8	Tempe UHSD	53.6
		Glendale UHSD	57.2	Sunnyside USD	52.5
		Marana USD	54.6	Vail USD	52.4
		Tolleson UHSD	54.4	Flagstaff USD	52.2
		Amphitheater USD	54.2	Yuma UHSD	48.6

Table 10 continued

Peer group		Instructional spending percentage		Instructional spending percentage	
Number	Description	District name		District name	
3	Medium-large and medium unified and union high school districts in cities and suburbs	Peer group average	54.1%		
		Tanque Verde USD	57.5	Queen Creek USD	55.5
		Humboldt USD	57.1	Sierra Vista USD	54.0
		Lake Havasu USD	56.4	Prescott USD	53.1
		Flowing Wells USD	55.8	J.O. Combs USD	51.4
		Agua Fria UHSD	55.6	Apache Junction USD	50.5
		Buckeye UHSD	55.6	Fountain Hills USD	50.0
		Cave Creek USD	55.6	Casa Grande UHSD	48.0
		Catalina Foothills USD	55.5		
4	Large and medium-large unified and union high school districts in towns and rural areas	Peer group average	53.0%		
		Safford USD	63.0	Florence USD	52.4
		Snowflake USD	58.4	Chino Valley USD	51.4
		Show Low USD	58.0	Santa Cruz Valley USD	51.4
		Sahuarita USD	56.6	Payson USD	50.5
		Maricopa USD	53.8	Coolidge USD	49.5
		Kingman USD	53.1	Chinle USD	49.3
		Douglas USD	52.8	Whiteriver USD	48.2
		Nogales USD	52.8	Page USD	47.1
5	Medium unified and union high school districts in towns and rural areas	Peer group average	51.5%		
		Pima USD	67.9	Miami USD	51.5
		Morenci USD	61.4	Winslow USD	51.0
		Thatcher USD	61.1	St. Johns USD	50.8
		Mingus UHSD	60.1	Bisbee USD	50.0
		Willcox USD	56.8	Tombstone USD	49.6
		Saddle Mountain USD	56.5	Sedona-Oak Creek Joint USD	49.5
		Camp Verde USD	55.9	Wickenburg USD	48.8
		Colorado City USD	55.3	Window Rock USD	48.3
		Holbrook USD	54.7	Tuba City USD	46.9
		Benson USD	53.5	Ganado USD	45.4
		Blue Ridge USD	53.1	Baboquivari USD	42.8
		Parker USD	52.5	Sanders USD	42.7
		Colorado River UHSD	52.3	Kayenta USD	42.6
		Ft. Thomas USD	52.3	San Carlos USD	42.0
		Round Valley USD	51.9	Piñon USD	38.6
		Globe USD	51.7		

Table 10 continued

Peer group		Instructional spending percentage		Instructional spending percentage	
Number	Description	District name		District name	
6	Small unified and union high school districts in towns and rural areas	Peer group average	48.6%		
		Bagdad USD	59.5	Gila Bend USD	47.8
		Williams USD	55.2	St. David USD	47.8
		Ray USD	53.4	Antelope UHSD	46.8
		Littlefield USD	53.2	Hayden-Winkelman USD	46.3
		Mammoth-San Manuel USD	52.4	Joseph City USD	45.7
		Ajo USD	51.8	Duncan USD	45.4
		Heber-Overgaard USD	51.6	Santa Cruz Valley UHSD	43.0
		Mayer USD	51.4	Grand Canyon USD	38.8
		Ash Fork Joint USD	51.2	Red Mesa USD	33.9
		Superior USD	49.0		
7	Very large and large elementary school districts in cities and suburbs	Peer group average	54.5%		
		Kyrene ESD	61.9	Tempe ESD	53.5
		Litchfield ESD	58.9	Cartwright ESD	53.3
		Alhambra ESD	56.1	Glendale ESD	50.8
		Washington ESD	55.6	Roosevelt ESD	50.7
		Pendergast ESD	54.1	Yuma ESD	50.1
8	Medium-large and medium elementary school districts in cities and suburbs	Peer group average	52.2%		
		Liberty ESD	59.0	Crane ESD	51.9
		Wilson ESD	55.3	Union ESD	51.7
		Fowler ESD	55.1	Avondale ESD	51.6
		Osborn ESD	54.2	Isaac ESD	51.1
		Littleton ESD	53.5	Buckeye ESD	50.6
		Laveen ESD	53.3	Balsz ESD	50.5
		Murphy ESD	53.3	Casa Grande ESD	49.5
		Phoenix ESD	53.1	Creighton ESD	47.7
		Madison ESD	52.7	Riverside ESD	45.7
		Tolleson ESD	52.2		
9	Medium-large and medium elementary school districts in towns and rural areas	Peer group average	51.7%		
		Cottonwood-Oak Creek ESD	58.1	Toltec ESD	51.7
		Bullhead City ESD	54.2	Mohave Valley ESD	49.6
		Palominas ESD	53.6	Gadsden ESD	49.2
		Somerton ESD	52.9	Eloy ESD	44.4
		Nadaburg USD ¹	51.9		
10	Small elementary school districts in towns and rural areas	Peer group average	53.9%		
		Red Rock ESD	61.7	Beaver Creek ESD	52.4
		Clarkdale-Jerome ESD	59.7	Sacaton ESD	52.3
		Palo Verde ESD	57.4	Oracle ESD	52.2
		Naco ESD	57.0	Stanfield ESD	48.3
		Continental ESD	54.7	Altar Valley ESD	44.0
		Arlington ESD	53.4		

Table 10 concluded

Peer group		Instructional spending percentage		Instructional spending percentage	
Number	Description	District name	District name	District name	District name
11	Very small school districts	Peer group average	50.1%		
		Blue ESD	71.1	Wellton ESD	49.3
		Hillside ESD	62.7	San Fernando ESD	49.1
		Aguila ESD	61.9	Seligman USD	48.8
		Bonita ESD	61.2	Morristown ESD	48.7
		Valentine ESD	60.6	Topock ESD	48.7
		Crown King ESD	60.5	Mohawk Valley ESD	48.6
		Cochise ESD	60.0	Skull Valley ESD	48.6
		Sonoita ESD	59.3	Solomon ESD	48.6
		Double Adobe ESD	58.7	Sentinel ESD	48.5
		Yucca ESD	57.8	Vernon ESD	48.5
		Alpine ESD	57.1	Yarnell ESD	48.5
		Maine Consolidated SD	54.2	Patagonia ESD	48.0
		Young ESD	54.2	Patagonia UHSD	48.0
		Cañon ESD	54.1	Picacho ESD	47.1
		Owens-Whitney ESD	54.1	Kirkland ESD	46.5
		McNary ESD	53.9	Concho ESD	45.3
		Congress ESD	53.8	Wenden ESD	44.3
		Hyder ESD	53.3	Quartzsite ESD	44.2
		Santa Cruz ESD	51.6	Apache ESD	42.8
		Bicentennial UHSD	51.5	Ash Creek ESD	41.6
		San Simon USD	51.3	Salome Consolidated ESD	41.6
		Valley UHSD	51.2	Bowie USD	41.4
		Pine Strawberry ESD	50.7	Peach Springs USD	40.9
		Pomerene ESD	50.6	Bouse ESD	40.1
		Tonto Basin ESD	50.5	Mobile ESD	38.6
		Elfrida ESD	50.4	Cedar USD	35.4
		Fredonia-Moccasin USD	50.3	McNeal ESD	35.1
		Pearce ESD	50.2	Hackberry ESD	34.2
		Paloma ESD	49.7		

¹ Although a unified school district, Nadaburg USD was included in a group with elementary school districts because it did not have any high school students in fiscal year 2019.

