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The Federal Estate Tax as a Wealth Equalizer

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Justin Martinez
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The Federal Estate Tax as a Wealth Equalizer

I. Introduction

The implementation of the federal estate tax is an issue that has been debated for decades, and its components are constantly being adjusted in response to the economic fluctuations and fiscal needs of the United States. This paper examines the perspectives of proponents and opponents of the federal estate tax, while statistically and speculatively analyzing whether or not it is effective in maintaining income and wealth equality in the United States. The federal estate tax promotes equal economic opportunity through progressivity, and is utilized as a wealth equalizer, rather than a revenue generator.

II. History

The federal estate tax was enacted as a wealth inheritance tax that is imposed by the Federal government. It is a tax imposed on the net worth of an individual at the date of their death. Since its enactment, it has evolved over the years and has become a part of the Federal Transfer Tax System, which incorporates the estate tax, the gift tax, and generation skipping transfer taxes.\(^1\) For decedents in 2013, the estate tax features a $5,250,000 indexed exemption with a maximum tax rate of 40 percent.\(^2\) Any transferred assets that exceed the $5,250,000 exemption will be subject to the estate tax. The decedent's assets and certain interests at the date of death are measured by their fair market value, rather than historical cost or what their value


was upon acquisition. As an inheritance tax, the estate tax has been a topic of controversy and debate since its enactment. It has evolved over the years in response to economic conditions and the fiscal needs of the United States. At its inception it served the function of a revenue generator for the federal government, however now should be considered a wealth distribution equalizer.

The estate tax was originally enacted in 1916 as a component of the Emergency Revenue Act to raise revenue as the nation was rapidly expanding and needed funds to assist in financially supporting World War I. The estate tax rate has fluctuated with the needs of Congress and the federal government. At its initial enactment, it applied to decedents whose estate was valued over $50,000 and it was subject to a 10 percent maximum tax rate. As the years passed, the maximum tax rate was raised as high as 77 percent in 1941, and the exemption amount has gradually increased due to inflation. When the need for cash inflows from tax revenue diminished, the estate tax rate was lowered in response. However, in either condition it became clear that the estate tax could be avoided by estates if they elected to give substantial gifts throughout their lifetime to their heirs or other beneficiaries.

This led to the development and enactment of the gift tax in 1924 which reduced estate and income tax avoidance. The gift tax was also subject to fluctuating tax rates that were often consistent with the estate tax rates. It can now be assumed that the consistently matching tax rates of the gift and estate taxes was established not to generate more tax revenue, but to prevent avoidance of the estate tax in an effort to decrease large accumulations of wealth. Transfers of

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wealth to surviving spouses have also been accounted for differently since the original enactment of the estate tax.

Since 1924 the estate tax applied to spousal transfers the same way that it applied to transfers to heirs. There was no deduction for transfers to surviving spouses therefore they were subject to 100 percent of the estate tax liability. In 1948, a marital deduction was introduced that made it possible to deduct the value of the property that was transferred to the surviving spouse as long as they were the only beneficiary.\(^6\) The estate tax marital deduction was limited to 50 percent of the decedent’s adjusted gross estate. The adjusted gross estate is the gross estate less debts and administrative expenses, such as funeral costs and attorney fees. Any exceeding amounts would be considered to be fully taxable by the federal estate tax.\(^7\)

Three decades later, The Tax Reform Act of 1976 merged the gift tax with the estate tax under the United Transfer Tax System. They were combined into a unified estate and gift tax credit, which can be used to offset gift tax liability during the donor’s lifetime. If the gift tax credit is unused at death, it becomes available to offset the deceased donor’s estate tax liability.\(^8\) As a result, the gift tax and estate tax shared a common tax rate schedule that applied to cumulative transfers during life and at death. The Tax Reform Act of 1976 also changed the transfer tax systems so that the estate and gift taxes are supplemented with a generation skipping transfer tax. Generation skipping transfer taxes are transfers that are made to a beneficiary that is more than one generation apart from the transferor. For example, a transfer from a grandparent to


a grandchild would be considered a generation skipping transfer.\textsuperscript{9} The generation skipping transfer tax intended to reduce tax avoidance through generation skipping transfers, and it also applied to indirect transfers from established trusts.\textsuperscript{10}

Only six years later, the Economic Recovery and Tax Act of 1981 significantly impacted components of the estate tax. The estate tax rate was reduced incrementally down to 50 percent that was applicable to estates valued at over $2.5 million.\textsuperscript{11} The previous 50 percent marital deduction was increased up to 100 percent which fully exempted spousal transfers from taxation. All assets that were transferred to surviving spouses were excluded from the estate tax. The Tax Relief Act of 1997 increased the size of exempted estates to $1,000,000 which would be enacted in 2006. It also provided family-owned entities a family-business deduction that applied to gross estates that were at least 50 percent made up of a business. Additional changes included a maximum 40 percent exclusion from the estate tax for the value of land for permanent conservation easements.\textsuperscript{12} Permanent conservation easements apply when decedent’s give up certain rights of ownership to preserve their land or buildings for future generations.\textsuperscript{13}

In 2001, the Economic Growth and Tax Relief Reconciliation Act passed under temporary legislation. This act stated that the estate tax exemption would be incrementally increased up to $3.5 million by 2009. More importantly, the federal estate tax was scheduled to

\textsuperscript{9} Modeling the Federal Revenue Effects of Changes in Estate and Gift Taxation." \textit{Joint Committee on Taxation} 76 (2012): 1-43.
be abolished for decedents dying in 2010. For 2010, a modified carryover basis system was put in place of the historical step-up in basis to the fair market value for estate tax purposes due to the fact that there was no estate tax. The decedent’s basis in the property would be carried over to the recipient with a maximum step-up in basis of $1.3 million, or $4.3 million for assets that are transferred to a surviving spouse.

