

School Finance: A Primer

Highlights

The Ultimate Goal

Adequate, equitable, and efficient funding for all levels of education that allows all students to perform to the full extent of their abilities.

The Problems

Tax structures are stressed by economic fluctuations.

Enrollment growth and unfunded mandates create pressures for increased education spending.

Many schools do not produce desired levels of achievement, spawning public criticism and scrutiny.

Symptoms of Problems

Absent external constraints taxes rise and school budgets grow.

Taxpayers protest and demand improved performance by schools.

Revenues fluctuate with the economy, making planning difficult and necessitating cuts in down years.

Popular Responses

Voters adopt ballot measures to limit tax increases.

Residents of low-income districts file litigation.

Legislatures and courts issue orders designed to ensure equity and/or adequate funding, often shifting some level of education funding – and oversight – to the state.

Possible Unintended Consequences

Ballot initiatives, legislation, and court orders can lead to patchwork of contradictory taxation and funding requirements.

Shifting more K-12 funding to the state squeezes other services, including higher education.

Tax limits and cuts can fuel budget gaps during recessionary years.

Keep Thinking

Consider proposing a constitutional amendment to overhaul the state tax structure, including provisions of TABOR and Amendment 23, to establish more stable and predictable state and local revenue streams.

Revise funding mechanisms to promote practices found to improve achievement instead of basing appropriations on inputs like enrollment.

Establish adequate funding levels for higher education and guarantee minimum annual shares of the total state budget.

Key Issues and Findings from the Research

Financing education is an integral part of any state's tax structure and budget process. Most states, including Colorado, rely on some mix of local, state, and federal funds to finance elementary and secondary schools. The balance among the three sources varies greatly from state to state, however, depending on laws, court rulings, and, to varying degrees, the demographics of the state's population, characteristics of its schools, its historic attitudes about education, and economic factors.

Even in austere budget years, education enjoys more popular support and legal protection than many other state services. Opinion polls consistently show high support for education, and proposals to cut spending on schools predictably generate public protests. Most state constitutions contain some requirement to provide an adequate and/or equitable K-12 education, giving elementary and secondary schools a mandate usually not shared even by the colleges and universities attended by K-12 graduates. One result of this protected status, fueled in part by increased accountability demands, is that nationally per-pupil spending in K-12 has risen over the last century by an average of 3.5 percent annually in inflation-adjusted dollars.¹ This steady expansion has spawned searches for revenue that often resulted in funding apparatus that buckle during recessions, revealing stress fractures throughout the entire revenue structure.

Education has been primarily a local enterprise through much of U.S. history, with local governments raising the majority of revenue to pay for schools, generally relying mostly on property taxes. A leading

Heavy reliance on property taxes can create inequities between rich and poor districts.

benefit of this system is that it allows a high degree of local control. Taxpayers live close to their neighborhood schools and, in theory, weigh how much they value education when choosing a home. In theory, families that put great value on education can live in districts with high property taxes and high-performing schools; those who value it less and/or who want to pay lower taxes can live elsewhere.

Using property taxes to pay for schools also creates divisive equity issues, however. Districts in areas with expensive personal and commercial real estate can raise more property tax revenue than other districts and provide better schools. The existence of identifiably rich schools and poor schools means that differences in educational quality and opportunity often track with differences in wealth. Further, students with the greatest educational disadvantages often are low-income and live in areas of low property wealth. Thus, districts with the costliest students to educate often have much less capacity to raise tax revenue.

Since the middle of the 20th Century, states have played a bigger role in school finance, usually dedicating revenue from some combination of income, sales, and business taxes.² In recent decades lotteries have become a popular source of education revenue in many states, although schools are most likely to benefit if proceeds are specifically earmarked for education – and even then some of the added revenue is often siphoned off for other state functions.³ Some states earmark selected revenue sources – such as a statewide property tax in Michigan – in an effort to guarantee specified levels of education funding. State money is dispensed primarily in two forms: foundation allotments, based on a minimum per-pupil rate applied to all students, and “categorical” funding, special payments for students who are disabled or low-income or have other disadvantages that make them more expensive to educate. This structure is designed to dedicate more money to needier students, although states and districts sometimes thwart the intent of these policies by also sending more unrestricted money to wealthier districts so that disadvantaged students end up with little if any net boost in funding. Thus, even if funding is more equalized among the districts in a state, inequities often still exist between schools.⁴

Litigation and Ballot Initiatives

States – and to a lesser degree the federal government – began augmenting local education revenues in part out of concern over the inequities associated with relying on property taxes and to compensate for the disadvantages of needy students. But the supplements were insufficient to level the funding field, so beginning in the 1970s advocates for students in low-wealth school districts sued to achieve more equitable funding.