Source: Auditor General staff analysis of fiscal year 2019 district-reported accounting data, fiscal year 2019 Arizona Department of Education student membership data, and fiscal year 2018 U.S. Census Bureau location designations reported in the National Center for Education Statistics' Common Core of Data.

Table 11
Districts grouped by transportation peer group and ranked by cost
per mile and cost per rider
Fiscal year 2019

Peer group			Cost	Cost
Number	Description	District name	per mile	per rider
T-1	Districts in cities and suburbs traveling less than 165 miles per rider	Peer group average	\$7.55	\$1,108
		Catalina Foothills USD	3.59	474
		Crane ESD	5.38	890
		Littleton ESD	6.12	836
		Tempe ESD	5.20	981
		Fowler ESD	6.11	1,009
		Flowing Wells USD	7.20	1,157
		Glendale ESD	7.45	1,303
		Creighton ESD	9.40	1,035
		Alhambra ESD	8.67	1,231
		Murphy ESD	9.21	1,153
		Cartwright ESD	9.20	1,233
		Laveen ESD	8.65	1,703
		Madison ESD	11.95	1,394
T-2	Districts in cities and suburbs traveling 165-230 miles per rider	Peer group average	\$6.82	\$1,386
		Riverside ESD	2.80	741
		Litchfield ESD	3.89	989
		Sunnyside USD	4.75	1,040
		Avondale ESD	6.47	1,349
		Roosevelt ESD	7.00	1,293
		Pendergast ESD	6.91	1,347
		Osborn ESD	8.66	1,327
		Union ESD	7.65	1,689
		Isaac ESD	8.93	1,798
		Phoenix ESD	8.94	2,216
		Tolleson ESD	11.19	2,287

Table 11 continued

Peer group			Cost	Cost
Number	Description	District name	per mile	per rider
T-3	Districts in cities and suburbs traveling 231-290 miles per rider	Peer group average	\$4.60	\$1,224
		Sierra Vista USD	3.42	1,048
		Apache Junction USD	3.36	1,082
		Buckeye ESD	4.36	962
		Queen Creek USD	4.37	1,045
		Kyrene ESD	4.02	1,181
		Wilson ESD	4.38	1,213
		Higley USD	5.30	1,207
		Tempe UHSD	4.40	1,516
		Chandler USD	5.02	1,406
		Tolleson UHSD	5.29	1,345
		Deer Valley USD	5.47	1,410
		Washington ESD	5.84	1,401
		Balsz ESD	8.70	1,095
T-4	Districts in cities and suburbs traveling 291-365 miles per rider	Peer group average	\$4.02	\$1,407
		Fountain Hills USD	2.89	1,345
		Humboldt USD	3.26	1,236
		Cave Creek USD	3.46	1,329
		J.O. Combs USD	4.23	1,087
		Tanque Verde USD	3.78	1,262
		Casa Grande ESD	3.60	1,411
		Peoria USD	3.92	1,349
		Liberty ESD	4.01	1,380
		Agua Fria UHSD	3.80	1,459
		Dysart USD	4.84	1,210
		Gilbert USD	4.36	1,419
		Scottsdale USD	4.59	1,564
		Vail USD	3.95	1,859
		Paradise Valley USD	4.74	1,605
Mesa USD	4.83	1,594		

Table 11 continued

Peer group			Cost	Cost
Number	Description	District name	per mile	per rider
T-5	Districts in cities and suburbs traveling more than 365 miles per rider	Peer group average	\$4.10	\$1,775
		Buckeye UHSD	2.97	1,615
		Marana USD	3.71	1,558
		Flagstaff USD	3.83	1,549
		Yuma ESD	3.58	1,845
		Prescott USD	3.82	1,815
		Amphitheater USD	5.06	1,736
		Lake Havasu USD	4.70	1,912
		Yuma UHSD	6.18	2,168
		Casa Grande UHSD	4.75	3,817
		Glendale UHSD	7.77	3,037
		Phoenix UHSD	N/A	1,188
		Tucson USD	5.16	NR
T-6	Districts in towns and rural areas traveling less than 240 miles per rider	Peer group average	\$4.23	\$768
		Red Rock ESD	1.19	328
		Colorado City USD	3.17	606
		Somerton ESD	3.60	629
		Clarkdale-Jerome ESD	3.95	570
		Safford USD	3.35	687
		Sahuarita USD	3.53	815
		Pima USD	4.17	728
		Thatcher USD	4.22	739
		Gadsden ESD	4.10	816
		Bullhead City ESD	3.74	948
		Maricopa USD	3.98	1,042
		Toltec ESD	4.75	930
		Nogales USD	5.22	879
		Morenci USD	5.27	1,035
		San Carlos USD	6.19	1,837

Table 11 continued

Peer group			Cost	Cost
Number	Description	District name	per mile	per rider
T-7	Districts in towns and rural areas traveling 240-335 miles per rider	Peer group average	\$3.70	\$1,127
		Littlefield USD	2.48	695
		Mammoth-San Manuel USD	2.77	900
		Beaver Creek ESD	3.22	797
		Continental ESD	3.57	723
		Gila Bend USD	3.23	888
		Mohave Valley ESD	2.88	1,014
		Whiteriver USD	3.48	893
		Santa Cruz Valley USD	3.58	887
		Palo Verde ESD	2.89	1,236
		Cottonwood-Oak Creek ESD	3.87	963
		Chino Valley USD	4.01	1,021
		Ft. Thomas USD	4.21	1,037
		Eloy ESD	3.64	1,226
		Mingus UHSD	4.03	1,404
		Sedona-Oak Creek Joint USD	4.29	1,436
		Miami USD	5.14	1,324
		Window Rock USD	4.81	1,541
Superior USD	4.28	1,857		
Snowflake USD	5.50	1,892		
T-8	Districts in towns and rural areas traveling 336-450 miles per rider	Peer group average	\$3.26	\$1,447
		Ganado USD	2.50	1,107
		Chinle USD	2.86	1,056
		Kingman USD	2.31	1,378
		Saddle Mountain USD	3.00	1,081
		Nadaburg USD	2.51	1,305
		Stanfield ESD	2.96	1,110
		Blue Ridge USD	3.11	1,120
		St. David USD	3.09	1,450
		Camp Verde USD	3.55	1,256
		Florence USD	3.32	1,474
		Bisbee USD	3.49	1,647
		Globe USD	3.14	1,867
		Parker USD	4.05	1,783
		Benson USD	3.89	1,955
		Payson USD	4.74	1,727
		Sacaton ESD	5.06	1,713
		Naco ESD	7.52	2,968
Show Low USD	NR	NR		

