

INCOME TAX AS IMPLICIT INSURANCE AGAINST LOSSES FROM TERRORISM

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ABSTRACT

This Article examines the effects of the income tax rules as they relate to losses from terrorist attacks. It shows that the income tax system affords victims of terrorism a form of implicit insurance because the amount of tax owed decreases proportionately with the amount of the loss. The Article argues that the level of insurance should be greater for victims of terrorism than that provided to those who suffer other kinds of losses. Granting special tax benefits to victims of terrorist attacks provides behavioral incentives, not only for individuals and businesses who have suffered or might potentially suffer losses from terrorist attacks, but also for the government. The Article argues that, while the Victims of Terrorism Tax Relief Act of 2001 grants special tax benefits to victims of terrorism, this type of relief should be codified and should apply to all victims of terrorism against the United States, rather than granted on an *ad hoc* basis. Further, additional rules should be adopted which grant tax benefits to companies which provide insurance against terrorist attacks and favorable tax treatment should be given to expenses for the private provision of security against such attacks.

INTRODUCTION

This Article examines the public policy behind providing special tax benefits to the victims of terrorism. The total losses from the September 11, 2001 attacks are estimated to exceed \$50 billion dollars and over 3000 lives.¹ Therefore, how these losses are treated for tax purposes is a significant issue. This Article analyzes how the tax system currently treats these losses and how these rules can be improved.

This Article will discuss how the income tax system provides a certain level of implicit insurance, which emanates from provisions that allow for deduction of losses and, in some instances, deduction of insurance payments, as well as the

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1. Gordon Woo, Quantifying Insurance Terrorism Risk (Feb. 1, 2002) (unpublished paper, presented at the 2002 National Bureau of Economic Research Insurance Project Workshop), available at <http://www.nber.org/~confer/2002/insw02/woo.pdf> (last visited Oct. 15, 2002).

exclusion of recoveries from insurance companies or the tortfeasors themselves. It is estimated that the level of insurance provided by the tax system is of approximately the same level as automobile insurance, or health insurance.²

Because the tax system provides insurance against all losses, there is, inherent in the income tax system, a level of insurance against terrorist strikes. The tax rules should provide benefits to victims of terrorist attacks; therefore, in essence, the government is providing an additional layer of insurance against such attacks. Such additional insurance would have beneficial social consequences, in part because the government should insure against its own failures, and in part because the benefits can have favorable behavioral incentives.

The Article also argues that because governmental actors behave so as to maximize their own self-interest and consequently do not always act to maximize the total welfare of the citizens, if the government does not face an appropriately high cost, the government might insufficiently provide for defense against terrorism. By forcing the government to provide insurance for its failures, the tax system can overcome potential public choice problems that may result.

The Article argues that without additional behavioral incentives, individuals will not behave in a socially optimal way with respect to protection from terrorist acts. Because individual actors do not reap all of the benefits of the protection they provide, they might not take the appropriate level of protection against terrorist attacks. The argument is not that the people will take no action, but that they might not take optimal action. Because often the benefits of individual actions, such as those airlines may take against terrorists, can have external benefits to other actors, it very possible such activities would be under provided without governmental intervention.³ This argument is based on a traditional rationale for governmental action: mitigating externalities some actors impose upon others.

The Article is divided into three parts. Part I analyzes the theory behind the income tax as well as the various specific rules that apply to losses from terrorist attacks. Part II analyzes the effect of tax rules on insurance companies and how they respond to catastrophic losses. It also discusses how allowing special tax benefits to particular victims of terrorism creates incentives to non-governmental actors that will optimize societal levels of insurance and security. Part III proposes specific changes to the current rules to influence governmental behavior. It discusses how addressing terrorism systematically, rather than through piecemeal legislation as is currently done, will improve the process by which budgetary decisions are made. It also discusses how allowing certain tax benefits to victims of terrorism can foster governmental action for socially productive behavior. It argues that, by encouraging the government to take on more of these losses and allocate more resources to security, giving benefits to

2. Thomas P. Kniesner & James J. Ziliak, *Explicit Versus Implicit Income Insurance*, 25 J. RISK & UNCERTAINTY 5 (2002).

3. HOWARD KUNREUTHER & GEOFFREY HEAL, INTERDEPENDENT SECURITY: THE CASE OF IDENTICAL AGENTS (Nat'l Bureau of Econ. Research, Working Paper No. 8871, 2002).

victims of terrorism will improve governmental action because government decision-makers will be comparing the costs of defense against an amount which more closely represents the societal costs of terrorism rather than, as is the current practice, evaluating the costs of defense equipped only with an abstract notion of the costs of terrorism.