Advocates found the greatest success in state courts which generally required legislatures to find ways to

“equalize” funding across all districts. But even after states overhauled their school finance structures, the total levels of funding still were insufficient to support reasonable levels of student achievement.

As a result, school finance litigation and legislation in recent decades have turned to ensuring that funding is adequate for students to meet desired academic standards. The shift in focus to adequacy has raised the question: What is “adequate” and how should it be measured? Thus, defining the components of an adequate education is a difficult yet essential element of any school funding system.

An increasing number of states are conducting adequacy studies, and researchers offer a variety of approaches. Some scholars recommend basing adequacy standards on the judgment of education professionals, sometimes combined with research findings, with costs then based on those standards.⁵ Others derive standards from research on school-wide reform strategies.¹ A third approach uses a so-called outcomes-based foundation plan that requires funding to be based on a formula that considers the cost of achieving certain performance goals in different types

Adequacy debates center on whether schools have enough funding to produce expected results.

of districts.⁶ Whichever approach is used, several authors advised against relying mostly on test scores as performance indicators. Some suggested variables like whether students graduated or earned college prep diplomas, while others recommended calculating

the cost of interventions found effective by research, such as small primary grade classes, one-on-one tutoring, and the use of formative assessments and performance data to improve learning.

Tax and Spending Limits

California’s Proposition 13 did not inaugurate tax limits; they have existed throughout American history. But Prop 13’s passage by voters in 1978 set off a cascade of ballot referenda and legislation in other states that played a major role in shaping the school finance systems we have today. Within a few years of Prop 13’s passage, nearly all states had adopted some kind of limit on taxation and/or spending, with a majority aimed at property taxes.⁷ Like all aspects of school

finance, voter initiatives have varied greatly from state to state in their structure and details, but in most cases they were motivated by a desire for greater efficiency in government, not a reduction in services. However, reduced services often have followed.

Shift from State to Local Funding

The layers of court orders, legislation, and ballot initiatives have created a complex set of metrics for education budgets, and generated some unforeseen consequences. One major effect of school finance equalization efforts, adequacy legislation and litigation, and tax and spending limits has been to shift education funding responsibility away from local governments and to the states, as Table 1 shows.

Table 1. Sources of revenue for public schools

	Federal	State	Local
1919-20	0.3%	16.5%	83.2%
1955-56	4.6%	39.5%	55.9%
2007-08	8.2%	48.3%	43.5%

Source: National Center for Education Statistics⁸

As states provided a greater share of K-12 funding, they also imposed rules and policies in areas such as curriculum, testing, student promotion, graduation requirements, budget practices, and, sometimes, how specific resources could be used. This shift in power to the states from local governments has raised questions about whether states really are better equipped to provide an equitable, accountable, effective, and efficient education system.⁴ It also has generated discontent among some local policy makers, educators, and parents, as well as taxpayers in property-wealthy districts.

Broader Effects, Including on Higher Education

Another effect of shifting a greater share of school finance to the state is that it can impinge on funding for other state services. States must produce new sources of revenue – a lottery, for example – to balance the outflow of general fund money for schools, or other services will suffer. Ironic examples occur when other services serving youth, such as child welfare or higher education, are cut to preserve funding for elementary and secondary schools. Reductions to higher education can appear less harmful than other cuts because colleges have other steady sources of revenue, including tuition, fees, and federal grants. But acceptance of tuition as a flexible revenue source stirs debate

about the level of financial responsibility students should shoulder for higher education, how much debt is reasonable, and whether high tuition rates curtail access for low-income students. Nationally, state and local funding per full-time equivalent student (FTE) dropped more than 5 percent between 1998 and 2008 for public research universities, on average, while net tuition revenues per FTE rose an average of 45 percent over the same period.⁹ (All calculations used inflation-adjusted dollars.) The authors explained that while the 2001 recession led to expected drops in appropriations and increases in tuition, tuition continued to rise at

As states have provided more funding they have assumed a greater policy-setting role.

public four-year institutions -- though not at community colleges -- after state funding recovered.