Table 11 continued

Peer group			Cost	Cost
Number	Description	District name	per mile	per rider
T-9	Districts in towns and rural areas traveling 451-600 miles per rider	Peer group average	\$2.74	\$1,641
		Hayden-Winkelman USD	1.46	1,404
		Baboquivari USD	2.10	1,309
		Tombstone USD	2.13	1,355
		Round Valley USD	2.02	1,533
		Altar Valley ESD	2.48	1,265
		Wickenburg USD	2.32	1,384
		Palominas ESD	2.46	1,339
		Heber-Overgaard USD	2.24	1,785
		Winslow USD	2.90	1,412
		Arlington ESD	2.86	1,544
		Oracle ESD	3.25	1,586
		Colorado River UHSD	2.97	1,757
		Williams USD	3.36	1,677
		Grand Canyon USD	3.01	1,971
		Coolidge USD	3.51	2,446
Kayenta USD	3.42	2,539		
Ajo USD	4.37	2,479		
T-10	Districts in towns and rural areas traveling more than 600 miles per rider	Peer group average	\$2.20	\$1,962
		Antelope UHSD	1.25	977
		Duncan USD	1.89	1,210
		Bagdad USD	1.61	1,563
		St. Johns USD	1.33	1,826
		Holbrook USD	1.64	1,572
		Ash Fork Joint USD	1.05	2,228
		Willcox USD	1.73	1,750
		Mayer USD	2.51	1,551
		Ray USD	2.54	1,918
		Joseph City USD	1.98	2,450
		Sanders USD	2.63	1,909
		Page USD	2.74	2,032
		Red Mesa USD	2.25	2,668
		Tuba City USD	3.28	2,212
		Douglas USD	3.63	3,059
Santa Cruz Valley UHSD	3.63	3,121		
Piñon USD	4.07	2,802		

Table 11 continued

Peer group		District name	Cost per mile	Cost per rider
Number	Description			
T-11	Very small districts	Peer group average	\$2.28	\$1,665
		Aguila ESD	0.61	432
		Owens-Whitney ESD	0.51	733
		Yarnell ESD	0.59	752
		Bouse ESD	1.18	421
		San Simon USD	0.74	846
		Cañon ESD	1.78	397
		Double Adobe ESD	1.18	870
		Paloma ESD	1.69	621
		Vernon ESD	1.37	934
		McNary ESD	1.69	765
		Bonita ESD	1.48	925
		Bowie USD	0.90	1,355
		Congress ESD	1.56	886
		Pearce ESD	1.95	632
		Valentine ESD	2.20	540
		Cochise ESD	1.97	729
		Alpine ESD	0.49	2,099
		Santa Cruz ESD	2.24	891
		Hyder ESD	1.63	1,515
		Topock ESD	3.32	561
		Tonto Basin ESD	1.40	1,981
		Bicentennial UHSD	1.57	1,985
		Fredonia-Moccasin USD	2.72	1,145
		Concho ESD	1.21	2,331
		Young ESD	3.13	936
		Ash Creek ESD	1.26	2,340
		Picacho ESD	3.41	812
		Quartzsite ESD	2.57	1,502
		Elfrida ESD	2.40	1,768
		Wellton ESD	3.47	1,284
		Skull Valley ESD	3.47	1,317
		Morristown ESD	3.47	1,343
		Mobile ESD	2.36	2,326
		Salome Consolidated ESD	4.12	1,044
		Kirkland ESD	1.95	2,645
		Wenden ESD	3.43	1,610
		McNeal ESD	1.55	2,988
		Seligman USD	1.95	2,707
		Apache ESD	1.79	2,955
		Valley UHSD	2.57	2,824

Table 11 concluded

Peer group			Cost	Cost
Number	Description	District name	per mile	per rider
T-11 (concluded)	Very small districts	Sentinel ESD	2.28	3,065
		Patagonia ESD	1.63	3,789
		Patagonia UHSD	1.63	3,789
		Maine Consolidated SD	4.19	1,978
		Pomerene ESD	5.70	953
		Pine Strawberry ESD	3.45	2,675
		Sonoita ESD	4.64	2,351
		Mohawk Valley ESD	2.78	4,180
		Hackberry ESD	5.07	4,641
		Solomon ESD	2.78	NR
		Cedar USD	NR	2,417

Source: Auditor General staff analysis of fiscal year 2019 district-reported accounting data, fiscal year 2019 Arizona Department of Education route reports, and fiscal year 2018 U.S. Census Bureau location designations reported in the National Center for Education Statistics' Common Core of Data.

Table 12

**Districts grouped by student achievement peer group and ranked by percentage of students who passed State assessments
Fiscal year 2019**

Peer group		Percentage of students passing			
Number	Description	District name	Math	English Language Arts	Science
1	Unified school districts with poverty rates less than 8 percent in cities and suburbs	Peer group average	60%	60%	72%
		Catalina Foothills USD	67	66	77
		Vail USD	66	63	78
		Higley USD	65	63	76
		Cave Creek USD	61	63	73
		Tanque Verde USD	55	60	78
		Queen Creek USD	62	56	62
		Fountain Hills USD	54	53	67
		Gilbert USD	52	53	64
		2	Unified school districts with poverty rates of 8 to 16 percent in cities and suburbs	Peer group average	46%
Deer Valley USD	57			57	70
Scottsdale USD	57			56	65
Chandler USD	58			57	61
Prescott USD	45			53	67
Paradise Valley USD	47			48	57
Peoria USD	49			45	54
Dysart USD	41			42	48
Marana USD	40			39	49
Flagstaff USD	32			37	46
3	Unified school districts with poverty rates greater than 16 percent in cities and suburbs	Peer group average	39%	39%	50%
		Lake Havasu USD	51	43	55
		Amphitheater USD	42	44	57
		Humboldt USD	40	44	57
		Mesa USD	43	41	52
		Sierra Vista USD	39	43	50
		Apache Junction USD	28	29	43
		Tucson USD	30	32	36

Table 12 continued

Peer group		Percentage of students passing			
Number	Description	District name	Math	English Language Arts	Science
4	Unified school districts with poverty rates less than 21 percent in towns and rural areas	Peer group average	33%	36%	50%
		Thatcher USD	52	50	66
		Morenci USD	45	51	69
		St. David USD	40	45	62
		Sahuarita USD	41	45	51
		Chino Valley USD	41	44	47
		Wickenburg USD	39	35	58
		Grand Canyon USD	33	36	54
		Saddle Mountain USD	42	32	47
		Maricopa USD	34	36	43
		Duncan USD	34	34	44
		Fredonia-Moccasin USD	22	27	58
		Bagdad USD	27	32	46
		Florence USD	24	29	44
		Ray USD	21	28	42
		Sedona-Oak Creek Joint USD	21	34	34
		San Simon USD ¹	29	29	-
		Camp Verde USD	20	25	35
		Blue ESD ^{1,3}	-	-	-
5	Unified school districts with poverty rates of 21 to 26 percent in towns and rural areas	Peer group average	29%	32%	43%
		Ash Fork Joint USD	62	62	73
		Round Valley USD	44	46	50
		Payson USD	38	43	58
		Safford USD	45	41	51
		Willcox USD	37	35	48
		Blue Ridge USD	32	39	43
		Kingman USD	28	31	48
		Littlefield USD	27	36	44
		Tombstone USD	28	31	39
		Mammoth-San Manuel USD	24	26	35
		Bisbee USD	20	23	37
		Superior USD	11	20	48
		Globe USD	24	23	26
		Page USD	19	23	29
		Seligman USD ¹	19	25	-
		Coolidge USD	12	15	23
		Bowie USD ¹	-	-	-

