



STATE OF CONNECTICUT DEPARTMENT OF REVENUE SERVICES

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February 14, 2024

I am pleased to provide you with the 2023 Tax Incidence report as prescribed by Connecticut General Statutes Sec. 12-7c and amended by Public Act 23-204. This report uses data from calendar year 2011 through calendar year 2020. Consistent with the authority in Connecticut General Statutes Sec. 12-7c, the department retained Accenture to assist in preparing this study along with the Department of Revenue Services' Research, Analytics, and Forecasting Unit. It is the department's hope that this report will serve as a useful tool for policy makers.

Respectfully submitted,

A handwritten signature in black ink that reads "Mark D. Boughton". The signature is stylized and cursive.

Mark D. Boughton

Commissioner



2023 Connecticut Tax Incidence Study: Tax Years 2011 - 2020

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Report Overview

Executive Summary

In compliance with the Connecticut General Statutes (Conn. Gen. Stat.) § 12-7c, as amended by Public Act 23-204, this study provides an analysis of tax incidence of various tax types over ten years, based on the available data, and further clarifies the following in the glossary:

- Personal Income Tax: Tax Years 2011-2020
- Corporation Business Tax: Tax Years 2016-2020
- Sales and Use Tax: Tax Years 2012-2020
- Property Tax: Grand List Year 2019 (paid in 2020)
- Excise Tax: Tax Years 2011-2020
- Other Taxes Generating Greater than \$100 Million Annually: Tax Years 2011-2020

This report provides an in-depth examination of each of the above tax categories, encompassing legal incidence, estimated overall economic ramifications for businesses and Individual Tax Filers (ITFs), as well as applicable trend analysis. Throughout the study, two approaches are employed: a pre-credit analysis and a post-credit analysis, considering certain tax credits and deductions. Furthermore, the report provides trend analysis for years with available tax data from 2011 to 2020. It is essential to clarify that this study does not consider non-tax revenue such as fees, fines, or other service charges. It is important to note that this report does not conduct future forecasting and acknowledges the influence of the COVID-19 pandemic on the 2020 tax data.

This report is foundational to the Connecticut Department of Revenue Services' (DRS) commitment to providing a view of tax incidence biennially in accordance with legislative requirements. In the future, DRS intends to leverage its newly established Research, Analytics, and Forecasting (R.A.F) unit to offer comprehensive comparative analysis, trend assessments, and multivariate economic modeling, accounting for further factors that contribute to the overall landscape of tax incidence in Connecticut. Recognizing the absence of a one-size-fits-all model for measuring tax incidence, DRS is committed to utilizing the R.A.F. unit to develop an economic model tailored to the unique characteristics of the Connecticut economy. For more details on Conn. Gen. Stat. § 12-7c, please refer to the Legislative Mandate section of this report.

Key Findings

- In Tax Year 2020, the state and local governments collected \$30.9 billion in taxes that are in the scope of this study. The Property Tax constituted 38.2% of this state & local tax revenue, followed by Personal Income Tax (PIT) at 33.0%, and Sales and Use Tax at 15.3%.
- Analysis of the economic tax incidence on ITFs reveals that lower-income deciles shoulder a relatively higher tax burden compared to higher-income deciles. Conversely, higher-income ITF deciles contribute significantly more taxes per individual. Moreover, when comparing the comprehensive tax incidence between the 100% pass-through tax model and the 50% pass-through tax model, the findings suggest that any taxes imposed on corporations and businesses disproportionately affect lower-income individuals when passed on to ITFs, placing a greater burden on them compared to the higher income individuals.
- Based on the Suits Index analysis, Connecticut's PIT maintains a slightly progressive and proportional structure and has done so since at least 2011. Excluding PIT, all other taxes in this study are found to be regressive for the 2020 tax year. This means that lower-income deciles bear a heavier tax burden compared to the wealthier deciles. In Connecticut, the Property Tax and PIT constitute the largest tax burdens with the Property Tax being particularly regressive, following more regressive taxes like Corporation Business Tax, Pass-Through Entity Tax, and other taxes exceeding \$100 million.
- The Sales and Use Tax, however, shows relatively less regressiveness due to the State's implementation of progressive policy measures such as the introduction of a variety of tax rates, including the distinct 7.75% luxury tax rate. This is evident in Figure 9.4.
- When considering all applicable taxes, the overall economic impact on the Connecticut ITFs is largely regressive. However, excluding Property Tax from the analysis demonstrates a less burdensome and regressive picture for the comprehensive economic incidence.
- Excise tax revenue has shown a slight decrease since at least 2011. The decline in revenue from the cigarette tax has been offset by revenue from the consistently rising tobacco products tax and the electronic cigarette products tax (effective date of October 1, 2019). Notably, in 2020, there was a substantial increase in revenue from the alcohol tax due to an increase of rates in October 2019.
- The primary contributors to the Corporation Business Tax have consistently been corporations in the finance and insurance sectors, dating back to at least 2011. Following closely, the manufacturing sector has also played a significant role. Notably, tax revenue from the management of companies and enterprise sectors exhibited a more robust increase, surpassing the manufacturing sector in both 2018 and 2019.

Terms Glossary

The following section provides definitions and explanations for key terms and concepts used throughout this report.

- **Businesses:** A legal entity that is subject to taxation under the State's law.
- **Connecticut Adjusted Gross Income (CT AGI):** Income based on adjusted gross income for federal tax purposes with certain modifications and exemptions.
- **Corporations:** A type of business that is subject to taxation under the State's corporation business tax law and files a CT1120 or CT1120-CU form.
- **Consumer Expenditure Surveys (CE):** A survey compiled by the United States Bureau of Labor Statistics that provides valuable insights into the spending habits, income levels, and demographic attributes of American consumers.
- **Decile:** A statistical metric that divides data into ten equal segments. As defined in Conn. Gen. Stat § 12-7c, tax incidence is categorized into deciles, each spanning a range of ten percentage points. These deciles are formed by either partitioning the total CT AGI or the total count of Connecticut ITFs by ten.
- **Economic Incidence:** The ultimate burden or impact of tax, including the extent to which one party can transfer the tax cost and the cost of goods sold to another party.
- **Effective rate:** Tax paid as a percentage of Connecticut Adjusted Gross Income.
- **Individual Tax Filer (ITF):** an ITF is defined as any person(s) who have filed a CT-1040 or CT-1040NRPY form. This can include multiple people in an ITF of the Connecticut Income Tax Return.
- **Legal Incidence:** The burden of tax borne by the party that pays the tax to the State or municipal government.
- **Tax Year:** A period of twelve consecutive months, commencing January 1st and concluding on December 31st.

Legal Incidence vs. Economic Incidence

For this study, we categorize tax incidence into two distinct facets: legal incidence and economic incidence. Legal incidence represents the initial stage where the legal responsibility for tax payments falls directly on the entity, whether it's an ITF or a business. These taxpayers are legally bound to remit payments directly to the government.

Furthermore, the study provides a calculated estimate of economic incidence for ITFs and businesses. In line with the previous report, this analysis adopts a long-run economic view that businesses ultimately transfer their costs to consumers. The 'long-run' in economic theory signifies a scenario where all variables are subject to change. In such a context, prices tend to be more flexible in a competitive, capitalist society. Over time, as we account for various inefficiencies in the supply chain, these inefficiencies gradually encompass the tax burdens. Ultimately, it is the consumers who end up shouldering these tax burdens.

To illustrate the transfer of costs to consumers, this report employs a structured three-step approach, ensuring compliance with statutory requirements in each tax area. First, we determine the legal tax incidence for ITFs and businesses over 10 years. Then, we assess the economic impact or economic tax incidence on these entities. Finally, we conduct a trend analysis in tax areas, where relevant.

It's widely acknowledged in economics that businesses typically pass on costs to consumers within a range of 50% to 100%.¹ In this report, we provide estimates of economic tax incidence using a 100% tax pass-through tax model, like our previous report.² This approach represents an accurate perspective on the tax burden borne by ITFs.

This report also provides a supplemental view in which business taxes are passed through onto ITFs at 50%, which is referred to as the 50% Tax Pass-Through Model. This supplemental view indicates a more moderate shift in business tax incidence and provides a secondary lens for readers to view incidence. These estimates may help provide the new RAF unit with two data points to calibrate more Connecticut-specific economic models in the future.

¹ Gentry M., William. "A Review of the Evidence on the Incidence of the Corporate Income Tax." Department of the Treasury – Office of Tax Analysis. December 2007. Pg. 6. <https://home.treasury.gov/system/files/131/wp-101.pdf>

² <https://portal.ct.gov/-/media/DRS/Tax-Incidence/Connecticut-Tax-Incidence-Study-TY2019.pdf>

Population and Income Deciles

This year's report categorizes ITFs into deciles using two distinct methodologies. One method subdivides ITFs into ten equal deciles based on their CT AGI termed the "Income Decile View." The other method classifies Connecticut's ITF population into ten equal deciles, referred to as the "Population Decile View." These methodologies are selectively applied throughout the report, offering readers diverse perspectives on the presented information.

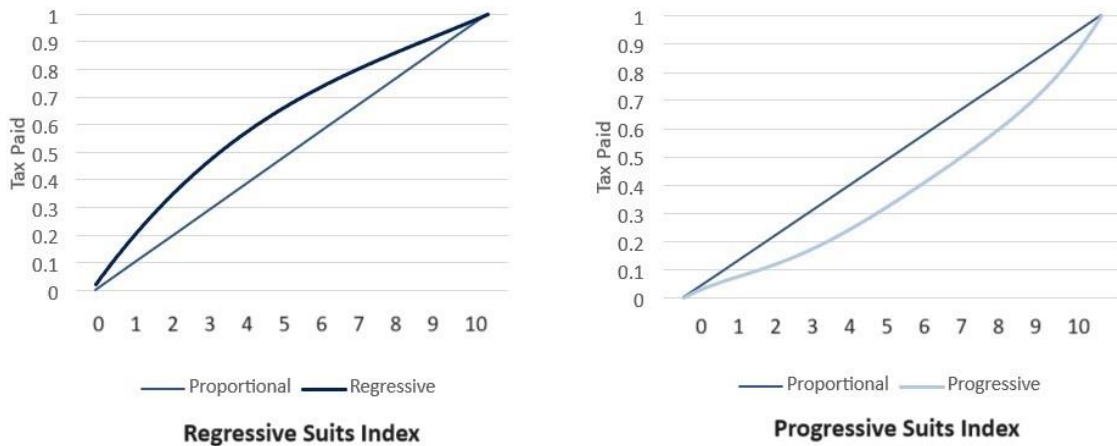
Moreover, when interpreting deciles, particularly the 1st decile, it's crucial to adopt an appropriate perspective. Decile 1 comprises two distinct groups of ITFs: those with low wages and those who may have reported business or capital losses for income tax purposes resulting in a negative CT AGI. This report treats ITFs with a negative CT AGI as having zero CT AGI. Consequently, these ITFs are classified in decile 1, causing this study to show a much higher tax burden than it could be.

It's also worth noting that not all income earners or ITFs can be identified in this study. Extremely low-income ITFs who haven't filed a Connecticut PIT return might not have been included in this study. Furthermore, income from government programs such as nutritional support, housing assistance, healthcare, or other programs may not have been fully accounted for, as this information is not required for filing the Connecticut Income Tax Form CT-1040.

Therefore, it's crucial to understand the 1st decile may not consistently represent the overall aggregate trend. To gain a more accurate overview of the tax incidence trend, deciles 2 to 10 offer greater clarity. The first decile needs to remain in the study, however, to be able to calculate Suits Indices as well as accurately distribute income across the statutorily required ten deciles (Conn. Gen. Stat. § 12-7c).

Suits Index Review

The Suits Index³ is a fundamental tool in tax policy analysis, used to measure the fairness and distributional impact of a tax system. It calculates the progressivity or regressivity of a tax by analyzing how tax burdens are distributed among different income groups within a population. This evaluation is based on the construction of Lorenz curves, which graphically depict the cumulative income and tax payments of each income group.



The Suits Index assigns values within a range of -1 to 1 to characterize the tax system's nature:

- A Suits Index of -1 signifies a perfectly regressive tax, where the lower-income individuals bear a disproportionately heavier tax burden.
- A Suits Index of 1 reflects a perfectly progressive tax, indicating that higher-income individuals shoulder a more substantial portion of the tax responsibility.
- A Suits Index of 0 represents a proportional or flat tax, where all individuals, regardless of their income level, contribute the same fraction of their income to taxes.

It's important to recognize that the Suits Index may not encompass certain factors when evaluating overall progressivity or regressivity. Variables like non-tax revenue, tax exemptions, and supplemental income from nutritional programs or other targeted interventions can influence the fairness and distribution of a tax and expenditure system, making the Suits Index one piece of a broader governmental policy analysis puzzle.

³ Suits, D. B. (1977). Measurement of Tax Progressivity. *The American Economic Review*, 67(4), 747–752. <http://www.jstor.org/stable/1813408>

Consumer Expenditure Surveys

The Consumer Expenditure Surveys (CE)⁴ is a program compiled by the United States Bureau of Labor Statistics, offering valuable insights into the spending habits, income levels, and demographics of American consumers. Its primary goal is to analyze the relative importance of goods and services in the Consumer Price Index, serving as a key household survey providing comprehensive insights into consumers' expenditures and incomes. This report utilizes CE data to estimate the spending habits of Connecticut ITFs, addressing challenges in reconciling CT-1040 data with other tax-related spending data, such as the Sale and Use Tax, Excise Tax, and Insurance Premiums Tax.

The analysis considers public-use microdata files, comprising the Interview Survey for major expenses and the Diary Survey for minor or frequent purchases. These surveys contribute to the CE data collection, available in separate zip files for each year. The quarterly Interview Survey covers significant purchases such as cars or appliances, and regular expenditures like rent, mortgage, insurance, and utilities. Whereas the diary survey requests household respondents to maintain two one-week diaries, capturing small everyday purchases like food, meals, personal care products, and gasoline.

This report estimates the average spending of taxable goods and services by Connecticut ITFs, focusing on Connecticut state taxes in the economic incidence analysis. Both interview and diary data are used, with a meticulous filtering process to retain relevant columns subject to Connecticut state taxes. Despite encountering a lack of responses, especially from high-income individuals, a 10-year aggregate of interview and diary data was used. Acknowledging the dataset's limited constraints, we recognize that this analysis may not precisely capture the diverse landscape of taxpayers in this context. The report aims to make informed assumptions and projections regarding the economic incidence of Connecticut taxpayers, mindful of the inherent constraints in the available data.

⁴ Bureau of Labor Statistics, Consumer Expenditure Survey, <https://www.bls.gov/cex/pumd.htm>

Overall Tax Review

Tax Year 2020 Connecticut State and Local Tax Liability (In Millions)				
Tax Type	State	Local	Total	% of Total
Personal Income Tax	\$10,195		\$10,195	33.0%
Pass-Through Entity Tax	1,293		1,293	4.2%
Corporation Business Tax*	852		852	2.8%
* Based on Income Year 2020				
Property Tax		\$11,820	11,820	38.2%
Net Real Property Levy		10,137	10,137	32.8%
Net Personal Property Levy		832	832	2.7%
Net Motor Vehicle Levy		850	850	2.8%
Sales & Use Tax	4,745		4,745	15.3%
Sales at 6.35%	4,125		4,125	13.3%
Sales at 7.35%	449		449	1.5%
Sales at 7.75%	89		89	0.3%
Sales at 9.35%	16		16	0.1%
Room Occupancy	66		66	0.2%
Excise Tax	431		431	1.4%
Cigarette	328		328	1.1%
E-cigarette	5		5	0.0%
Alcohol	76		76	0.2%
Tobacco	22		22	0.1%
Other Taxes Greater than \$100M	1,584		1,584	5.1%
Estate & Gift	253		253	0.8%
Insurance	218		218	0.7%
Motor Vehicle Fuels	435		435	1.4%
Petroleum Products	165		165	0.5%
Public Service	253		253	0.8%
Real Estate Conveyance	259		259	0.8%
Total Tax	\$19,101	\$11,820	\$30,921	100%

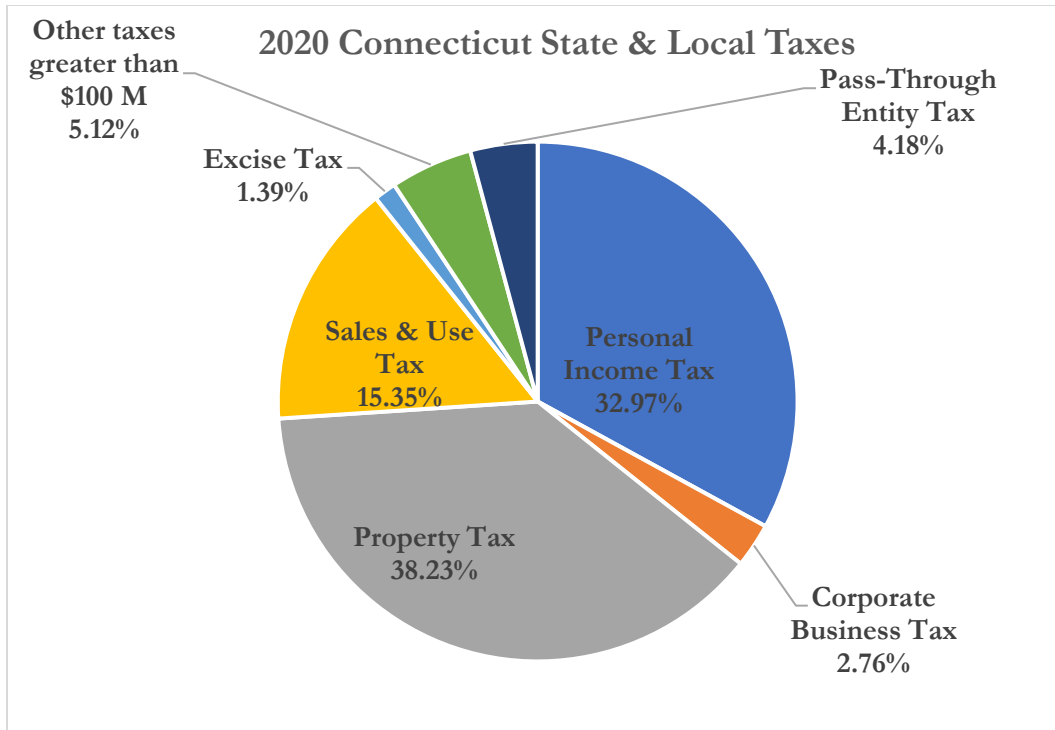


Figure 1.1: Tax Year 2020 Connecticut State and Local Taxes

In this section, we provide a comprehensive examination of the overall taxes analyzed in this study. Notably, the data reveals that in Tax Year 2020, the aggregate sum of the larger state and local taxes reached an impressive \$30.9 billion. Further analysis unveils a tax break down with Property Tax contributing 38.2%, Personal Income Tax (PIT) at 33.0%, and Sales and Use Tax accounting for 15.3%, as illustrated in Figure 1.1 above.

Table 1.2 illustrates that the PIT has a slightly progressive Suits Index, whereas all other analyzed taxes are regressive. When aggregating all analyzed taxes, the comprehensive economic incidence on the State’s ITFs yields a regressive Suits Index value of -0.269 in Connecticut.

Tax Type	Income View Suits Index	Population View Suits Index
Personal Income Tax	0.175	0.156
Corporation Business Tax	-0.595	-0.631
Property Tax	-0.561	-0.588
Sales, Use, and Occupancy Tax	-0.368	-0.363
Excise Tax	-0.418	-0.445
Other Taxes Greater than \$100 million	-0.595	-0.631
Comprehensive Economic Incidence	-0.269	-0.293

Personal Income Tax

The Personal Income Tax (PIT) is one of the primary taxes collected in Connecticut. The PIT is levied on resident individuals and trusts. Additionally, nonresidents and part-year resident individuals are subject to taxation on income tied to the State. The PIT rates cater to various filing categories, including single and married individuals filing separately, heads of households, joint filers, and qualifying surviving spouse. A shift in tax policy was enacted in 2011 with additional adjustments made to top income brackets starting in 2015. The adjustments that shaped the current tax structure (Table 2.1) involved the expansion of tax brackets and the introduction of new rates. Since PIT is borne by ITFs, its legal incidence is the same as its economic incidence.

Table 2.1: Connecticut Income Tax Rates
Effective for taxable years commencing on or after January 1, 2015:

Filing Status	Rate and Basis
Single and Married Filing Separately	3% on the first \$10,000 of Connecticut Taxable Income
	5% on the excess over \$10,000, but not over \$50,000
	5.5% on the excess over \$50,000, but not over \$100,000
	6% on the excess over \$100,000, but not over \$200,000
	6.5% on the excess over \$200,000, but not over \$250,000
	6.9% on the excess over \$250,000, but not over \$500,000
	6.99% on the excess over \$500,000
Head of Household	3% on the first \$16,000 of Connecticut Taxable Income
	5% on the excess over \$16,000, but not over \$80,000
	5.5% on the excess over \$80,000, but not over \$160,000
	6% on the excess over \$160,000, but not over \$320,000
	6.5% on the excess over \$320,000, but not over \$400,000
	6.9% on the excess over \$400,000, but not over \$800,000
	6.99% on the excess over \$800,000
Joint Filers	3% on the first \$20,000 of Connecticut Taxable Income
	5% on the excess over \$20,000, but not over \$100,000
	5.5% on the excess over \$100,000, but not over \$200,000
	6% on the excess over \$200,000, but not over \$400,000
	6.5% on the excess over \$400,000, but not over \$500,000
	6.9% on the excess over \$500,000, but not over \$1,000,000
	6.99% on the excess over \$1,000,000

Legal Incidence

This report provides a view of the legal, or initial, incidence for various Connecticut taxes (Personal Income, Corporation Business, Property, etc.). Of the taxes enumerated in Conn. Gen. Stat. § 12-7c, PIT and Property Tax are borne initially by ITFs for legal incidence, whereas Corporation Business Tax is borne by the Corporations for legal incidence.