For purposes of this Article, the term “victim of terrorism” will include any person⁴ who suffers loss (either physical or economic) from terrorist attacks designed to influence the U.S. government. The current tax provisions only address those who died or will die from injuries sustained from these attacks. The definition of “terrorism” used in this Article is similar to that used by the United Kingdom in connection with Pool RE,⁵ the reinsurance pool for terrorist attacks against the United Kingdom.⁶ As used here, the term would include the conduct of terrorist acts by such groups as Al Qaeda or the FMLN (the Puerto Rican independence group).

I. INCOME TAX RULES AND BEHAVIORAL INCENTIVES FOR TAXPAYERS

Before analyzing the effects of taxation on compensation for terrorism, it is necessary first to discuss the tax rules that apply to victims of terrorism. There are very few rules that apply solely to victims of terrorism, and these are discussed below in Part I.B.5. The majority of the tax rules applicable to losses from terrorist attacks relate generically to all who suffer loss. This section, therefore, will first discuss the fundamentals of the income tax system. It will begin by examining the basic definition of income for tax purposes. Then, it will examine the application of this definition to specific circumstances relevant to losses from terrorism. It will also examine the tax rules concerning losses to personal property, losses from medical expenses, and recoveries in tort. The section concludes by analyzing the rules that are specific to losses from terrorist acts.

A. *The Definition of Income and the Theoretical Basis of the Income Tax*

The income tax is designed to raise revenue for the government and allocate the tax burden based on the income of the citizens and residents of the United States. Income, for purposes of the income tax, is determined by the ability of the individual to “exercise control over the use of society’s scarce resources.”⁷

4. For purposes of this Article, the term “person” means any legal person (e.g., individual, corporation, etc.).

5. *Terrorism Insurance: Alternative Programs for Protecting Insurance Consumers: Hearing on the Treasury Dep’t Before the Senate Comm. on Banking, Hous., & Urban Affairs*, 108th Cong. 8-10 (2002) (prepared statement of Thomas J. McCool, General Accounting Office).

6. Dwight Jaffee & Thomas Russell, *Extreme Events and the Market for Terrorist Insurance* (Feb. 1, 2002) (unpublished paper, presented at the 2002 National Bureau of Economic Research Insurance Project Workshop), available at <http://www.nber.org/~conf/2002/insw02/jaffee.pdf> (last visited Oct. 20, 2002).

7. HENRY CALVERT SIMONS, *PERSONAL INCOME TAXATION* 49 (1936).

This is generally said to be equivalent to the net change in wealth plus amounts expended in personal consumption.⁸ This is referred to as the Haig-Simons definition of income, after the two men who first proposed it.⁹

The definition of income in the Internal Revenue Code is essentially equivalent to the Haig-Simons definition. However, in determining the amount of taxable income, the U.S. tax law begins by including all receipts of money or property and then subtracting any costs of acquiring the income.¹⁰ In addition, income tax rules exclude certain receipts that can essentially only be used for the production of income and cannot be used for consumption activities by the taxpayer.¹¹ At a very abstract level, the amount of income as determined under the Haig-Simons definition and the amount of income as determined under the Internal Revenue Code should be equal. If one subtracts those amounts which are neither saved nor used for personal consumption from the receipts of money or property, the resulting amount must be equal to savings plus consumption. The largest difference between the definition in the Internal Revenue Code and the Haig-Simons definition is attributable to the "realization" doctrine.¹² While there are many exceptions,¹³ under the U.S. income tax, changes in wealth are not "realized" (i.e., included in the calculation of income for tax purposes) until the investment is sold or otherwise ended or terminated.¹⁴ Under the Haig-Simons definition, a change to wealth that does not create current revenue would still be income subject to tax.¹⁵ This is largely a timing distinction and, while timing differences can be quite significant, this difference will not be stressed in this Article.¹⁶

It is generally argued that an income tax is the best way to raise revenue because it reflects the individual's ability to pay¹⁷ and is consequently a "fair" tax. Furthermore, it is argued that the income tax interferes less with economic

8. Because the income is a flow amount rather than a stock amount, it must be calculated based on an accounting period, which, in the case of income, is on an annual basis.