The federal estate tax was scheduled by the Economic Growth and Tax Relief Reconciliation Act to be revived back to its 2001 status after 2010, which included an exemption amount of $1 million with a maximum rate of 55 percent. However, at the end of 2010, the Tax Relief, Unemployment Insurance Authorization, and Job Creation Act was enacted and reinstated the estate tax which featured an exemption of $5 million with a maximum tax rate of 35 percent. The Tax Relief Act included stepped up basis rules that allowed property with a stepped up basis to receive a basis equal to the estate’s fair market value at date of death. Decedents that passed away after December 31, 2009 but before January 1, 2011 had the option to apply the estate tax based on $5 million exemption amount with a 35 percent maximum rate; or be subject to no estate tax and apply modified carryover basis rules under the Economic Growth and Tax Relief Reconciliation Act. In addition, the 2010 Tax Relief Act allowed for portability of applicable and unused exemption amounts between spouses. A surviving spouse could take advantage of the unused portion of the estate tax exclusion amount of his or her predeceased spouse and include it to their own exemption of $5 million.

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On January 1, 2013 the American Taxpayer Relief Act was enacted and set the maximum estate and gift tax rates to 40 percent with an exemption of $5,250,000. The executor of decedents who pass away in 2013 must complete a United States Estate and Generation-Skipping Transfer Tax Return (Form 706), if their gross estate plus their adjusted lifetime taxable gifts and specific exemption is more than $5,250,000. In terms of the current calculation of the estate tax, the base the total gross estate which includes of all of the assets that the decedent has an interest in including control. These assets may include real estate, cash, bank deposits, stocks, bonds, mutual funds, annuities, businesses, pensions, and proceeds from life insurance policies that were owned by the decedent. The assets are generally valued at an appraised value or their fair market value. According to Federal Tax Regulation 20.203 1-1(b) fair market value is defined as, “the price at which the property would change hands between a willing buyer and a willing seller, neither being under any compulsion to buy or to sell and both having reasonable knowledge of all relevant facts.”

In terms of timing, executors can choose to value the gross estate at the time of death or six months following death. The alternate valuation date can only be elected if it will decrease the value of the gross estate and the sum of the estate and GST tax liability. Once at gross estate, certain deductions and reductions are applied which then brings taxpayers to the taxable estate amount. These deductions can include mortgages and other debts, funeral expenses, legal fees, property that passes to surviving spouses, and qualified charities. The value of lifetime taxable gifts is added to the taxable estate amount and then the estate tax liability is computed.

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Lifetime taxable gifts include transfers of property made from one individual to another while receiving nothing, or anything less than full value in return. An important aspect of the estate tax that was added in its most recent modification is the portability of exemptions between spouses. As previously mentioned, any unused exemption amount from the first spouse that dies can be used by the estate of the surviving spouse along with their personal exemption. For example, if a spouse dies and uses only $3 million of their estate tax exemption, leaving $2.25 million unused, then the surviving spouse is entitled to a $7.25 million estate tax exemption.

III. Controversy

The federal estate tax has been a controversial topic since it was enacted. As of 2013, the estate tax affects only estates that are larger than the $5,250,000 exemption. It is estimated that only 1.4 out of every 1,000 estates will owe any estate tax in 2013. However as described earlier, it has undergone several changes over the past few decades, including its complete repeal in 2010. There are many who insist that there needs to be reform or repeal of the federal estate tax, while there are others who believe that it should be left as is.

Those in favor of the repeal of the estate tax have many reasons to support their position. The estate tax has been deemed the “death tax” by many which gives it a negative connotation, and makes it easier to scrutinize for being a tax that follows the event of death. The Death Elimination Act in 2001 stated “the estate, gift and generation skipping transfer taxes are unduly burdensome on all taxpayers [...] the committee further believes it is inappropriate to impose a

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tax by reason of the death of a taxpayer.  

The bill intended to phase out the federal estate tax and it was passed by the House of Representatives on April 4, 2001, but it was never passed by the Senate.

In addition, many believe that the estate tax is to blame for the dissolution of many family run businesses and farms. They claim that they have been hit the hardest by the estate tax and over time many are forced to eventually face liquidation or shut down due to the large financial burden. The succession from one generation to another is deemed to be the most crucial transition in terms of small business, and the estate tax makes the transition difficult and unstable, which sometimes leads to the failure of small businesses and farms. While some believe that the estate tax should be repealed because it is detrimental to the well-being of family businesses and farms, there are options to manage the estate tax liability to reduce financial hardships on such estates. Under present law, an executor may choose extend the full payment of the estate tax up to 14 years from its original due date by making annual payments which include interest only on the first five years. They also believe that it is unfair to be double taxed on an accumulation of wealth that is being passed down to their heirs after their death.