For this year's report, the legal incidence of the PIT can be displayed across ten (10) deciles of equal population (ITFs) or equal income (CT AGI). The analysis below provides the Income View and Population View which include the Effective Rate for each decile. The total and median statistical values of the CT AGI are rounded to the nearest thousands to provide a level of anonymity for the ITFs. The Connecticut Earned Income Tax Credit and Property Tax Credit are the two credits considered in the pre-and post-credit analysis.

Income Decile View:

The first view of legal incidence for the PIT, Table 2.2 below, examines the impact of the EITC and Property Tax credits for the tax year (TY) 2020 when attributed to ten (10) equal income deciles. The table allows for a comparison of the pre- and post-credit income tax and its associated effective rates for each decile. Some key takeaways from this view are:

- Nearly half of CT ITFs fall within the 1st decile;
- 1.1% of CT ITFs fall into deciles eight through ten (8-10) in this view;
- For 2020, the EITC and Property Tax Credit totaled \$155 million;
- Applying the credits resulted in a 0.67% reduction in the effective rate for the first decile which is the largest reduction;
- There is no difference between the pre- and post-credits effective rates of deciles four (4) through ten (10) which is consistent with the eligibility criteria of the two credits;
- The pre- and post-credits effective rate of decile two (2) was 4.09% and 4.00%, respectively, higher than decile one (1) and represents the largest differences between two consecutive deciles in this view; and
- The 6.99% effective rates of the top two deciles (9-10) are consistent with the rate and basis for these ITFs with high AGIs found in Table 2.1.

To safeguard all tax-related information of the ITFs in the top CT-AGI percentiles (5%, 1%, and 0.5%), a breakout of these individuals is only provided below using the population decile view.

Table 2.2: Income Decile View of 2020 Income Tax: Pre- and Post-Credit Analysis

Decile	Population	Total CT AGI	Median CT AGI	Pre-Credits Income Tax	Pre-Credits Effective Rate	Post-Credits Income Tax	Post-Credits Effective Rate	Change in Effective Rate
1	883,552	\$ 19,288,483,000	\$ 21,000	\$ 284,637,214	1.48%	\$ 157,072,447	0.81%	0.67%
2	316,630	19,288,457,000	60,000	789,278,098	4.09%	771,004,226	4.00%	0.09%
3	203,484	19,288,527,000	94,000	915,335,940	4.75%	906,904,440	4.70%	0.05%
4	143,461	19,288,513,000	133,000	991,541,099	5.14%	990,706,601	5.14%	0.00%
5	102,145	19,288,351,000	186,000	1,023,846,105	5.31%	1,023,843,175	5.31%	0.00%
6	67,721	19,288,456,000	277,000	1,079,550,627	5.60%	1,079,550,172	5.60%	0.00%
7	37,424	19,288,301,000	488,000	1,226,954,192	6.36%	1,226,953,687	6.36%	0.00%
8	15,302	19,288,596,000	1,115,000	1,342,862,131	6.96%	1,342,862,131	6.96%	0.00%
9	3,846	19,278,057,000	4,103,000	1,347,306,163	6.99%	1,347,306,163	6.99%	0.00%
10	478	19,299,308,000	23,784,000	1,348,975,983	6.99%	1,348,975,983	6.99%	0.00%
Total	1,774,043	\$192,885,049,000		\$10,350,287,552		\$10,195,179,025		

Table 2.3: Population Decile View of 2020 Income Tax: Pre- and Post-Credit Analysis

Decile	Population	Total CT AGI	Median CT AGI	Pre-Credits Income Tax	Pre-Credits Effective Rate	Post-Credits Income Tax	Post-Credits Effective Rate	Change in Effective Rate
1	177,405	\$ 734,134,000	\$ 4,000	\$ 176,191	0.02%	\$ (13,007,624)	-1.77%	1.79%
2	177,405	2,293,344,000	13,000	369,089	0.02%	(26,411,779)	-1.15%	1.17%
3	177,405	3,818,278,000	21,000	14,643,370	0.38%	(21,661,550)	-0.57%	0.95%
4	177,404	5,398,706,000	30,000	76,053,078	1.41%	44,011,250	0.82%	0.59%
5	177,404	7,205,489,000	40,000	198,678,341	2.76%	179,153,149	2.49%	0.27%
6	177,404	9,595,799,000	54,000	355,851,777	3.71%	345,162,486	3.60%	0.11%
7	177,404	12,927,781,000	73,000	585,088,514	4.53%	575,632,434	4.45%	0.08%
8	177,404	17,699,607,000	99,000	848,948,320	4.80%	842,344,758	4.76%	0.04%
9	177,404	25,987,700,000	144,000	1,349,110,158	5.19%	1,348,589,751	5.19%	0.00%
10	177,404	107,224,000,000	281,000	6,921,368,714	6.46%	6,921,366,152	6.46%	0.00%
Total	1,774,043	\$192,885,049,000		\$10,350,287,552		\$10,195,179,025		

Population Decile View:

The second view of legal incidence for income tax examines the impact of the two credits across ten (10) equal population deciles as shown in Table 2.3 above. An additional breakout of the top CT-AGI percentiles (0.5%, 1%, and 5%) is provided in Table 2.4 below. Again, certain values are rounded to safeguard the ITFs.

- In the view, 56% of CT AGI is concentrated in decile ten (10);
- ITFs in the ninth and tenth deciles do not qualify for the credits selected for analysis which is consistent with the 0% change in effective rate for these deciles;
- The effective tax rates of the first three (3) deciles are negative due to the impact of refundable low-income credits which can offset income tax liabilities;
- Deciles one through three (1-3) benefit the most from the credits as shown by relatively large (0.95%-1.79%) difference in pre- and post-credits effective rates; and
- Refundable tax credits such as the EITC also reduce the overall income tax statistic for deciles containing ITFs who qualify; and
- The ITFs of the top 5% experience the highest effective rate and contribute 57% of the post-credit income tax total (Table 2.4).

Table 2.4: Population View of 2020 Income Tax of Top CT AGI Percentiles

Top Percentiles	Population	Total CT AGI	Median CT AGI	CT Income Tax	Effective Rate
Top 5 % to Top 1 %	70,962	\$ 30,998,421,062	\$ 391,364	\$ 1,910,357,993	6.16%
Top 1 % to Top 0.5 %	8,870	9,401,376,177	1,030,063	653,016,265	6.95%
Top 0.5 %	8,869	46,941,553,732	2,467,754	3,281,081,728	6.99%
Total	88,701	\$87,341,350,971		\$5,844,455,986	

The two figures below illustrate the progressive nature of the Connecticut PIT. In figure 2.1, one can observe that ITFs in higher deciles contribute an increasing amount to the overall income tax. When examined through a population decile view in Figure 2.2, one can clearly see the contrast in post-credit income taxes paid by the highest decile, decile ten (10), versus the overall negative totals for deciles one through three (1-3).

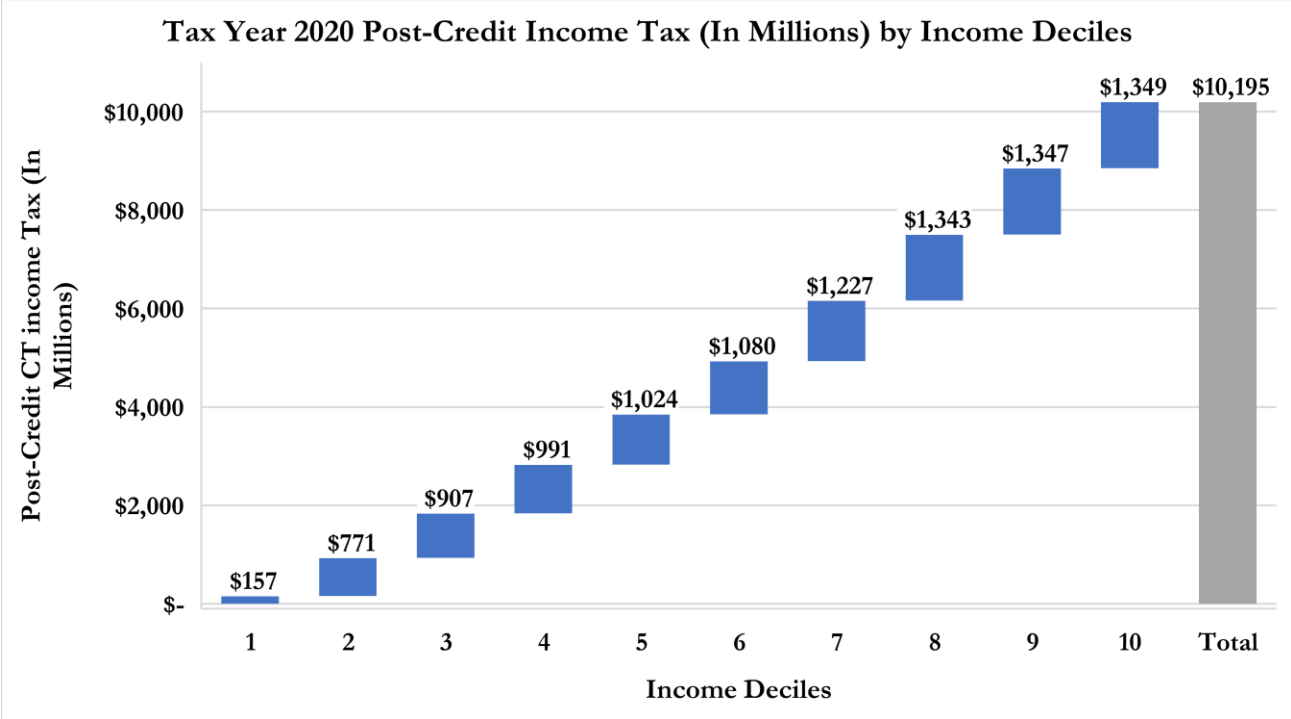


Figure 2.1: Personal Income Tax Paid by Decile as a Portion of the Total PIT paid (Post-credits, Income Decile View).

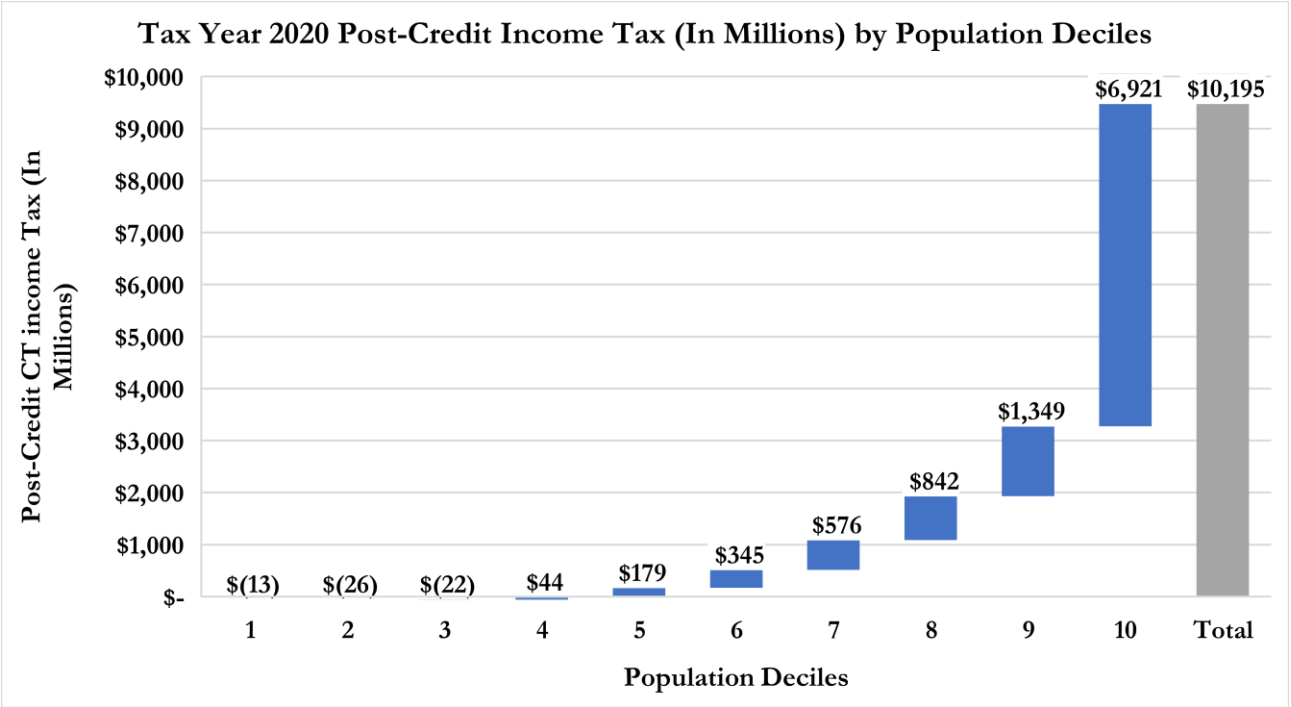


Figure 2.2: Personal Income Tax Paid by Decile as a Portion of the Total PIT paid (Post-credits, Population Decile View).

Suits Index and Tax Proportionality

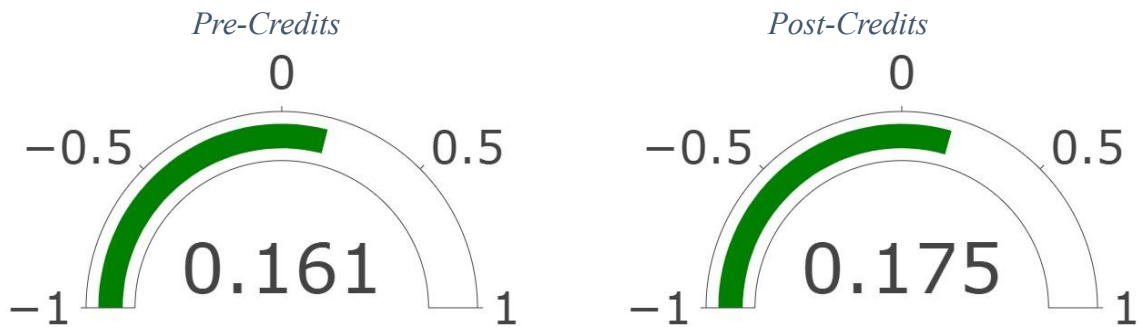
In addition to the legal incidence, this report provides additional analysis of the Connecticut PIT as it relates to the year-over-year trend analysis of the Suits Index, residents vs non- and part-year residents, and analysis of the impact of credits.

Suits Index

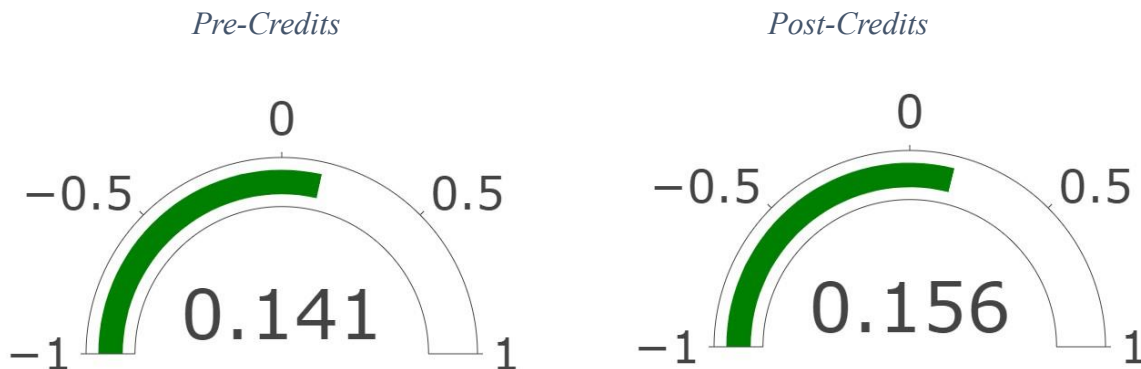
As a brief review, a tax is considered regressive if effective tax rates fall with income. A regressive tax claims a smaller share of ITF income as income rises. If effective tax rates rise with income, a tax is said to be progressive. A progressive tax claims an increasing share of ITF income as income rises. If the effective tax rate remains constant as income rises, the tax is said to be proportional.

The Suits index is a summary measure of regressivity (between 0 and -1) or progressivity (between 0 and +1). The Suits indices below indicate that the PIT in Connecticut is slightly progressive and made more so when accounting for refundable credits.

Income Decile View:



Population Decile View:



Demographics Data

The report also provides analysis across filer demographics for Connecticut ITFs. The two primary ITF demographics captured by CT PIT forms include the composition of deciles by filing status (i.e., Single, Married Filing Jointly and qualifying Surviving Spouse, Married Filing Separately, and Head of Household) as well as tax collected by various filer residency types (i.e., Full-Year Resident, Part-Year Resident, and Non-resident).

Non-Resident and Part-Year Contributions:

Only Full-Year and Part-Year Residents are included in this report's decile tables and analysis, and therefore, the report pertains to Connecticut Residents and Part-Year residents only, who together bear much of the tax burden in Connecticut. Table 2.5 below indicates that Full-Year Residents contribute over fifteen times (15x) more pre-credit PIT when compared to Part-Year Residents. The detailed methodology section below will detail how and why this study excluded non-residents.

Table 2.5: Summary of 2020 PIT Based on Residency Status

Type of Residency	ITF Count	Total CT AGI	Pre-Credit Income Tax
Full-Year Resident	1,710,053	\$181,901,595,912	\$9,695,036,248
Part-Year Resident	63,990	10,983,454,000	655,251,304
Total	1,774,043	\$192,885,049,912	\$10,350,287,552

Filing Status:

Furthermore, the filing status of ITFs which includes Single, Married Filing Jointly, Qualifying Surviving Spouse, Married Filing Separately, and Head of Household are reported and tabulated. Qualifying Surviving Spouse statistics are aggregated with Married Filing Jointly ITFs as they filed under the same tax rules. Historically, the Civil Union was a sixth type of filing status. This filing status isn't reported in TY 2020. Table 2.6 below presents filing status information via the income decile view while Table 2.8 offers the filing status breakdown via the population decile view.

Income Decile View:

Table 2.6: Income View of 2020 Post-Credit Income Tax by IFT Filing Status

Decile	Total CT AGI	Post-Credits Income Tax	Total Population	Single Filers	Married Filing Jointly*	Married Filing Separately	Head of Household
1	\$ 19,288,483,000	\$ 157,072,000	883,552	605,691	122,880	19,580	135,401
2	19,288,457,000	771,004,000	316,630	170,415	85,795	12,152	48,268
3	19,288,527,000	906,904,000	203,484	71,968	104,897	6,477	20,142
4	19,288,513,000	990,707,000	143,461	28,600	103,622	3,335	7,904
5	19,288,351,000	1,023,843,000	102,145	13,095	83,881	1,524	3,645
6	19,288,456,000	1,079,550,000	67,721	7,244	57,673	790	2,014
7	19,288,301,000	1,226,954,000	37,424	3,616	32,195	468	1,145
8	19,288,596,000	1,342,862,000	15,302	1,289	13,382	252	379
9	19,278,057,000	1,347,306,000	3,846	281	3,381	99	85
10	19,299,308,000	1,348,976,000	478	36	420	17	5
Total	\$192,885,049,000	\$10,195,178,000	1,774,043	902,235	608,126	44,694	218,988

*Includes ITFs filing under the Qualifying Surviving Spouse status

- Within Single – The highest concentration of ITFs is within decile one through three (1-3) at 94% and deciles six through ten (6-10) representing 1.38%;
- Within Married or Widowed – The highest concentration of filers is within decile one through three (1-3) at 51.6%, and the lowest concentration is within Decile eight through ten (8-10) at less than 3%;
- Within Married filing Separate – The highest concentration of filers is within deciles one through three (1-3) at 85.5%, and the lowest concentration is within deciles eight through ten (8-10) at less than 1%
- Within Head of Household – The highest concentration of filers is within deciles one through three (1-3) at 93.1%, and the lowest concentration is within deciles eight through ten (8-10) at less than 1%

Population Decile View:

Table 2.7: Population View of 2020 Post-Credit Income Tax by ITF Filing Status

Decile	Total CT AGI	Post-Credits Income Tax	Total Population	Single Filers	Married Filing Jointly*	Married Filing Separately	Head of Household
1	\$ 734,134,000	\$ (13,007,624)	177,405	147,553	15,988	2,735	11,129
2	2,293,344,000	(26,411,779)	177,405	133,922	18,283	3,267	21,933
3	3,818,278,000	(21,661,550)	177,405	116,884	24,372	3,900	32,249
4	5,398,706,000	44,011,250	177,404	107,543	29,062	4,514	36,285
5	7,205,489,000	179,153,149	177,404	101,745	35,965	5,290	34,404
6	9,595,799,000	345,162,486	177,404	98,478	43,443	6,696	28,787
7	12,927,781,000	575,632,434	177,404	88,144	58,464	6,823	23,973
8	17,699,607,000	842,344,758	177,404	57,593	98,231	5,440	16,140
9	25,987,700,000	1,348,589,751	177,404	31,647	133,290	3,760	8,707
10	107,224,000,000	6,921,366,152	177,404	18,726	151,028	2,269	5,381
Total	\$192,884,838,000	\$10,195,179,025	1,774,043	902,235	608,126	44,694	218,988

*Includes ITFs filing under the Qualifying Surviving Spouse status

Within each decile, there is a variety of filing status concentrations:

- Within Single – The highest concentration of filers is within decile 1-3 at 44.1 %, and the lowest concentration is within Decile 8-10 at 12.0%
- Within Married or Widowed – The highest concentration of filers is within Decile 8-10 at 62.9%, and the lowest concentration is within Decile 1-3 at 9.7%
- Within Married filing Separate – The highest concentration of filers is within Decile 6-8 at 42.4%, and the lowest concentration is within Decile 1-3 at 22.2%
- Within Head of Household – The highest concentration of filers is within Decile 3-5 at 47.0%, and the lowest concentration is within Decile 8-10 at 13.8%

When reviewing the overall breakdown of filing status in Table 2.8 below, most of the filers are single (51%), followed by Joint/Widow filers (34%), Head of Household (12%), and 3% of ITFs filed under the Married Filing Separate status.