9. ROBERT MURRAY HAIG ET AL., *THE FEDERAL INCOME TAX* (series of lectures delivered at Columbia University in December 1920) (Robert Murray Haig ed., 1921); *see also* SIMONS, *supra* note 7.

10. I.R.C. §§ 61-63 (2000). It also allows certain other deductions for other purposes. *See* discussion *infra* Part II.A.

11. David M. Schizer, *Realization as Subsidy*, 73 N.Y.U. L. REV. 1549 (1998).

12. *Id.*

13. There are many exceptions to this rule, including non-recognition provisions such as I.R.C. section 1031 and sections 351-368, as well as placing securities dealers on a mark to market system (I.R.C. section 475).

14. I.R.C. § 1001 (2000).

15. SIMONS, *supra* note 7.

16. For examples of methods the tax system could use to eliminate the timing differences, *see* David Bradford, *Fixing Realization Accounting: Symmetry, Consistency and Correctness in the Taxation of Finance Instruments*, 40 TAX L. REV. 731 (1995).

17. STEPHEN G. UTZ, *TAX POLICY: AN INTRODUCTION AND SURVEY OF THE PRINCIPLE DEBATE* (1993).

decisions than do other taxes because all income, irrespective of source, is taxed.¹⁸ These conclusions are generally derived from a utilitarian framework.¹⁹ This Article does not attempt to question any of these presumptions and will generally assume that they are correct.²⁰

B. Insurance Aspects of the Income Tax

The income tax not only raises revenue but also provides a form of insurance for taxpayers. This insurance results from the allowance of a deduction for losses. The deduction causes the actual out-of-pocket cost associated with losses to become $(1 - t)L$, where t is the tax rate and L is the amount of the loss.²¹ If the tax rate is greater than zero, after-tax losses will be less than the original loss. As long as the tax rate is less than 100%, some of the loss remains with the taxpayer. Thus, the income tax deduction serves only as partial insurance²² because, under current rates of tax, most of the loss remains with the taxpayer.²³ Even so, this insurance aspect of the income tax has very large effects on the utility of taxpayers. Kniesner and Ziliak estimate that its effect on utility is

18. I.R.C. § 61 (2000). Interference with economic decisions is generally viewed as decreasing the efficiency of the economy. If all types of income are taxed at the same rate, decisions between whether to earn income from one activity or another should not be affected by the income tax. See Terrence R. Chorvat, *Ending the Taxation of Foreign Business Income*, 42 ARIZ. L. REV. 835 (2000). But see discussion *infra* Part I.C for analysis of Pigouvian taxes (discussing the issue of the allocation between income and consumption that is created by the income tax).

19. See Thomas D. Griffith, *Should "Tax Norms" Be Abandoned? Rethinking Tax Policy Analysis and the Taxation of Personal Injury Recoveries*, 1993 WIS. L. REV. 1115 (analyzing pain and suffering damages under an *ex ante* Pareto superiority norm yields different conclusions than under traditional tax norms like horizontal equity and the ideal tax base, norms which should be abandoned because they are not grounded in general ethical theory); see also Louis Kaplow, *The Income Tax as Insurance: The Casualty Loss and Medical Expense Deductions and the Exclusion of Medical Insurance Premiums*, 79 CAL. L. REV. 1485 (1991).

20. For works which attempt to do this, see Edward McCaffrey, *Cognitive Theory and Tax*, in BEHAVIORAL LAW AND ECONOMICS 398 (Cass R. Sunstein ed., 2000).

21. For an analysis of the potential "double recovery" for victims of crime, see *People v. Sullivan*, 71 Cal. Rptr. 2d 440 (Ct. App.), *appeal granted and opinion superseded*, 955 P.2d 448 (Cal. 1998) (explaining that statute which required criminal convicts to pay restitution, convicts could not deduct payments from victim's insurer); Eric Kades, *Windfalls*, 108 YALE L.J. 1489 (1999).

