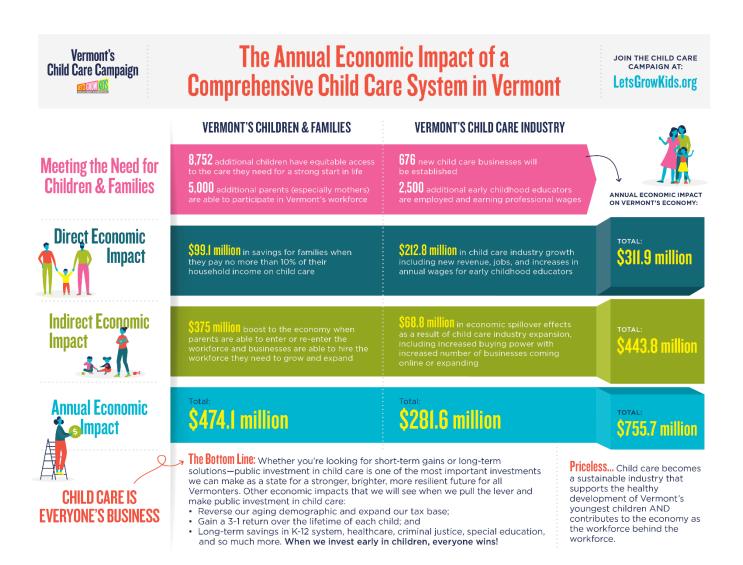


CHILD CARE IS EVERYONE'S BUSINESS

Annual Economic Impact of a Comprehensive Child Care System for Vermont This report was developed by Blue Otter Consulting and Let's Grow Kids.

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EXECUTIVE SUMMARY



Vermont's child care system, also referred to as its early childhood education system, has benefited from years of strategic financial investments, targeted policy advancements, and decades of research on the positive impacts of early childhood investments for children, their families, and their communities. In 2021, Vermont made further progress in Act 45 by:

- 1) establishing state goals for child care affordability, access, and quality; and
- 2) making additional investments to stabilize Vermont's child care system by supporting family

affordability, Vermont's early childhood education workforce, and infrastructure improvement.¹ Now, Vermont must take the next steps to deliver on the promise of providing affordable access to quality child care for all families across the state.

In Vermont, about 73% of children ages 5 and under live in families in which all available parents are working, meaning over 21,000 children under age 5 are likely to need full-time care while their parents work.² Many of these parents, however, cannot participate optimally in the workforce due to the scarcity and high cost of child care, with some even opting to work fewer or shorter shifts or in lower paid positions so that they can rely on informal child care such as from grandparents, friends, and neighbors. And now, families must navigate their child care needs within the new context of the COVID-19 pandemic, which completely reshaped the world. At the same time, many early childhood education programs have struggled to remain open due to rising costs and staffing shortages, and many families are still trying to determine how best to balance work, family, and health and safety needs.³

This analysis explores how child care access and affordability connect to the larger economy, including workforce participation, business productivity, and state economic growth. It also provides an overview of the current early childhood education system, supply and demand for child care, the actual cost of providing high-quality care, and the benefits of early childhood education investments. Pulling from the existing body of work on these topics, this report provides insight as to how a robust early childhood education system benefits Vermont's children, families, communities, and economy.

In summary:

Vermont needs more workers and parents need more income

- While estimates project 41,000 annual job openings in Vermont, the state is experiencing a
 decreasing rate of net in-migration and employers report difficulty in recruiting potential
 employees from outside of the state.
- The median household income for families with children under age 6 in Vermont is \$69,000, which is less than the annual income needed in Vermont to afford basic needs, including housing, food, child care, and transportation.

Lack of child care impacts worker and economic productivity

- Attendance and schedule disruptions for working parents due to child care issues cost U.S. employers more than \$3 billion each year. For Vermont employers, this could translate to a cost of approximately \$4.8 million to \$6 million per year.
- In the U.S., insufficient access to care for children under age 3 costs their working parents \$3,350, employers \$1,150 per working parent, and taxpayers \$630 per working parent annually. If just half of the working parents in Vermont with children under age 3 that are likely to use child care experienced insufficient access to care, that would translate to over \$31 million in collective annual losses for working parents, their employers, and taxpayers.

Current child care supply is insufficient to meet demand

- Over 21,000 young Vermonters need some form of regular child care while their parents work.
- Vermont needs nearly 9,000 additional slots in regulated child care to meet the demand of its working families.
- More than 2,000 additional early childhood educators are needed to meet the demands of Vermont's working families.
- Wages for child care teachers are comparably low, contributing to increased turnover.