Filing Status	Number of Filers	% of Total	Post-Credit Income Tax Total
Single	902,235	51%	\$1,920,992,013
Head of Household	218,988	12%	398,072,689
Joint Filers/Surviving Spouse	608,126	34%	7,572,034,026
Married Filing Separately	44,694	3%	304,080,297
Total	1,774,043	100%	\$10,195,179,025

Personal Income Tax Trends 2011-2020

Credits and Modifications

As mentioned in the Executive Summary, two approaches are employed throughout this study: a pre-credit analysis and a post-credit analysis. Among the many credits and modifications Connecticut offers, two credits are included in this study to show their impact on tax incidence.

- **Earned Income Tax Credit (EITC):** a refundable state income tax credit for low to moderate-income working individuals and families. The state credit mirrors the federal Earned Income Tax Credit.
- **Property Tax Credit:** a non-refundable credit for middle- and lower-income filers, for property taxes a taxpayer paid to a Connecticut political subdivision (e.g., city, town, or fire district) on a primary residence, privately owned or leased motor vehicle, or both.

In addition to the TY2020 data presented, the report reviewed trend data for the PIT from TY2011 to TY2020. Table 2.10 below displays the change in the Suits Index for Connecticut PIT of ITFs over the past ten (10) years of available data across the ten (10) income deciles. Connecticut mitigates the effects of the PIT with various credits and subtractions. One example is the State’s Earned Income Tax Credit (EITC), which was the first of two credits applied to produce the Post-

Credit Totals throughout the PIT findings. This credit is available for working families with low to moderate income to reduce their tax burden and its impact on effective rates is further analyzed later in this chapter. There are also subtraction modifications on interest income from U.S. treasury bonds and pension income which also can lower the tax burden. In addition, the alternative minimum tax requires taxpayers, typically high-income earners, to pay at least a minimum tax. The Property Tax Credit is the second credit considered by this study when examining the impact of credits to the PIT in the Post-Credits Totals throughout the PIT findings. Together, the EITC and the Property Tax Credits were subtracted from the PIT to produce the Post-Credit Totals and Suits indices.

As shown in Tables 2.9 and 2.10 below, the pre-credit Suits indices in either the income decile or population decile views only decreased by 0.01 and 0.012, respectively, from 2011 to 2020. The post-credits Suits indices have decreased slightly more in both the income decile and population decile views. The largest increases to pre-credit Suits indices occurred from 2014 to 2015 which coincides with the change of tax rates and basis. The greatest decrease to post-credit Suits indices occurred from 2016 to 2017 which coincides with a drop in EITC credit percentage drop from 30% to 23%. Major changes to the Pass-Through Entity Tax and Pass-Through Entity Tax Credit along with fluctuations in the EITC and property tax credit may have impacted the effective rates across the deciles.⁵

⁵ SN 2018(9.1) 2018 Legislative Changes Affecting the Income Tax. Accessed online Nov. 30, 2023, via <https://portal.ct.gov/-/media/DRS/Publications/pubssn/2018/SN-20189-1.pdf>

Table 2.9: Income Decile View: PIT Suits Indices for TYs 2011-2020 to Examine Impact of EITC and Property Tax Credit

Tax Year	Pre-Credit SI	Post-EITC SI	Change in SI	Year-Over-Year % Change of SI	Post-Property Tax Credit SI	Change in SI	Year-Over-Year % Change of SI	Post-Credits SI	Change in SI	Year-Over-Year % Change of SI
2011	0.171	0.186	0.015	-	0.195	0.024	-	0.210	0.047	-
2012	0.164	0.178	0.013	-4.48%	0.186	0.021	-4.80%	0.199	0.043	-5.22%
2013	0.168	0.180	0.012	1.38%	0.190	0.022	2.50%	0.203	0.042	1.69%
2014	0.162	0.174	0.012	-3.35%	0.182	0.020	-4.35%	0.195	0.04	-4.00%
2015	0.170	0.183	0.012	4.97%	0.188	0.017	3.14%	0.200	0.036	2.96%
2016	0.174	0.187	0.013	2.20%	0.186	0.013	-0.69%	0.200	0.031	-0.36%
2017	0.165	0.174	0.009	-6.63%	0.171	0.006	-8.25%	0.180	0.018	-9.64%
2018	0.165	0.175	0.010	0.15%	0.171	0.006	-0.09%	0.181	0.019	0.17%
2019	0.165	0.174	0.010	-0.14%	0.170	0.006	-0.18%	0.180	0.019	-0.15%
2020	0.161	0.169	0.008	-2.78%	0.167	0.006	-2.24%	0.175	0.017	-2.89%

Table 2.10: Population Decile View: PIT Suits Indices for TYs 2011-2020 to Examine Impact of EITC and Property Tax Credit

Tax Year	Pre-Credit SI	Post-EITC SI	Change in SI	Year-Over-Year % Change of SI	Post-Property Tax Credit SI	Change in SI	Year-Over-Year % Change of SI	Post-Credits SI	Change in SI	Year-Over-Year % Change of SI
2011	0.153	0.169	0.016	-	0.177	0.024	-	0.194	0.047	-
2012	0.146	0.160	0.015	-5.15%	0.167	0.022	-5.43%	0.183	0.043	-5.86%
2013	0.150	0.163	0.013	1.73%	0.173	0.023	3.10%	0.187	0.042	2.02%
2014	0.144	0.158	0.014	-3.49%	0.164	0.021	-4.65%	0.179	0.04	-4.17%
2015	0.149	0.163	0.014	3.36%	0.167	0.018	1.49%	0.181	0.036	1.36%
2016	0.153	0.167	0.015	2.81%	0.166	0.013	-0.59%	0.181	0.031	-0.19%
2017	0.144	0.154	0.010	-7.96%	0.150	0.006	-9.72%	0.160	0.018	-11.28%
2018	0.144	0.155	0.011	0.86%	0.151	0.006	0.59%	0.162	0.019	0.85%
2019	0.144	0.155	0.011	-0.06%	0.151	0.006	-0.09%	0.162	0.019	-0.07%
2020	0.141	0.150	0.009	-3.43%	0.146	0.006	-2.72%	0.156	0.017	-3.50%

Effect of Earned Income Tax Credit and Property Tax Credit

The report examines the effect of the Earned Income Tax Credit (EITC) on the PIT Suits Index for each year. Table 2.11 below shows the year-over-year changes to the baseline amount of CT EITC which is calculated as a percentage of the Federal EITC. The percentage ranges from a low of 23% from 2017 to 2020 to a high of 30%. The table also serves to set the baseline for the Property Tax Credit by providing the maximum allowable property tax credit which has fluctuated from \$200 or \$300. Of note, TYs 2017-2019 had both the lower EITC percentage and lowest allowable Property Tax Credit which is consistent with the decrease in post-credit Suits index when compared to prior years. The final change in SI is the sum of the individual changes to the SI by each credit. Data for TY2020 was impacted by the global COVID-19 pandemic and analysis of more recent years will provide more insights into the findings derived from analysis of this year's tax data.

Table 2.11: EITC and Property Tax Credit Allowable Amounts for TYs 2011-2020

Tax Year	% of Federal EITC	Maximum Allowable Property Tax Credit (\$)
2011	30	300
2012	30	300
2013	30	300
2014	25	300
2015	27.5	300
2016	30	200
2017	23	200*
2018	23	200
2019	23	200
2020	23 ⁶	300

* For tax years 2017-2021, the property tax credit was limited to those who were: 1) age sixty-five (65) or older before the end of the tax year; and or 2) validly claimed at least one dependent on their federal income tax return for that year.

Overall, as the PIT became steadily less progressive from 2011 to 2020, the two credits continued to drive the post-credits Suits indices in the progressive direction, albeit with decreasing impact.

⁶ Nearly 200,000 ITFs received a retroactive increase to their EITC using Federal Corona Relief Funds <https://portal.ct.gov/office-of-the-governor/news/press-releases/2021/12-2021/governor-lamont-directs-eitc-for-2020-to-be-retroactively-enhanced>

Pass-Through Entity Tax

The Pass-Through Entity (PE) tax is imposed on entities conducting business in Connecticut or have income derived from or connected with Connecticut sources:

- Partnerships, including limited liability companies treated as partnerships for federal income tax purposes (excluding publicly traded partnerships), and
- S corporations, including limited liability companies treated as S corporations for federal income tax purposes.

For 2020, the tax rate was 6.99%, and PEs can use either the Standard Base or Alternative Base methods to calculate their tax. The Standard Base includes a PE's Connecticut source income from its own activities, excluding income from subsidiary PEs. The Alternative Base considers the portion of a PE's CT source income from its activities flowing through to members who are CT Income taxpayers plus the portion flowing through to Connecticut resident members not sourced to any state.

Members of a PE could claim a credit of 87.5% of their share of the PE tax liability for taxable years beginning on or after January 1, 2019. This credit can be applied against taxes under chapter 208 (Corporation Business Tax) or chapter 229 (Income Tax). The PE tax credit was reduced from 93.01% to 87.5% for taxable years beginning on or after January 1, 2019. The state collected around \$1.3 billion in Pass-Through Entity Tax, with a total credit claimed in 2020 through the Income Tax amounting to approximately \$660 million.

Legislative changes have made the Pass-Through Entity Tax optional, starting with taxable years commencing on and after January 1, 2024. Due to other numerous legislative changes and only one year of data available at the time of this study, a trend analysis and determination of economic impact would be challenging and is not demonstrated in this report.

Corporation Business Tax

The Corporation Business Tax in Connecticut applies to corporation carrying on or doing business in the state, with most being required to file returns and pay taxes, except for certain exemptions. Corporations calculate their tax using two methods, with the higher amount determining the payment. If a corporation owes less than \$250 under both methods, it pays a minimum tax of \$250.

The Net Income Base Method involves computing Connecticut net income by adjusting federal taxable income, adding back items like exempt interest income and state/local income taxes, while allowing deductions for certain dividends and capital losses. Corporations with multi-state operations apportion their net income based on the percentage of sales in Connecticut. The tax rate for Connecticut net income is 7.5%.

The Capital Base Method calculates tax based on the total value of average capital stock, surplus, undivided profits. Financial service companies are excluded, and the tax rate is 3.1 mils per dollar, with a maximum tax of \$1 million. Corporations pay tax on the higher of the Net Income Base or Capital Base methods.

A minimum tax of \$250 is applied if a corporation's tax is less than that amount under both previous methods. A surtax of 10% applies to corporations, excluding those paying the minimum tax. Combined Unitary Reporting is required for commonly owned corporations engaged in unitary business. The group's tax liability cannot exceed a specified aggregate maximum tax, determined by a nexus combined basis, or they pay tax on the standard combined unitary basis.

It is crucial to highlight that in the context of this tax incidence study, significant legislative changes were implemented between 2016 and 2017, particularly in the area of Business Tax through the apportionment factor.⁷ The impact of these changes is evident in the data presented in this section. One of the most noteworthy modifications is the transition from a three-factor apportionment regime to a single-factor apportionment formula.

Prior to this shift, many businesses calculated their taxes based on three factors: property, payroll, and sales. Now, the single-factor apportionment formula is used to determine the taxpayer's gross receipts that attributed to Connecticut, providing the portion of income subject to Connecticut taxation. The adoption of a single-sales-factor apportionment, along with a market-based approach aims to align business tax obligations with the markets in which a corporation operates.

As a consequence of these changes, there has been a discernible shift in the tax incidence in Connecticut. The burden moved away from companies physically located in Connecticut towards those operation corporations located outside of the state.

⁷ For purposes of this report, Apportionment Legislation refers to 2015 CT Pub. Acts 1, § 40 (Dec. Spec. Sess.) and 2016 CT Pub. Acts 3, § 199 (May. Spec. Sess.), which amended CT Gen. Stat. § 12-218 (Corporation Business Tax), and 2016 CT Pub. Acts 3, § 200 (May. Spec. Sess.), which amended CT Gen. Stat. § 12-711 (Income Tax)

Additionally, starting January 2016, the state transitioned from a separate filing regime to a combined unitary system, resulting in the introduction of the CT-1120CU form. This shift enabled companies to file under a single parent company instead of submitting multiple separate returns.

The subsequent sections examine the legal tax incidence borne by corporations engaged in the sale of goods and services in Connecticut. It includes a comprehensive review of Corporation Business tax by the NAICS code, assessing the economic impact of Corporation Business Tax on ITFs, and conducting a trend analysis of Corporation Business Tax over a period of time, where applicable.

Legal Incidence

This section delves into the legal incidence of Corporation Business Tax, where corporation initially bear the tax burden. For this report, the legal incidence is analyzed across 10 deciles of Total Income. Table 3.1 illustrates these 10 equal deciles of total income, along with both pre-credit and post-credit tax liability.

Several key findings are:

- In 2020, corporations conducting business in Connecticut paid a total of \$851.9 million in post-credit Connecticut business tax.
- A majority of this amount, specifically \$293 million, constituting 34.4% of the corporation business tax, was contributed by businesses within the first decile of corporations.
- Corporations received a total of \$173.8 million in credits, \$72.4 million of credits in the first decile specifically.

Decile	Count	Total Income	CT Net Income	Pre-Credit Business Tax	Post-Credit Business Tax
1	36,304	\$ 750,016,608,632	\$ -3,245,158,598	\$ 365,493,199	\$ 293,012,283
2	927	761,133,995,099	319,143,760	88,968,836	78,741,564
3	372	760,669,734,763	802,166,506	80,372,453	70,973,695
4	192	762,068,714,701	1,218,422,057	115,045,943	89,506,122
5	103	760,999,946,734	879,327,278	80,171,390	72,185,709
6	56	747,055,941,218	1,316,171,571	83,128,754	69,953,720
7	32	754,885,426,894	1,115,722,939	70,697,936	56,294,005
8	18	776,679,386,365	562,163,026	45,342,724	35,385,878
9-10	12	1,534,107,990,365	1,266,894,685	96,473,435	85,810,552
Total	38,016	\$7,607,617,744,771	\$4,234,853,224	\$1,025,694,669	\$851,863,527

**It's worth noting that slight variations in total income across deciles may arise from corporations within each decile reporting a combined total income exceeding the 1/10th fraction of the aggregated total income when consolidated into the decile group.

**Furthermore, to ensure privacy and prevent data leakage, deciles 9 and 10 were combined into a single row.

Table 3.2: Tax Year 2020 Corporation Business Tax Pre and Post credits by NAICS Sector

Sector	Sector Description	Count	Total Income (In Millions)	Pre-Credit Business Tax	Post-Credit Business Tax
72	Accommodation and Food Services	936	\$ 50,053	\$ 4,398,053	\$ 4,306,647
56	Administrative and Support and	1,064	295,163	15,656,601	15,359,343
11	Agriculture, Forestry, Fishing and Hunting	121	5,191	2,234,081	2,038,461
71	Arts, Entertainment, and Recreation	361	5,140	1,043,615	632,270
23	Construction	2,301	35,280	10,817,828	10,241,578
61	Educational Services	220	9,633	1,003,907	812,677
52	Finance and Insurance	2,608	983,642	220,764,630	182,918,203
62	Health Care and Social Assistance	1,082	74,917	10,419,035	9,110,210
51	Information	1,185	609,611	55,649,281	46,337,597
55	Management of Companies and Enterprises	1,155	1,022,972	142,205,328	115,496,201
31-33	Manufacturing	3,258	1,253,046	167,174,218	123,545,633
21	Mining, Quarrying, and Oil and Gas Extraction	32	9,266	72,822	50,778
81	Other Services (except Public Administration)	3,287	49,968	7,337,923	7,011,404
54	Professional, Scientific, and Technical Services	5,441	692,023	77,114,143	67,896,519
92	Public Administration	27	188	24,492	24,492
53	Real Estate and Rental and Leasing	3,368	186,810	15,722,566	14,392,821
44-45	Retail Trade	2,771	514,539	101,141,396	85,487,490
48-49	Transportation and Warehousing	583	250,505	13,545,675	12,175,060
99	Unclassified	5,799	1,042,780	115,960,221	97,796,139
22	Utilities	80	28,458	6,526,333	4,581,720
42	Wholesale Trade	2,337	488,433	56,882,522	51,648,284
Total		38,016	\$7,607,618	\$1,025,694,669	\$851,863,527

To gain insights into the Corporation Business Tax landscape, this section examines the number of corporations and their post-credit tax contribution across various NAICS sectors.⁸ Among these, four main industries collectively account for a tax liability of \$641 million out of the total \$1.03 billion.

1. *Finance and Insurance* constitute 21.4 %, contributing \$183 million.
2. *Manufacturing* follows at 14.5%, amounting to \$123.5 million.
3. *Management of Companies & Enterprises* stands at 13.5%, contributing \$115.5 million.
4. *Retail* makes up 10%, with a tax liability of \$85.5 million.

The remaining sectors collectively contribute 40.4%, totaling \$344.4 million. Figure 3.3 stands as supporting evidence on these industries, illustrating *Finance and Insurance*, *Manufacturing*, *Management of Companies & Enterprises*, and *Retail* sectors represent 59.6% of the total tax liability of corporations.

⁸ NAICS stands for North American Industry Classification System and operates as a federal reporting tool. Companies self-select their required NAICS code based on the description that matches their operation.

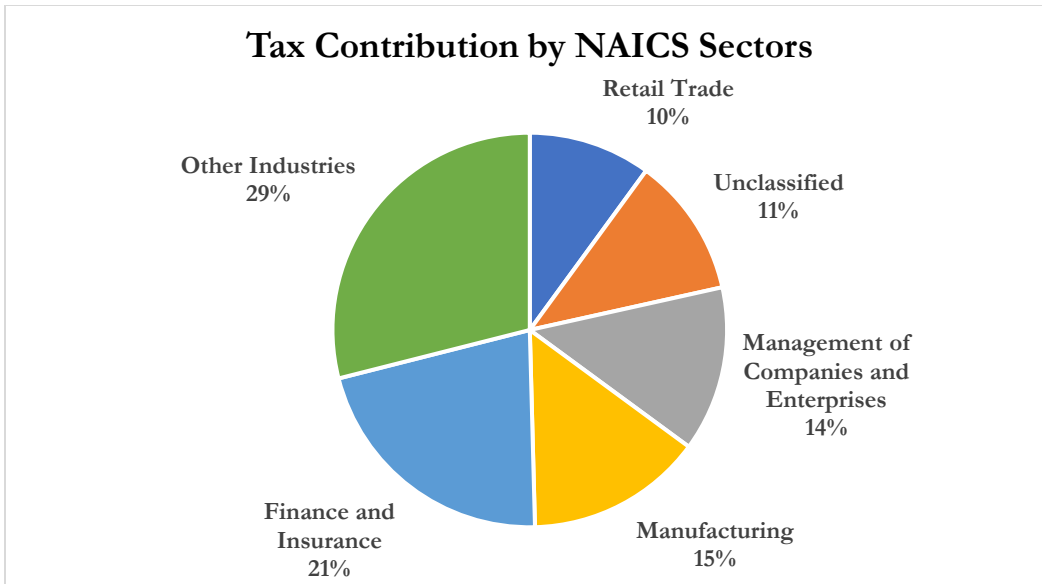
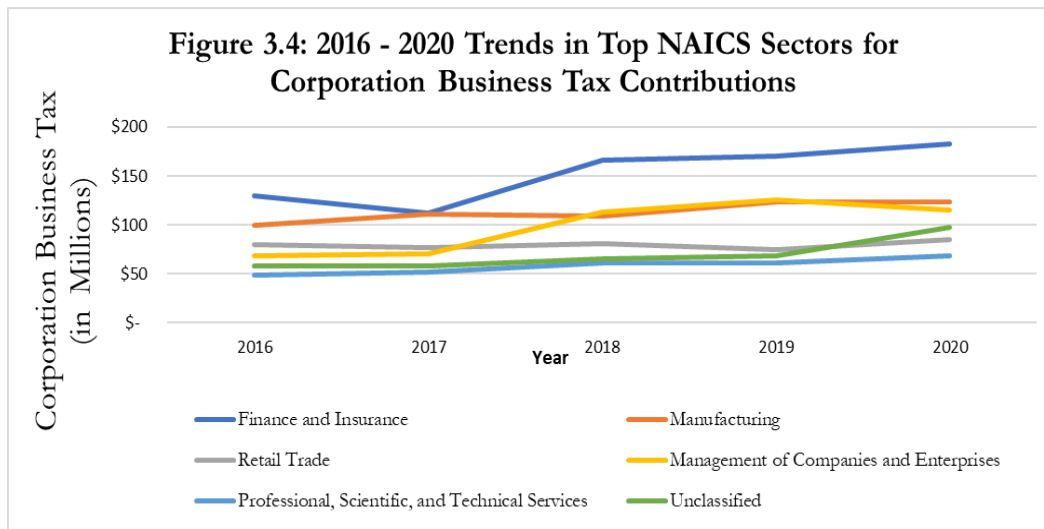


Figure 3.3: Leading NACIS Sectors in Corporation Business Tax Contribution for Tax Year 2020

It is noteworthy that 11%, equivalent to \$97.8 million of the total tax, belongs to unassigned or unclassified corporations.