22. See Robert A. Baruch Bush, *Between Two Worlds: The Shift From Individual to Group Responsibility in the Law of Causation of Injury*, 33 UCLA L. REV. 1473 (1986); see Griffith, *supra* note 19.

23. The highest marginal rate is 38.6%, which is scheduled to decline to 35%. I.R.C. § 1(a)(i) (2000). Therefore 61.4% of the risk remains with the taxpayer. This calculation ignores state taxation which reduces the risk retained by the individual even further.

approximately the same size as automobile insurance or health insurance.²⁴

This section will explore how the income tax rules provide insurance to taxpayers in specific situations. It will discuss how this insurance is provided as well as the limitations on this insurance.

1. *Losses of Business and Investment Property.*—Losses of business property are generally deductible when the property is damaged.²⁵ Under the Haig-Simons definition of income, the amount of loss in the value of property held for use, either in a trade or business or as an investment, is the associated reduction in income of the taxpayers. For example, assume A has a business and the total assets of the business are worth \$100,000 at the beginning of the year, including a \$10,000 computer. If the computer is destroyed and has to be replaced,²⁶ A has suffered a \$10,000 loss and the net value of assets of the business is now \$90,000. Because there has been a net decrease to wealth, A's taxable income is reduced by \$10,000.²⁷ Hence, the amount of income tax A owes will be reduced by \$10,000 multiplied by the tax rate.

An alternative way of addressing potential loss is for the owner to take out an insurance policy against the loss. This transfers the risk of loss to an insurance company, which presumably will not be as risk averse as the taxpayer.²⁸ If the insurance policy is actuarially fair, the cost of the policy will be equal to the risk of loss multiplied by the potential loss.²⁹ Hence, the premiums are simply the expected value of the loss. In order to not distort the taxpayer's decision of whether to purchase an insurance policy or to self-insure, the tax system should allow the insurance premiums to be deducted in the same manner as would be the loss.³⁰ Furthermore, any recovery made under the insurance policy should not be included in income. Unless the amount of insurance over-compensates the insured for the amount of loss, recovery under the insurance policy merely returns the insured to the same economic position that existed prior to the loss. To illustrate this, in the previous example, if the risk of loss was 2%, the actuarially fair premium would be \$200.³¹ If A took out such a policy and suffered a \$10,000 loss, he would receive a \$10,000 insurance payment. There would have been no net change in wealth. However, payment of the insurance premium is equivalent to a loss and should therefore be

24. Kniesner & Ziliak, *supra* note 2.

25. I.R.C. § 165(c) (2000).

26. This example assumes the computer is not insured.

27. I.R.C. §§ 162, 165 (2000).

28. WALTER NICHOLSON, MICROECONOMIC THEORY (1998). This results from the diversification of the risk. George Priest, *Rethinking the New Deal and the Liberal State: The Role of Government as Insurer* (Nov. 8, 2001) (unpublished working paper), available at <http://lawschool.stanford.edu/olin/papers/GeorgePriestSpring2002.pdf>; see also Terrence R. Chorvat, *Ambiguity and Income Taxation*, 23 CARDOZO L. REV. 617 (2002).

29. NICHOLSON, *supra* note 28.

30. If such losses were not deductible, then the tax system would encourage the losses to be self-insured. See discussion *infra* Part I.C.

31. This is 2% of \$10,000.

deductible.³²

Allowing deductions for insurance premiums permits taxpayers to arrange their affairs so as to increase the expected value of the risks and rewards. The tax system neither encourages nor discourages insuring against these losses. In the example above, if the taxpayer self-insured, the expected value of the deduction would be \$200 and the insurance premium would also create a \$200 deduction.

2. *Losses of Personal Property.*—The analysis of the treatment of losses on property used for consumption purposes is more difficult than for property used for the production of income. Personal use property is used by the taxpayer in activities which do not generate taxable income. This property is used in consumption activities. Such expenses are not deductible for income tax purposes because they represent the very thing that is designed to be taxed.³³ For example, rent paid on one's personal apartment is generally considered to be a consumption expense, as are amounts paid for food or entertainment.