Table 12 continued

Peer group		Percentage of students passing			
Number	Description	District name	Math	English Language Arts	Science
6	Unified school districts with poverty rates of 27 to 33 percent in towns and rural areas	Peer group average	36%	35%	44%
		Snowflake USD	62	53	68
		Colorado City USD	56	50	67
		St. Johns USD	56	52	62
		Heber-Overgaard USD	53	45	66
		Benson USD	47	47	67
		Joseph City USD	42	55	56
		Flowing Wells USD ²	40	41	50
		Pima USD	27	35	40
		Santa Cruz Valley USD	30	32	35
		Ajo USD	26	27	40
		Sunnyside USD ²	28	26	27
		Gila Bend USD	19	16	26
		Tuba City USD	23	15	22
		Ft. Thomas USD	20	16	17
		Hayden-Winkelman USD	18	19	16
Young ESD ^{1, 3}	-	-	-		
7	Unified school districts with poverty rates greater than 33 percent in towns and rural areas	Peer group average	24%	22%	29%
		Show Low USD	40	41	63
		Williams USD	36	38	47
		Nogales USD	36	36	42
		Winslow USD	35	28	42
		Holbrook USD	30	31	42
		Mayer USD	33	34	31
		Miami USD	21	21	44
		Douglas USD	24	28	31
		Chinle USD	31	24	27
		Parker USD	26	22	30
		Window Rock USD	20	20	23
		Kayenta USD	18	18	17
		Ganado USD	16	14	17
		Baboquivari USD	13	15	17
		Piñon USD	22	11	12
		Sanders USD	13	13	19
		Red Mesa USD	15	13	16
		Whiteriver USD	15	11	17
		San Carlos USD	6	5	11

Table 12 continued

Peer group		Percentage of students passing			
Number	Description	District name	Math	English Language Arts	Science
8	Union high school districts with poverty rates of 17 percent or less in cities and suburbs	Peer group average	37%	32%	35%
		Tempe UHSD	35	37	51
		Agua Fria UHSD	42	37	38
		Buckeye UHSD	43	30	22
		Tolleson UHSD	26	22	29
9	Union high school districts with poverty rates greater than 17 percent in cities and suburbs	Peer group average	28%	25%	34%
		Glendale UHSD	49	38	62
		Casa Grande UHSD	21	25	40
		Phoenix UHSD	22	21	22
		Yuma UHSD	21	14	13
10	Union high school districts with poverty rates of 17 percent or less in towns and rural areas	Peer group average	28%	28%	36%
		Patagonia UHSD	39	43	36
		Valley UHSD ¹	16	25	-
		Bicentennial UHSD ¹	-	16	-
11	Union high school districts with poverty rates greater than 17 percent in towns and rural areas	Peer group average	18%	22%	30%
		Mingus UHSD	31	26	41
		Antelope UHSD	12	21	26
		Colorado River UHSD	13	23	22
		Santa Cruz Valley UHSD ¹	16	17	-
12	Elementary school districts with poverty rates less than 16 percent in cities and suburbs	Peer group average	54%	54%	72%
		Kyrene ESD	57	60	75
		Madison ESD	58	58	75
		Litchfield ESD	56	57	71
		Liberty ESD	44	41	65
13	Elementary school districts with poverty rates of 16 to 23 percent in cities and suburbs	Peer group average	33%	35%	45%
		Avondale ESD	44	40	58
		Laveen ESD	42	41	58
		Crane ESD	39	40	51
		Tempe ESD	38	39	49
		Pendergast ESD	33	34	44
		Casa Grande ESD	30	32	37
		Littleton ESD	25	31	41
		Buckeye ESD	24	28	42
		Union ESD	25	30	29

Table 12 continued

Peer group		Percentage of students passing			
Number	Description	District name	Math	English Language Arts	Science
14	Elementary school districts with poverty rates of 24 to 30 percent in cities and suburbs	Peer group average	29%	29%	42%
		Yuma ESD	36	37	50
		Washington ESD	34	35	53
		Riverside ESD	32	34	53
		Osborn ESD	38	29	39
		Glendale ESD	33	29	43
		Tolleson ESD	26	31	48
		Fowler ESD	27	31	37
		Roosevelt ESD	22	22	32
		Murphy ESD	17	15	27
15	Elementary school districts with poverty rates greater than 30 percent in cities and suburbs	Peer group average	26%	26%	39%
		Phoenix ESD	29	31	47
		Alhambra ESD	31	27	43
		Wilson ESD	30	27	38
		Cartwright ESD	28	28	37
		Balsz ESD	26	25	40
		Creighton ESD	23	25	32
		Isaac ESD	18	18	33
16	Elementary school districts with poverty rates less than 15 percent in towns and rural areas	Peer group average	40%	40%	59%
		Maine Consolidated SD	52	45	82
		Congress ESD ¹	63	56	-
		Clarkdale-Jerome ESD	46	60	72
		Palominas ESD	50	47	73
		Sentinel ESD ¹	62	50	-
		Continental ESD	47	42	64
		Red Rock ESD	37	41	70
		Bonita ESD ¹	46	50	-
		Nadaburg USD ³	34	38	56
		Beaver Creek ESD	30	28	53
		Oracle ESD	27	27	53
		Elfrida ESD	20	29	57
		Morristown ESD	29	29	46
		Stanfield ESD	15	15	21
		Crown King ESD ¹	-	-	-
		Hillside ESD ¹	-	-	-
Owens-Whitney ESD ¹	-	-	-		
San Fernando ESD ¹	-	-	-		
Skull Valley ESD ¹	-	-	-		

Table 12 continued

Peer group		Percentage of students passing			
Number	Description	District name	Math	English Language Arts	Science
17	Elementary school districts with poverty rates of 15 to 22 percent in towns and rural areas	Peer group average	40%	42%	63%
		Hackberry ESD ¹	61	67	-
		Solomon ESD	44	54	71
		Sonoita ESD	39	44	83
		Pine Strawberry ESD	49	50	62
		Topock ESD	45	34	82
		Cochise ESD	53	47	58
		Palo Verde ESD	47	46	62
		Hyder ESD	45	38	58
		Cottonwood-Oak Creek ESD	39	49	52
		McNeal ESD ¹	39	43	-
		Pearce ESD ¹	38	35	-
		Patagonia ESD ¹	23	30	-
		Paloma ESD ¹	21	29	-
		Toltec ESD	16	23	36
		Ash Creek ESD ¹	-	-	-
		Bouse ESD ¹	-	-	-
Yucca ESD ¹	-	-	-		
18	Elementary school districts with poverty rates of 23 to 27 percent in towns and rural areas	Peer group average	35%	39%	56%
		Pomerene ESD	54	55	67
		Santa Cruz ESD	45	55	71
		Vernon ESD	32	46	75
		Mohawk Valley ESD	40	42	63
		Mohave Valley ESD	31	33	45
		Altar Valley ESD	28	28	44
		Arlington ESD	35	30	26
		Picacho ESD ¹	13	20	-
		Mobile ESD ¹	-	-	-
		Valentine ESD ¹	-	-	-

Table 12 concluded

Peer group			Percentage of students passing		
Number	Description	District name	Math	English Language Arts	Science
19	Elementary school districts with poverty rates of 28 to 31 percent in towns and rural areas	Peer group average	27%	31%	46%
		Tonto Basin ESD	53	59	81
		Aguila ESD	45	39	60
		Concho ESD	19	36	75
		Gadsden ESD	35	32	31
		Quartzsite ESD	13	24	41
		Wellton ESD	16	27	32
		Eloy ESD	18	20	28
		Naco ESD	14	13	22
		Double Adobe ESD ¹	-	-	-
20	Elementary school districts with poverty rates greater than 31 percent in towns and rural areas	Peer group average	26%	34%	46%
		Alpine ESD ¹	54	74	-
		Cañon ESD	27	40	66
		Somerton ESD	42	35	43
		Kirkland ESD ¹	30	45	-
		Bullhead City ESD	27	28	51
		Wenden ESD	21	23	55
		Salome Consolidated ESD ¹	23	20	-
		Cedar USD ^{1,3}	13	-	-
		McNary ESD ¹	13	-	-
		Sacaton ESD	7	10	13
		Apache ESD ¹	-	-	-
		Peach Springs USD ^{1,3}	-	-	-
		Yarnell ESD ¹	-	-	-

¹ Scores are not shown because measure did not meet our criteria for reporting.