The estate tax has been considered a form of double taxation which gives people an additional reason to support the repeal of the estate tax. Those who are subject to the estate tax argue that they have paid income tax on their earnings and property taxes on their estates so they should not have to pay taxes on their estate transfer after death. However, out of the many estates

that the estate tax should be applied to, only a small percentage actually end up paying the tax.\textsuperscript{29}

Out of the 9,412 estate tax returns filed in 2012, only 3,738 were taxable and were subject to paying the federal estate tax.\textsuperscript{30}

Despite the potential drawbacks of the estate tax, there are also benefits that come as a result of keeping the federal estate tax. Supporters of the estate tax argue that the tax preserves the United States economy and democracy. Some go as far as to say that the repeal of the estate tax would create economic aristocracy as wealth is passed down from heir to heir without taxation, and social and economic status would be linked directly to birth rights. The accumulation and retention of wealth would widen the gap between the upper and middle class over a long period of time, and increase the level of income inequality while reducing opportunities for middle and lower classes. This would eventually lead to more economic and social problems that would need to be addressed by the Federal government. It should be noted that the estate tax would not fix the problem of rising income inequality, but it can have the ability to slow it down.

Overall there are many supporters on both sides of the issue with valid arguments. However, there are others who believe the federal estate tax just needs to be reformed or simplified. The American Institute of Certified Public Accountants (AICPA) has been an advocate for the simplification of the gift and estate tax since August 2004 and has been urging congress to reform the estate tax to a simpler state.\textsuperscript{31} If components of the estate tax were made permanent and consistent it would be simplified, resulting in less complex estate planning. The AICPA suggests that the exemption amounts and portability to surviving spouse’s rules be made

\textsuperscript{29} Feldman, Amy. "New estate tax rules call for new planning tactics." Reuters.
\textsuperscript{30} Internal Revenue Service, Statistics of Income Division, August 2013.
\textsuperscript{31} Estate Tax Reform AICPA Letters and Studies." AICPA.
consistent. However, the simplification of the estate tax might make it easier to find loopholes in the taxation system and avoid tax liability. Avoiding taxation from the federal estate tax can be a simple process due to the fact that the wealthiest of families are able to afford experienced planners and attorneys which may guide them to allocate the majority of their wealth into tax exempt situations such as trusts. There are many who argue that the estate tax rate needs to be raised in order to make up for the tax avoidance and to help decrease the federal deficit. An estimated $500 billion in revenue would be supplied over the next 10 years if the estate tax was set up as it was in 2004, at a rate of 48 percent.

Lastly, there are issues surrounding how fair market value is measured when taken into the calculation of the estate tax. Fair market value is determined by the taxpayer and can be undervalued to have a lower tax liability. Also, under current law, estates can assume a fair market value, while their beneficiaries can assume a different fair market value. This can provide complications in tax planning and make it difficult to ensure that the right tax liability amount is reported.

IV. Research Method-Statistical Analysis

A method that is effective in measuring wealth is by total income share. The share of total income held by the top percentage of individuals demonstrates how income in the United States is being allocated. A statistical correlation is planned to be drawn between the maximum federal estate rate since 1920 and the share of total income accruing to the top one-tenth percent, one percent and five percent group of the United States which include households with income over $1.9 million, $394,000 and $161,000 respectively. As of 2004 there were over 143 million

households in the United States population. For the purpose of this paper, pre-tax income share of households is going to be used as a measurement of wealth.

Households are defined as tax units which include married couples with dependents or single adults with dependents. Household income includes all income items reported on tax returns before deductions and excluding governmental transfers. It includes salaries and wages, partnership and fiduciary income, dividends, interest and realized capital gains. The income is computed before individual income taxes and individual payroll taxes but after employers’ payroll taxes and corporate income taxes. The graph below is a representation of the top one-tenth percent, one percent and five percent group United States Pre-Tax Income share from 1916 to 2012..

**Share of Total Income Accruing to Each Group**

The original data was acquired by Thomas Piketty from EHESS and Emmanuel Saez from UC Berkley. The data was derived from the Census Bureau, Statistics of Income in Internal
Revenue Service and the Social Security Administration. Inferences were drawn from correlation derived from the data shown above, with the maximum federal estate tax rate from 1916 to 2012. The detailed statistical data and results can be found in appendix A.

![Maximum Estate Tax Rate from 1916-2012](image)

The above graph illustrates the fluctuations of the maximum estate tax rate since its enactment in 1916 to 2013. The data was gathered from the Internal Revenue Service Tax Statistics. The three sets of data relating to pre-tax income share are planned to be compared independently with the maximum estate tax rate to determine if a correlation exists between the two variables. From speculative observations, a hypothesis can be derived which states that there is a negative correlation between the maximum estate tax rate and the top one-tenth percent, one percent, and five percent income shares of the country. This may suggest that the higher the

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maximum estate tax rate is set, the lower the share of the wealthiest household incomes tends to be based on statistical speculation.