Quality child care is expensive

- Actual annual per child costs for high-quality care can range from nearly \$14,000 for preschoolers to almost \$42,000 for infants.
- Child care tuition for two children can cost over \$29,000, or almost half of the state median income, leaving little room in a family's budget for anything other than basic necessities.

Early childhood education is one of the best investments a state can make

- For every \$1 invested in quality child care, Vermont would receive a benefit of \$3.08. These benefits reflect increased future earnings and taxes for both children and mothers; reduced health care costs; reduced K-12 education costs for special education and repeating grades; and reduced future crime, substance abuse, and child welfare costs.
- An additional annual investment of \$206 million in the state early childhood education system would translate to a \$1.3 billion net benefit to the state economy for every cohort of children.
- If child care expenditures were capped at no more than 10% of a family's income, Vermont could experience a 1.3% annual increase in the state economy, or \$375 million.

Economic Impact	Description
\$1.3 billion (or	Net lifetime benefit to the state economy per cohort of children ages 0-5 from
\$22.8 million	an additional annual investment of \$206 million in the state early childhood
annualized over	education system
the child's	
lifetime)	
\$375 million	A 1.3% increase in the state economy resulting from capping child care
	expenditures at 10% of family income
	Potential aggregate savings to working parents, their employers, and taxpayers if
\$31 million	half of working parents in Vermont with children under age 3 no longer
	experienced insufficient access to care

Summary of Potential Economic Impacts in Vermont Related to Child Care Issues

Conclusion

While Vermont is on the path to creating the early childhood education system its families need, the current early childhood education system is unable to serve all children in need of care, either through lack of available slots, unaffordable cost of care, or a combination of the two. For many Vermont parents and guardians, this can force them to leave the workforce because there are no other care options for their children, or because the cost of care exceeds their own earnings. The resulting effects constrain the Vermont economy by both limiting the economic well-being of these Vermont families and decreasing productivity in the economy.

To fully realize the goal of providing affordable access to quality child care for all families across the state, additional investments are necessary to attract additional early childhood educators, create the additional slots needed, and support affordability of care. By investing in its youngest residents, Vermont will reap the immediate benefits of increased worker and economic activity as well as long-term returns for generations to come.

INTRODUCTION



The strength of Vermont's current early childhood education system is, in part, a result of years of policy development and strategic financial investments. From developing a system-level framework and action plan, to implementing a quality rating and improvement system, to offering universal prekindergarten, the state has made some significant advancements for its youngest residents. Vermont's efforts build on decades of research showing the benefits of investing in early childhood education for both individuals and the larger community, including increased future earnings and taxes for both children and mothers; reduced health care costs; reduced K-12 education costs for special education and repeating grades; and reduced future crime, substance abuse, and child welfare costs.⁴

In 2021, the Vermont Legislature made further progress by 1) establishing state goals for child care affordability, access, and quality, and 2) making additional investments to stabilize Vermont's child care system by supporting family affordability, Vermont's early childhood education workforce, and infrastructure improvement.⁵ This included the specific goals of Vermont families paying no more than 10% of their income on child care and early childhood educators being fairly compensated and well supported. Now Vermont must take the next steps to deliver on the promise of providing affordable access to quality child care for all families across the state.

Of the 29,000 children aged 5 and younger in Vermont, about 73% live in families with all available parents working.⁶ This means over 21,000 children under age 5 are likely to need full-time care while their parents work. Many of these parents, however, cannot participate optimally in the workforce due to the scarcity and high cost of child care, with some even opting to work fewer or shorter shifts or in lower paid positions so that they can rely on informal child care such as from grandparents, friends, and neighbors. And now, families must navigate their child care needs within the new context of the COVID-19 pandemic, which completely reshaped the landscape of child care in Vermont and throughout the country. Remote working and school and child care closures shone a spotlight on the challenges families have been quietly struggling with. Many early childhood education programs have struggled to remain open due to rising costs and staffing shortages, and many families are still trying to determine how best to balance work, family, and health and safety needs.⁷

The pandemic also showed anecdotally that the child care decisions of Vermont families impact more than just the children needing care and their parents. As this analysis will show, child care access and affordability have ripple effects across the economy, including workforce participation, business productivity, and state economic growth. It also provides an overview of the current early childhood education system, supply and demand for child care, the actual cost of providing high-quality care, and the benefits of early childhood education investments. Pulling from existing research, this document serves as a single primer for those interested in better understanding how a robust child care system can benefit the state's children, families, communities, and economy.