² Although urban districts, Flowing Wells USD and Sunnyside USD were included in groups with rural districts to better match poverty rates.

³ Although unified school districts, Cedar USD, Nadaburg USD, and Peach Springs USD were included in groups with elementary school districts because they did not have any high school students take AzMERIT, AIMS, ACT, or SAT in fiscal year 2019. In addition, Blue ESD and Young ESD were included in groups with unified school districts as they did have high school students who took the AzMERIT, AIMS, ACT, or SAT in fiscal year 2019.

Source: Auditor General staff analysis of fiscal year 2019 Arizona Department of Education AzMERIT and AIMS data and/or ACT and SAT data, fiscal year 2018 U.S. Census Bureau poverty rates, and fiscal year 2018 location designations reported in the National Center for Education Statistics' Common Core of Data.



Description of operational spending

Operational spending includes costs incurred for the District's day-to-day operations and includes the categories listed below. These categories follow Arizona's Uniform Chart of Accounts for school districts, which meets the requirements of the U.S. Department of Education's account classifications, providing us the ability to compare individual school districts' measures to peer districts' measures, Arizona's measures to national averages, and Arizona's measures over time. Operational spending includes instructional and noninstructional spending. The definition of instruction used in this report is based on the definition of "instruction" developed by the U.S. Department of Education's National Center for Education Statistics. Operational spending excludes costs associated with acquiring capital assets (such as purchasing or leasing land, buildings, and equipment), interest, and programs that are outside the scope of preschool through grade 12 education, such as adult education and community service programs.

Total operational spending includes instructional and noninstructional expenditures as shown below:

Instructional spending

- **Classroom personnel**—Salaries and benefits for teachers, teachers' aides, substitute teachers, graders, and guest lecturers.
- **General instructional supplies**—Paper, pencils, crayons, etc.
- **Instructional aids**—Textbooks, workbooks, instructional software, etc.
- **Activities**—Field trips, athletics, and co-curricular activities, such as choir or band.
- **Tuition**—Paid to out-of-State and private institutions.

Noninstructional spending

- **Administration**—Salaries and benefits for superintendents, principals, business managers, and clerical and other staff who perform accounting, payroll, purchasing, warehousing, printing, human resource activities, and administrative technology services; and other costs related to these services and the governing board.
- **Plant operations and maintenance**—Salaries, benefits, and other costs related to equipment repair, building maintenance, custodial services, groundskeeping, and security; and costs for heating, cooling, lighting, and property insurance.
- **Food service**—Salaries, benefits, food supplies, and other costs related to preparing, transporting, and serving meals and snacks.
- **Transportation**—Salaries, benefits, and other costs related to maintaining buses and transporting students to and from school and school activities.
- **Student support services**—Salaries and benefits for attendance clerks, social workers, counselors, nurses, audiologists, and speech pathologists; and other costs related to these support services to students.
- **Instruction support services**—Salaries and benefits for curriculum directors, special education directors, teacher trainers, librarians, media specialists, and instruction-related IT staff; and other costs related to assisting instructional staff in delivering instruction.

Description of nonoperational spending

Nonoperational spending includes costs incurred to acquire capital assets (such as purchasing or leasing land, buildings, and equipment), interest, and programs, such as adult education and community service, that are outside the scope of preschool through grade 12 education, but excludes principal payments on bond debt. The following categories comprise nonoperational expenditures:

- **Land and buildings**—Expenditures for purchasing or leasing land and existing buildings, constructing and renovating school buildings, and improving school grounds.
- **Equipment**—Expenditures for purchasing or leasing initial, additional, and replacement equipment, such as furniture, vehicles, and technology-related hardware and noninstructional software.
- **Interest**—Expenditures for the interest on long- and short-term debt.
- **Other**—Expenditures for all remaining nonoperational spending—those primarily for adult education; community service programs for students, staff, or other community participants; and civic activities, such as parent-teacher association meetings, public forums, lectures, and clubs.¹

Description of revenue sources

Arizona school districts receive revenues from local, State, and federal sources. In general, districts receive local and State revenues based on an equalization formula set by State law. This “equalization formula funding” provides the base funding for districts through locally levied property taxes and State-appropriated monies. Districts also receive State monies through additional statutory formulas, such as Classroom Site Funds (Proposition 301) and instructional improvement formulas. Some districts receive other local and State revenues as allowed by State law to provide funding for a small school adjustment, voter-approved budget override or bond, or activities required or permitted to comply with a federal desegregation court order or administrative agreement. Many districts also receive local, State, or federal monies through grants for specific purposes, such as providing meals and additional educational opportunities to students from low-income families. The following are descriptions for specific revenue sources discussed in this report:

- **Federal impact aid**—Federal monies provided to districts that have been impacted by the presence of tax-exempt federal lands or the enrollment of students living on federal lands, such as military bases and reservations.
- **Federal grants**—Federal monies that are generally provided for specific purposes, including programs targeted toward at-risk students and programs that distribute the majority of their monies based on poverty rates.
- **Transportation funding**—Monies for student transportation based on the State funding formula that uses primarily the number of miles traveled and secondarily the number of eligible students transported.
- **Additional budgetary funding**—Additional monies received through the State funding formula for relative costs associated with various classifications, including district size, type, and location, and numbers and types of special needs children.
- **Small school adjustment**—Additional local and State monies for small districts, which are allowed by law to increase their expenditure budgets and levy monies without voter approval if their student enrollment is within the following prescribed numbers:
 - Grades K-8 with 125 or fewer students.
 - Grades 9-12 with 100 or fewer students.

¹ A district’s governing board may provide academic and skill development for all citizens and furnish facilities for disseminating community-related services in accordance with Arizona Revised Statutes (A.R.S.) §§15-1141 and 15-1142, and may also permit the use of school facilities under its direction for civic activities as defined in A.R.S. §15-1105.

- **Desegregation**—Additional local and State monies for districts, which are allowed by law to increase their expenditure budgets and levy monies without voter approval to comply with a court order or administrative agreement with the U.S. Department of Education’s Office for Civil Rights.
- **Voter-approved budget overrides**—Additional local monies districts may levy through voter-approved increases to district expenditure budgets.
- **Tax credits**—Monies provided to districts in accordance with A.R.S. §43-1089.01, which allows taxpayers to claim credit—up to \$200 per individual tax return or \$400 per joint tax return—for fees paid or contributions made to a school for extracurricular activities or character education programs.

Scope

All the State’s 236 school districts were included in calculating the fiscal year 2019 State-wide spending percentages and per pupil spending amounts. However, some districts were excluded from the following further analysis:

- When calculating individual district instructional spending percentages, transporting districts, career and technical education districts (CTEDs), and accommodation districts were excluded. Transporting districts transport all of their students to other districts and, therefore, do not have expenditures in many of the operational areas, and CTEDs and accommodation districts often operate very differently than other districts and among themselves in terms of the services they provide and how they provide them.
- When analyzing State-wide trends in the efficiency of district operations, very small districts, i.e., those serving fewer than 200 students, transporting districts, CTEDs, and accommodation districts were excluded. Transporting districts, CTEDs, and accommodation districts often operate differently than most school districts in terms of the services they provide, the students they serve, and the programs they offer. Additionally, these districts and very small districts often have wide ranges of operational costs and, therefore, would distort the analysis of factors generally affecting districts of other types and sizes.