For this statistical analysis, the correlation coefficient, r, is used to determine if a relationship exists between the two variables, X (maximum estate tax rate) and Y (share of household incomes). The correlation coefficient measures the degree to which two variables are related by measuring the strength of the linear relationship between them. The sign of r indicates the direction of the relationship between the two variables, either being negative or positive. The magnitude of r, ranges between -1 and 1, which indicates the strength of the relationship. A perfect positive relationship signifies that Y increases as X increases. Conversely, a perfect negative relationship, of -1 indicates as Y decreases, X increases. If r is 0, then it can be assumed there no linear relationship exists.

The results of the analysis were that correlation coefficient, r, between the top-one tenth percent income share and the maximum estate tax produced a correlation of -.72. Similarly, the top one percent income share generated a correlation of -.73 when compared with the maximum estate tax rate. This suggests that a strong negative correlation exists between the two sets of data. This finding helps to support the hypothesis that the estate tax is acting as a progressive tax, by decreasing the levels of wealth in the United States. However, when the top 5 percent income share was compared with the maximum estate tax rate, the resulted correlation was -.56. This was lower than the top one-tenth and one percent segments, which suggests a weaker correlation. It can be assumed that families with annual household incomes of at least $161,000 are not as affected or may not be subject to the federal estate tax. This assumption can be based on the premise that there is a lower probability that the households with the top 5 percent income share do not have as many estates that are valued at over $5.25 million. From this statistical
analysis, it can be determined that a negative correlation exists between the top household income shares in the United States and the maximum federal estate tax rate.

To assure that the results were not due to chance alone, it is beneficial to determine if the results were statistically significant. In terms of determining if the results were statistically significant, the p-value and t-statistic were analyzed for each correlation result. The significance level is affirmed when the p-value is less than or equal to what is considered statistically significant, which in this case is .025.35 At a 95 percent confidence level the p-values of all three independent correlations were less than .025, which suggests statistical significance. T-Tests test for statistical significance by utilizing interval and ratio level data. For a two-tailed test of t, at a 95 percent confidence interval, the value of t must equal or exceed 1.960.36 The detailed statistical data and results of significance summary output can be found in appendix C. It can be assumed that the results were overall statistically significant, which helps support the proposed hypothesis which states that there is a relationship between the federal estate tax rate and top income shares. This finding does not suggest any causation between the two variables, but it is evident there is a negative relationship between the maximum federal estate tax rate and the top household income shares.

Income share is not the only method for measuring wealth, therefore in the second statistical analysis; the maximum federal estate tax rate will be compared against the top 1% share of net worth between the years 1922 and 2007. Net worth reflects wealth as a store in value of a family’s holdings. Net worth is defined as the current value of marketable assets less the current value of debts and liabilities. Total marketable assets are the sum of: the gross value of

owner-occupied housing, other real estate owned by the household, cash and demand deposits, time and savings deposits, certificates of deposit, money market accounts, government bonds, corporate bonds, foreign bonds, cash surrender value of life insurance plans and pension plans, corporate stock, mutual funds and equity in trust funds. Total liabilities include mortgage debt, consumer debt, and other debt. The chart below illustrates the growth of the top one percent’s net worth from 1922 to 2007.

Similar to the previous analysis, the hypothesis states that there will be a negative correlation between the maximum federal estate tax rate and the top one percent share of net worth between the years 1922 and 2007. This would suggest that the higher the estate tax rate is set at, the lower the top one percent share of net worth will be. Once again, the correlation coefficient, $r$, was utilized to determine if a relationship exists between the two variables. The resulting correlation coefficient, $r$, was -.66. The detailed statistical data and results can be found

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in appendix B. This finding indicates that there is a moderately strong negative correlation between the maximum federal estate tax rate and the top one percent share of net worth. The result assists in confirming the hypothesis that the progressive estate tax acts as a wealth equalizer in the United States.

In addition to utilizing the correlation coefficient, a linear regression analysis was performed on this dataset to determine more information about the relationship between the federal estate tax rate and the share of net worth of the one percent. Based on regression analysis, the explanatory variable “x” would have an effect on the dependent variable “y”.38 The linear regression equation is: \( y = bx + a \). The variable “b” represents the slope of the regression line, while the variable “a” represents the y-intercept. The hypothesis of this analysis was that the maximum federal estate tax rate (x) has an effect on the share of net worth of the one percent (y). The detailed statistical data and results can be found in appendix D. The resulting equation of running the linear regression analysis at a 95 percent confidence level was determined to be:

\[
y = -0.222x + 0.459047
\]

This equation can be utilized to model the effect of the maximum estate tax rate on the share of net worth. For example, if the maximum estate tax rate is set at 10 percent, it would yield a net worth share of 43.6 percent. Conversely, if the maximum estate tax rate is set at 80 percent, it would result in a net worth share of 28.1 percent. Lastly, if the federal estate tax did not exist, or was set at zero percent, the net worth share would be 45.9 percent based on the linear regression equation. In terms of statistical significance, the p-value and t-statistic of the regression analysis were analyzed. The p-value that resulted was 1.2E-11 which was

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significantly less than .025 and the resulting t-statistic of 13.2 which was much greater than 2. Therefore it can be assumed that the results of the regression analysis between the maximum estate tax rate and the share of net worth were statistically significant and support the hypothesis that the federal estate tax acts as a progressive tax by equalizing wealth.