The Vermont Economy and Working Families

"If we want to attract young people here to Vermont, have them stay in Vermont, contribute to our economy, contribute to our community, it all comes down to child care." — Ben Doyle, President, The Preservation Trust of Vermont

Vermont is experiencing slower population growth than the nation as a whole.⁸ The state's population is also aging rapidly, with nearly one in five Vermonters aged 65 or older, and the number of available jobs is outpacing the size of the available labor force.^{9,10} In its most recent occupational projections, the Vermont Department of Labor estimates there will be over 41,000 annual job openings in the state through 2028.¹¹

Vermont is experiencing a decreasing rate of net in-migration (residents moving into the state) and employers report difficulty in recruiting potential employees from outside of the state for many reasons, including limited employment alternatives, shortage of affordable and available housing, and a relatively high cost of living compared to wages.¹² The state's Blue Ribbon Commission on Financing High Quality, Affordable Child Care also found that an investment in early childhood education could help attract working families with young children to the state while also investing in the state's future workforce.¹³

There are over 300,000 Vermonters currently active in the labor force.¹⁴ The largest employment sectors in Vermont include government (inclusive of public PK-12 schools); health care and social assistance; retail trade; and manufacturing.¹⁵ Approximately 7.4% of the Vermont labor force has a child under age 6 using child care. These working parents earn about 8.4% of total wages, or over \$1 billion annually, and pay around \$114 million in state, local, and federal taxes.¹⁶

Industry	Annual Average Employment
Government	52,200
Health Care and Social Assistance	49,400
Retail Trade	34,800
Manufacturing	28,700

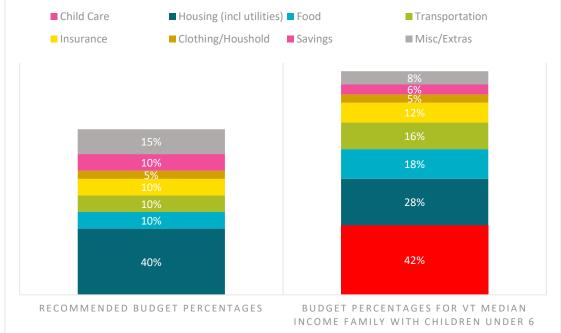
Vermont Nonfarm Payroll Employment by Industry, 2021

Source: Vermont Department of Labor, 2022

The median income in Vermont for families with children under age 6 is \$69,000.¹⁷ For a Vermont family of four with two working parents and two children, the annual income needed to afford basic needs, including housing, food, child care, and transportation is \$85,452 in rural areas and \$99,044 in urban areas.¹⁸ For a Vermont family with young children earning only the state median income, affording child care and all other household necessities is extremely challenging. Tuition for an infant, which can cost over \$15,000 per year, would represent over one-fifth of this family's income, and care for two children could cost over \$29,000, or over 40% of the state median income for families with young children. The

high cost of child care leaves little room in a family's budget for anything other than basic necessities like housing (30% of income), food (10%), transportation (10%), utilities (10%) and insurance (10%).^{19,20} The financial realities facing many Vermont families can leave parents without affordable child care options, furthering the economic and opportunity divide in the state.





Notes: Recommended Budget Percentages based on mean spending percentages from the Bureau of Labor Statistics Consumer Expenditure Surveys and U.S. News & World Report article. Budget Percentages for VT Median Income Family with Children Under 6 based on expense estimates from the Vermont Legislative Joint Fiscal Office calculated basic needs budget calculated as a percentage of the median income in Vermont for families with children under age 6.

Sources: U.S. Bureau of Labor Statistics Consumer Expenditure Surveys, 2020; "How to Determine Budget Percentages to Meet Your Money Goals," U.S. News & World Report, 2020; Murphy, et al, Presentation to Vermont Senate Health and Welfare Committee, 2019; Vermont Legislative Joint Fiscal Office, Vermont Basic Needs Budgets and Livable Wage, 2021

Effect of Child Care on Workforce and Economic Productivity

"Finding reliable child care is an ongoing struggle. I see many employees making difficult choices when child care falls through; this impacts us at home and our teams' productivity at work. We must continue to work together towards solving the child care crisis so all Vermonters can thrive." — Jarred Cobb, Director of Operations, SunCommon

Early childhood education programs benefit more than just the children in attendance. For the tens of thousands of parents and guardians in Vermont, child care enables their consistent participation in the labor market. This is another reason why access to affordable child care is critical for families and supports state economic growth — without it, parents, especially single parents and those in jobs with minimal education requirements, may be forced to reduce or even eliminate their labor force

participation.^{21,22} Before the pandemic, 82% of Vermont households with children with all available parents working said the availability of child care impacted how much parents were able to work.²³