Sources and methodology

To analyze the most current expenditure data available for Arizona’s districts, we obtained fiscal year 2019 school district Annual Financial Reports (AFRs) and Classroom Site Fund Narrative Results Summaries (CSF Narratives) from the Arizona Department of Education (ADE). In addition, all of the State’s 236 school districts provided us with fiscal year 2019 accounting data. The information used to prepare this report was not audited; however, it was subjected to certain quality control procedures to help ensure its completeness and reasonableness. For example, instead of auditing the districts’ AFRs, CSF Narratives, and accounting data to the underlying district records, we performed analytical procedures using the financial data and interviewed school district officials about anomalies or variances. We corrected any data errors prior to calculating instructional spending percentages and other measures analyzed for, and presented in, this report. Additionally, we reviewed the reasonability of changes in related measures, such as whether a district’s square footage increased after opening a new school.

Other information related to the analyses presented in this report was obtained from ADE, such as school district staffing levels, academic achievement indicators, bus mileage, and average daily membership counts; and from the Arizona School Facilities Board (SFB), such as square footage and number of schools. This information was adjusted as necessary, based on information obtained from districts or other sources. In addition, we obtained national-level financial data from the National Center for Education Statistics and district-level poverty rates and locations relative to population centers from the U.S. Census Bureau. In order to provide explanations for cost changes, we reviewed and analyzed historical spending and trends and identified efficient and inefficient operational practices from school district performance audits we conducted and interviews of school district staff. Where noted, we adjusted spending data to fiscal year 2019 dollars using the Consumer Price Index published by the U.S. Labor Department, Bureau of Labor Statistics, when analyzing historical spending and trends.

District peer groups

To compare the school districts' operational measures and student achievement, we developed 3 types of district peer groups. The peer groups are presented in Tables 10, 11, and 12 in Appendix A beginning on pages a-1, a-5, and a-12, respectively.

- To compare districts' administration, plant operations, and food service cost measures relative to peer groups', we developed operational peer groups using district size, type, and location because these factors are associated with school districts' cost measures in these areas. The 6 district size categories are defined on page b-5. The 2 district type categories are elementary and high school/unified. We grouped union high school districts with unified districts because both districts serve high school students. The 2 location categories are cities/suburbs and town/rural areas. The U.S. Census Bureau classifies districts by distance and population density into 4 main categories: city, suburb, town, and rural. We grouped together districts located in city and suburban areas and grouped together districts located in town and rural areas. Considering these 3 factors, we created 11 operational peer groups to compare district operations in administration, plant operations, and food service operations. These peer groups are labeled 1 through 11, and each includes between 9 and 57 districts.
- To compare districts' transportation cost measures relative to peer groups', we developed transportation peer groups using location and miles per rider because these factors are associated with school districts' transportation cost measures. We grouped together districts based on similar location and miles per rider using an average of historical miles per rider over the past 5 fiscal years. Considering these factors, we created 11 transportation peer groups to compare district operations in transportation. These peer groups are labeled T-1 through T-11, and each includes between 11 and 51 districts.
- To compare districts' academic indicators relative to peer groups', we developed student achievement peer groups using poverty rates, district type, and location. Considering these factors, we created 20 achievement peer groups to compare student achievement. These peer groups are labeled 1 through 20, and each includes between 3 and 19 districts.

State and individual district pages

The following describes the data sources, definitions, and methodology for the State page (see page 19) and individual district pages (see pages 20 through 226). This information is organized into 4 sections: background information, such as the number of districts and schools; operational spending, such as instructional and noninstructional spending and other operational measures; average teacher salary and other measures, such as average years of teacher experience and percentage of teachers in their first 3 years; and the percentage of students who passed State assessments. "N/A" indicates that information is not available, not applicable, or not appropriate to include because it could reveal personal information about a small number of district students. Further, we chose not to report the percentage of students who passed State assessments when the population of test takers was too small or providing the information could identify individual student results. "NR" indicates that we determined that the district's information is not reliable and is, therefore, not being reported or included in peer averages. Further, some districts are excluded from the peer average for certain operational measures because their extreme values would skew the peer average. The following districts are excluded from the peer average for all operational measures because their extreme values would skew the peer average: Ash Creek ESD, Baboquivari USD, Casa Grande UHSD, Chinle USD, Crown King ESD, Ft. Thomas USD, Grand Canyon USD, Kayenta USD, Mobile ESD, Phoenix ESD, Phoenix UHSD, Piñon USD, Red Mesa USD, Sacaton ESD, Sanders USD, and Window Rock USD. Graphics with discontinuous trend lines indicate that data is not reliable for particular years. All information is for fiscal year 2019 unless otherwise indicated. Because Patagonia ESD and Patagonia UHSD operate essentially as 1 district and comingle costs, the 2 districts' spending and other operational measures are presented combined on each district's individual page in this report.

Background information

- **County**—Our analysis of ADE-provided county data. For district boundaries encompassing more than 1 county, the county in which the district office resides is presented.
- **Legislative districts**—Our analysis of school district and legislative district boundaries.
- **Location**—Our analysis of the National Center for Education Statistics’ fiscal year 2018 (the most recent year for available data) urban-centric locale codes that use geocoding and population information to assign a designation based on proximity to population clusters. The 4 main categories are city, suburb, town, and rural.
- **Number of schools**—Our analysis of ADE’s attending average daily membership (ADM) reports and SFB district-wide building reports.
- **Graduation rate**—For districts serving high school students, the fiscal year 2018 (the most recent year for available data) 4-year cohort graduation rates obtained from ADE in October 2019. The State average is the fiscal year 2018 graduation rate reported by ADE.
- **Students attending/District size**—Our analysis of ADE-provided, school-district-reported attending ADM counts. ADM numbers are rounded to the nearest whole number. District sizes were categorized as follows:

Size	Students attending
○ Very large	20,000+
○ Large	8,000 to 19,999
○ Medium-large	2,000 to 7,999
○ Medium	600 to 1,999
○ Small	200 to 599
○ Very small	Fewer than 200

- **5-year change in students attending**—Our analysis of ADE-provided, school-district-reported ADM counts for fiscal years 2014 through 2019.
- **Special education population**—Our analysis of ADE-provided, school-district-reported special education unduplicated attending ADM counts and ADE-provided, school-district-reported total ADM counts. The district- and State-level percentages were calculated by dividing special education ADM by total ADM.
- **English learner population**—Our analysis of ADE-provided, school-district-reported English learner unduplicated attending ADM counts and ADE-provided, school-district-reported total ADM counts. The district- and State-level percentages were calculated by dividing English learner ADM by total ADM.
- **Poverty rate**—Our analysis of U.S. Census Bureau fiscal year 2018 (the most recent year for available data) *Small Area Income and Poverty Estimates* published in December 2019. District- and State-level poverty rates were calculated by dividing the number of children 5 to 17 years old who were living at or below the federal poverty level by the total number of children 5 to 17 years old living in the district or State.
- **Free/reduced meal eligibility**—Our analysis of ADE-provided, school-district-reported counts of students eligible for free or reduced-price meals. The eligibility numbers are from October 2018. For schools participating in the Community Eligibility Provision, the number of eligible students is determined by the site Identified Student Percentage, as instructed by the U.S. Department of Agriculture. For schools participating in Provision 2 or 3, the number of eligible students is determined by the school’s base year of operation. District- and State-level percentages were calculated by dividing the number of students eligible for free or reduced-price meals by the number of students enrolled.