Although it is evident that correlations between the maximum estate tax rate and income and wealth levels exist, it is necessary to mention that there may be other economic factors involved in the correlation. For example the depression following World War I and the Great Depression in the 1920’s had negative effects on many businesses which destroyed the top capital incomes of the country. It can be speculated that these top wealth holders were not able to recover their income and wealth shares for many years, especially with the effects of progressive taxation, such as the estate tax.39 As stated earlier, a correlation represents a relationship between two variables, and it is clear that a relationship exists between the maximum estate tax and the top income shares and wealth holders.

For the third statistical analysis the effects of the maximum estate tax rate, in conjunction with the exemption rate and the amount of wealth, measured by net worth, in the United States were analyzed. This study focused on more recent years than previous analysis, by analyzing data from 1989 to 2007. The data table on the following page illustrates changes in the net worth of wealth holders with net worth amounts of at least $1 million. The net worth amounts are in millions of dollars. The source of the data is from the IRS Tax Statistics database regarding all top wealth holders.

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After computing the geometrical growth rate of each stratum of net high net worth individuals, it is evident that each segment experiences total growth from 1989 to 2007. From analyzing the data it can be noted that with the gradual decline in the maximum federal estate tax rate in conjunction with the increasing exemption amount, those that would be subject to the estate tax are still experiencing high growth rates. Considering the estate tax rate dropped 10 percent between 1989 and 2007, the net estate tax liability would also decrease due to the fact that the net estates have been taxed at a consistently lower amount. During that time period, the exemption level increased from $600,000 to 2,000,000. While a portion of this increase is indexed for inflation, the effect is that less of the net estate is eligible for taxation since decedents are able to exempt greater amounts of their estate.

In addition, it is notable that the highest levels of net worth individuals, with net worth amounts over $10 million, experience the highest growth rate of 30 percent. It can be assumed that these individuals would have the highest estate tax liability considering they would be taxed at the highest rate given that their estates would be the most valuable. However, these ultra-high net worth individuals have not only retained their wealth, but their net worth amounts have
grown at the highest rate between 1989 and 2007. This finding rejects the hypothesis that the estate tax is a wealth equalizer due to the fact that the net worth growth rate of wealth holders is increasing at an accelerated rate when compared to the rest of the country. If the estate tax was effective in equalizing wealth, then it can be presumed that the growth rates of the net worth’s of the wealthiest individuals would not be as high. With such large amounts of wealth, they are able to utilize the most experienced tax planners that may assist with avoiding estate taxation. The following segment of this paper analyzes how the individuals with the highest net worth utilize methods for minimizing or avoiding estate taxation.

V. Research Method-Speculative Case Study- Steinbrenner Family and the Walton Family

A method of determining the impact of the federal estate tax is analyzing the effects on estates and tax implications if it did not exist. As mentioned previously, the estate tax was repealed in 2010, which resulted in decedent’s ability to transfer their wealth without estate taxation. On July 13, 2010 the New York Yankees owner George Steinbrenner passed away, leaving behind an estate with an estimated value of $1.1 billion that could be transferred to his heirs without estate taxation. If he had passed away the year before his estate would have been subject to a 45 percent maximum estate tax rate above the $3.5 million exemption amount. Depending on how his estate was structured and the deductions that were applied, Steinbrenner’s family could have faced an estate tax liability of up to $500 million if he had. This may have led the family to consider selling the New York Yankees in order to pay the estate tax liability, which is what occurred to the family of Chicago Cubs owner, P.K. Wrigley. Wrigley’s family

was forced to sell the Cubs to the Tribune Company in order to pay the taxes on his estate when he passed away in 1977.42

The 2010 estate tax laws state that estates do not receive a step-up in basis when estates are transferred. Instead the basis of a decedent’s estate is calculated using the lessor of the cost basis, or the fair market value at the date of death.43 This change could be expected to result in large capital gain taxes since the heirs of the estate transfer would have the same tax basis that Steinbrenner had when he purchased the Yankees in 1973 for $10 million. Therefore if the family decided to sell the franchise immediately following his death in 2010, they would be required to pay capital gains taxes on amounts exceeding the basis of $10 million. Considering the value of the team was $1.6 billion in 2010, the Steinbrenner family would pay $238.5 in capital gain taxes.44

Now suppose that George Steinbrenner passed away and the federal estate tax existed as it had in 2009, where the maximum federal estate tax rate was 45 percent at a $3.5 million exemption level. Assume that he transferred the franchise to his heirs after his death with a stepped up basis in the amount of $1.6 billion which was the fair market value at date of death. Steinbrenner’s net estate was estimated to be $1.1 billion, and after subtracting the $3.5 million exemption amount, an estate tax liability of approximately $496.5 million would result. When compared to the $238.5 million resulting from capital gain taxation,

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it can be determined that estate taxation results in a loss of tax savings of approximately $264 million. Therefore under these specific circumstances, an estimated $264 million is not being retained by the Steinbrenner family.