Items that will continue to provide consumption benefits beyond the current year are known as consumer durables. If one buys an apartment instead of renting it, the expense is the purchase of a consumer durable because the benefits of the purchase will presumably last beyond the current year. As with regular consumption expenses, expenditures for consumer durables are not deductible because such expenditures are viewed as not for the production of income³⁴ but rather for consumption. Generally gains on the sale of consumer durables are includible in income,³⁵ whereas losses from the sale of these assets are not deductible.³⁶ Losses from the sale of consumer durables are generally viewed as consumption expenses.³⁷ For example, the reduction in the value of a car reflects the fact that the amount of consumption use remaining has decreased because some of it has been used by the taxpayer. There are exceptions to the inclusion of gain on consumer durables (such the exclusion for the sale of the house)³⁸ but the argument in favor of these provisions has little to do with properly measuring income. These rules are justified as an attempt to encourage productive behavior.³⁹

The purchase of these consumer durables in essence receives a tax preference as compared with renting or leasing the same property. The tax preference results because the income tax code does not tax imputed income from owning a consumer durable. To understand how this imputed income arises, one has to

32. I.R.C. §§ 162, 212 (2000).

33. SIMONS, *supra* note 7 (referring to the Haig-Simons definition of income: consumption plus change in net wealth).

34. SANFORD M. GUERIN & PHILLIP POSTLEWAITE, FEDERAL INCOME TAXATION 715 (1998).

35. *Id.* at 716.

36. I.R.C. § 262 (2000).

37. GUERIN & POSTLEWAITE, *supra* note 34, at 715.

38. Currently an individual taxpayer can exclude up to \$250,000 of gain on the sale of a primary residence and married couples can exclude up to \$500,000 of gain.

39. Here, to encourage home ownership; *see* discussion of Pigouvian taxes *infra* Part I.C.

view the purchase of a consumer durable as a form of investment. This investment gives returns of two kinds. First, it gives a monetary return when and if the asset is sold. Second, it gives returns in the form of the use of the asset for which the individuals would otherwise have to pay. This second form of return is equal to the amount of rent the individual would have paid to lease the item. This imputed return is generally not subject to tax. Because this imputed income is not subject to tax, the purchase of the asset is tax-favored.

To illustrate this, consider two hypothetical taxpayers. The first taxpayer invests \$400,000 in securities which produce a return of 10% a year, and the taxpayer uses after-tax returns to rent a house. If the income on the investment is taxed at a 30% rate, then the amount of rent that the securities can support is \$28,000 ($40,000 \times .7 = 28,000$). On the other hand, consider a different taxpayer who purchases the house for \$400,000.⁴⁰ The taxpayer pays no tax on the imputed value of the house. If the house earned a 10% return as well, because this return is not taxed, it can support a higher rent of \$40,000. The taxpayer would have an incentive to purchase a house rather than invest in securities and rent a house.⁴¹

One might initially think that losses on consumer durables should be deductible because the total net wealth of the taxpayer is reduced by such losses. However, as discussed above, much of the loss on personal property is disallowed because the decrease in value of the asset is really a consumption expense.⁴² Therefore, any deduction for losses on personal property must result from losses that occur from unexpected events rather than planned for consumption.⁴³ If one suffers a loss that does not result from consumption, that loss represents a reduction in income.

One might argue that, unlike property used for the production of income, a large portion of the returns from personal property are not subject to tax,⁴⁴ because there is no corresponding casualty gain provision, and allowing the losses to generate tax benefits would create an asymmetrical treatment of gains and losses on personal property. However, if the consumer durable is sold at a gain, this gain generally will be taxed and so, strictly speaking, it is not true that casualty gains always escape taxation.⁴⁵ There may be a timing advantage to the

40. The analysis here assumes an efficient investment market. That is, if housing assets have lower returns, then they have lower risks, and if corporate stocks have higher returns, they thus have higher risks.

41. The United Kingdom experimented with taxing the imputed income from housing, but this was very unpopular and was repealed. See JOSEPH M. DODGE, *THE LOGIC OF TAX* 312-13 (1989). What will likely happen in the situation in the example is that the taxpayer will invest in housing until the return on housing drops to the after-tax rate of other assets. See Boris Bittker, *Equity, Efficiency and Income Tax Theory: Do Misallocations Drive Out Inequities?*, 16 SAN DIEGO L. REV. 735 (1979).