Similar figures were not provided for Colorado, but a different report from the University of Colo-

rado noted that higher education's share of total state funding has dropped from 21 percent in 1979 to 6.4 percent in 2009-10, excluding funds from the American Recovery and Reinvestment Act of 2009 (ARRA). Yet another report showed that net tuition revenue per FTE for Colorado's public colleges rose 28 percent between 2004-05 and 2009-10, and in that final year the state ranked eighth in the country in the percent of total higher education revenue that came from tuition. In 2010, the legislature passed a bill giving each governing board authority to set tuition rates -- within prescribed limits -- for fiscal years 2011-12 through 2015-16.^{10, 11, 12, 13}

Finally, a very important consequence of an accumulation of school finance requirements from ballot initiatives, legislation, and court rulings is that they can result in contradictory orders for a state to limit spending and increase appropriations to ensure adequacy at the same time. This is the situation Colorado now faces.

Current Practices & Policies in Colorado

The Colorado Constitution requires the legislature to provide "a thorough and uniform system of free public schools."¹⁴ Financing for this mandate comes from state and local sources in a tax structure shaped by

layers of ballot initiatives and legislation. Most state revenues come from sales and income taxes, both of which are sensitive to fluctuations in the economy, making it hard for agencies to predict revenues and provide consistent service levels. Because of the state's decentralized local government tax structure, Coloradoans historically paid relatively low state taxes and relatively high local government taxes.

School districts draw first from local property and vehicle registration taxes. All local revenues remain in a school district; none are transferred to other districts, as happens in some states. If assessed property values don't generate enough revenue to reach state mandated levels, the state makes up the shortfall. Because local tax revenues have been constrained, the state's share of K-12 funding grew from about 44 to 63 percent of the total between the mid-1980s and 2009, although percentages vary widely among local districts because of differences in property wealth and tax rates.^{15, 16, 18}

Colorado falls below the national average on several key school finance measures. Table 2 shows this is true for expenditures and revenues per pupil, as well as for revenue collected per \$1,000 of residents' personal income, a measure indicating the level of personal wealth devoted to education.

Table 2. Colorado's Rankings on Selected K-12 Finance Indicators (2007-08)

	Colorado	U.S. Avg.
Operating expenditures per pupil	\$9,152 (35)	\$10,297
Instructional expenditures per pupil	\$5,795 (35)	\$6,778
Total revenue per pupil	\$10,118 (40)	NA
Total revenue per \$1,000 personal income	\$39 (49)	\$49

Sources: National Center for Education Statistics; U.S. Census Bureau^{21, 22}

Notes: Rankings are in parentheses and include 50 states and District of Columbia. Operating expenditures cover day-to-day operations (salaries, supplies, and purchased services) and exclude construction, equipment, property, debt services, and programs outside of public elementary and secondary education such as adult education and community services.

Table 2 uses data from 2007-08, but spending has dropped since then because of the recession. Starting in 2010-11, Colorado introduced a change to the per-pupil formula called the "state budget stabilization

factor” that reduced state funding to districts by about 6.35 percent for that year.¹⁵

The stabilization factor was only the most recent patch applied to Colorado’s school finance calculations,

TABOR and Amendment 23 create conflicting requirements.

however. The main pieces in Colorado’s patchwork are the Gallagher constitutional amendment approved by voters

in 1982, the Taxpayer Bill of Rights (TABOR) approved by voters in 1992, Amendment 23 approved in 2000, and the Mill Levy Freeze Bill passed by the legislature in 2007.¹⁸

The Gallagher Amendment limits assessed values of residential and nonresidential property and mandates that residential property account for less than half the state’s total property assessed valuation.²³ As a result, residential property carries an assessed valuation that is equal to only 7.96% of its actual value. Assessed valuation provides the base for local property taxes. Local governments set a tax rate – called “mills” – that is one-tenth of 1 percent (.001) of assessed valuation.¹⁵

TABOR limits increases in state spending to the Consumer Price Index and population growth of the preceding year, or enrollment growth in the case of schools. If the tax base – and, hence, revenues – drop sharply during a recession, recovery to pre-recession levels can take years because of the growth limit. TABOR allows voters to permit state and local governments to raise taxes and spend revenues exceeding the TABOR limit. A revision approved by voters in 2005 allowed the state to keep and spend all revenue collected above the limit between 2005-06 and 2009-10. Although a cap on excess revenue kicked in after 2009-10, policymakers hoped the respite would prevent a sharp drop in revenues from the recession.^{19, 23}

Amendment 23 was intended to bolster state funding for public schools after revenues eroded under TABOR. The ballot initiative required the legislature to dedicate a specified amount of income tax for education, increase state funding by at least the rate of inflation plus one percentage point through 2010-11, and set a minimum rate of increase through that year. Funding must increase by at least the rate of inflation after 2010-11.¹⁷