However, with a step up in basis from $10 million to $1.6 billion, it can be assumed that the majority of the additional basis of $1.5 billion is considered to be goodwill and other intangible assets. According to the Internal Revenue Service, approximately 90 percent of the assets of a sports franchise are considered to be intangible assets. For this study, it was assumed that 100 percent of the additional basis is comprised of intangible assets. Intangible assets of a professional sports franchise are able to be amortized using the straight-line method over 15 years, under the Internal Revenue Code Section 197. This amortized amount is able to be used as an income tax deduction for the taxpayer. Therefore, the $1.59 billion of amortizable intangible assets can be utilized to reduce income tax liability over 15 years. In 2009 the income tax rate was 35%, which would be applied to the total intangible asset amortization amount to determine the net deduction, which is $556.5 million. This represents the total tax savings resulting from the amortization of intangibles. When amortized over 15 years, it would result in a tax savings deduction of approximately $37.1 million per year. When using a 5 percent discount rate, the present value of $37.1 million for 15 years is equal to $385,085,313. By comparing the total estate liability of $264 million to the $385,085,313 million in the present

<table>
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<tr>
<th>Amortization of Intangible Assets</th>
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<td>Original basis (1973)</td>
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<tr>
<td>Step-up in basis</td>
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<tr>
<td>Additional new basis</td>
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<tr>
<td>Income tax rate (2009)</td>
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<td>Total tax savings</td>
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<td>Tax savings per year</td>
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value tax saving amortization deduction, it is evident that the estate tax actually provides tax savings in the long run.

This outcome rejects the hypothesis that the federal estate tax acts as a wealth equalizer, by actually providing tax savings that is held by the ultra-wealthy families. It is estimated that over $1.2 trillion is passed down every year to future generations according to former Treasury Secretary, Lawrence Summers. More importantly, most of the wealth that is passed down is from the extremely rich, as the majority of wealth in the United States is concentrated in the top one percent. The speculative case study that is being analyzed focuses on the Walton family which are the heirs of the founders of Wal-Mart. As a family, they hold half of the top ten spots on The Forbes 400, The Richest People in America. With such large fortunes that are exponentially higher than the estate tax exemption of $5.25 million, it can be presumed that the Walton family will be subject to substantial estate tax bills. The following research will determine how effective the estate tax is as a wealth equalizer in respect to the wealthiest family in America.

The Walton family is worth over $144 billion has retained much of their inherited wealth since the passing of the founders of Walmart in the 1990’s. The six heirs of the Walton inheritance are Alice, Jim, Rob and Christy Walton, Nancy Walton Laurie, and Anne Walton Kroenke. Their enormous accumulation of wealth is greater than 42 percent of the combined

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wealth of all Americans.\textsuperscript{52} It is evident that with such a large estate, the wealth would be subject to the estate tax and a large estate tax liability would result. However, it is unlikely that this is the case. Since the Walton family maintains a large amount of wealth, they have access to the most experienced professional estate tax planners and are able to utilize strategies to decrease their estate tax liability. Such maneuvers include charitable lead annuity trusts (CLAT), the grantor retained annuity trusts (GRAT), and family-limited partnerships.

A charitable lead annuity trust is a long term trust that makes annual payments to charity, and the remainder of the trust at the end of the term is transferred to a beneficiary or heir. It is used to pass down assets through an inheritance with minimal to no estate or gift tax. The trust is valued at present value on the date that it is established while utilizing a discount rate set by the Internal Revenue Service (IRS).\textsuperscript{53} The IRS uses current interest rates, known as charitable midterm rates, to determine how much of the trust is actually going to charity. Low charitable midterm rates increase the tax advantages for charitable lead annuity trusts.\textsuperscript{54} If the investments within the trust outperform the charitable midterm rates, then the trust will be left with a surplus that is transferred to the heirs or beneficiaries without gift or estate taxation. In the case of the Walton family, they have established a charitable lead trust with a fair value of over $484 million as of 2011.\textsuperscript{55} Wealthy American families hold over $20 billion in CLAT’s and according to IRS data, the Walton’s are the largest users of charitable lead annuity trusts in the United States.\textsuperscript{56}

\textsuperscript{52} "Meet the Family." The Walmart I. http://walmart1percent.org/family
An additional vehicle for minimizing or eliminating estate taxation is the grantor retained annuity trust (GRAT) which is a trust that pays annuities of an initial investment back to the grantor over a term of at least two years. Generally the investment is intended to outperform the market so that the investment gains can be transferred to an heir or beneficiary without estate or gift taxation. As long as the grantor outlives the term of the trust, then the remaining assets will be transferred tax free. In 1993 Audrey Walton put $200 million of assets into a GRAT that would benefit her daughters if the assets appreciated. Shortly after, Audrey Walton was sued for utilizing the GRAT as a method for evading taxation. However, the judge ruled in favor of Audrey Walton which established the nickname, “Walton GRAT” for the tax avoidance maneuver and granted it legal standing.