National research demonstrates the impact child care challenges have on working families, their employers, and the state. One study, conducted before the onset of the COVID-19 pandemic, found that 45% of parents experienced child care-related absences in a six-month period, averaging 4.3 days. During that same time, 65% of parents' work schedules were also affected by child care issues an average of 7.5 times. These attendance and schedule disruptions cost U.S. employers more than \$3 billion each year.²⁴ For Vermont employers, this could translate to a cost of approximately \$4.8 million to \$6 million per year in child care-related attendance and schedule disruption costs.²⁵

Another study looking specifically at families with children under age 3 found that insufficient care for very young children cost working parents, their employers, and taxpayers billions of dollars every year. Annually, the insufficient access to care for their children under age 3 cost working parents \$3,350 in lost earnings, reduced productivity, and more time searching for work. For employers, the annual cost was \$1,150 per working parent in reduced revenue and extra recruitment costs. For taxpayers, this translated to an annual cost of \$630 per working parent resulting from lower income and sales taxes.²⁶ If just half of the working parents in Vermont with children under age 3 that are likely to use child care experienced insufficient access to care, that would translate to over \$31 million in collective annual losses for working parents, their employers, and taxpayers.²⁷

Annu	al Lo	sses	Due to	o Ins	ufficie	nt Ac	cess t	o Care	tor	Working	Parents	with	Children	Under	Age 3
				-											

Number of estimated impacted working parents	6,053
Annual cost to working parents	6,053 x \$3,350 = \$20.3 million
Annual cost to employers	6,053 x \$1,150 = \$7 million
Annual cost to taxpayers	6,053 x \$630 = \$3.8 million
Collective annual costs	\$31.1 million

Sources: Calculated from U.S. Census Bureau (2019) and Belfield, The Economic Impacts of Insufficient Child Care on Working Families (2018) data

When parents leave the workforce because they can't find child care, the cost of this decision follows them for life. Parents with young children who leave or reduce their employment — and are typically in the early stages of their careers — also limit their expected earnings increases and retirement savings over those years, resulting in lower lifetime earnings and less savings for retirement.²⁸

CHILD CARE AS AN INDUSTRY

Overview of the Vermont Child Care System

Child care in Vermont is provided through a complex and varied system of programs and providers that attempts to serve the diverse and changing needs of all parents of young children in the state. Unlike K-12 education, which is operated through a standardized system, child care in Vermont relies on mixed

delivery methods — including a variety of provider types to best meet the needs of families. However, this highly regulated, low-profit margin industry cannot expand sufficiently to meet the current and future demand of Vermont families.

Many Vermont families use regulated early childhood education programs to care for their children. Regulated programs are licensed by the Vermont Department for Children and Families Child Development Division and include the following three categories (see table.)²⁹

Children under age 5 are grouped by age bands in early childhood education programs.

- Infants: Children aged between 6 weeks and 23 months
- Toddlers: Children aged between 24 and 35 months
- Preschoolers: Children aged 3 and 4 years old

In Vermont, there are 950 regulated child care providers, about half (424) of which are sole proprietor FCCHs.³⁰ Most of these regulated providers (671) offer full-day, full-year care for children under age 5.³¹ These regulated providers are able to serve 12,379 children under age 5, with almost half of available slots dedicated to preschoolers. Almost two-thirds of these slots are available in high-quality programs, or those programs rated as 4- or 5-star in the state's quality recognition and improvement system known as STARS (STep Ahead Recognition System).

1. Licensed Center-Based Child Care

and Preschool Programs (CBCCPPs): Licensed child care centers and preschool programs care for children in a dedicated space that is not located in a home. This includes privately operated child care centers, as well as preschool and prekindergarten programs in public K-12 schools. These programs are also regulated by the state and have two or more staff who have specific training or formal education in early childhood care and education. Licensed child care centers offer many different types of programs, and may focus on a particular age group, such as preschool.

2. Licensed Family Child Care Homes (Licensed FCCHs):

Like registered family child care homes, licensed child care homes offer a regulated home-based option for child care; however, licensed child care homes typically care for more than six children, with the support of an assistant. Since licensed family child care homes care for more children than registered family child care homes, they must meet additional regulations.

3. Registered Family Child Care Homes (Registered FCCHs):

Also known as family providers or homebased providers, registered family child care homes provide early childhood education programs in the provider's own home. These home-based providers typically care for six or fewer children.