Moreover, approximately 38,016 corporations are conducting business in Connecticut. The *Professional, Scientific, and Technical Services*, along with *Real Estate and Rental and Leasing*, emerge as industries with the highest number of corporations. Conversely, *Public Administration* and *Mining, Quarrying, and Oil and Gas Extraction* represent sectors with the fewest corporations.

In terms of post-credit business tax revenue, *Finance and Insurance* lead, making the most significant contribution to the state's revenue. Figure 3.4 further dissects the top six sectors that play a significant role in contributing to the Corporation Business Tax.



As depicted in Figure 3.4, the Corporation Business Tax exhibited a decline from 2016 to 2017 across top NAICS industries, followed by a gradual year-over-year increase until 2020.

- The *Finance and Insurance* sector consistently emerged as the predominant contributor to the Corporation Business Tax in Connecticut.
- The tax collected from the *Management of Companies and Enterprises* sector witnessed a notable surge since 2017, surpassing *Manufacturing* in both 2018 and 2019.

In Table 3.5, examining data from 2016 to 2020 reveals noteworthy growth in both Corporation Total Income and CT Corporation Business Tax.

- Total Income has surged 37.3%, from \$5.5 billion to \$7.6 billion during this period.
- Post-credit Corporation Business Tax has experienced substantial growth, escalating from \$658.7 million to \$851.9 million, a 29.3% increase.
- The pre-credit tax witnessed a robust 30.8% increase.

Tax Year	Total Income	CT Net Income	Pre-Credit Tax	Post-Credit Tax
2016	\$ 5,539,938	\$ 252	\$ 784	\$ 659
2017	5,873,869	58	793	644
2018	7,351,959	5,129	977	804
2019	6,632,002	3,505	1,004	830
2020	7,607,618	4,235	1,026	852

Economic Incidence

This section presents a scenario where 100% of the corporation business tax burden is shifted onto ITFs in Connecticut. We offer a perspective in which the tax is distributed uniformly across the 10 deciles, acknowledging this assumption is one of the pivotal aspects of this particular scenario.

An inherent inequality emerges when considering that individuals may adjust their consumption of items in response to changes in price. This raises questions about the economic impact, as it may not be uniformly distributed among all taxpayers in the state.

While businesses may face taxes, they have the ability to adjust their goods and service prices to mitigate these costs. This study employs a 100% pass through model, representing the most rigorous scenario, when the entire tax burden is assumed to be passed on to ITFs. We acknowledge such goods and services can be bought by businesses, not only individuals. Hence, we offer a supplementary perspective, assuming a 50% distribution of the corporation business tax burden onto ITFs. This alternative viewpoint showcases the rigorous 100% Pass-Through model, considering varying degrees of tax allocation.

For future studies, we recommend delving deeper into the economic impact not only on individuals but also on businesses. If possible, we suggest examining the burden effects on both consumers and businesses, particularly assessing the consumer impact resulting from potential price increases or tax law changes.

Tables 3.6 and 3.7 provides insights into the economic impact of the Corporation Business Tax within 10 income deciles of ITFs, along with the corresponding effective tax rate on the CT AGI for each decile.

As explained in the *Population and Income Deciles* section, decile 1 may show a much higher tax burden than other Deciles because of the ITFs who reported a negative CT AGI, and they are lumped into decile 1 in both Income Decile View and Population Decile View.

Income Decile View:

Table 3.6: Corporation Business Tax for Tax Year 2020, assuming 100% of tax is passed to ITFs

Decile	Population	Total CT AGI	Median CT AGI	Pre-Credit		Post-Credit	
				Business Tax	Effective Rate	Business Tax	Effective Rate
1	883,552	\$ 19,288,483,000	21,000	\$ 510,849,507	2.65%	\$424,272,521	2.20%
2	316,630	19,288,457,000	60,000	183,062,404	0.95%	152,037,629	0.79%
3	203,484	19,288,527,000	94,000	117,646,055	0.61%	97,707,813	0.51%
4	143,461	19,288,513,000	133,000	82,943,232	0.43%	68,886,304	0.36%
5	102,145	19,288,351,000	186,000	59,056,025	0.31%	49,047,417	0.25%
6	67,721	19,288,456,000	277,000	39,153,489	0.20%	32,517,892	0.17%
7	37,424	19,288,301,000	488,000	21,637,013	0.11%	17,970,048	0.09%
8	15,302	19,288,596,000	1,115,000	8,846,985	0.05%	7,347,629	0.04%
9	3,846	19,278,057,000	4,103,000	2,223,599	0.01%	1,846,751	0.01%
10	478	19,299,308,000	23,784,000	276,360	0.00%	229,523	0.00%
Total	1,774,043	\$192,885,049,000		\$1,025,694,669	0.53%	\$851,863,527	0.44%

- Pre-credit analysis considers \$1.03 billion in Corporation Business Tax shifted to ITFs, exceeding the post-credit tax liability by \$173.8 million.
- In the post-credit analysis, \$851.8 million in Corporation Business Tax is assumed to be shifted along to ITFs, resulting in an effective tax rate of 0.44%.
- Among the 10 income deciles, Decile 1 shows a post-credit effective rate of 2.2%, while Decile 10 exhibits a post-credit effective rate of 0.001%.

Population Decile View:

Table 3.7: Corporation Business Tax for Tax Year 2020, assuming 100% of tax is passed to ITFs

Decile	Population	Total CT AGI	Median CT AGI	Pre-Credit		Post-Credit	
				Business Tax	Effective Rate	Business Tax	Effective Rate
1	177,405	\$ 734,134,000	\$ 4,000	\$ 102,569,987	13.98%	\$ 85,186,785	11.61%
2	177,405	2,293,344,000	13,000	102,569,409	4.47%	85,186,305	3.71%
3	177,405	3,818,278,000	21,000	102,569,409	2.69%	85,186,305	2.23%
4	177,404	5,398,706,000	30,000	102,569,409	1.90%	85,186,305	1.58%
5	177,404	7,205,489,000	40,000	102,569,409	1.42%	85,186,305	1.18%
6	177,404	9,595,799,000	54,000	102,569,409	1.07%	85,186,305	0.89%
7	177,404	12,927,781,000	73,000	102,569,409	0.79%	85,186,305	0.66%
8	177,404	17,699,607,000	99,000	102,569,409	0.58%	85,186,305	0.48%
9	177,404	25,987,700,000	144,000	102,569,409	0.39%	85,186,305	0.33%
10	177,404	107,224,000,000	281,000	102,569,409	0.10%	85,186,305	0.08%
Total	1,774,043	\$192,884,838,000		\$1,025,694,669	0.53%	\$851,863,527	0.44%

Utilizing the population decile view, the analysis reveals that,

- With the 10 equal population decile approach, overall pre- and post-credit tax revenue decreases from \$1.03 billion to \$851.9 million.
- Concurrently, the effective tax rate sees a decline from 0.53% to 0.44%.

Supplemental Scenarios:

Table 3.8 provides an additional perspective on the Corporation Business Tax. In the supplemental scenario, 50% of taxes are assumed to be passed on to ITFs, while the remaining 50% of business tax is distributed to in-state corporations, reflecting the 50% pass-through tax model. Utilizing the population decile view, the analysis reveals that,

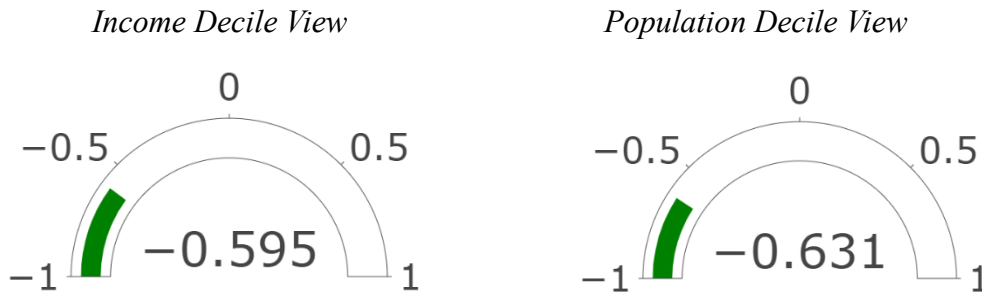
- With the 10 equal population decile approach, overall pre- and post-credit tax revenue decreases from \$512.8 million to \$425.9 million.
- Concurrently, the effective tax rate sees a decline from 0.27% to 0.22%.
- Under the 50% pass-through tax model, the effective tax rate for Decile 1 experiences a significant decrease compared to 100% pass-through tax model.

Table 3.8: Corporation Business Tax for Tax Year 2020, assuming 50% of tax is passed to ITFs and 50% of Business Tax is attributed to corporations based in Connecticut

Decile	Population	Total CT AGI	Median CT AGI	Pre-Credit		Post-Credit	
				Business Tax	Effective Rate	Business Tax	Effective Rate
1	177,405	\$ 734,134,000	\$ 4,000	\$ 51,284,994	6.99%	\$ 42,593,392	5.80%
2	177,405	2,293,344,000	13,000	51,284,705	2.24%	42,593,152	1.86%
3	177,405	3,818,278,000	21,000	51,284,705	1.34%	42,593,152	1.12%
4	177,404	5,398,706,000	30,000	51,284,705	0.95%	42,593,152	0.79%
5	177,404	7,205,489,000	40,000	51,284,705	0.71%	42,593,152	0.59%
6	177,404	9,595,799,000	54,000	51,284,705	0.53%	42,593,152	0.44%
7	177,404	12,927,781,000	73,000	51,284,705	0.40%	42,593,152	0.33%
8	177,404	17,699,607,000	99,000	51,284,705	0.29%	42,593,152	0.24%
9	177,404	25,987,700,000	144,000	51,284,705	0.20%	42,593,152	0.16%
10	177,404	107,224,000,000	281,000	51,284,705	0.05%	42,593,152	0.04%
Total	1,774,043	\$192,884,838,000		\$512,847,334	0.27%	\$425,931,764	0.22%

Suits Index:

Both perspectives indicate that the Corporation Business Tax may be regressive. However, this might not accurately reflect the genuine economic impact of corporation business taxes relative to a corporation’s net income. As income increases, the tax liability should increase as the Corporation Business Tax is proportionate to income.



For more comprehensive analysis, it is advisable for future studies to express the effective tax rate in terms of its impact on consumer prices or wages, providing a more nuanced understanding than a straightforward percentage of income.

Another valuable perspective involves breaking down entities by NAICS sectors and scrutinizing the specific entities responsible for paying the corporation business tax.

Additionally, a more-in depth exploration of apportionment data is warranted to understand how the tax is being exported out of the state. This approach can provide a more granular and nuanced analysis of the economic dynamics related to corporation business taxes.

Property Tax

Property taxes in many states fund crucial municipal services like education, public safety, and infrastructure. In Connecticut, each municipality manages its property tax system, overseeing valuations and setting mill rates (the tax rate per \$1000 of assessed property value). Oversight from the Office of Policy and Management (OPM) ensures compliance. Note that the DRS does not handle Property Tax administration. The State authorizes municipalities to levy property taxes on real estate, motor vehicles, business-owned personal property, and certain personal possessions. Legally, municipalities must evaluate properties every five years to establish accurate assessed values.

State law dictates how town or city assessors establish property assessments and the procedures employed by tax collectors to collect property taxes. The Property Tax is *ad valorem*, or based on the assessed value, which equals 70% of the real estate's fair market value as determined by the municipal assessor. This report analyzes assessed values set by municipalities rather than fair market value, representing the probable market price. Some municipalities itemize costs for fire protection and running a borough within a town, by setting a separate mill rate. For instance, Simsbury has a 1.19 mill rate for fire protection, included in the total tax bill. These costs are included in this report's calculations.

Legal Incidence

Property Tax payments from ITFs and businesses surpass \$11.8 billion in Connecticut. The data is based on the property information from Grand List Year 2019, with corresponding tax payments paid in 2020. In table 4.1, the legal incidence of the Property Tax is detailed including real property, personal property, and motor vehicles. Figure 4.2 provides a more granular breakdown separating real property into residential and non-residential. Notably, residential real property constitutes 68% of the tax burden for CT residents, highlighting the significance of the residential Property Tax on individual tax filers.

Tax Category	Total Amount	
Real Property Tax	\$	10,137,199,471
Personal Property Tax		832,332,461
Motor Vehicle Tax		850,447,675
Total	\$	11,819,979,608

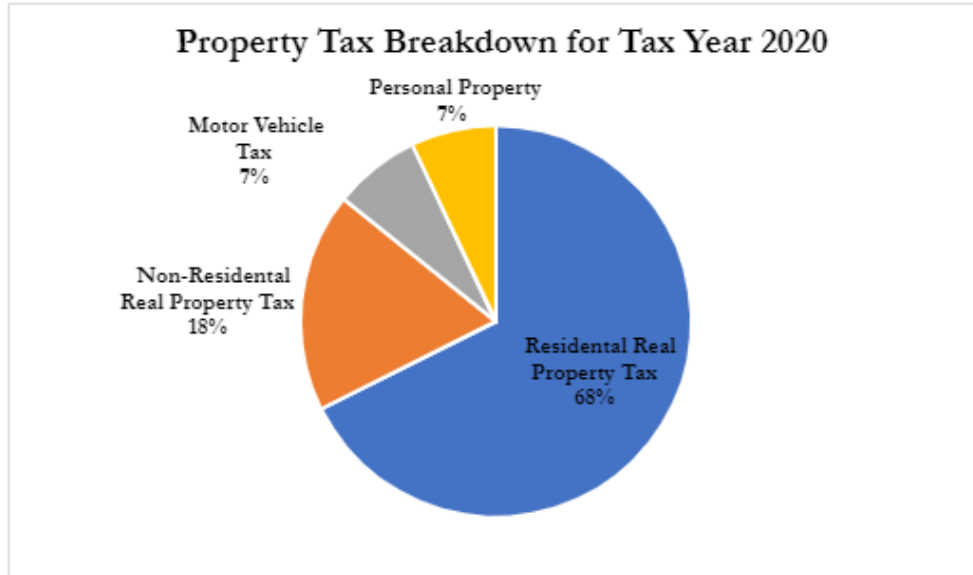


Figure 4.2: Tax Year 2020 Property Tax Breakdown, representing the weight of Residential Real Property Tax on Connecticut ITFs

Economic Incidence

This section examines the overall impact of total Property Tax on Connecticut ITFs. As outlined in the *Population and Income Deciles* section, Decile 1 may exhibit a disproportionately higher tax burden due to ITFs reporting negative CT AGI, placing them in the first decile in both income and population view. The tables below illustrate the Property Tax for tax year 2020, assuming a scenario using the 100% pass-through tax model, where the entire tax burden is transferred to individual filers.

Income Decile View:

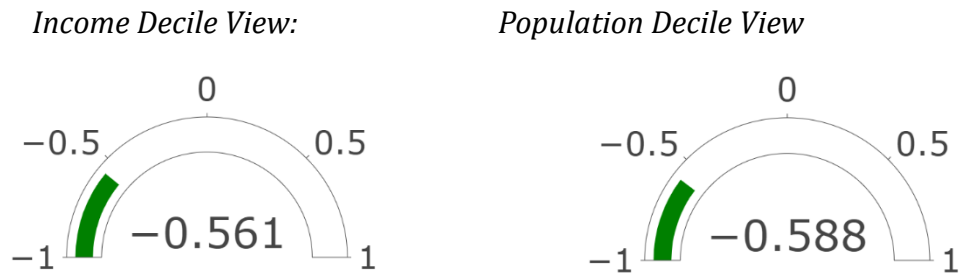
Table 4.3: Tax Year 2020 Property Tax: 100% of Tax Passed on ITFs

Decile	Population	Total CT AGI	Residential Real Property Tax	Non-Residential Real Property Tax	Motor Vehicle Property Tax	Personal Property Tax	Effective Rate
1	883,552	\$ 19,288,483,000	\$ 3,638,104,083	\$ 1,068,179,345	\$ 410,342,140	\$ 414,545,030	2.90%
2	316,630	19,288,457,000	1,343,640,472	382,780,989	151,457,776	148,551,793	0.93%
3	203,484	19,288,527,000	923,926,130	245,996,294	100,492,443	95,467,621	0.56%
4	143,461	19,288,513,000	693,299,435	173,433,166	72,560,428	67,306,916	0.39%
5	102,145	19,288,351,000	539,411,773	123,485,343	52,625,350	47,922,884	0.30%
6	67,721	19,288,456,000	413,724,294	81,869,410	34,891,840	31,772,340	0.22%
7	37,424	19,288,301,000	272,729,313	45,242,699	18,914,295	17,558,040	0.16%
8	15,302	19,288,596,000	128,920,645	18,498,925	7,329,978	7,179,167	0.12%
9	3,846	19,278,057,000	34,592,164	4,649,514	1,658,697	1,804,410	0.08%
10	478	19,299,308,000	4,137,613	577,865	174,728	224,261	0.02%
Total	1,774,043	\$192,885,049,000	\$7,992,485,921	\$2,144,713,549	\$850,447,675	\$832,332,461	0.11%

From the Income Decile perspective, Deciles 1-4 collectively contribute over 84% of the total Property Taxes, reflecting a significant burden on lower-income individual filers. Beyond Decile 2, the effective rate consistently decreases through Decile 10.

Suits Index:

The Suits Index results suggest that the Property Tax is primarily regressive in Connecticut. This is supported by the economic incidence, which demonstrates that the majority of the property tax burden is shouldered by ITFs in lower-income deciles. This regressive nature isn't exclusive to Connecticut; according to the 2018 Institute of Taxation and Economic Policy (ITEP) “Who Pays” Report⁹, 45 states share similar property tax structures. Meanwhile, Connecticut even offers a Property Tax program for eligible elderly or disabled citizens with incomes below specified limits, a factor considered in this study.



⁹ <https://itep.sfo2.digitaloceanspaces.com/whopays-ITEP-2018.pdf>

Sales and Use Tax

In Connecticut, compliance with the Sales and Use Tax is crucial for individuals and businesses involved in selling goods, providing taxable services, and operating hospitality establishments in the state. Retailers engaged in these activities must register with the Department of Revenue Services, file Sales and Use Tax returns, and adhere to statutory exemptions for tangible personal property sales and taxable services, with no local sales taxes levied.

While the Sales and Use Tax is typically perceived as regressive, Connecticut has implemented several policy measures to enhance its progressiveness. Notably, these policies encompass the introduction of a variety of tax rates, including the distinct 7.75% luxury tax rate, as outlined in the table below. Furthermore, the state provides a variety of exemptions such as fuel for residential heating, prescription and non-prescription medicines, children's car seats, and groceries. These measures serve the purpose of reducing the tax burden on vital goods and services, thus fostering equity within the state's tax system.

Table 5.1: Connecticut Sales and Use Tax Rates

6.35%	Gross receipts from the sale, rental, or leasing of tangible personal property, and the rendering of certain services (general rate);
7.35%	As of October 1 st , 2019, meals and certain beverages are subject to an additional 1% rate of tax for a total effective tax rate of 7.35%.
7.75%	<ul style="list-style-type: none">• Most motor vehicles with a sales price of more than \$50,000.• Items of jewelry with a sales price of more than \$5,000.• Articles of clothing or footwear or a handbag, luggage, umbrella, wallet, or watch, with a price of more than \$1,000.
1.0%	Sale of computer and data processing services.
2.99%	Sales of vessels, motors for vessels, and trailers used for transporting a vessel, and dyed diesel fuel sold by a marine dock exclusively for marine purposes.
4.5%	Sale of a motor vehicle to a nonresident member of the armed forces of the United States stationed on full-time active duty in Connecticut.
9.35%	Rental or leasing of a passenger motor vehicle for a period of 30 consecutive calendar days or less.

In our analysis, we considered the entirety of the Sales and Use Tax system, consolidating all its components to provide a holistic understanding of its implications on the state's economy and residents. Additionally, it's important to note that the Occupancy Tax is incorporated into the Sales and Use Tax framework, as operators of hospitality establishments are required to obtain a Sale and Use Tax permit.

Legal Incidence

As indicated in the data below, the total State Sales and Use Tax paid by Connecticut taxpayers in 2020 amounted to approximately \$4.7 billion. Notably, a significant portion of these taxes, constituting 86.9% of the total, originates from sales that are subject to the 6.35% tax rate.

Categories	Total Amount
Sales at 6.35%	\$4,125,197,023
Sales at 7.35%	448,692,323
Sales at 7.75%	89,033,380
Sales at 9.35%	16,137,556
Occupancy	65,822,260
Total	\$4,744,882,542

Table 5.3 illustrates a trend analysis of total Sales and Use Tax liability on a year-over-year basis. This liability has shown consistent growth since 2011. Notably, the 6.35% sales tax rate, often referred to as the general rate, has consistently been the primary source of Sales and Use Tax revenue. In 2019, the tax rate increased to 7.35% for certain meals and beverages. These changes have contributed significantly to the State's revenue, enhancing its progressiveness in taxation.