The Walton family has also decreased their estate tax liability by holding their Wal-Mart stake in family limited partnerships. Parents can choose to place stock or other assets into a partnership and give minority stakes to their heirs or children. The parents are able to claim those gifts as less valuable than the underlying investment because they are lack control and liquidity. Therefore it is possible for them to claim that a minority’s interest is worth less than its proportional share of the investment, which creates a discount. When the parents ultimately transfer a minority interest to one of their heirs or beneficiaries, they are only liable to pay gift or estate tax on the discounted value of the stock. This makes it possible to pass on large sums of estate without taxation, if the discount is substantial. In 1953, The Walton’s created Walton

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Enterprises LLC, which serves as the vehicle for the family to own its shares through and maintain control of the assets that are being transferred to future generations while minimizing gift or estate taxation.

From a speculative standpoint, it is evident that the Walton family has utilized estate tax avoidance loopholes to pass down the wealth to future generations. With a net worth of over $144 billion, it is clear that they have an abundance of funds to allocate into trusts and partnerships that reduce inheritance taxes. This makes it possible to transfer wealth while avoiding estate taxation, resulting in accumulations of wealth being tied up in the richest families. It is important to mention that the results and assumptions of the speculative case studies are constrained by the availability of federal estate tax return information considering client confidentiality. The general speculations were based off of reasonable predictions and explanations that were surmised to be appropriate for the purpose of this paper. However, based on the information that was publicly available, it can be assumed that the estate tax is not a wealth equalizer in terms of extremely high net worth individuals such as the Walton family. However it is notable that the estate tax has significant impact on the perspectives of tax auditors, users of relevant tax information.

V. Tax Auditor Perspective

The federal estate tax affects the Internal Revenue Service (IRS) auditors that examine the estate tax return. The auditor examines the federal estate tax return and identifies discrepancies within the return. Estate tax audits are more intensive than audits on individual tax returns, partially because the size of the total gross estate, which has to be over $5,250,000 in order to be considered for the estate tax. Consequently the estate tax audit process provides near
complete coverage of all tax returns that are filed by estates. Estate tax returns that are selected for formal audits are assigned to estate tax auditors based on the size of the estate, potential revaluation issues, and the expertise of available IRS auditors. The larger the size of the assets for an estate, the greater chance the estate would be audited. A study completed in 1992 when the exemption amount was $600,000 with a tax rate of 55 percent, showed that nearly half of all estates with gross assets greater than $5 million were audited; compared to less than 12% of estates with gross assets that were valued under $1 million.  

Upon being selected for an audit, an estate may have to provide documentation or information to support adjustments, complete examination, or complete explanation of questioned items. Information that can be requested may include but is not limited to appraisals on included real estate, and a certified copy of the death certificate. IRS auditors that examine estate tax returns need to be efficient and accurate in determining valuations of the estate assets that determine the total gross estate. After determining the total gross estate amount, the deductions can be examined and the tax liability can be checked for accuracy. A study has discovered that 60% of audited estate return cases were closed with additional tax owed, while 21% were closed with a tax reduction, and 18.9% were closed with no change in original net estate tax. The most common asset reevaluations within the study were other real estate, closely held stock, and cash. The majority of the total gross estate in estate tax returns is undervalued, which results in a lower estate tax liability. IRS auditors have a responsibility to identify areas of risk and fraud within the estate tax return and should be aware of various valuation methods of total gross estates.

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VI. User Perspective

In addition to the auditor's perspective, the federal estate tax has an impact on the users of the relevant tax information. Users that are affected by estate tax return data include policy makers and estate tax planners. Policy makers within the Senate are constantly voting on federal tax laws and potential tax reforms. The estate tax reform has been brought to the Senate floor numerous times over the decades, most recently in 2012 to vote on the estate tax provision and tax rate. Policy makers utilize estate tax revenue to determine potential revisions for the estate tax. Several senators and other governmental officials believe that the estate tax should be repealed, while others believe it should remain in place.

Estate tax planners are also constantly affected by the implications of the estate tax because of the future changes that may be enacted by policy makers. Estate tax planners strive to reduce estate tax liability for their client while still adhering with the guidelines of the estate tax. They may offer guidance on allocating assets, gift giving, investing, and managing trusts. As users of estate tax information, tax planners need to be aware of how the estate tax functions and how to legally offset tax liability. An interview with Kristen Carter, a Certified Public Accountant that works in Private Client Services at Deloitte, provided a perspective from a professional service standpoint. Kristen often encounters situations involving the federal estate tax since she provides services to ultra-high net worth individuals. She states that estate planning is an important tool in regards to the estate tax and that it is important to stay current with any changes that may be on the horizon. She also points out that every client is unique and wants to manage their estate differently. Some may want to try to pass down their wealth and minimize their estate tax liability, while others choose to give their entire estate to charity. Whichever the

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case, it is her duty to provide tax services to clients, therefore any changes in regards to estate
taxes directly affect her duty and responsibility to providing a professional service.