Current Capacity of Regulated Early Childhood Education Programs in Vermont

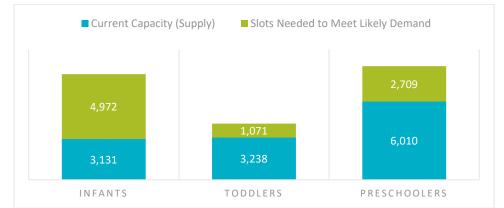
Source: Let's Grow Kids calculations from Vermont Department for Children and Families Child Development Division data, 2022

Vermont Children Under Age 5 and Early Childhood Education Capacity

Children Under Age 5	Children Under Age 5 with All Available Parents in Workforce	Early Childhood Education Seats Available for Children Under Age 5	Additional Capacity Needed to Serve Children Under Age 5
29,043	21,131	12,379	8,752

Approximately 73% of children aged 5 and younger live in families in which all available parents are working, meaning over 21,000 children under age 5 are likely to need some form of regular child care while their parents work.³² Based on available slots in regulated early childhood education programs, Vermont needs almost 9,000 additional slots to meet the demand of its working families. The current early childhood education workforce is insufficient to provide the amount of care needed by these working families. An additional 2,500 early childhood educators, including center-based program teachers and home-based providers, would be needed in an expanded early childhood education system to meet demand.³³



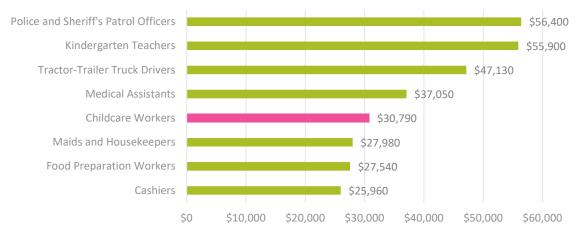


Source: Let's Grow Kids calculations from Vermont Department for Children and Families Child Development Division data, 2022

Child Care Wages and Economic Impacts

Regulated early childhood education programs (FCCHs and CBCCPPs) in Vermont employ over 7,000 individuals, mostly in teaching and assistant teaching roles.³⁴ Preparation of these early educators is the biggest predictor of early childhood program quality. Teachers at publicly funded pre-kindergarten programs must have a Vermont teaching license with an early education endorsement. Most educator positions at regulated early childhood programs in Vermont must complete some amount of postsecondary education or training. In Vermont, the median annual wage for a child care worker is \$30,790, which is \$25,000 less than the median annual wage for a kindergarten teacher in the state.³⁵ An early childhood teacher with a bachelor's degree working at a center-based program will earn slightly more — a median annual wage of \$38,870 — but still earn \$17,000 less than kindergarten teachers.³⁶ In addition to lower wages, early childhood educators typically work the entire year and receive few or no fringe benefits, such as medical insurance, retirement contributions, or paid time off, further exacerbating the divide between early educators and their peers in public education.³⁷

Wages for early childhood educators are typically more like jobs with little or no education requirements and lower than comparable professions requiring at least some post-secondary education. Studies have shown these lower wages and lack of access to benefits contribute to increased turnover among early childhood educators.^{38,39}



Median Annual Wages in Vermont, 2020

Source: U.S. Bureau of Labor Statistics, Occupational Employment and Wage Statistics Survey, May 2020

Even with its comparably low wages, the child care industry in Vermont generates approximately \$74 million in annual wages and earnings for the early childhood education workforce. These earnings support an estimated \$35.9 million in additional earnings within the state. In total, the child care industry in Vermont creates a total earnings impact of \$109.9 million.⁴⁰

In addition to wages and earnings, the child care industry contributes to the larger economy through spillover economic activity. This includes early childhood education providers purchasing goods and services to support their business operations, as well as workers spending their personal earnings. In total, the child care industry generates roughly \$222 million in economic impact — approximately \$135 million from direct revenue within the industry and \$97 million in spillover or related productivity in other sectors.⁴¹

Cost and Efficiency of the Early Childhood Education System

Early childhood education is a labor-heavy industry, even more so than K-12 education. This is largely due to the low staff-to-child ratios necessary to provide safe, quality care and education for young children. In addition to ratios, licensing regulations also limit the number of children allowed in a classroom, referred to as group size. Ratios for licensed CBCCPPs range from 1-to-4 for infants to 1-to-10 for 3- and 4-year-olds. Ratios for registered and licensed FCCHs vary based on the ages of the children present, with the lowest ratios for when providers are serving only infants. These ratios are significantly lower than class sizes in K-12 education, which average 17 students per classroom in Vermont elementary schools and 20 students per classroom in secondary schools.⁴²

Age	Staff-Child Ratio	Max Group Size
Birth - 18 months	1:4	8
18 months - 30 months	1:4	10
24 months - 36 months	1:5	10
32 months - 42 months	1:6	15
3- & 4-year-olds	1:10	20