The 2007 Mill Levy Freeze Bill (Senate Bill 07-199)

further altered the balance of revenues between state and local sources by allowing most local districts to keep the same tax rate as the previous year’s if voters had approved waivers to exceed the TABOR limits. Thus, most districts retained their 2006-07 rates instead of dropping the mill levy if property valuation increased. The bill also capped tax rates at 27 mills. The net impact was to increase the annual local share of school funding by about \$115 million to \$200 million during the bill’s first three years.^{15, 20}

One last piece of the K-12 funding picture is a pending adequacy lawsuit, Anthony Lobato et al. v. State of Colorado, et al., that claims TABOR and the Gallagher amendment violate the education requirements of the state constitution and argues that the state has treated Amendment 23’s required appropriations increases as a maximum funding level instead of a minimum. It asserts that the constitutional amendments should yield to the intent of the constitution’s original language.²⁴

Colorado’s tax structure, including the provisions for K-12 finance, has created the predicted squeeze on higher education. Public colleges and universities experienced disproportionately large drops in state funding during the two recessions of the last decade. The state backfilled recent losses with tuition increases and hundreds of millions of ARRA dollars. The reliance on ARRA was so great that Colorado’s colleges and universities wound up with the country’s largest share – 43 percent -- of their total appropriations from stimulus funds.

ARRA provided temporary help that states now must replace.

Thus, although appropriations per FTE increased by 20 percent between 2004-05 and 2009-10, higher education will experience a drop unless the state finds money to replace the ARRA funds.

Problems with education finance, always a big policy issue in Colorado, promise to keep stirring debate through the summer and fall of 2011 as the recession continues suppress tax revenues. After the 2011 legislative session resulted in another large funding cut for both K-12 and higher education, talk began to emerge from different groups about new efforts to reform tax structures either through piecemeal measures or sweeping constitutional revisions. Changes could also come if courts rule on the adequacy lawsuit.²⁵

What's Next?

Concerned about continuing gaps in student performance and adequacy of funding levels, scholars and advocates have proposed completely reworking current systems. In Colorado, for example, some reformers want to make it harder to change the state constitution so school finance issues will be coordinated rather than instituted piecemeal through initiatives like the Gallagher Amendment, TABOR, and Amendment 23.

Others recommend blowing up traditional funding formulas, given that research findings produce no clear consensus on such fundamental questions as whether state controls or local flexibility produce the best educational results – or even whether more money improves student achievement. One paper recommends rewarding behaviors and practices by school personnel that have been shown to improve student

Education finance promises to remain a hot topic in Colorado.

achievement. For example, instead of linking teacher salaries primarily to credentials and seniority – or test scores – states and districts could reward teachers who provide evidence of using

data and formative assessments effectively to improve instruction. School-level bonuses could reward low staff turnover in addition to student achievement.⁴

Another researcher proposes turning the current system on its head by basing a school's appropriation on the specific, current needs of its students instead of opaque calculations by the district for services, programs, and salaries. Schools with high-needs students

would get more money and be held accountable for meeting performance standards. Schools would have greater latitude in spending decisions – whether to hire more teachers at lower salaries or experiment with instructional approaches, for example – in the belief that such decisions belong at the level closest to students. The proposal establishes achievement standards as the ultimate goal and works from

Fixing current problems could require extensive changes.

the premise that a funding system is not equitable if certain groups consistently underperform. Thus, the plan aligns funding decisions, standards, and accountability. It also includes market forces allowing for the replacement of instructional programs or even schools that fail to produce the desired results. Finally, and maybe most importantly, it encourages system-wide transparency based on the production and informed use of fiscal and student performance data to measure student performance, gauge the effectiveness of schools and programs, and compare costs and efficiency.²⁶

About the Education Innovation Institute

The Education Innovation Institute, created in 2009 by the Colorado General Assembly, identifies and interprets the nation's best research on current education issues to help shape policy and reform. It is housed at the University of Northern Colorado, a leader in teacher education since 1889. For more information about EII and its work, visit www.unco.edu/eii.

Recommendations for Next Steps

- *Investigate the feasibility of stabilizing Colorado's constitution by changing the initiative process while also overhauling the state tax structure, including tax and spending limits and required funding increases, to establish more predictable state and local revenue levels.*
- *Investigate K-12 funding frameworks that base appropriations on the cost of delivering desired outcomes such as specific achievement goals instead of inputs such as enrollment or teachers' credentials.*
- *Consider imposing penalties on school districts that thwart the purpose of extra categorical funds for high-needs schools by increasing base funding to low-need schools.*
- *Consider strategies that establish minimum funding levels for public higher education and tie annual increases to an external indicator such as the rate of inflation.*
- *Consider limiting the size of annual tuition increases to the same indicator.*

References

NOTE: The citations below are hyperlinked to their source, simply click on the blue citation title.