Fiscal Year	Sales at 6.35%	Sales at 7.35%	Sales at 7.75%	Sales at 9.35%	Occupancy	Total
2012	\$3,578.4	\$ -	\$ 47.2	\$ 18.5	\$ 101.6	\$3,745.6
2013	3,698.7	-	50.7	19.4	104.8	3,873.5
2014	3,820.4	-	57.9	20.3	110.1	4,008.6
2015	3,917.2	-	63.0	21.0	117.2	4,118.4
2016	3,996.2	-	69.7	21.0	121.0	4,207.9
2017	4,051.0	-	76.2	21.5	124.2	4,272.8
2018	4,239.8	-	80.6	23.2	131.4	4,474.9
2019	4,313.9	134.2	83.8	23.6	132.0	4,687.5
2020	4,125.2	448.7	89.0	16.1	65.8	4,744.9

Economic Incidence

In general, goods and services are subject to Sales and Use Tax, typically paid by individuals or businesses. The sales and use tax for items like clothing is typically passed on to consumers as part of the item's purchase price. When a consumer buys an item, the seller includes the applicable sales tax in the total amount paid. This tax is then be collected by the seller on behalf of the government. In essence, consumers bear the burden of the Sales and Use Tax through the pricing of the purchased item.

To assess the economic incidence of Sales and Use Tax, this study relies on various methods and external data sources. The Consumer Expenditure Surveys (CE) from the US Bureau of Labor Statistics provides valuable insights into the spending habits of American consumers. We've selected specific survey fields, including small and large personal purchases subject to Sales and Use Tax, to create expenditure ratios across 10 deciles. This detailed approach involves examining the total amount of household income before taxes and spending on:

- Small purchases such as alcoholic beverages, housekeeping supplies and services, personal care products, pet food, tobacco products, smoking supplies, and
- Large purchases such as cars and trucks, entertainment systems, sports equipment, home furnishings, major appliances, etc.

First, respondents of CE were grouped into 10 deciles based on the total amount of household income of the respondent. Within each decile, their Mean and Median expenditure on small and large purchases that are subject to Connecticut's Sales and Use Tax were computed by decile. The expenditure ratios between 10 deciles were computed based on the Mean and Median expenditure of the deciles. The ratios were then used to distribute the collected Sales and Use Tax by the State in Tax Year 2020. The distribution and Suits Index can vary depending on whether Mean or Median expenditure is considered. Both views are displayed in Tables 5.4 and 5.5. The approach is further explained in the Detailed Methodology section.

There is a wide range of products subject to the Sales and Use Tax, including room occupancy and car rental. This may not only impact individuals residing in Connecticut but as well as out-of-state residents. Due to data limitations, it is difficult to understand how much of Sales and Use tax is exported out of state. Hence, this study analyzes the economic incidence by examining how businesses transfer Sales and Use Tax to ITFs who reside in Connecticut only.

As outlined in the *Population and Income Deciles* section, Decile 1 may exhibit a notably higher tax burden compared to other deciles. This discrepancy is attributed to the ITFs that reported a negative CT AGI; they are consolidated with Decile 1 in both the Income Decile View and Population Decile View.

Income Decile View:

Table 5.4: Tax Year 2020 Sales and Use Tax,
Total Tax Apportioned using Mean Household Expenditure

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Sales & Use Tax	Effective Rate
1	883,552	\$ 19,288,483,000	\$ 21,000	\$ 22,000	\$1,169,694,000	6.06%
2	316,630	19,288,457,000	60,000	61,000	712,770,000	3.70%
3	203,484	19,288,527,000	94,000	95,000	680,891,000	3.53%
4	143,461	19,288,513,000	133,000	134,000	624,947,000	3.24%
5	102,145	19,288,351,000	186,000	189,000	556,419,000	2.88%
6	67,721	19,288,456,000	277,000	285,000	449,243,000	2.33%
7	37,424	19,288,301,000	488,000	515,000	313,475,000	1.63%
8	15,302	19,288,596,000	1,115,000	1,261,000	170,780,000	0.89%
9	3,846	19,278,057,000	4,103,000	5,012,000	57,192,000	0.30%
10	478	19,299,308,000	23,784,000	40,375,000	9,471,000	0.05%
Total	1,774,043	\$192,885,049,000			\$4,744,882,000	2.46%

Table 5.5: Tax Year 2020 Sales and Use Tax,
Total Tax Apportioned using Median Household Expenditures

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Sales & Use Tax	Effective Rate
1	883,552	\$ 19,288,483,000	\$ 21,000	\$ 22,000	\$ 955,100,000	4.95%
2	316,630	19,288,457,000	60,000	61,000	708,219,000	3.67%
3	203,484	19,288,527,000	94,000	95,000	756,294,000	3.92%
4	143,461	19,288,513,000	133,000	134,000	708,971,000	3.68%
5	102,145	19,288,351,000	186,000	189,000	635,173,000	3.29%
6	67,721	19,288,456,000	277,000	285,000	474,242,000	2.46%
7	37,424	19,288,301,000	488,000	515,000	312,306,000	1.62%
8	15,302	19,288,596,000	1,115,000	1,261,000	139,170,000	0.72%
9	3,846	19,278,057,000	4,103,000	5,012,000	47,419,000	0.25%
10	478	19,299,308,000	23,784,000	40,375,000	7,989,000	0.04%
Total	1,774,043	\$192,885,049,000			\$4,744,883,000	2.46%

- Income deciles 1,2,3 (80% of the population) contributed approximately 50% to the Sales and Use Tax revenue in Tax Year 2020.
- Following the first income decile, the effective tax rate exhibits a more gradual decline.
- Decile 10 bears a significantly lower tax burden in comparison to the deciles preceding it, showcasing the regressivity of this tax.

Population Decile View:

Table 5.6: Tax Year 2020 Sales and Use Tax,
Total tax Apportioned using Mean Household Expenditure

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Sales & Use Tax	Effective Rate
1	177,405	\$ 734,134,000	\$ 4,000	\$ 4,000	\$ 238,566,000	32.51%
2	177,405	2,293,344,000	13,000	13,000	200,254,000	8.73%
3	177,405	3,818,278,000	21,000	22,000	232,231,000	6.08%
4	177,404	5,398,706,000	30,000	30,000	303,704,000	5.63%
5	177,404	7,205,489,000	40,000	41,000	365,413,000	5.07%
6	177,404	9,595,799,000	54,000	54,000	419,497,000	4.37%
7	177,404	12,927,781,000	73,000	73,000	485,656,000	3.76%
8	177,404	17,699,607,000	99,000	100,000	616,088,000	3.48%
9	177,404	25,987,700,000	144,000	146,000	767,178,000	2.95%
10	177,404	107,224,000,000	281,000	604,000	1,116,295,000	1.04%
Total	1,774,043	\$192,884,838,000			\$4,744,882,000	2.46%

Table 5.7: Tax Year 2020 Sales and Use Tax,
Total tax Apportioned using Median Household Expenditure

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Sales & Use Tax	Effective Rate
1	177,405	\$ 734,134,000	\$ 4,000	4,000	\$ 167,350,000	22.80%
2	177,405	2,293,344,000	13,000	13,000	153,599,000	6.70%
3	177,405	3,818,278,000	21,000	22,000	196,841,000	5.16%
4	177,404	5,398,706,000	30,000	30,000	278,506,000	5.16%
5	177,404	7,205,489,000	40,000	41,000	362,081,000	5.03%
6	177,404	9,595,799,000	54,000	54,000	421,147,000	4.39%
7	177,404	12,927,781,000	73,000	73,000	517,431,000	4.00%
8	177,404	17,699,607,000	99,000	100,000	672,486,000	3.80%
9	177,404	25,987,700,000	144,000	146,000	841,978,000	3.24%
10	177,404	107,224,000,000	281,000	604,000	1,133,465,000	1.06%
Total	1,774,043	\$192,884,838,000			\$4,744,884,000	2.46%

- The effective rate of Decile 1 is significantly higher than that of Decile 2 and all subsequent deciles.
- Following Decile 2, the effective rate gradually decreases.
- Similar to Income Decile View, higher income deciles bear a significantly lower tax burden in comparison to the lower-income deciles, showcasing the regressivity of this tax.

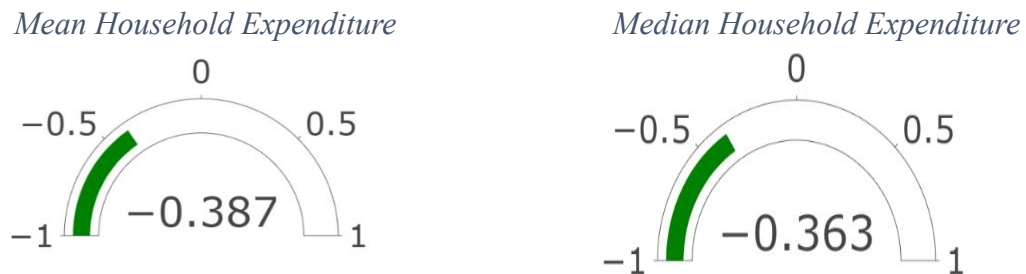
Suits Index:

The negative values of the Suits Index across all four scenarios suggest that Connecticut's Sale & Use Tax is regressive. In conclusion, the economic incidence of the tax on individuals in lower-income deciles indicates that a significant portion of the burden falls on them.

Income View:



Population View:



The presented charts visually depict the distribution of Total Sales and Use Tax across income deciles, utilizing both mean and median household expenditures. The visuals underscore a regressive structure, with the highest tax burden observed for lower-income taxpayers in Decile 1, while wealthier taxpayers in Decile 10 experience comparatively lower tax burdens.

Excise Tax

Excise taxes are levies imposed on specific goods, services, or activities, involving taxpayers like importers, manufacturers, retailers, and consumers. It is not directly based on the income or property of the person paying it, but rather on the quantity of the product. Excise tax may be imposed for the sale and use by the manufacturer, sale or use by the retailer, or use by the consumer. Examples include taxes on cigarettes, alcohol, or tobacco.

Though businesses initially bear the legal burden of excise tax, the assumption is that the eventual impact is shifted to consumers through heightened prices of goods and services. To alleviate this burden on sellers, especially local establishments like breweries and wineries, Connecticut has implemented exemptions that reduce the excise tax on their product sales. This initiative serves a dual purpose: reducing the tax burden on local businesses and minimizing entry barriers for entities operating within the State.

The subsequent sections detail the excise taxes imposed by the state of Connecticut, encompassing alcohol, cigarettes, e-cigarettes, and tobacco. This report consolidates the analysis of these excise taxes into an aggregate view, with a detailed breakdown of each tax category provided below.

Alcohol Tax

Alcohol taxes are applied to all distributors of alcoholic beverages for in-state sales. Monthly, distributors are required to submit reports detailing the total gallons sold, opening and closing inventories, and the corresponding tax amount. Additionally, sales of alcoholic beverages are subject to the Sales and Use Tax, as elaborated in the Legal and Economic Incidence of Sales and Use Tax sections of this report. The following table outlines specific tax rates for various alcohol types, including beer, cider, wines, and others.

**Table 6.1 Alcohol Beverage Tax Rates
Effective since October 1, 2019**

Beer	\$0.20 per gallon
Cider	\$0.26 per gallon
Still Wines	\$0.79 per gallon
Small Wineries	\$0.20 per gallon
Sparkling Wines	\$1.98 per gallon
Alcohol	\$5.94 per gallon
Distilled Liquor	\$5.94 per gallon
Liquor Coolers	\$2.71 per gallon

Cigarette Tax

An excise tax imposed on all cigarettes sold in Connecticut, requiring payment through the attachment of stamps or heat-applied decals on each pack of cigarettes. These stamps are available for purchase by licensed dealers and distributors. Cigarettes sold to state institutions, excluding correctional institutions, and those sold on armed service bases are exempt from this tax. A tax of 217.5 mills per cigarette or \$4.35 per pack of 20 cigarettes is levied on all cigarettes sold within Connecticut. Additionally, sales of cigarettes are subject to the Sales and Use Tax.

Electronic Cigarette Products Tax

An excise tax is levied on the sale or use of electronic cigarette (e-cigarette) liquid and e-cigarette products. It is set at a rate of either:

- \$0.40 per milliliter of the electronic cigarette liquid within a pre-filled, manufacturer-sealed product, not intended for refill, or
- 10% of the wholesale sales price of other electronic cigarette products.

Tobacco Products Tax

All non-cigarette tobacco products, including cigars, stogies, snuff, pipe, and chewing tobacco, are subject to an excise tax. The tax is levied when these products are manufactured, imported, or bought by distributors. The only exceptions are tobacco products sold to the federal government or exported out of the State. Distributors need to get a license every year and pay the tax every month.

**Table 6.2 Tobacco Products Tax Rates
Effective since December 1, 2017**

Tobacco	50% of the wholesale sales price
Cigars	50% of the wholesale sales price, not to exceed 50¢ per cigar
Snuff	\$3.00 per ounce

Legal Incidence

As shown in Table 6.3, the total excise tax revenue amounted to \$431 million in Tax Year 2020. Cigarette Tax constituted 76% of this total, while Alcohol Tax accounted for 17.8%. For the scope of this study, we presume that distributors transfer this tax to consumers via increased prices, a topic we will delve into further in the upcoming Economic Incidence section.

Table 6.3: Tax Year 2020 Legal Incidence of Excise Tax

Categories	Total Amount
Cigarette	\$ 327,545,938
Alcohol	76,499,287
Tobacco Products	22,382,635
E-cigarette Products	4,544,374
Total	\$ 430,972,234

As indicated in Table 6.4, analyzing the excise tax trends from 2011-2020 reveals an 18.6% decline in cigarette taxes, whereas alcohol taxes have risen 41.9% from \$53.9 million to \$76.4 million, potentially due to an increase in tax rates, effective October 1st, 2019. Despite the introduction of the electronic cigarette tax in recent years, there appears to be a gradual decline in total excise tax over time.

Table 6.4: Annual Tax Year Connecticut Excise Tax Liability (In Millions)

	Cigarette	Alcohol	Tobacco Products	E-Cigarette Products	Total
2011	\$ 402.5	\$ 53.9	\$ 8.7	\$ -	\$ 465.0
2012	392.1	60.1	14.4	-	466.6
2013	371.6	60.4	13.3	-	445.4
2014	350.0	60.8	11.2	-	421.9
2015	352.3	62.4	11.4	-	426.1
2016	361.1	63.3	12.7	-	437.0
2017	353.1	62.9	15.0	-	431.0
2018	351.4	62.9	22.1	-	436.3
2019	322.3	66.4	21.6	1.2	411.6
2020	327.5	76.5	22.4	4.5	431.0

Economic Incidence

Similar to the economic incidence study of the Sales and Use Tax, the economic impact of excise tax on ITFs involves utilizing the Consumer Expenditure Surveys (CE) data from the U.S. Bureau of Labor Statistics. This study employs specific survey fields related to purchases subject to excise tax, such as alcoholic beverages, tobacco products, and other smoking supplies. The process includes grouping CE respondents into 10 deciles based on their total household income, calculating mean expenditures on excise tax-subject purchases within each decile, and establishing expenditure ratios across the 10 deciles. These ratios are then utilized to distribute collected excise tax by Connecticut for Tax Year 2020. The approach is further explained in the Detailed Methodology section of this report.

It is important to note that Decile 1 may exhibit a notably higher tax burden compared to other deciles, as outlined in the *Population and Income Deciles* section. This discrepancy is attributed to the ITFs that reported a negative CT AGI; they are consolidated with Decile 1 in both the Income Decile View and Population Decile View.

Key findings include:

- From the income decile perspective, the first three deciles collectively contribute 60% of the State’s excise tax.
- Decile 1 exhibits a notably higher effective rate compared to Decile 2, partly due to the explained approach above.
- The tax burden tends to decline after Decile 1.
- Decile 10 bears a significantly lower burden compared to the preceding high-income deciles.

Income Decile View:

Table 6.5: Tax Year 2020 Excise Tax: Total tax Apportioned using Mean Household Expenditure

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Excise Tax	Effective Rate
1	883,552	\$ 19,288,483,000	\$ 21,000	\$ 22,000	\$ 128,248,000	0.66%
2	316,630	19,288,457,000	60,000	61,000	68,678,000	0.36%
3	203,484	19,288,527,000	94,000	95,000	60,441,000	0.31%
4	143,461	19,288,513,000	133,000	134,000	53,092,000	0.28%
5	102,145	19,288,351,000	186,000	189,000	43,690,000	0.23%
6	67,721	19,288,456,000	277,000	285,000	34,029,000	0.18%
7	37,424	19,288,301,000	488,000	515,000	24,571,000	0.13%
8	15,302	19,288,596,000	1,115,000	1,261,000	13,173,000	0.07%
9	3,846	19,278,057,000	4,103,000	5,012,000	4,341,000	0.02%
10	478	19,299,308,000	23,784,000	40,375,000	707,000	0.00%
Total	1,774,043	\$192,885,049,000			\$ 430,970,000	0.22%

Population Decile View:

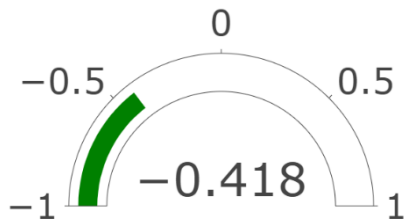
Table 6.6: Tax Year 2020 Excise Tax: Total Tax Apportioned using Mean Household Expenditure

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Excise Tax	Effective Rate
1	177,405	\$ 734,134,000	\$ 4,000	\$ 4,000	\$ 27,567,000	3.76%
2	177,405	2,293,344,000	13,000	13,000	23,474,000	1.02%
3	177,405	3,818,278,000	21,000	22,000	24,257,000	0.64%
4	177,404	5,398,706,000	30,000	30,000	30,568,000	0.57%
5	177,404	7,205,489,000	40,000	41,000	35,813,000	0.50%
6	177,404	9,595,799,000	54,000	54,000	40,046,000	0.42%
7	177,404	12,927,781,000	73,000	73,000	43,721,000	0.34%
8	177,404	17,699,607,000	99,000	100,000	54,808,000	0.31%
9	177,404	25,987,700,000	144,000	146,000	63,845,000	0.25%
10	177,404	107,224,000,000	281,000	604,000	86,873,000	0.08%
Total	1,774,043	\$192,884,838,000			\$430,972,000	0.22%

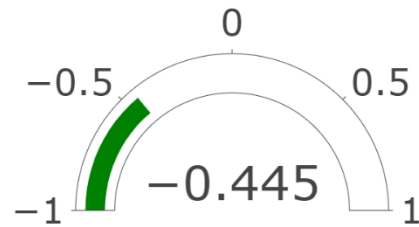
Suits Index:

The negative values of the Suits Index across both scenarios suggest that Connecticut’s excise taxes are regressive. In conclusion, the economic incidence of the tax on individuals in lower-income deciles indicates that a significant portion of the burden falls on them.

Income Decile View:



Population Decile View:



Taxes Greater than \$100 Million

The focus of this year's report centers on an updated statute, specifically examining taxes that generated more than \$100 million in revenue. Within the state, several taxes consistently surpass this threshold on an annual basis. For the Tax Year 2020, the taxes exceeding this threshold fall into six main categories: 1) Insurance, 2) Public Service, 3) Estate & Gift, 4) Motor Vehicle Fuels, 5) Real Estate Conveyance, and 6) Petroleum Products. The legal incidence of these high-revenue taxes is outlined below, considering both the total number of entities paying the taxes and the overall tax generated.

The economic incidence of this data is presented across 10 deciles, reflecting equal population or income distribution based on CT AGI of ITFs. It's important to note that economic incidence was not provided for every tax exceeding \$100 million. This was due to lack of information available, and it did not make sense to simply shift the tax burden to all taxpayers in the state. Due to statutory time constraints, we were limited in our economic analysis. However, we aim to delve deeper into such analysis in our future studies.

As outlined in the *Population and Income Deciles* section, Decile 1 may exhibit a notably higher tax burden compared to other deciles. This discrepancy is attributed to the ITFs that reported a negative CT AGI; they are consolidated with Decile 1 in both the Income Decile View and Population Decile View.

1) Public Service

The tax on public services, applied to the gross earnings of companies in this sector, encompasses a variety of entities, including electric, gas, satellite, cable, and antenna television companies. In Tax Year 2020, the legal incidence analysis revealed that 81 public service companies generated \$253.4 million in post-credit taxes, derived from total gross earnings amounting to \$20.4 billion.

For economic incidence, a straightforward approach is adopted, allocating the entire tax burden to ITFs in Connecticut. This decision assumed that distributing the tax uniformly across all taxpayers, regardless of income, is justifiable because certain expenses like cable and Wi-Fi bills, are expected to remain relatively consistent across households. The subsequent economic incidence tables provide a detailed examination of this tax burden distribution.

Indeed, this approach reveals a degree of naivety. The allocation of 100% of the tax to ITFs fails to consider the nuanced dynamics of how individuals may benefit unequally from the services in question. For instance, it overlooks the fact that some consumer, with lower ability to pay, might adjust their consumption patterns for essential services like electric or gas in response to a price increase. This oversight suggests that our initial approach may not accurately capture the true economic incidence, emphasizing the need for a more refined methodology in future studies.