Staff-Child Ratios and Maximum Group Sizes for Licensed Center-Based Programs in Vermont

Source: Vermont Department of Children and Families Child Development Division

These low ratios translate into relatively high costs per child in care, especially for infants and toddlers. Rather than spreading the cost of an individual teacher across 17 to 20 students, like in K-12 classrooms, early childhood education teacher salaries are spread across far fewer children. This is especially true for infant classrooms, where the actual per child cost of high-quality care per child can be over \$35,500.⁴³

One cost model for high-quality early childhood education developed in 2016 by the Vermont Blue Ribbon Commission on Financing High Quality, Affordable Child Care estimated the actual per child costs to range from nearly \$14,000 to almost \$42,000 annually. These estimates were based on a full-day program for children, operating expenses for center- and home-based programs, including staffing and non-staffing related costs, and average enrollment.⁴⁴ The staffing costs included in this model reflect salaries more comparable to similar roles in Vermont's public K-12 schools, as well as fringe benefits for staff, such as healthcare premium and retirement contributions. Vermont is in the process of revisiting a cost model for quality early childhood education, with updated estimates expected by the end of 2022.⁴⁵ Based on increasing labor and supply costs, the estimates in the forthcoming model are likely to be similar, if not higher, than the estimates in the Blue Ribbon Commission model.

Child Age Crown	Center	· Based	Home Based		
Child Age Group	Cost of Care	Tuition Charged	Cost of Care	Tuition Charged	
Infant	\$35,535	\$15,080	\$41,640	\$10,400	
Toddler	\$35,535	\$14,560	\$20,820	\$10,335	
Preschool	\$15,793	\$14,300	\$13,880	\$9,880	
Average	\$28,954	\$14,647	\$25,447	\$10,205	

True Cost of Child Care Compared to Tuition Rates Charged

Note: Cost of care numbers represent annualized estimate of actual cost of care from the Vermont Blue Ribbon Commission. Tuition charged numbers represent annualized tuition rates at the 75th percentile from the 2019 market rate survey.

Sources: Vermont Blue Ribbon Commission on Financing High Quality, Affordable Child Care estimated actual per child costs, 2016; Vermont Department of Children and Families Child Development Division, 2019 Market Rate Survey

Child care providers are sensitive to what families can afford and are often unable to set tuition rates for infants and toddlers at the true cost of care, instead making up some cost differences through tuition for preschoolers, as well as before- and after-school care for school-age children. In the most recent market rate survey of child care providers, annualized tuition rates at the 75th percentile ranged from almost \$10,000 for preschoolers in registered FCCHs to over \$15,000 for infants in center-based programs.⁴⁶

Serving children across all age groups and through a mixed delivery system — where providers serve children funded by both public pre-K programs and private tuition — helps support early childhood education programs' financial stability as well as parental choice.⁴⁷

Current Public Investments in Early Childhood Education

The Vermont early childhood education system is funded through a combination of state and federal investments, along with family tuition payments. Of the approximately \$110 million in annual public investments, about 65% of the public investment is from state funds, while about 35% of funding comes through federal programs, including Head Start and the Child Care Development Block Grant.^{48,49,50,51} As a result of the COVID-19 pandemic, the State of Vermont received nearly \$5 billion in one-time federal relief grants, including approximately \$60.1 million in additional Child Care Development Fund and Child Care Stabilization funds.^{52,53}

Funding	Source	Amount
Head Start & Early Head Start (FY2019)	Federal	\$22.4 million
Child Care Development Block Grant (CCDBG) (FY2021)	Federal	\$13.3 million
CCDBG State Match & MOE (FY2021)	State	\$4.3 million
IDEA Part C (FY2020)	Federal	\$2.3 million
IDEA Part B (FY2020)	Federal	\$0.9 million
State-Funded Pre-K (FY2019)	State	\$67.3 million
Total		\$110.5 million

Public Funding for Early Childhood Education in Vermont

Source: U.S. Department of Health and Human Services, Administration of Children and Families, Office of Head Start, 2021; U.S. Department of Health and Human Services, Administration of Children and Families, Office of Child Care, 2021); U.S. Department of Education, 2021; Vermont Department for Children and Families Child Development Division, 2021 In addition to annual state and federal funding for early childhood education programs, a statewide grant program called Make Way for Kids provides grants and technical assistance to early childhood education providers to help increase the availability and quality of early care and learning programs for Vermont's children. The grant program is administered by Let's Grow Kids and funded through a combination of philanthropic donations and state funding. Since 2018, the program has invested over \$4.2 million, funded 127 projects, and supported the creation of 2,240 new early childhood education slots, 29 new child care businesses, and 132 new jobs. These new slots and businesses also generated larger community benefits with grantees describing how families were able to continue to work because they have trusted, high-quality early childhood education available in their community. Considering the outcomes, the modest investment cost of roughly \$1,875 per created slot is far less than the potential multiple thousands of dollars in losses for working parents, employers, and taxpayers that can result from lack of access to reliable child care.