42. *Id.*

43. GUERIN & POSTLEWAITE, *supra* note 34.

44. UTZ, *supra* note 17.

45. If the item is never sold, it will not be taxed, but then has the taxpayer in fact experienced

way gains versus losses are treated, in that such gains are included only when the property is sold, whereas casualty losses are deductible in the year in which they occur. However, such gains are taxed; therefore, there is no inconsistency.⁴⁶

The notion behind the rules for the casualty loss deduction is that once the loss exceeds the consumption use of the property, loss really represents a loss in net wealth, and so should be allowed as a net deduction. The mechanics of this provision are that, to the extent that the total casualty losses for the year exceed 10% of the adjusted gross income,⁴⁷ these losses can be deducted. Furthermore, each casualty loss is deductible only to the extent that it exceeds \$100.⁴⁸ The loss must be the result of some sudden and unexpected event such as theft, hurricane, flood, earthquake, or terrorist attack.⁴⁹ To the extent the loss is covered by insurance, it is not deductible.⁵⁰

The cost of insurance for losses on such property is not deductible.⁵¹ Rather, this cost is viewed as a consumption expense. To compensate a deductible loss would be illogical. The insurance premium is simply the expected value of the loss. Because such losses may be deductible⁵² but insurance premiums are not, the tax rules encourage self-insurance of these losses. This rule might decrease the desire of individuals to take out insurance because of the insurance provided by the tax system.⁵³ To illustrate, assume the taxpayer has an asset worth \$100 but which has a 10% risk of loss with a \$100 replacement cost.⁵⁴ The expected real cost of the asset is then \$100 + \$10 (10% of \$100). The alternate way to address the cost is to insure the loss, for which the actuarially fair premium is \$10.⁵⁵ Hence, a risk-neutral investor would be indifferent between insuring the loss and not insuring it. However, if the loss is deductible but the insurance is not, there is now an incentive to self-insure the loss. If the tax rate is 30%, then the after-tax loss is only \$70, yielding an expected cost of \$7, but the after-tax cost of the insurance is still \$10. Thus the current rules distort the decision in

a gain?

46. GUERIN & POSTLEWAITE, *supra* note 34.

47. Adjusted Gross Income, or AGI, is defined by I.R.C. section 62 as gross income (I.R.C. section 61 defines this as essentially gross receipts) minus the expenses incurred in producing these gross receipts.

48. Furthermore, these deductions are itemized deductions, so that they are also subject to the limits imposed on itemized deductions in I.R.C. sections 67 and 68.

49. *Popa v. Commissioner*, 73 T.C. 130 (1979).

50. I.R.C. § 165 (c)(3) (2000).

51. GUERIN & POSTLEWAITE, *supra* note 34.

52. I.R.C. § 165(c)(3) (2000).

53. Kaplow, *supra* note 19.

54. To keep this simple, we will assume that there is no chance that the replacement property will be destroyed. If it too had a 10% chance of destruction, this would translate into a 11.11% increase in the cost rather than a 10% increase in the cost.

55. The actuarially fair premium is the expected value of the loss, which here is \$10 (or .1 X \$100).

favor of not insuring property against casualty events.⁵⁶

As one might expect, the recovery from the insurance company is not included in income.⁵⁷ If the taxpayer has suffered a loss and the insurance compensates the taxpayer for this loss, the taxpayer has not had a gain, but rather is in the same position as before the incident. Hence, the taxpayer has not increased her command over society's resources.

3. *Tort Recoveries.*—In general, tort recoveries which arise from physical injuries are excludible from income,⁵⁸ whereas tort recoveries from non-physical injuries, such as defamation and anti-trust, are generally includible in income.⁵⁹ Payments for destruction of property are examples of payments for non-physical injuries.⁶⁰ In this case, payments for the physical capital are excluded, but payments for lost income are includible in income. If the origin of the claim is a physical injury, recoveries for lost wages are excluded even though such recoveries would have been included in income had they been actually earned.⁶¹

Recoveries for pain and suffering are excluded from income. Pain and suffering recoveries are intended to be equal to the utility lost by the accident.⁶² While wealth has increased as a result of the recovery, the tort victim is no better off after the recovery than before the accident.⁶³ Therefore, pain and suffering recoveries are not included in income, because they do not really improve the recipient's situation. The exclusion of such rewards is analogous to exclusion of casualty recoveries from insurance.⁶⁴

4. *Medical Expenses.*—The treatment of medical expenses is in many ways similar to the treatment of losses on personal property. Routine medical expenses (for things like check-ups, etc.) are treated as consumption expenses which are not deductible because they are simply a cost of living. However, if severe medical problems occur, for example some catastrophic disease, then the expenses incurred to treat this condition are viewed as representing a loss to the ability of the taxpayer to consume and hence should be deductible.