Income Decile View:

Table 7.1: Tax Year 2020 Public Service Tax: 100% of tax is passed onto ITFs

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Public Service Tax	Effective Rate
1	883,552	\$ 19,288,483,000	\$ 21,000	\$ 22,000	\$ 126,236,763	0.65%
2	316,630	19,288,457,000	60,000	61,000	45,236,816	0.23%
3	203,484	19,288,527,000	94,000	95,000	29,071,687	0.15%
4	143,461	19,288,513,000	133,000	134,000	20,496,222	0.11%
5	102,145	19,288,351,000	186,000	189,000	14,593,420	0.08%
6	67,721	19,288,456,000	277,000	285,000	9,675,275	0.05%
7	37,424	19,288,301,000	488,000	515,000	5,346,754	0.03%
8	15,302	19,288,596,000	1,115,000	1,261,000	2,186,191	0.01%
9	3,846	19,278,057,000	4,103,000	5,012,000	549,477	0.00%
10	478	19,299,308,000	23,784,000	40,375,000	68,292	0.00%
Total	1,774,043	\$192,885,049,000			\$253,460,898	0.13%

Population Decile View:

Table 7.2: Tax Year 2020 Public Service Tax: 100% of tax is passed onto ITFs

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Public Service Tax	Effective Rate
1	177,405	\$ 734,134,000	\$ 4,000	\$ 4,000	\$ 25,346,218	3.45%
2	177,405	2,293,344,000	13,000	13,000	25,346,075	1.11%
3	177,405	3,818,278,000	21,000	22,000	25,346,075	0.66%
4	177,404	5,398,706,000	30,000	30,000	25,346,075	0.47%
5	177,404	7,205,489,000	40,000	41,000	25,346,075	0.35%
6	177,404	9,595,799,000	54,000	54,000	25,346,075	0.26%
7	177,404	12,927,781,000	73,000	73,000	25,346,075	0.20%
8	177,404	17,699,607,000	99,000	100,000	25,346,075	0.14%
9	177,404	25,987,700,000	144,000	146,000	25,346,075	0.10%
10	177,404	107,224,000,000	281,000	604,000	25,346,075	0.02%
Total	1,774,043	\$192,884,838,000			\$253,460,898	0.13%

- \$253 million in public service tax was transferred to ITFs, resulting in an effective tax rate of 0.13%.
- In the Income Decile View, Decile 1 bears an effective rate of 0.65%, while Decile 10 has a minimal rate of 0.0004%.
- Shifting to the Population Decile View, Decile 1 experiences an increase in effective rate to 3.45%, contrasting with Decile 10's effective rate of 0.02%.

2) Motor Vehicle Fuels

The Motor Vehicle Fuels Tax is levied on motor fuel used or sold in Connecticut. Fuel includes gasoline, diesel, gasohol, propane, or any combustible gas or liquid providing the power to propel a motor vehicle. This includes rates of \$0.25 per gallon for gasoline or gasohol and \$0.26 for natural gas or propane. Tax revenue is sourced from the total gallons of fuel sold by motor vehicle fuel companies.

In Tax Year 2020, approximately 700 motor fuels taxpayers generated \$434.9 million in taxes owed, representing their tax liability. This tax revenue is applied uniformly to all ITFs, assuming that expenses like gas remain relatively consistent across households, regardless of income. However, an inherent inequality emerges when considering that individuals with lower income may adjust their consumption of items in response to price increases. This raises questions about the economic impact, as it may not be uniformly distributed among all taxpayers in the state.

Moreover, this study acknowledges the impact on businesses, particularly in industries like transportation, which rely heavily on fuel. While businesses may face increased tax burden due to fuel purchases, they have the ability to adjust their service prices to mitigate these costs. This study employs a 100% pass through model, representing the most rigorous scenario, when the entire tax burden is assumed to be passed on to ITFs. For future studies, we recommend analyzing the economic impact not only on individuals but also on businesses. If possible, we suggest examining the burden effects on both consumers and businesses, particularly assessing the consumer impact resulting from potential price increases or tax law changes.

Income Decile View:

Table 7.3: Tax Year 2020 Motor Vehicle Fuels Tax: 100% of tax is passed onto ITFs

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Motor Fuels Tax	Effective Rate
1	883,552	\$ 19,288,483,000	\$ 21,000	\$ 22,000	\$ 216,628,288	1.12%
2	316,630	19,288,457,000	60,000	61,000	77,628,528	0.40%
3	203,484	19,288,527,000	94,000	95,000	49,888,398	0.26%
4	143,461	19,288,513,000	133,000	134,000	35,172,492	0.18%
5	102,145	19,288,351,000	186,000	189,000	25,043,003	0.13%
6	67,721	19,288,456,000	277,000	285,000	16,603,233	0.09%
7	37,424	19,288,301,000	488,000	515,000	9,175,284	0.05%
8	15,302	19,288,596,000	1,115,000	1,261,000	3,751,608	0.02%
9	3,846	19,278,057,000	4,103,000	5,012,000	942,928	0.00%
10	478	19,299,308,000	23,784,000	40,375,000	117,192	0.00%
Total	1,774,043	\$192,885,049,000			\$434,950,954	0.23%

Population Decile View:

Table 7.4: Tax Year 2020 Motor Vehicle Fuels Tax: 100% of tax is passed onto ITFs

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Motor Fuels Tax	Effective Rate
1	177,405	\$ 734,134,000	\$ 4,000	\$ 4,000	\$ 43,495,316	5.93%
2	177,405	2,293,344,000	13,000	13,000	43,495,071	1.90%
3	177,405	3,818,278,000	21,000	22,000	43,495,071	1.14%
4	177,404	5,398,706,000	30,000	30,000	43,495,071	0.81%
5	177,404	7,205,489,000	40,000	41,000	43,495,071	0.60%
6	177,404	9,595,799,000	54,000	54,000	43,495,071	0.45%
7	177,404	12,927,781,000	73,000	73,000	43,495,071	0.34%
8	177,404	17,699,607,000	99,000	100,000	43,495,071	0.25%
9	177,404	25,987,700,000	144,000	146,000	43,495,071	0.17%
10	177,404	107,224,000,000	281,000	604,000	43,495,071	0.04%
Total	1,774,043	\$192,884,838,000			\$434,950,954	0.23%

- \$435 million in Motor Vehicle Fuels Tax was transferred to ITFs, resulting in an effective tax rate of 0.23%.
- In the Income Decile View, Decile 1 exhibits an effective rate of 1.12%, contrasting with Decile 10, which has a minimal rate of 0.0006%.
- In the Population Decile View, Decile 1 shows an effective rate of 5.93%, while Decile 10 reflects a rate of 0.04%.

3) Petroleum Products

The Petroleum Products Gross Earning Tax is applied to the gross earnings from the first sale by companies distributing petroleum products. These products encompass but are not limited to, gasoline, aviation fuels, kerosene, diesel fuel, number 2 heating oil, greases, lubricants, mineral oils, and motor oil. The tax calculation involves a \$3 per gallon cap on the first sale of gasoline and gasohol, with distributors required to calculate the tax based on this cap. Any consideration beyond the \$3 is exempt from the tax. Tax revenue is sourced from the total gross earnings of these companies.

In Tax Year 2020, the legal incidence analysis indicates that 639 Petroleum Products companies shouldered a tax burden of \$165.3 million in taxes on \$2 billion in total gross earnings.

This tax revenue is applied to all ITFs, considering that such expenses remain relatively uniform across households, regardless of income. This study employs a 100% pass through model, representing the most rigorous scenario, when the entire tax burden is assumed to be passed on to ITFs. Similar to the Motor Fuels Tax, this approach is very naïve. We acknowledge that price or tax changes may affect consumption, and therefore, the economic impact may not be equal across all taxpayers in the state. Businesses also purchase petroleum products; hence, we recommend analyzing the economic impact not only on individuals but also on businesses.

- \$165 million in Petroleum Products Tax was transferred to ITFs, resulting in an effective tax rate of 0.09%.
- In the Income Decile View, Decile 1 exhibits an effective rate of 0.43%, contrasting with Decile 10, which has a minimal rate of 0.0002%.
- In the Population Decile View, Decile 1 shows an effective rate of 2.25%, while Decile 10 reflects a rate of 0.02%.

Income Decile View:

Table 7.5: Tax Year 2020 Petroleum Products Tax: 100% of tax is passed onto ITFs

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Petroleum Products Tax	Effective Rate
1	883,552	\$ 19,288,483,000	\$ 21,000	\$ 22,000	\$ 82,346,049	0.43%
2	316,630	19,288,457,000	60,000	61,000	29,508,623	0.15%
3	203,484	19,288,527,000	94,000	95,000	18,963,878	0.10%
4	143,461	19,288,513,000	133,000	134,000	13,369,980	0.07%
5	102,145	19,288,351,000	186,000	189,000	9,519,497	0.05%
6	67,721	19,288,456,000	277,000	285,000	6,311,321	0.03%
7	37,424	19,288,301,000	488,000	515,000	3,487,764	0.02%
8	15,302	19,288,596,000	1,115,000	1,261,000	1,426,084	0.01%
9	3,846	19,278,057,000	4,103,000	5,012,000	358,431	0.00%
10	478	19,299,308,000	23,784,000	40,375,000	44,548	0.00%
Total	1,774,043	\$192,885,049,000			\$165,336,174	0.09%

Population Decile View:

Table 7.6: Tax Year 2020 Petroleum Products Tax: 100% of tax is passed onto ITFs

Decile	Population	Total CT AGI	Median CT AGI	Mean CT AGI	Petroleum Products Tax	Effective Rate
1	177,405	\$ 734,134,000	\$ 4,000	\$ 4,000	\$ 16,533,701	2.25%
2	177,405	2,293,344,000	13,000	13,000	16,533,608	0.72%
3	177,405	3,818,278,000	21,000	22,000	16,533,608	0.43%
4	177,404	5,398,706,000	30,000	30,000	16,533,608	0.31%
5	177,404	7,205,489,000	40,000	41,000	16,533,608	0.23%
6	177,404	9,595,799,000	54,000	54,000	16,533,608	0.17%
7	177,404	12,927,781,000	73,000	73,000	16,533,608	0.13%
8	177,404	17,699,607,000	99,000	100,000	16,533,608	0.09%
9	177,404	25,987,700,000	144,000	146,000	16,533,608	0.06%
10	177,404	107,224,000,000	281,000	604,000	16,533,608	0.02%
Total	1,774,043	\$192,884,838,000			\$165,336,174	0.09%

4) Estate & Gift Tax

The Estate Tax is levied on the transfer of property upon death, preceding the transfer of assets to heirs. Conversely, the Gift tax is imposed on the transfer of money or property during one’s lifetime as a gift. In Connecticut, if the aggregate amount of taxable estate or taxable gift exceeds \$12.92 million, the tax is 12% of the excess over the federal exclusion amount.

The legal incidence analysis for assets subject to tax reveals the distribution of the tax burden. In Tax Year 2020, owners of taxable estates and gifts paid \$253.2 million in taxes on a total of \$6.7 billion in estate and gift amounts.

Information on the tax burden of the Estate and Gift Tax is limited and does not allow for an effective analysis of the recipients of the estate or gift. In the case of the Estate Tax, one might assume that the tax burden falls on the person receiving the estate, as the deceased individual is no longer directly responsible for the tax payment. This challenge hampers a clear understanding of the ultimate financial impact of these taxes. Furthermore, the targeted nature of estate and gift taxes, wherein the tax liability is concentrated on specific individuals rather than distributed across the entire tax-paying population, adds to the complexity. At this time, DRS does not have a means to connect the recipients of the estate or the gift to their individual income. As a result, calculating a Suits Index becomes challenging, especially when considering the economic impact through the 100% or 50% pass through model. Hence, it is not demonstrated in this study. It is important to note that this tax operates progressively, with the affected individuals directly shouldering the tax burden.

Income Decile View:

Table 7.7: Tax Year 2020 Estate & Gift Tax

Decile	% of Count	Total Estate & Gift	Estate & Gift Tax	Effective Rate
1	25.68%	\$ 667,193,429	\$ 3,681,121	0.55%
2	20.21%	669,034,559	10,541,455	1.58%
3	16.63%	664,747,501	15,755,908	2.37%
4	13.68%	675,764,192	30,082,175	4.45%
5	11.58%	657,460,985	32,997,437	5.02%
6	7.16%	651,039,584	47,295,033	7.26%
7	3.37%	646,626,160	40,471,488	6.26%
8	1.47%	605,926,692	57,655,715	9.52%
10	0.21%	1,448,436,979	14,804,471	1.02%
Total	100.00%	\$6,686,230,081	\$253,284,804	3.79%

**Note: The omission of Decile 9 in this table is intentional and aimed at achieving deciles of equal value in estates and gift amounts. This decision was made due to the minimal total number of estates and gifts falling between the 9th and 10th deciles.

Population Decile View:

Table 7.8: Tax Year 2020 Estate & Gift Tax

Decile	% of Count	Total Estate & Gift	Estate & Gift Tax	Effective Rate
1	10.11%	\$ 246,389,827	\$ 144,427	0.06%
2	10.11%	264,843,527	1,671,149	0.63%
3	10.11%	295,828,048	4,419,852	1.49%
4	10.11%	335,244,804	5,665,070	1.69%
5	10.11%	365,417,101	5,203,386	1.42%
6	9.89%	400,806,976	9,094,179	2.27%
7	9.89%	464,501,462	18,672,348	4.02%
8	9.89%	520,299,828	25,634,963	4.93%
9	9.89%	605,906,887	33,684,625	5.56%
10	9.89%	3,186,991,621	149,094,805	4.68%
Total	100.00%	\$6,686,230,081	\$253,284,804	3.79%

- Estate and Gift Tax payments totaled \$235 million.
- Effective rate is based on the total value of the estate. As shown in the table above, as the value of the estate and gift increases, the effective rate also increases.
- Effective tax rates suggest that the tax burden on Estate and Gift taxpayers aligns proportionally with the total estate and gift amount, suggesting a progressive nature of this tax.

5) Real Estate Conveyance

The Real Estate Conveyance Tax is imposed on the transfer of real property, with the assessment based on the full purchase price and determined by the property’s classification as outlined in the Basis and Rate Table. The seller bears the responsibility of tax payment, a prerequisite for recording the deed. According to legal incidence analysis, \$259.4 million in taxes was collected on a total real estate conveyance amounting to \$29.2 billion in the tax year 2020.

Table 7.8 Real Estate Conveyance Basis and Tax Rates	
Classification	Rate
Unimproved Land	0.75%
Nonresidential property other than Unimproved Land	1.25%
Residential Dwelling	
Portion of \$800,00 or less	0.75%
Portion between \$800,000 and \$2.5 million	1.25%
Portion that exceeds \$2.5 million	2.25%
Residential Property other than Resident Dwelling	0.75%
Delinquent Mortgage	0.75%

Similar to Estate and Gift tax, the Real Estate Conveyance tax only applies to certain individuals and businesses rather than being distributed across the entire tax-paying population. Consequently, a Suits Index was not calculated, and the economic impact through the 100% or 50% Pass-Through models is not demonstrated. However, since the payment of tax is the responsibility of the seller of the property, we say this tax operates progressively.

Income Decile View:

Table 7.9: Tax Year 2020 Real Estate Conveyance Tax

Decile	% of Count	Total Conveyance Amount	Conveyance Tax	Effective Rate
1	33.36%	\$ 2,919,982,421	\$ 22,131,904	0.76%
2	18.18%	2,919,811,078	22,049,292	0.76%
3	14.16%	2,920,199,842	22,103,719	0.76%
4	11.20%	2,920,034,700	22,148,404	0.76%
5	8.63%	2,919,982,283	22,277,896	0.76%
6	6.26%	2,919,845,483	22,559,260	0.77%
7	4.08%	2,919,093,265	25,979,853	0.89%
8	2.46%	2,919,867,020	29,857,370	1.02%
9	1.30%	2,917,804,631	35,375,831	1.21%
10	0.37%	2,923,662,627	34,901,726	1.19%
Total	100.00%	\$29,200,283,350	\$259,385,255	0.89%

Population Decile View:

Table 7.10: Tax Year 2020 Real Estate Conveyance Tax

Decile	% of Count	Total Conveyance Amount	Conveyance Tax	Effective Rate
1	10%	393,871,733	3,017,679	0.77%
2	10%	892,714,170	6,765,709	0.76%
3	10%	1,179,988,108	8,912,310	0.76%
4	10%	1,429,203,830	10,804,726	0.76%
5	10%	1,664,018,783	12,572,544	0.76%
6	10%	1,938,545,871	14,646,774	0.76%
7	10%	2,301,067,642	17,438,570	0.76%
8	10%	2,830,111,764	21,494,691	0.76%
9	10%	3,937,586,777	30,188,714	0.77%
10	10%	12,633,174,670	133,543,538	1.06%
Total	100%	\$29,200,283,350	\$259,385,255	0.89%

- Real estate conveyance tax payments totaled \$259 million, contributed by 65,929 payers, primarily the sellers involved in real estate conveyance transactions
- Effective tax rates suggest that the tax burden on real estate conveyance payers aligns proportionally with the total conveyance amount, suggesting a progressive nature of this tax.

6) Insurance Premiums Tax

Insurance companies, both domestic and foreign, operating in Connecticut are subject to taxation based on the total net direct premiums received from policies covering property or risk within the state. This includes taxation on total net direct subscriber charges for health care center contracts or policies, whether new or renewed. The state also imposes taxes on premium related to unauthorized insurances, with insured individuals obtaining nonadmitted insurance required to remit taxes on premiums paid to nonadmitted insurers. Furthermore, risk retention groups must pay taxes on premiums collected by coverages within the state. Notably, Connecticut now permits the operation of captive insurance companies, entities wholly owned by non-insurance companies, established to provide self-insurance for risks for their owners.

The legal incidence analysis sheds light on the distribution of the tax burden among these insurance companies. In the Tax Year 2020, approximately 1,100 insurance companies contributed \$218 million in taxes on premiums, derived from premiums totaling \$13.2 billion.

Calculating the economic incidence and suits index of these insurance taxes in Connecticut proves to be a complex task. Merely assuming that the tax burden is shifted onto consumers is overly simplistic. Given that not everyone opts to purchase insurance policies, and those who do are typically individuals with the financial means to afford them, treating the tax as uniformly transferred to consumers overlooks the personalized nature of insurance decisions. Since obtaining insurance is a personal choice, it may not be equitable or logical to distribute the tax burden across all taxpayers in Connecticut.

Due to time constraints, we were limited in our economic analysis. However, for future studies, we recommend evaluating how different types of insurance companies respond to tax changes, how the price of premiums affects the purchase of insurances policies, etc.

Comprehensive Economic Incidence

The preceding sections of this report have delved into the legal and economic incidence of Connecticut ITFs, categorized by tax types such as Personal Income Tax, Corporation Business Tax, Property Tax, Sales and Use Tax, Excise Tax, and other taxes generating over \$100 million. This section consolidates the outcomes of each tax type to compute the total economic incidence of the State's ITFs. The Suits Index value for overall ITF economic incidence is determined by aggregating the total tax amounts across all analyzed tax types by decile and assessing relative progressivity against CT AGI.

The *Population and Income Deciles* section clarifies that Decile 1 might exhibit a higher tax burden, attributed to ITFs reporting a negative CT AGI, as these taxpayers are included in Decile 1, along with low-income filers in both the Income Decile View and Population Decile View.

Additionally, the total ITF economic incidence calculation excludes the Estate and Gift Tax and Real Estate Conveyance Tax, given its nature of not being distributed to the entire ITF population.

It's important to note that this study employs tax liability for calculation, and actual tax revenue collected by the State may be different than this. For precise figures, consult the DRS annual reports and relevant OPM reports. Discrepancies between these reports may arise from data considerations detailed in our methodology sections.

Key takeaways for ITF economic incidence are:

- Total economic incidence for Connecticut ITFs is regressive.
- Excluding Property Tax in the summation of taxes paints a more progressive picture of total economic incidence.
- Considering that Decile 1 includes ITFs with negative CT AGI, lower-income deciles bear a more substantial burden than higher-income deciles, while higher-income deciles contribute a larger tax amount per ITF than their lower-income counterparts.

100% Pass-Through Tax Model

As mentioned earlier in this report, it assumes that 100% of each tax type is passed on to ITFs in the State. Recognizing this as the higher end of what ITFs likely experience, the report presents a supplementary perspective, considering the lower end with a 50% pass-through tax model.

In summary, for Tax Year 2020, Connecticut state and local governments collected \$28.9 billion in taxes, assumed to be transferred onto ITFs, as shown in Table 9.1. This amount slightly differs from the \$30.9 billion reported in the *Overall Tax Review* section, as this section excludes the Pass-Through Entity Tax, Insurance Premiums Tax, Estate and Gift Tax and Real Estate Conveyance Tax in the calculation for the total ITF economic incidence.