It is evident that these two perspectives are interrelated and their effects on each other
help determine the dynamics and implications of the federal estate tax. As users of relevant tax
information, tax planners anticipate any changes that policy makers enact regarding the estate
tax. The tax planners provide a professional service to their clients based on their specific needs.
Once an estate tax return has been filed, the IRS tax auditor needs to be aware of any strategies
or maneuvers that may be used to minimize estate tax liability and determine if the methods are
legal and if the estate tax liability amount is correct. Any future changes that the estate tax
experiences will definitely have an effect on the perspectives of the tax auditor and the users of
estate tax financial information.

VII. Conclusion

The estate tax has been enacted for over ninety years and has evolved in response to the
fiscal and economic needs of the United States. Initially it was enacted as a revenue generator;
however it is apparent that it no longer serves this function considering it only generated 0.42
percent of the federal collections in 2012. After statistically analyzing the maximum estate tax
rate in comparison to the income shares and net worth shares of the top five percent of
individuals, it can be speculated that the estate tax is effective as a wealth equalizer. However,
further research indicates that the wealth of the top one percent has grown at an accelerated rate.
The case study of George Steinbrenner illustrated how the estate tax could actually provide
future tax savings with the step up to basis function and by amortizing intangible assets. In
addition, the case study of the Walton Family demonstrated how ultra-wealthy families can
transfer wealth, by utilizing vehicles and maneuvers to minimize or completely avoid estate tax liability.

In conclusion it is evident that the federal estate tax is able to act as a wealth equalizer, only to an extent. The extent being that the wealthiest of America's that wish to transfer their wealth after death, may find a way to bypass the estate tax. However, the lower end of the top five percent of individuals may not have access to such estate tax avoiding vehicles, making them more susceptible to the estate tax. Based on the analysis of this paper it can be presumed that without the estate tax, wealth accumulations would increase at an exponentially higher rate if there is no taxation on large inheritances. Therefore, the federal estate tax functions effectively as a progressive tax, to assist in preserving economic opportunity by equalizing wealth.
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### Appendix A: Correlation coefficient between maximum estate tax rate and top income shares of 0.1%, 1.0% and 1-5%

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<th>Top 1% Income Share</th>
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Appendix B: Correlation coefficient between top 1% share of net worth and maximum estate tax rate. Graphs illustrate maximum estate tax rate from 1922-2007, and top 1% share of net worth from 1922-2007.

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Resulting Correlation: -0.6600
Appendix C. Statistical significance summary output resulting from regression analysis on correlations between the maximum estate tax rate and top income shares.

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<td>0.1133241</td>
<td>0.00568371</td>
<td>19.938413</td>
<td>1.0193E-35</td>
<td>0.102040579</td>
<td>0.124608</td>
</tr>
<tr>
<td>Maximum Estate Tax Rate</td>
<td>-0.0009403</td>
<td>9.2202E-05</td>
<td>-10.198759</td>
<td>6.2181E-17</td>
<td>-0.001123391</td>
<td>-0.00076</td>
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</tbody>
</table>

Statistical significance between maximum estate tax rate and top 1%

<table>
<thead>
<tr>
<th></th>
<th>Coefficients</th>
<th>Standard Error</th>
<th>t Stat</th>
<th>P-value</th>
<th>Lower 95%</th>
<th>Upper 95%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Intercept</td>
<td>0.23398</td>
<td>0.009055</td>
<td>25.84043</td>
<td>9.321E-45</td>
<td>0.216004</td>
<td>0.251956</td>
</tr>
<tr>
<td>Maximum Estate Tax Rate</td>
<td>-0.00152</td>
<td>0.000147</td>
<td>-10.344</td>
<td>3.046E-17</td>
<td>-0.00181</td>
<td>-0.00123</td>
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Statistical significance between maximum estate tax rate and top 1-5%

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</thead>
<tbody>
<tr>
<td>Intercept</td>
<td>0.162487</td>
<td>0.003601764</td>
<td>45.11326</td>
<td>1.7162E-65</td>
<td>0.155336</td>
<td>0.169639</td>
</tr>
<tr>
<td>Maximum Estate Tax Rate</td>
<td>-0.00039</td>
<td>5.81343E-05</td>
<td>-6.64781</td>
<td>1.9352E-09</td>
<td>-0.0005</td>
<td>-0.00027</td>
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</tbody>
</table>
Appendix D. Regression analysis between maximum estate tax rate and top 1% net worth share.

Statistical significance between maximum estate tax rate and top 1% share of net worth:

<table>
<thead>
<tr>
<th></th>
<th>Coefficients</th>
<th>Standard Error</th>
<th>t Stat</th>
<th>P-value</th>
<th>Lower 95%</th>
<th>Upper 95%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Intercept</td>
<td>0.4590469</td>
<td>0.034769484</td>
<td>13.20258</td>
<td>1.22702E-11</td>
<td>0.3867399</td>
<td>0.5313541</td>
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<tr>
<td>Maximum Estate Tax Rate</td>
<td>-0.2222359</td>
<td>0.055197518</td>
<td>-4.02619</td>
<td>0.000610296</td>
<td>-0.3370255</td>
<td>-0.107446</td>
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</tbody>
</table>

Resulting scatter plot from regression analysis with resulting equation:

\[
y = -0.2222x + 0.459
\]