Under the Internal Revenue Code, medical expenses are generally deductible. However, they are subject to a floor of 7.5% of adjusted gross income.⁶⁵ Self-employed individuals are also allowed to deduct a portion of the amount they pay for medical insurance. For tax years 2004 and following, the full amount of medical insurance will be deductible by self-employed individuals.⁶⁶ While there are differences, this system is in many respects rather like the casualty loss

56. Kaplow, *supra* note 19.

57. I.R.C. § 104(a) (2000).

58. *Id.*

59. GUERIN & POSTLEWAITE, *supra* note 34, at 716.

60. *Id.* at 717.

61. *Id.*

62. Griffith, *supra* note 19.

63. *Id.*

64. Kniesner & Ziliak, *supra* note 2.

65. I.R.C. § 105 (2000).

66. *Id.*

system, where routine expenses are treated as consumption, while severe losses are treated as real reductions in net wealth. One key distinction between medical expenses and casualty losses is the treatment of the costs of insurance. Insurance for casualty losses on personal property are generally not deductible; however, medical insurance payments are generally either deductible or excludible.⁶⁷ Medical insurance when paid by the employer is both deductible to the employer as compensation and generally not includible to the employee (the equivalent of deductibility).⁶⁸ Furthermore, recoveries under medical insurance are not includible; thus, medical payments covered by insurance that are below the 7.5% of adjusted gross income threshold are treated more favorably than self-insured amounts.⁶⁹ The tax system therefore encourages the purchase of medical insurance. This is the reverse of most casualty losses, where self-insured losses are often treated more favorably than insured losses.⁷⁰

5. Special Provisions Dealing with Losses from Terrorism.—There are very few provisions of the Internal Revenue Code that apply specifically to victims of terrorist acts. The most recent of these provisions are found in the Victims of Terrorism Tax Relief Act of 2001. The Victims of Terrorism Tax Relief Act of 2001 applies to victims of the Oklahoma City Bombing, the September 11 attacks, and bioterrorism involving anthrax between September 11 and January 1, 2002.⁷¹

The provisions of the act include:

- (i) income waived for year of death and at least one prior year, with a minimum benefit of \$10,000 per victim;
- (ii) \$3 million in assets shielded from federal and state estate tax plus \$8.5 million in assets for 2001;
- (iii) exclusion for workers' compensation benefits, death benefits, payments from government retirement plans, and payments from employer due to terrorism attack;
- (iv) charitable payments exempt;
- (v) forty percent excise tax on beneficiaries of structured settlements who cash out unless court approved;
- (vi) exemption for disaster relief payments; and
- (vii) additional authority for Treasury secretary to waive Internal Revenue Code provisions.

The Act only applies to those who die as a result of the attacks. It essentially extends the tax benefits that apply to soldiers who die in combat area to civilians

67. *Id.*

68. *Id.*

69. Almost ironically, the deductibles on insurance recoveries (i.e., amounts actually paid by the taxpayer) might easily not be deductible.

70. See discussion *supra* Part I.B.2.

71. FBI experts have stated that the terrorist responsible for the anthrax cases appears to have been a domestic microbiologist, so there may be a different policy applicable in the case of the anthrax poisonings. Laura Parker, *Anthrax Probably Domestic: Investigators Focus in U.S. Laboratories*, USA TODAY, Dec. 18, 2001, at 1A.

who die as a result of terrorist attacks against the United States.⁷² One of the main justifications for these provisions was that such civilians have been put in the same position as combat soldiers because, in the words of Rep. William M. Thomas (R-CA), Chairman of the House Ways and Means Committee, they “took it on the chin for America.”⁷³

In connection with an earlier terrorist attack, Congress passed the Aviation Security and Improvement Act of 1990⁷⁴ (which never became part of the Internal Revenue Code), granting income tax exemptions to taxpayers who died as a result of the Pan American Airways Flight 103 Terrorist disaster over Lockerbie, Scotland, for the year of the attack and the prior year. As with the Victims of Terrorism Relief Act, this act was targeted to victims of specific terrorist attacks.