Table 9.1: Tax Year 2020 Total Economic Incidence Summary 100% Pass-Through Model		
Tax Type	Total Tax (In Millions)	Contribution to Total Tax
Personal Income Tax	10,195	35.28%
Corporation Business Tax	852	2.95%
Property Tax	11,820	40.90%
Sales, Use and Occupancy Tax	4,745	16.42%
Excise Tax	431	1.49%
Other Taxes Greater than \$100 million	854	2.95%
Comprehensive Economic Incidence	28,897	100%

*Excluding Pass-Through Entity Tax Insurance Premiums, Real Estate Conveyance and Estate and Gift Taxes

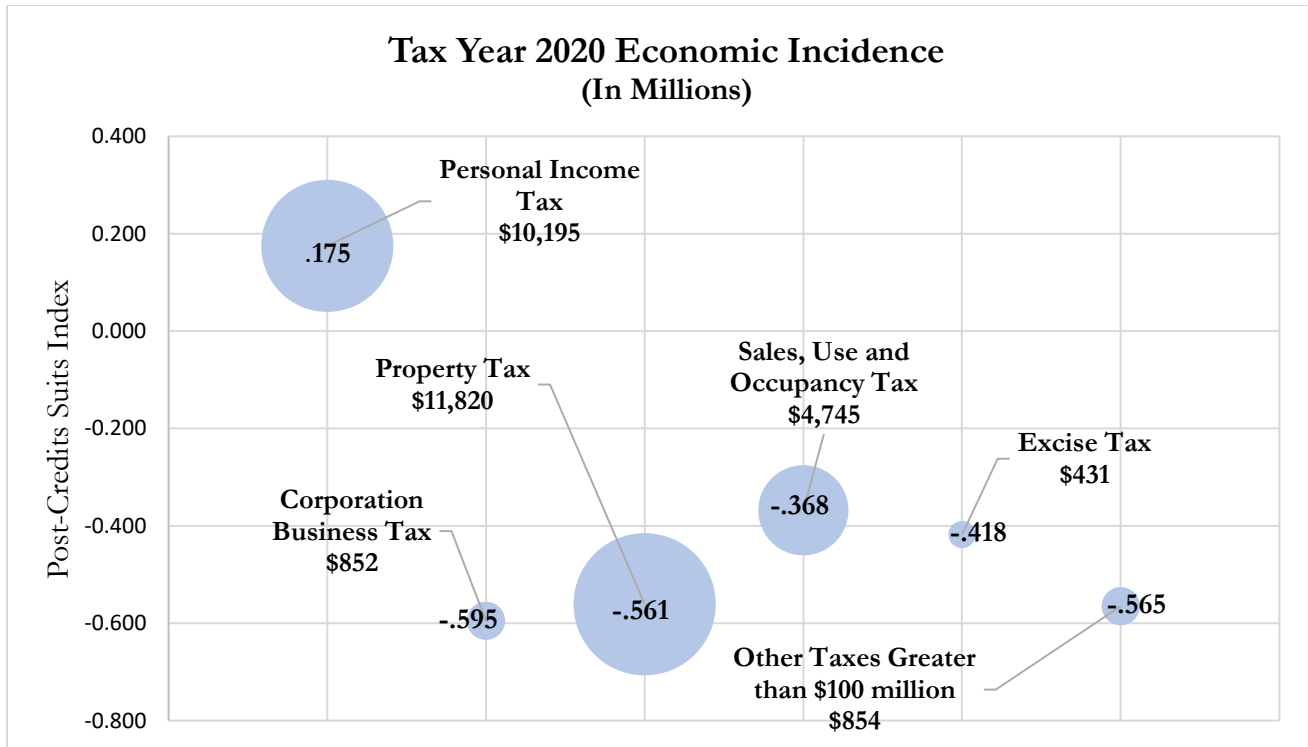
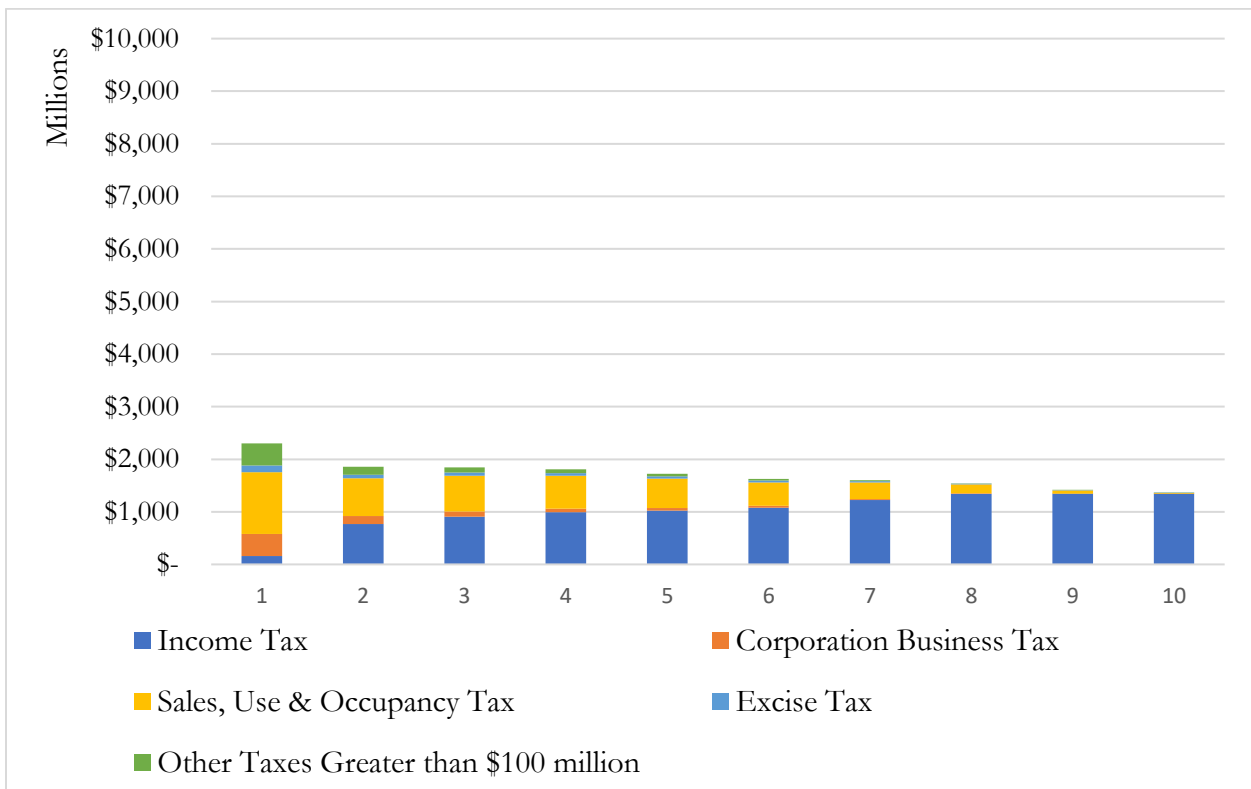
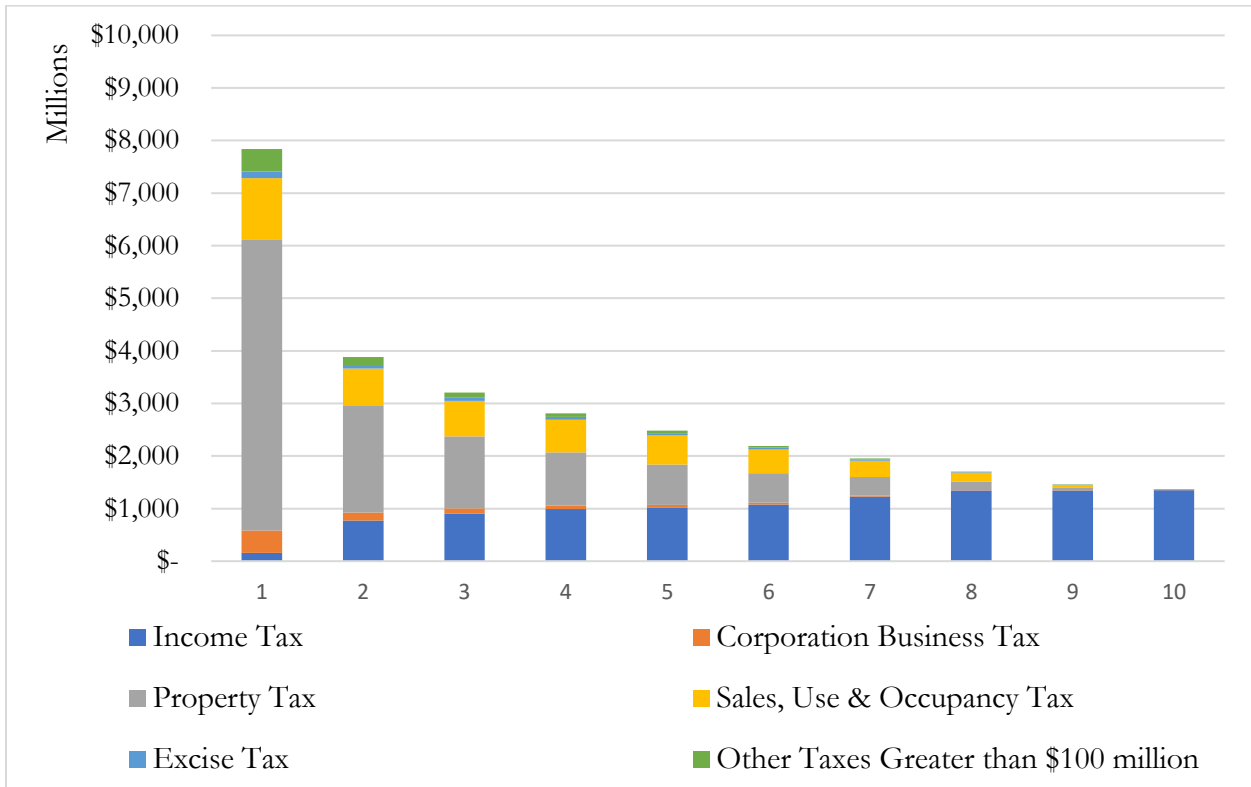


Figure 9.2: Comparison of Tax Year 2020 Suits Index by Tax Type using the Income Decile View

Figure 9.2 illustrates the regressive nature of all state taxes, except Income Tax, for the 2020 tax year.

- Property Tax and Personal Income Tax emerge as the leading tax burdens on ITFs.
- While the Property Tax holds the largest share by amount, it is notably regressive, as supported by Figure 9.3.
- The Income Tax, a substantial burden, benefits from state provisions such as graduated tax rates, exemptions, credits like the EITC and Property Tax Credit, alleviating the tax load for lower-income deciles.
- The Sales and Use Tax is comparatively less regressive due , in part, to base exemptions and the State’s implementation of diverse tax rates aimed at enhancing progressiveness, including the introduction of rates like the luxury tax rate.
- The Corporation Business tax and Other Taxes exceeding \$100 million exert a significant burden on the State’s ITFs. It’s important to highlight that the analysis assumes an even distribution of taxes across all deciles, considering uniform expenses like gas and cable for taxpayers, regardless of income. It also assumes that 100% of these costs are shifted onto individuals, whereas businesses also purchase these goods and services.

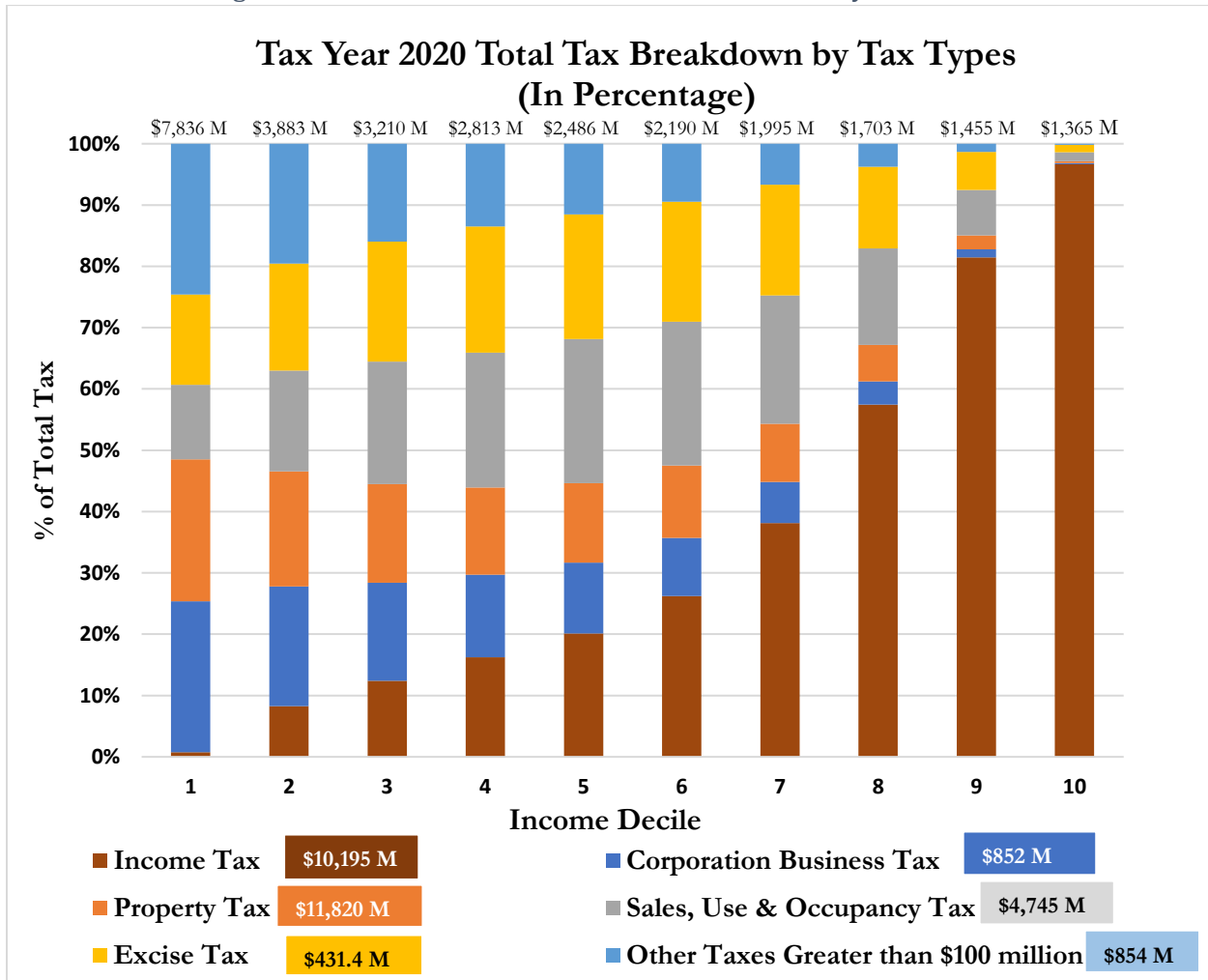
Figure 9.3: Comparison of Tax Year 2020 Total Taxes by Income Deciles, with Property Tax excluded in the bottom graph



Nevertheless, excluding the Property Tax amplifies the visual regressivity across the 10 deciles. This is more apparent in Figure 9.3, where a relative parity is observed upon excluding Property Tax from in the charts. The inclusion of Property Tax significantly places a heavier burden on Decile 1 compared to all other deciles.

Collectively, regressive tax types indicate that the burden is predominately borne by lower-income deciles.

Figure 9.4: Breakdown of Tax Year 2020 Total Taxes by Income Deciles



Examining the tax breakdown depicted in Figure 9.4 reveals a distinct pattern of progressivity and regressivity among the 10 income deciles. The brown-coated rectangles, symbolizing slightly progressive and proportional Income Tax, clearly indicate a lesser burden on lower-income deciles (Deciles 1, 2, and 3) and a more substantial burden on higher-income deciles (8, 9, or 10). Notably, the grey-coated Sales, Use, and Occupancy Tax stands out as the least regressive among all other regressive tax types.

Income Decile View:

Table 9.5a: Tax Year 2020 Total Economic Incidence, assuming 100% of tax is transferred to ITFs

Decile	Population	Total CT AGI	Total Tax	% of Total Tax	Effective Rate
1	\$ 883,552	\$ 19,288,483,000	\$ 7,704,408,015	26.7%	39.9%
2	316,630	19,288,457,000	3,809,999,450	13.2%	19.8%
3	203,484	19,288,527,000	3,183,016,735	11.0%	16.5%
4	143,461	19,288,513,000	2,833,891,068	9.8%	14.7%
5	102,145	19,288,351,000	2,508,739,274	8.7%	13.0%
6	67,721	19,288,456,000	2,227,623,747	7.7%	11.5%
7	37,424	19,288,301,000	1,993,748,201	6.9%	10.3%
8	15,302	19,288,596,000	1,731,494,036	6.0%	9.0%
9	3,846	19,278,057,000	1,489,669,262	5.2%	7.7%
10	478	19,299,308,000	1,414,035,174	4.9%	7.3%
Total	1,774,043	\$192,885,049,000	\$28,896,624,962	100.0%	15.0%

Table 9.5b: Income Decile View - Breakdown of Total Tax Distribution by Deciles

Decile	Income Tax	Corporation Business Tax	Property Tax	Sales, Use & Occupancy Tax	Excise Tax	Other Taxes Greater than \$100 million
1	\$ 157,072,447	\$ 293,012,283	\$ 5,531,170,598	\$ 1,169,693,869	\$ 128,247,719	\$ 425,211,099
2	771,004,226	78,741,564	2,026,431,029	712,770,390	68,678,274	152,373,968
3	906,904,440	70,973,695	1,365,882,488	680,890,968	60,441,181	97,923,963
4	990,706,601	89,506,122	1,006,599,945	624,947,236	53,092,469	69,038,694
5	1,023,843,175	72,185,709	763,445,350	556,418,840	43,690,280	49,155,920
6	1,079,550,172	69,953,720	562,257,884	449,243,195	34,028,948	32,589,829
7	1,226,953,687	56,294,005	354,444,347	313,474,934	24,571,427	18,009,801
8	1,342,862,131	35,385,878	161,928,715	170,780,212	13,173,216	7,363,884
9	1,347,306,163	36,274,202	42,704,784	57,192,011	4,341,265	1,850,836
10	1,348,975,983	49,536,350	5,114,467	9,470,888	707,454	230,031
Total	\$10,195,179,025	\$ 851,863,528	\$11,819,979,607	\$ 4,744,882,542	\$ 430,972,235	\$ 853,748,025

- Decile 1, which represents approximately 50% of the population, contributes 29% of the total taxes to Connecticut, as outlined in Tables 9.5a and 9.5b, which provides a breakdown of the total tax distribution by deciles.
- Decile 1 exhibits an effective rate of 40%, whereas Decile 10 shows an effective rate of 7.3%.
- In an interesting observation, Decile 9 bears a slightly greater burden than Decile 10, with effective rates of 7.3% and 7.7%, respectively.

Population Decile View:

Table 9.6a: Tax Year 2020 Total Economic Incidence, assuming 100% of tax is transferred to ITFs

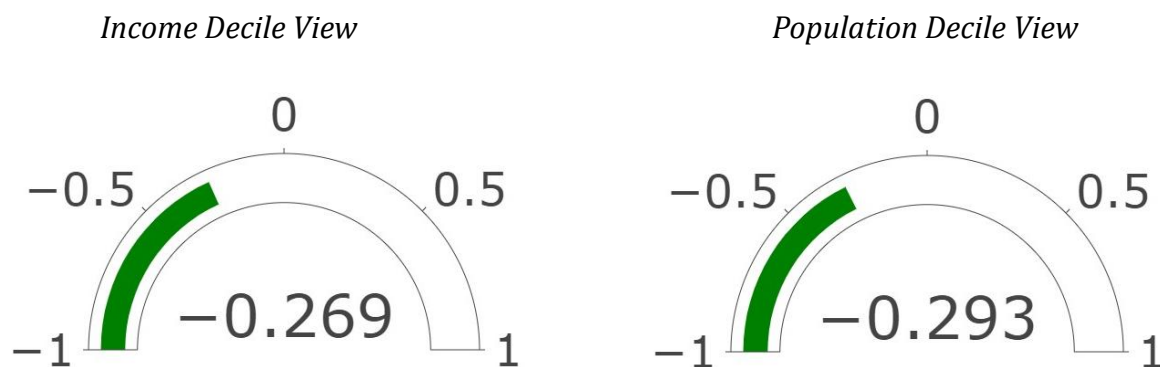
Decile	Population	Total CT AGI	Total Tax	% of Total Tax
1	177,405	\$ 734,134,000	\$ 1,603,439,119	5.5%
2	177,405	2,293,344,000	1,476,145,167	5.1%
3	177,405	3,818,278,000	1,491,714,049	5.2%
4	177,404	5,398,706,000	1,631,921,799	5.6%
5	177,404	7,205,489,000	1,846,362,858	6.4%
6	177,404	9,595,799,000	2,097,159,340	7.3%
7	177,404	12,927,781,000	2,433,184,979	8.4%
8	177,404	17,699,607,000	2,882,197,540	10.0%
9	177,404	25,987,700,000	3,611,577,139	12.5%
10	177,404	107,224,000,000	9,822,922,974	34.0%
Total	1,774,043	\$ 192,884,838,000	\$ 28,896,624,965	100.0%

Table 9.6b: Population Decile View - Breakdown of Total Tax Distribution by Deciles

Decile	Income Tax	Corporation Business Tax	Property Tax	Sales, Use & Occupancy Tax	Excise Tax	Other Taxes Greater than \$100 million
1	\$ (13,007,624)	\$ 85,186,785	\$ 1,179,751,087	\$ 238,566,418	\$ 27,567,218	\$ 85,375,236
2	(26,411,779)	85,186,305	1,108,267,552	200,253,896	23,474,438	85,374,754
3	(21,661,550)	85,186,305	1,086,326,332	232,230,790	24,257,418	85,374,754
4	44,011,250	85,186,305	1,083,077,438	303,703,968	30,568,083	85,374,754
5	179,153,149	85,186,305	1,095,422,228	365,413,483	35,812,940	85,374,754
6	345,162,486	85,186,305	1,121,892,854	419,497,249	40,045,692	85,374,754
7	575,632,434	85,186,305	1,157,614,943	485,655,953	43,720,590	85,374,754
8	842,344,758	85,186,305	1,198,396,168	616,087,771	54,807,784	85,374,754
9	1,348,589,751	85,186,305	1,261,403,932	767,177,597	63,844,799	85,374,754
10	6,921,366,152	85,186,305	1,527,827,072	1,116,295,416	86,873,274	85,374,754
Total	\$ 10,195,179,025	\$ 851,863,530	\$ 11,819,979,607	\$ 4,744,882,542	\$ 430,972,235	\$ 853,748,025

- In this view, Decile 2 contributes the lowest percentage (5.1%) while Decile 10 contributes the highest percentage (34%).
- Examining the detailed breakdown in Table 9.6b reveals negative Personal Income Tax for the initial three deciles, attributed to credits like EITC and Property Tax credits benefiting these individuals.

Suits Index:



50% Tax Pass-through Model

This section presents the outcomes of a 50% pass-through tax model, reflecting a partial shift of the tax burden onto ITFs. Unlike the 100% pass-through tax model, this approach divides certain taxes analyzed in half. While 50% of the business-borne taxes are passed on to Connecticut ITFs, taxes like individual Income Tax or Sales & Use tax, remain at 100%. Noteworthy findings include:

- ITFs shouldered a total economic tax incidence of \$25.9 billion for tax year 2020, a 10% decrease from the 100% pass-through tax model.
- Lower income deciles bear a greater burden than higher income deciles, while higher income deciles contribute more taxes per ITF, mirroring trends in the 100% pass-through tax model.
- The variation in tax burden between deciles is smaller in the 50% pass-through tax model, suggesting a less pronounced difference in burden between lower and higher-income ITFs.