Operational spending

- **Instructional spending percentage by year**—Our analysis of district-reported accounting data and AFRs for fiscal years 2001 through 2019. Instructional spending is further described on page b-1.
- **Spending by operational area**—Our analysis of spending in each operational area divided by total operational spending, using district-reported accounting data and AFRs. The peer average instructional spending percentages were calculated by adding individual districts' instructional spending percentages and dividing by the number of districts in each peer group. The classroom spending percentages were calculated by adding individual districts' instructional, student support, and instruction support percentages. The nonclassroom spending percentages were calculated by adding individual districts' administration, plant operations, food service, and transportation percentages.
- **Operational measures relative to peer averages**—We compared a district's cost measures, such as cost per square foot, and other related measures, such as square footage per student, to its peer group averages. We identified whether the district's cost measures were very low/very high, low/high, or comparable to its peer averages, and indicated the determination by a color bar for each measure. The operational measures and relativity to peer group averages are explained in more detail below. In addition, for the 57 very small districts, we provided comparative information but did not identify the relativity with a color bar because these districts' spending patterns are highly variable and result in less meaningful group averages. The peer averages were calculated by averaging individual districts' numbers for each measure. Some districts were excluded from peer averages for certain operational measures because their extreme values would skew the peer average. The following criteria were used to determine the operational measures relative to peer averages:
 - Green—Very low—Lower than the peer average by more than 15 percent.
 - Blue—Low—Lower than the peer average by 5.01 to 15 percent.
 - Yellow—Comparable—Within 5 percent of the peer average.
 - Orange—High—Higher than the peer average by 5.01 to 15 percent.
 - Red—Very high—Higher than the peer average by more than 15 percent.

Administration

- Cost per pupil: Our analysis of administrative costs divided by the number of students, using district-reported accounting data and ADE-provided ADM data.
- Students per administrative position: The number of students divided by the number of administrative full-time equivalent employees (FTEs), using ADE-provided ADM data and district-reported information on the *School District Employee Report*.

Plant operations

- Cost per square foot: Our analysis of plant operations and maintenance costs divided by the total square footage, using district-reported accounting data and SFB-provided, district-wide building reports.
- Square footage per student: Our analysis of the total square footage divided by the number of students, using SFB-provided, district-wide building reports and ADE-provided ADM data.

Food service

- Cost per meal: Our analysis of food service costs divided by the total number of meals served, using district-reported accounting data and AFRs. Total number of meals served is the sum of total lunches served, total breakfasts served divided by 2, total snacks served divided by 3, and total a la carte sales divided by the district's federal free lunch reimbursement rate in fiscal year 2019.

Transportation

- Cost per mile: Our analysis of transportation costs divided by the total miles driven, using district-reported accounting data and ADE-provided transportation route reports.
- Cost per rider: Our analysis of transportation costs divided by the total eligible riders transported, using district-reported accounting data and ADE-provided transportation route reports.
- **Per pupil spending**
 - District—Our analysis of fiscal years 2018 and 2019 operational and nonoperational costs divided by the number of students, using district-reported accounting data and AFRs, and ADE-provided ADM data.
 - Peer average—Our analysis of operational peer districts' per pupil expenditures. The peer group averages exclude districts with extreme or unreliable values and were calculated by averaging individual districts' per pupil expenditures in each operational and nonoperational area.
 - State average—Our analysis of district-reported accounting data and AFRs, and ADE-provided ADM data. The State's per pupil amounts were calculated by dividing total expenditures in each operational and nonoperational area by the total number of students (ADM).
 - National average—National Center for Education Statistics' fiscal year 2017 data, the most recently available national data.
- **Percentage point change in spending by operational area**—Our analysis of the change in the percentage spent in each operational area between fiscal years 2014 and 2019, using district-reported accounting data and AFRs.

Average teacher salary and other measures

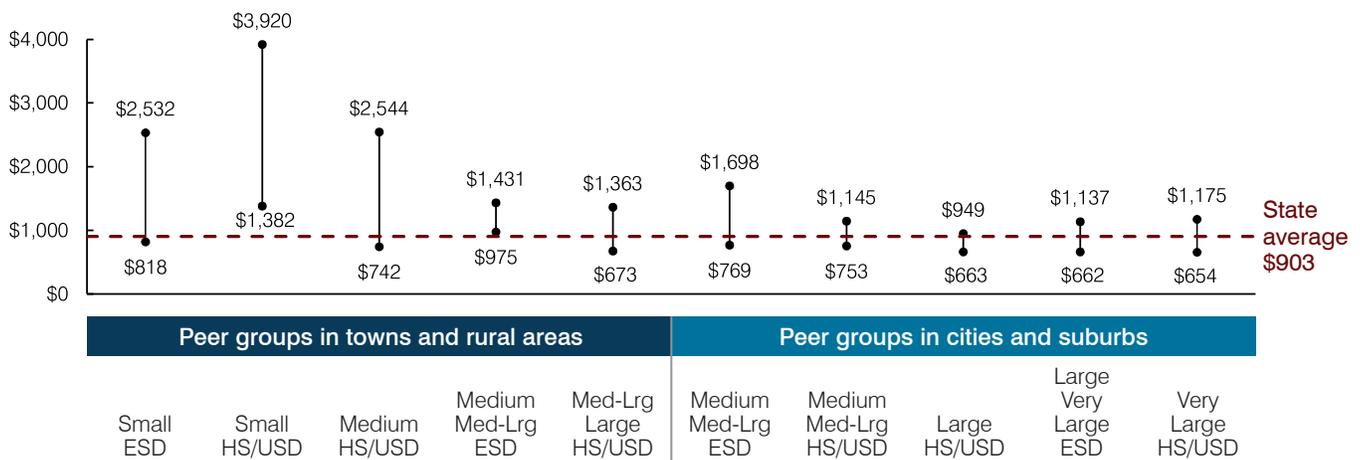
- **Average teacher salary**—Our analysis of total operational spending for certified teacher salaries (excluding salaries for substitute teachers) for fiscal years 2017 through 2019 from district-reported accounting data and the total number of certified teacher FTEs from district-reported CSF Narratives. The average teacher salary is based on total salaries paid related to teaching duties, including Proposition 301 monies, but does not include any salaries paid for additional duties such as cocurricular activities and athletics. To help ensure the average teacher salary was reasonable, we performed certain quality control procedures, such as year-to-year comparisons of district-reported data and interviews with school district officials about anomalies and variances. The district- and State-level averages were calculated by dividing the total teacher salaries by the total certified teacher FTEs.
- **Amount from Prop 301**—Our analysis of the total Proposition 301 (Classroom Site Fund) monies for fiscal years 2017 through 2019 spent on teacher salaries and the total number of certified teacher FTEs from district-reported accounting data and CSF Narratives. The district- and State-level averages were calculated by totaling the Proposition 301 amount paid to teachers and dividing by the total certified teacher FTEs.
- **Students per teacher**—Our analysis of ADE-provided ADM data and certified teacher FTEs as reported by districts on their CSF Narratives for fiscal years 2017 through 2019. The district- and State-level ratios were calculated by dividing total ADM by total certified teacher FTEs.
- **Average years of teacher experience**—Our analysis of district-reported certified teacher FTEs and years of experience obtained from ADE for fiscal years 2017 through 2019. The years of experience includes the actual, uncapped number of years of experience for each certified teacher. The district- and State-level years of experience were calculated by dividing the total number of years of experience by the total certified teacher FTEs.
- **Percentage of teachers in first 3 years**—Our analysis of district-reported certified teacher FTEs and years of experience obtained from ADE for fiscal years 2017 through 2019. The district- and State-level percentages were calculated by dividing the number of certified teachers in their first 3 years by the total number of certified teachers.