EARLY CHILDHOOD EDUCATION CONTRIBUTES TO VERMONT'S ECONOMIC GROWTH



Economic Benefits of Increased Investment in Early Childhood Education

"Child care is an essential benefit to attract and retain a workforce but is an extremely challenging business model. The longer we wait to fix the system, the more we continue to pay for the missed opportunity of not providing high-quality child care when it matters most. Vermont's businesses, our families, and our communities will benefit when every family has access to the child care they need. Now is the time to invest in that future." — Win Smith, Senior Advisor and Retired President, Sugarbush Resort

Increased investments in Vermont's early childhood education system would have ripple effects across the state's economy. Earlier research on the economic benefits of funding child care at the level recommended by the Blue Ribbon Commission found that an increased annual public investment of \$206 million in Vermont's early childhood education system would inject about \$1.9 billion into the economy over a five-year period, largely through wages for child care providers and increased economic activity for businesses serving child care providers.⁵⁴ This likely underestimates the overall economic benefit, as the investment would also generate indirect effects on business purchases, wages, and additional tax revenues. Even after subtracting the investment costs of approximately \$600 million (as projected by the Blue Ribbon Commission) for the expanded early childhood education system, this still translates to a \$1.3 billion net lifetime benefit to the state economy for every cohort of children likely to need care between the ages of 0-5.⁵⁵ As the state Joint Fiscal Office revisits the cost model for quality early childhood education in 2022, it will likely update the Blue Ribbon Commission's estimates, and the net economic impact from increased investments in child care is expected to be similar, if not greater.

Impacts of Increased Wages and Benefits for the Early Childhood Education Workforce

With low wages contributing to high turnover within the early childhood education workforce, increased wages have the potential to both stabilize and boost the sector workforce and benefit the children receiving care. Competitive wages have also been shown to support the sustainability of quality improvements in child care and reduce employee turnover.⁵⁶ Wage increases often translate to higher consumer spending, providing additional economic benefit to the state and local communities.⁵⁷ Additionally, research on raising incomes for low-wage workers shows both a resulting increase in tax collections and net income for the earner.^{58,59} With the need for more early childhood educators to meet family demand for child care, wage increase benefits would be further multiplied through a larger labor sector.

Child Care Access Supports Additional Workforce and Economic Productivity

"As an employer, I think that child care is essential to a thriving economy in our state, and we need an equally thriving child care infrastructure to support Vermont's workers." — James D. Sawtelle, Wealth Management Advisor

Lack of access to high-quality child care can impede the careers of parents with young children, especially mothers. This became increasingly apparent throughout the COVID-19 pandemic and by spring 2021, nearly 15% of women ages 25 to 44 in the U.S. were not working due to child care challenges.⁶⁰ In Vermont, women in the workforce have been disproportionately affected by the COVID-19 pandemic, in part because of disruptions to child care and education.⁶¹ Women in the labor force contribute \$7.5 trillion to U.S. GDP each year, and raising labor force participation rates of women to equal those of men could increase U.S. GDP by another \$500 billion over a decade.⁶² Research has also found that for every 1% increase in overall workforce participation, total national income also increases by 1%, or roughly \$180 billion nationally.

One way to increase workforce participation is through increased investments in child care.^{63,64} If child care expenditures were capped at 10% of a family's income, Vermont could experience a 1.3% increase in the state economy, or \$375 million.⁶⁵ Analysis of a proposed national investment to expand child care and prekindergarten that included a cap on family contributions for child care at 7% of income estimated that over 5,000 Vermont parents would increase their workforce participation as a result of the investment.⁶⁶ This includes both parents and guardians reentering the workforce and those increasing the number of hours worked. These parents and guardians would see an increase in wages, and states could expect increased tax revenues and economic activity.⁶⁷

Child Care as an Investment in the Future Population

The best opportunity to prepare children for success in life is during the first years, when the brain is developing most rapidly. A baby's brain forms over one million new connections every second, and about 90% of brain development occurs by age 5.⁶⁸ Brain connections are strengthened through stimulating learning opportunities and nurturing relationships with caregivers.