**Table 9.7: Tax Year 2020 Total Economic Incidence Summary
50% Pass-Through Model**

Tax Type	Total Tax (In Millions)	Contribution to Total Tax
Personal Income Tax	10,195	39.34%
Corporation Business Tax	426	1.64%
Property Tax	9,906	38.23%
Sales, Use and Occupancy Tax	4,745	18.31%
Excise Tax	215	0.83%
Other Taxes Greater than \$100 million	427	1.65%
Comprehensive Economic Incidence	25,915	100%

* Excluding Pass-Through Entity Tax Insurance Premiums, Real Estate Conveyance and Estate and Gift Taxes

Income Decile View:

Table 9.8: Tax Year 2020 Total Economic Incidence, assuming 50% of tax is transferred to ITFs

Decile	Population	Total CT AGI	Total Tax	% of Total Tax	Effective Rate
1	883,552	\$ 19,288,483,000	\$ 6,334,639,207	24.4%	32.8%
2	316,630	19,288,457,000	3,318,707,269	12.8%	17.2%
3	203,484	19,288,527,000	2,847,369,136	11.0%	14.8%
4	143,461	19,288,513,000	2,571,422,170	9.9%	13.3%
5	102,145	19,288,351,000	2,314,206,531	8.9%	12.0%
6	67,721	19,288,456,000	2,085,070,704	8.0%	10.8%
7	37,424	19,288,301,000	1,903,453,068	7.3%	9.9%
8	15,302	19,288,596,000	1,687,028,512	6.5%	8.7%
9	3,846	19,278,057,000	1,464,379,800	5.7%	7.6%
10	478	19,299,308,000	1,388,309,829	5.4%	7.2%
Total	1,774,043	\$ 192,885,049,000	\$25,914,586,226	100.0%	13.4%

- Among the 10 deciles, Decile 1 has an effective rate of 33%, while Decile 10 has an effective rate of 7.2%.
- Interestingly, Decile 10 carries a notably higher burden than Decile 9 within this decile-based view, demonstrated by an effective rate of 7.2% and 7.6% respectively.

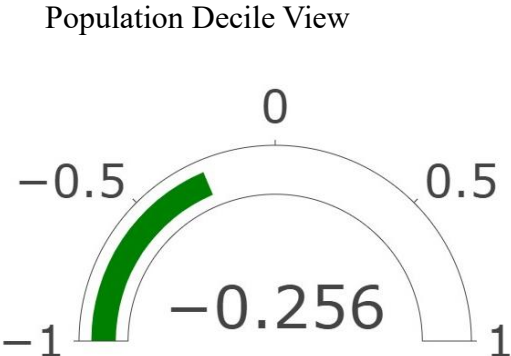
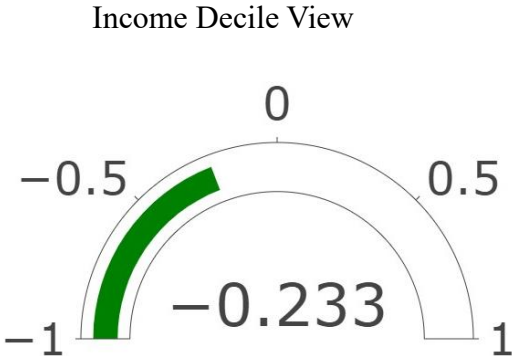
Population Decile View:

Table 9.9: Tax Year 2020 Total Economic Incidence, assuming 50% of tax is transferred to ITFs

Decile	Population	Total CT AGI	Total Tax	% of Total Tax	Effective Rate
1	177,405	\$ 734,134,000	\$ 4,153,627,590	16.0%	565.8%
2	177,405	2,293,344,000	1,804,439,743	7.0%	78.7%
3	177,405	3,818,278,000	1,421,470,261	5.5%	37.2%
4	177,404	5,398,706,000	1,331,192,941	5.1%	24.7%
5	177,404	7,205,489,000	1,377,392,951	5.3%	19.1%
6	177,404	9,595,799,000	1,474,649,272	5.7%	15.4%
7	177,404	12,927,781,000	1,633,004,876	6.3%	12.6%
8	177,404	17,699,607,000	1,892,851,462	7.3%	10.7%
9	177,404	25,987,700,000	2,461,499,567	9.5%	9.5%
10	177,404	107,224,000,000	8,364,457,564	32.3%	7.8%
Total	1,774,043	\$ 192,884,838,000	\$ 25,914,586,227	100.0%	13.4%

Suits Index:

Both views suggest that the comprehensive economic incidence of Connecticut ITFs is regressive.



Detailed Methodology

This report employs an economic, long-term approach to examine tax incidence among Individual Tax Filers (ITFs) in the state during the 2020 tax year. Several foundational economic concepts underpin our study, which we enumerate below:

- Taxes do not operate in isolation, and tax structures evolve.
- Businesses, given time, can shift their tax burden to consumers or through labor.
- Capital naturally flows to where it yields the highest return.

Our conclusions rely on conservative estimates of tax incidence, indicating that 100% of legal incidence borne by businesses in the State is shifted to consumers or ITFs. This is shown by the 100% Pass-Through Model. This stance is primarily adopted due to the long-standing nature of the examined taxes, assimilated into business models used in this report. In an alternative scenario, 50% of the incidence for business taxes is shifted onto consumers in applicable cases, reflected in the 50% Pass-Through Model.

This study includes both pre-credit and post-credit analyses across all tax types. The impact of credits and deductions on the tax incidence of individual taxpayers is measured, incorporating factors such as the Earned Income Tax Credit in the Personal Income Tax analysis presented in this report.

It's crucial to acknowledge instances where data isn't directly available to link ITFs with tax collection realities, except for Personal Income Tax. For example, although businesses collect and remit Sales and Use Tax, consumers are universally charged this tax at the point of sale. The comprehensive tracking of the amount each ITF pays in Sales and Use Tax across all industry sectors is challenging.

To address this, this study utilized CE (Consumer Expenditure Surveys) data to approximate the Sales and Use Tax paid by consumers by decile. This survey data formed a comprehensive view of tax incidence. Detailed information about these third-party data sources is provided in the 'Data Sources' section at the end of this report.

The following paragraphs outline limitations that demanded careful consideration and calculations for each tax type. For clarity and transparency, the specifics of each data consideration are detailed below.

Personal Income Tax Considerations

Personal Income Tax (PIT) is defined as the levy imposed on income earned by full-year residents and part-year residents of Connecticut via the rates defined in Figure 2.1 in the Personal Income Tax section. Because this report examines strictly Connecticut tax incidence, non-resident tax filers are excluded. While non-residents are not included in the analysis in this report, their contribution to tax distribution is shown in Table 2.5.

As shown in Table 2.5, the total population of ITFs (full-year residents and part-year residents of Connecticut) is 1,805,175 for Tax Year 2020. Further, this study excluded 31,132 (1.7%) ITFs who reported all four of the following criteria to avoid their impact on the overall tax incidence of Connecticut ITFs.

ITFs who reported all of the following were excluded:

- Zero amount of Connecticut Adjusted Gross Income,
- Zero amount of Connecticut PIT,
- Zero amount of Earned Income Tax Credit,
- And zero amount of Property Tax Credit

As noticeable across figures throughout this report, the final count of ITFs analyzed in this study for the Year 2020 is 1,774,071.

Regarding the Suits indices calculated to estimate the impact of the EITC and Property Tax Credit, the year-over-year change is based on the difference between pre- and post-credit SI to account for all factors that may have contributed to pre- and post-credit SIs.

Corporation Business Tax Considerations

Corporation Business Tax is paid by corporations that file CT-1120 and CT-1120CU. To report on the tax incidence of Corporation Business Tax for corporations, this report looks at a few methodological considerations. Consistent with the rest of the report, the Corporation Business Tax section provides both post-credits and Pre-credits analysis.

When reviewed by the North American Industry Classification System (NAICS) sectors, the classification “Unassigned” refers to corporations that did not self-report their NAICS code.

“Unassigned” is different from “Unclassified” in that “Unclassified” corporations fall under the NAICS industry code 999999 because they are usually too new to have an NAICS industry assigned to them. NAICS codes are self-selected at the time of business registration. Due to the large number of “unassigned” corporations identified in this study, DRS has actively taken steps to require NAICS code at registration.

For this study, corporations that did not self-report their NAICS code (“Unassigned”) are lumped together into “Unclassified” to show the overall count and impact of those corporations that are not classified into a specific industry.

To meet the requirements of this reporting, the report utilizes the Total Income, derived from Line 11 of the Federal tax return 1120.

There is no data to identify a direct association between Connecticut ITFs and the Corporation Business Tax that is paid by corporations that do business in Connecticut. For this study, the Corporation Business Tax is evenly distributed to the entire population of ITF in Connecticut.

Property Tax Considerations

For this report, Property Tax is defined as the Real Property Tax, Personal Property Tax, and Motor Vehicle Tax including Supplemental Motor Vehicle Tax. Property Tax is not collected by the Department of Revenue Services (DRS). Rather, it is collected from municipalities and local councils of government (COGs) and then aggregated at a State level by the Office of Policy and Management (OPM). Because of this, some data limitations have an impact on the ability to view tax incidence on ITFs and businesses. The following are data limitations concerning Property Tax of which readers should be aware:

- The localized administration of Property Tax assessment and data collection leads to an unstandardized set of definitions of real property use across the 169 municipalities in Connecticut. To address this issue, data cleaning and categorization for proper attribution are required. For example, mixed-use and commercial apartments may have tenants or domiciles in them. Some municipalities may treat them as residential property, and others may not.
- The classification and documentation associated with tax-exempt properties are left to the local levels to administer. This leads to some data gaps in the computation of Real Property Tax for Residential properties and Non-residential properties separately net of respective tax exemption amounts.
- The granularity of available data limits the ability to obtain and analyze a clearer picture of Property Tax incidence for ITFs and businesses. To rectify these limitations, this report outlines a recommendation in the Recommendations Section.

Property Tax is paid by both ITFs and businesses. It is important to separate the property use classifications between residential use and non-residential use to determine how much of Property Tax (combined total of property tax types aforementioned) is paid by ITFs and how much is paid by businesses. In the economic long-run, businesses pass their Property Tax costs onto consumers in the form of higher prices or through labor. With this assumption, this study computes ITF's legal and economic incidence of Property Tax in the following manner.

- Real Property Tax: the property use classifications are used to separate the residential portion of Total Real Property Tax that is borne by ITFs who own their residential properties. This portion of Real Property Tax is considered a legal incidence of ITFs. The non-residential portion of Total Real Property Tax, on the other hand, is paid by businesses and cannot be directly associated with specific ITFs. Therefore, the non-residential portion of Real Property Tax is evenly distributed to the entire population of Connecticut ITFs.
- Personal Property Tax: by nature, the Personal Property Tax is borne largely by businesses. Therefore, this tax cannot be directly associated with specific ITFs, and it is also evenly distributed to the entire population of Connecticut ITFs.
- Motor Vehicle Tax: this study did not find a data source to separate the businesses' portion of Motor Vehicle Tax, therefore all of Motor Vehicle Tax is assumed to be paid by ITFs.

Sales and Use Tax Considerations

In examining Sales and Use Tax incidence, this report assumes that ITFs bear the burden of these taxes when purchasing taxable goods and services. However, direct data associating ITFs with the realities of Sales and Use Tax collection is unavailable. Instead, the Consumer Expenditure Surveys (CE) data, collected by the Census Bureau for the Bureau of Labor Statistics through two surveys – the interview survey and the diary survey – proves valuable.¹⁰

The quarterly interview survey poses questions to household respondents about the costs of significant purchases, such as cars or appliances, and regular expenditures like rent, mortgage, insurance, and utilities. Simultaneously, the diary survey requests household respondents to maintain two one-week diaries, capturing small everyday purchases like food, meals, personal care products, and gasoline.¹¹

Utilizing this data, the report estimates the average spending on taxable goods and services by Connecticut's ITFs by averaging the spending of CE respondents within the same decile, categorized by income level. Both the interview survey and diary survey provide a 12-month household income for respondents, allowing classification into the same deciles used for ITFs by matching their 12-month household income with CT AGI. The ratios between spending amounts across deciles are employed to apportion the total Sales and Use Tax collected in Connecticut for Tax Year 2020.

It's crucial to note that the survey data has a limited number of respondents, averaging about a few hundred per year. To refine estimates, a 10-year average is calculated, breaking down spending into deciles. The mean or median spending for each decile is then used to determine the average tax that each decile would pay.

Excise Tax Considerations

Initially, excise taxes place a burden on businesses, but their impact ultimately trickles down to consumers. Like the Sales and Use Tax, there exists a challenge in directly associating ITFs with excise tax collection due to a lack of available data. However, an alternative approach involves utilizing CE data to estimate the excise taxes paid by ITFs, employing a decile-based allocation.

In this method, the average spending on goods and services by Connecticut ITFs, subject to excise taxes, is approximated. This is achieved by categorizing CE respondents into deciles based on their 12-month household by the CT AGI. The average spending of a CE respondent within each decile is then considered as the spending pattern of CT ITFs in the corresponding income group.

For instance, the CE data provides insights into various expenditures, such as average spending on gas per week or month. This structured approach allows for a nuanced understanding of the

¹⁰ [Consumer Expenditure Surveys Public Use Microdata Getting Started Guide : U.S. Bureau of Labor Statistics \(bls.gov\)](https://www.bls.gov/publications/microdata/getting-started-guide)

¹¹ [Consumer Expenditure Survey \(CE\) \(census.gov\)](https://www.census.gov/consumers/expenditure-surveys/)

economic dynamics associated with excise tax within the context of ITFs in Connecticut. It's crucial to note that the survey data has a limited number of respondents, averaging about a few hundred per year. To refine estimates, a 10-year average is calculated, breaking down spending into deciles. The mean or median spending for each decile is then used to determine the average tax that each decile would pay.

Taxes Greater than \$100 Million Considerations

Insurance Premium Tax is initially borne by insurance companies, but ultimately the tax burden falls on policyholders (i.e., ITFs). Similar to Sales and Use Tax, data is not available to directly associate ITFs with the realities of Insurance Premium Tax collection. Alternatively, the CE data was useful to allocate an approximation of Insurance Premium Tax paid by ITFs by decile. The average spending on insurance premiums by Connecticut ITFs that are subject to Insurance Premium Tax can be estimated by averaging the spending of CE respondents who would fall under the same decile as the Connecticut ITFs by income level. The method to apportion the total Insurance Premium Tax is the same as one used for Sales and Use Tax and Excise Tax.

The economic incidence is not applicable for Estate and Gift Tax as well as Real Estate Conveyance Tax due to limitations of data. These taxes accrue by actions of entities and individuals through the transactions, and thus should not be passed onto Connecticut ITFs. For Public Service, Motor Vehicle Fuels, and Petroleum Products, there is no data to identify a direct association between Connecticut ITFs and taxes that are paid by corporations that do business subject to the taxes in Connecticut. For this study, these taxes are evenly distributed to the entire population of ITFs in Connecticut.

Recommendations

1. Acknowledging the presence of individual tax filers with negative or zero AGI, attributed to business or capital losses for income tax purposes, it's crucial to recognize the impact on our study results. The inclusion of these filers as zero AGI in Decile 1 can potentially skew the analysis, leading to unreasonably higher tax burden results for Decile 1 compared to other deciles. To address this challenge, we recommend that we take it upon ourselves to tackle these data issues in future tax incidence studies to enhance the accuracy and reliability of our tax burden.
2. We advocate for a robust methodology in specific tax areas. For instance, collaborating with the Connecticut Department of Motor Vehicles to determine the ratio between motor vehicles owned by individuals versus businesses would enhance the accuracy of Motor Vehicle Property Tax incidence on ITFs. Furthermore, the exclusion of the Estate and Gift Tax from this report, despite generating over \$100 million in revenue, underscores certain challenges. Given the complexity of these taxes – where Estate Tax pertains to deceased individuals and Gift Tax to the living – analyzing the trade-offs between them presents unique challenges that warrant for careful consideration in future incidence studies.
3. To enhance the accuracy of the economic incidence analysis for certain tax types in this study, it is advised to develop a more calibrated method for total tax distribution amongst the ITFs. While a calibrated approach was applied to certain taxes, utilizing external sources like CE data for Sales & Use Tax and OPM data for Property Tax, others, such as Corporation Business Tax were uniformly distributed to the entire population of Connecticut ITFs. Considering the varied nature of businesses like retail companies or gas companies, we recognized that the economic incidence extends beyond individuals in the town where the business is located, encompassing individuals throughout the entire state. Hence, we opted to evenly distribute the incidence across the population to capture this broader impact. This uniform distribution method may result in the same Suits Index numbers across tax types and years, hindering meaningful comparisons. It may also overlook underlying differences between income deciles. Therefore, for tax types such as Corporation Business Tax, Pass-Through Entity Tax, and other taxes generating over \$100 million (excluding Insurance Premium Tax), we recommend adopting a more calibrated method.
4. The even distribution method may lead to producing the same Suits Index number regardless of the tax type or tax year studied, resulting in the Suits Index value that does not provide meaningful comparison horizontally or vertically (i.e., comparison across tax types within a given year, or of the tax type in a year-over-year trend). It is recommended to develop a more calibrated method for those tax types to distribute the total tax amount to deciles. In this study, the tax types that were evenly distributed to the entire population of Connecticut ITFs due to lack of a more calibrated method are Corporation Business Tax, Other Taxes that generated greater than \$100 Million (except Insurance Premium Tax), and Pass-through Entity Tax.

5. Exploring a significant portion of the State's taxes borne by part-time residents and non-residents is crucial for determining the legal and economic incidence of all residents. Conducting a study into this aspect, in collaboration with external sources and neighboring states, would provide valuable insights into the taxes shouldered by businesses and the extent to which their legal incidence is exported. For instance, examining the Occupancy Tax levied on businesses collected from visitors outside the state can shed light on the economic dynamics involved. This comprehensive analysis aids in understanding the broader impact and distribution of tax burdens across various groups.
6. Conducting a supplementary review of tax incidence based on various socio-economic indicators could provide the State with a more comprehensive understanding of how taxes impact all Connecticut residents, including part-time residents. Instead of focusing solely on deciles and filing status, exploring factors like town or zip code, occupation, and socioeconomic variables such as race, age, and gender can offer valuable insights. It's crucial to acknowledge that information such as gender or race is not typically captured in a tax return. However, exploring external resources like census data could benefit in more comprehensive analysis.
7. It could be beneficial to explore additional economic factors that could influence the economic landscape of the ITFs in Connecticut. These include, but are not limited to, the unemployment rate, inflation rates, and minimum wage rates.
8. DRS could leverage historical data for forecasting the potential impact of new tax policies and estimating tax revenues for the State. Additionally, conducting a comparative analysis with comparable jurisdictions could offer valuable insights for policymakers, aiding in informed decision-making regarding tax law changes that would ultimately benefit residents.

Legislative Mandate

Original Mandate

This Tax Incidence Study is enabled by the following legislation: Conn. Gen. Stat. § 12-7c which states:

2019 Connecticut General Statutes

Title 12 - Taxation

Chapter 201 - State and Local Revenue Services. Department of Revenue Services Section 12-7c - Report on the overall incidence of certain taxes.

The Commissioner of Revenue Services shall, on or before February 15, 2020, and biennially thereafter, submit to the joint standing committee of the General Assembly having cognizance of matters relating to finance, revenue, and bonding, and post on the department's Internet web site a report on the overall incidence of the income tax, sales, and excise taxes, the corporation business tax and property tax. The report shall present information on the distribution of the tax burden as follows:

For individuals:

Income classes, including income distribution expressed for every ten percentage points; and

Other appropriate taxpayer characteristics, as determined by said commissioner.

For corporations:

Business size as established by gross receipts; Legal organization; and Industry by NAICS code.

The Commissioner of Revenue Services may enter into a contract with any public or private entity to prepare the report required pursuant to subsection (a) of this section.

Modifications

Legislation makes several modifications to Conn. Gen. Stat. § 12-7c. Specifically, the legislation expands the scope of all future incidence reports to require the Commissioner of Revenue Services to report on the overall incidence of pass-through entity tax and any other tax that generated at least one hundred million dollars in the most recent fiscal year before the submission of each report. The legislation also requires the Commissioner to report on the following:

- For income tax purposes, the Commissioner must report on the distribution of the property tax credit, the earned income tax credit, the pass-through entity tax credit, and any other modification against the personal income tax that resulted in a revenue loss to the state of

at least twenty-five million dollars in the most recent fiscal year before the submission of each report.

- For property tax purposes, the Commissioner must report on the distribution of residential and commercial property, and for residential property, the distribution of homeowners and renters.
- For all other taxes implicated by this statute, the Commissioner must report on the distribution of any modification against such tax that resulted in a revenue loss to the state of at least twenty-five million dollars in the most recent fiscal year before the submission of each report.

The legislation is effective July 1, 2023.

Data Sources

Accenture, LLP developed the analytical model for Connecticut DRS utilizing data from DRS, OPM, and the United States Census Bureau. This report was prepared with assistance from Accenture. The primary data sources are listed below:

- United States Bureau of Labor Statistics, Consumer Expenditure Surveys (CES)
- Connecticut Office of Policy and Management (OPM)
 - Councils of Government (COGs) data
- Connecticut Department of Revenue Services (DRS)