Student achievement

- **Percentage of students who passed State assessments**—Our analysis of the Arizona’s Measurement of Educational Readiness to Inform Teaching (AzMERIT) Math and English Language Arts test results, the Arizona’s Instrument to Measure Standards (AIMS) Science test results, and the Menu of Assessments State administration of the ACT and the SAT for Math, English Language Arts, or Science test results obtained from ADE in October 2019 and January 2020. The district- and State-wide percentages were calculated by dividing the total number of students who passed State assessments—that is, those who scored proficient or highly proficient on AzMERIT, ACT, or SAT, or those who met or exceeded the State standards on AIMS Science—by the total number of students who took the tests. Test results were aggregated across grade levels and courses, as applicable. The peer group average percentages were calculated by adding individual districts’ percentages of students who passed State assessments and dividing by the number of districts in each peer group. We chose not to report a district’s percentage when the population of test takers was too small or providing the information could identify individual student results. Additionally, these districts’ percentages were not included in peer group averages.

This appendix presents graphic representations of cost ranges by operational peer groups for administration, plant operations, food service, and transportation. Each figure shows the State average for the cost measures (e.g., administrative costs per pupil, plant operations costs per square foot, etc.), as well as the lowest and highest dollar amounts for each operational peer group. See Appendix B, page b-4, for more on how we developed district peer groups. Very small districts are not included in the figures because they have highly variable spending patterns making comparisons less meaningful. The wide ranges in costs within the operational peer groups indicate that some districts have achieved substantially lower costs than other districts with similar characteristics. Districts at the high end of the ranges should work toward improving their efficiency using performance measures and practices identified in Chapter 2, pages 11 through 14.

Figure 4
Range of administrative costs per pupil by operational peer group
Fiscal year 2019



Source: Auditor General staff analysis of fiscal year 2019 district-reported accounting data, fiscal year 2019 Arizona Department of Education student membership data, and fiscal year 2018 U.S. Census Bureau location designations reported in the National Center for Education Statistics' Common Core of Data.

Figure 5
Range of plant operations costs per square foot by operational peer group
Fiscal year 2019



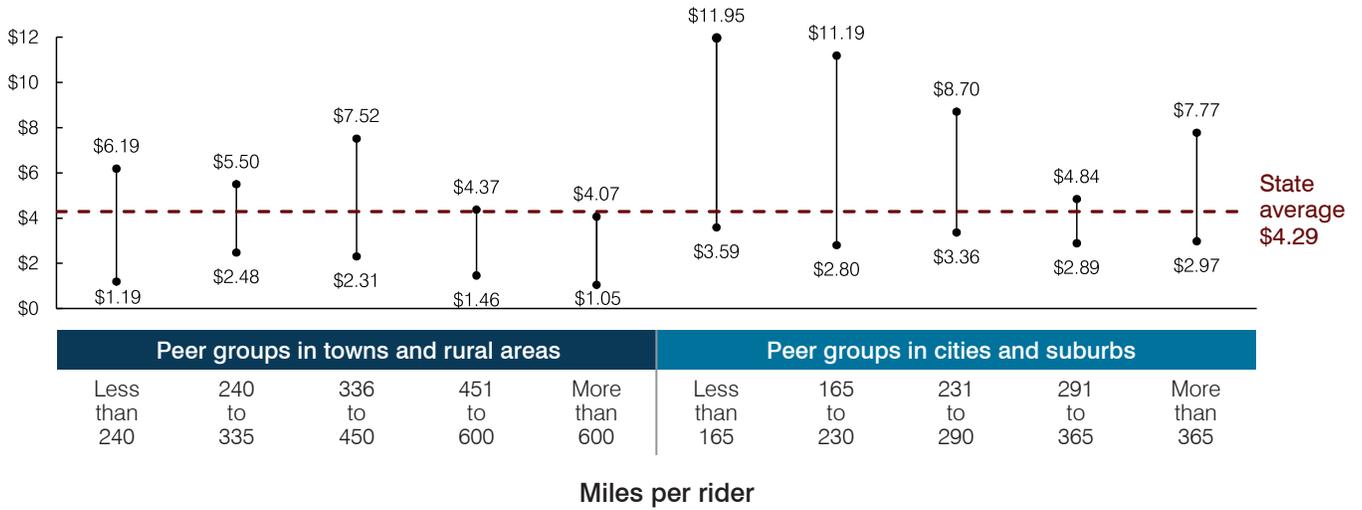
Source: Auditor General staff analysis of fiscal year 2019 district-reported accounting data, fiscal year 2019 School Facilities Board square footage data, and fiscal year 2018 U.S. Census Bureau location designations reported in the National Center for Education Statistics' Common Core of Data.

Figure 6
Range of food service costs per meal by operational peer group
Fiscal year 2019



Source: Auditor General staff analysis of fiscal year 2019 district-reported accounting and meals-served data and fiscal year 2018 U.S. Census Bureau location designations reported in the National Center for Education Statistics' Common Core of Data.

Figure 7
Range of transportation costs per mile by transportation peer group
Fiscal year 2019



Source: Auditor General staff analysis of fiscal year 2019 district-reported accounting data, miles driven, and riders transported and fiscal year 2018 U.S. Census Bureau location designations reported in the National Center for Education Statistics' Common Core of Data.



This appendix presents Arizona’s operational and total spending per pupil for fiscal years 2001 through 2019 unadjusted and inflation adjusted to fiscal year 2019 dollars. See Appendix B, page b-1, for more information on what is included in operational and total spending per pupil.

Table 13
Arizona’s operational and total spending per pupil¹ unadjusted and inflation adjusted to fiscal year 2019 dollars
Fiscal years 2001 through 2019

Fiscal year	Unadjusted		Inflation adjusted to fiscal year 2019 dollars	
	Operational spending per pupil	Total spending per pupil	Operational spending per pupil	Total spending per pupil
2001	\$5,374	-	\$7,773	-
2002	5,791	-	8,231	-
2003	6,048	-	8,411	-
2004	6,355	-	8,649	-
2005	6,500	-	8,588	-
2006	6,833	-	8,697	-
2007	7,382	-	9,159	-
2008	7,813	-	9,347	-
2009	7,908	-	9,330	-
2010	7,609	-	8,892	-
2011	7,485	-	8,575	-
2012	7,475	-	8,319	-
2013	7,496	-	8,206	-
2014	7,578	\$8,893	8,169	\$9,586
2015	7,658	9,057	8,195	9,692
2016	7,746	9,136	8,234	9,712
2017	8,141	9,653	8,497	10,076
2018	8,296	9,929	8,468	10,135
2019	8,905	10,928	8,905	10,928

¹ Total spending per pupil was not presented prior to the fiscal year 2015 report. For that report, we validated the nonoperational portion of total spending for fiscal years 2014 and 2015. Therefore, total spending per pupil is presented for only fiscal years 2014 through 2019.

Source: Auditor General staff analysis of district-reported accounting data unadjusted and inflation adjusted (using the Consumer Price Index published by the U.S. Labor Department, Bureau of Labor Statistics) to fiscal year 2019 dollars and Arizona Department of Education student membership data for fiscal years 2001 through 2019.