1. Odden, A. (2007). [Redesigning School Finance Systems: Lessons from CPRE Research](#). CPRE Policy Briefs, rb50.
2. [Education Commission of the States \(n.d.\) Finance Web page](#).
3. Evans, W.N., and Zhang, P. (2007). [The Impact of Earmarked Lottery Revenue on K–12 Educational Expenditures](#). *Education Finance and Policy*, 2(1), 40–73.
4. Timar, T.B., and Roza, M. (2010). [“A False Dilemma”: Should Decisions about Education Resource Use Be Made at the State or Local Level?](#) *American Journal of Education*, 116(3), 397-422.
5. Guthrie, J. W., and Rothstein, R. (1999). [Enabling Adequacy to Achieve Reality: Translating Adequacy into State School Finance Arrangements](#). In *Equity and Adequacy*, Washington D.C.: Committee on Education Finance, National Research Council, National Academy of Sciences. Washington, DC: National Academy Press.
6. Duncombe, W., and Yinger, J. (1998). [School Finance Reform: Aid Formulas and Equity Objectives](#). *National Tax Journal*, 51(2), 239-262. (Search by either author’s name.)
7. Mullins, D.R., and Wallin, B.A. (2004). [Tax and Expenditure Limitations: Introduction and Overview](#). *Public Budgeting & Finance*, 24(4), 2–15.
8. National Center for Educational Statistics (2010). [Revenues and Expenditures for Public Elementary and Secondary Education: School Year 2007–08 \(Fiscal Year 2008\)](#).
9. The Delta Project on Postsecondary Education Costs, Productivity, and Accountability (2010). [Trends in College Spending 1998-2008: Where does the money come from? Where does it go? What does it buy?](#)
10. University of Colorado Boulder (2010). [State Funding: A Historical Perspective](#).
11. State Higher Education Executive Officers (2011). [State Higher Education Finance FY 2010](#).
12. Colorado Legislative Council (2010). [State Funding: K-12 and Higher Education](#).
13. Senate Bill 10-003 (2010). [Concerning Higher Education Flexibility to Improve the Financial Position of State Institutions of Higher Education](#).
14. LexisNexis (n.d.) [Michie’s Legal Resources, Constitution of the State of Colorado](#). (See Article IX Education, Section 2.) Establishment and maintenance of public schools.
15. Colorado Department of Education (2010). [Understanding Colorado School Finance and Categorical Program Funding](#).
16. Colorado Legislative Council (2011a). [School Finance in Colorado](#).
17. Colorado Legislative Council (2011b). [Report on the State Education Fund](#).
18. Colorado Legislative Council (2009a). [Report to the Colorado General Assembly, Fiscal Stability Commission](#).
19. Colorado Legislative Council (2009b). [Memorandum on State Spending Limitations: TABOR and Referendum C](#).
20. Colorado Legislative Council (2009c). [Memo on Revised Impact of Mill Levy Freeze](#).
21. National Center for Education Statistics (n.d.) [Elementary/Secondary Information System, Express Tables, 2007-08 \(FY 2008\) State Revenue per Pupil](#). (Select “State” table level and “State Revenue Per Pupil, by Source”.)
22. U.S. Census Bureau (2010). [Public Education Finances 2008](#).
23. James, F.W. and Wallis, A. (2004). [Tax and Spending Limits in Colorado](#). *Public Budgeting & Finance*, 24(4), 16-33.
24. Anthony Lobato, et al. v. State of Colorado, et al. (2011). [Third Amended Complaint](#). (See particularly page 28, ff.)
25. Engdahl, T. (May 6, 2011). [Tight budget bill now law](#). *Education News Colorado*.
26. Roza, M. (2010). [Educational Economics: Where do School Funds Go?](#) Washington, DC: Urban Institute Press.

For More Information

These reports and Web sites provide more detail about school finance history and practices.

National Sources:

[Education Commission of the States, finance information](#)

Ladd, H.F., and Hansen, J.S. (Eds.) 1999. [Making Money Matter: Financing America's Schools](#). Washington, D.C. Committee on Education Finance, National Research Council.

[National Access Network](#) (Based at Teachers College, Columbia University, it provides information on school finance reform and litigation.)

[National Conference of State Legislatures, Education information](#)

Colorado Sources:

[Colorado Department of Education, Public School Finance](#)

[Colorado Department of Higher Education, Budget and Finance](#)

[Colorado Legislative Council: Education issues page](#)

[House Education Committee information](#)

[Senate Education Committee information](#)