High-quality early childhood education programs employ nurturing caregivers educated in early learning and development and offer activities shown to promote learning and healthy social-emotional development. Research has shown that high-quality programs support the cognitive, physical, social, and emotional development of young children, which in turn have long-term benefits for individual children. Studies show that children enrolled in high-quality early childhood education are less likely to be referred for special education services, experience fewer grade retentions, are more likely to graduate from high school, live healthier lives, and earn higher wages.⁶⁹ These benefits translate to preventing or reducing public spending in areas including special education, health care, social welfare, and criminal justice for juveniles and adults. This growing body of research also shows greater benefits — for children and their parents — when children participate in quality, full-day early childhood education programs from infancy, compared to only attending preschool.⁷⁰

A study, based on Nobel prize-winning research, of the Blue Ribbon Commission's recommendation to expand high-quality child care to serve all Vermont children under age 5 in need of care would generate an estimated lifetime benefit of \$77,413 per child.⁷¹ This translates to a society benefit, or return on investment, of \$3.08 for every dollar invested by Vermont. These benefits reflect increased future earnings and taxes for both children and mothers; reduced health care costs; reduced K-12 education costs for special education and repeating grades; and reduced future crime, substance abuse, and child welfare costs.

Comparison of Estimated Per-Child Benefits from Early Childhood Education in Vermont Current System Enrollment Versus Expanded System Enrollment

Benefit	Current VT ECE System	Expanded VT ECE System	Change in Benefits
Additional savings & revenues for VT government	\$4,911	\$16,638	\$11,727
Additional savings & benefits to participating children & society	\$11,347	\$77,113	\$65,686
Total Lifetime Benefits	\$16,338	\$93,751	\$77,413

Source: Wilder Research, Vermont's Early Care & Learning Dividend, 2017

The Equity Achieved

"Access to affordable child care is the foundation of equity in our community, state, and nation. It allows people of all races, genders, and socio-economic levels to participate fully in the workforce and society." — Ricky Klein, Co-Founder & Head Brewer, Groennfell Meadery

Increased investments in early childhood education will provide greater access and opportunities to families across the state, supporting a more equitable Vermont. Children participating in high-quality child care can help close or eliminate achievement gaps caused by generational poverty, structural racism, and social inequity.⁷² Providing all Vermonters with a strong start can minimize many of the inequities embedded in current systems, especially for those from communities traditionally underserved, disenfranchised, and oppressed by systemic racism, sexism, and other prejudices.

Funding the true cost of providing high-quality child care also supports more equity within the child care sector and allows early childhood educators and other staff to earn wages comparable to other fields with similar preparation requirements. Current low wages can make it hard for prospective early childhood educators to obtain the education and training they need when they can't make ends meet, and it's almost impossible to pay back student loans with such low income.⁷³ The cost of obtaining an associate or bachelor's degree in early childhood educators, especially individuals from lower-income communities and early childhood educators of color.⁷⁴ Raising early childhood educator compensation to levels comparable to similar professions can help Vermont develop a dynamic future workforce that includes and reflects the growing diversity of Vermonters.

CONCLUSION



Investments in early childhood education continue to provide some of the greatest returns for children, their working parents, and communities. Decades of research show the immediate and long-term benefits for children enrolled in high-quality child care, including increased educational and economic outcomes. For the parents of these children, child care investments support their increased and consistent workforce participation. Employers, in turn, benefit from a reliable workforce, translating into additional economic and societal gains for the state.

While Vermont is on the path to creating the early childhood education system its families need, the current system is unable to serve all children in need of care, either through lack of available slots, unaffordable cost of care, or a combination of the two. For many Vermont parents and guardians, this can force them to leave the workforce because there are no other care options for their children, or because the cost of care exceeds their own earnings. The resulting effects constrain the Vermont economy by both limiting the economic well-being of these Vermont families and decreasing productivity in the economy.

To fully realize the goal of providing affordable access to quality child care for all families across the state, additional investments are necessary to attract more early childhood educators, create the additional slots needed, and support affordability of care. By investing in its youngest residents, Vermont will reap both the immediate benefits of increased worker and economic activity as well as long-term returns for generations to come.

Economic Impact	Description
	Net lifetime benefit to the state economy per cohort of children ages 0-5 from
\$1.3 billion	additional annual investment of \$206 million in the state early childhood
	education system
¢275 million	A 1.3% increase in state economy resulting from capping child care expenditures
\$375 million	at 10% of family income
	Potential aggregate annual savings to working parents, their employers, and
\$31 million	taxpayers if half of working parents in Vermont with children under age 3 no
	longer experienced insufficient access to care

Summary of Potential Economic Impacts in Vermont Related to Child Care Issues

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