The only provision in the Internal Revenue Code which applies specifically to acts of terrorism in general (as opposed to specific incidents) is found in I.R.C. section 104(a)(5). That provision exempts from income tax amounts received as disability income attributable to injuries incurred as a direct result of a violent attack which the Secretary of State determines to be a terrorist attack and which occurred while the injured individual was an employee of the United States engaged in performing official duties outside of the United States. Normally such receipts would be includible as lost wages.⁷⁵

C. *Effects of the Current Tax Rules on Behavior*

As discussed earlier, the income tax provides a form of insurance.⁷⁶ If a taxpayer incurs a loss that is deductible, then the taxpayer really only suffers a loss equal to the amount of the loss multiplied by (1- the tax rate). Of course, if the loss is only partially deductible, then the actual loss to the taxpayer is increased to the extent the loss is not deductible.

As also stated earlier, it is generally assumed that the tax system should alter the behavior of taxpayers as little as possible.⁷⁷ However, many provisions selectively violate these neutrality principles.⁷⁸ The primary line of analysis that justifies using the tax system to alter the behavior of taxpayers argues that, where

72. *Thomas-Rangel Bill to Provide Relief for Terrorist Attack Victims*, TAX NOTES TODAY, Sept. 20, 2001, at 183-91. I.R.C. section 112 allows an exclusion from taxable income for income earned while in a combat zone or while hospitalized from injuries received in a combat zone.

73. *Id.*

74. Pub. L. No. 101-604, 104 Stat. 3081 (1990).

75. The Job Creation and Worker Assistance Act of 2002, Pub. L. No. 107-147, 116 Stat. 21 (2002). Businesses that qualify are those that either are located in the New York Liberty area (near the World Trade Center) and chose to stay or those that had to relocate from that area. It allows a credit of 40% up to the first \$6000 of salary for those working more than 400 hours before Jan. 1, 2003. This is not subject to tax credit limitation of section 38. This act did not modify the Internal Revenue Code.

76. Griffith, *supra* note 19.

77. Chorvat, *supra* note 18.

78. For examples, see UTZ, *supra* note 17.

a particular behavior results in externalities to others, and the rules are designed to make the taxpayer account for the effects of their behavior on others, these changes can be improve efficiency. This theory was put forth by A.C. Pigou.⁷⁹ Consequently, taxes which are designed to account for externalities are known as Pigouvian taxes. The most common illustration of Pigouvian taxes is an effluence or pollution tax. If the polluter is assessed a tax equal to the costs imposed on others, the optimal level of pollution should result. The converse of this analysis argues that benefits should be given by the government to those who engage in socially productive behavior in which the individuals who engage in the behavior do not receive a share of the benefits proportional to their contributions. If, for example, a person builds a school for the community, because the benefits to the community are not captured by the builder, the government should provide a benefit to the builder.

From the perspective of an individual taxpayer, it is difficult to argue that losses from terrorism are somehow worse than other losses to which individuals are subject. Death is an ever present possibility, as is the loss of property and other assets. Therefore, any special tax rules for losses from terrorism should be based on some theory beyond the accurate calculation of income. Pigouvian analysis is therefore a helpful framework to justify such provisions.

Providing additional security to protect one's person, family, or business against terrorist attack creates a number of externalities for others. Most notably, a network of persons providing security against terrorism increases the security of each member beyond that which the expenses of an individual actor could create.⁸⁰ These expenses can therefore create positive externalities for others. These benefits are not likely to be accounted for in the calculation of deciding the appropriate amount of security unless some coordination occurs. Therefore, if the government causes each actor to receive more of the benefits he or she confers upon others, each actor will face more appropriate incentives.

The increased expenses which businesses will have to bear as a result of terrorist attacks include increased security. Security expenses may not be provided at the optimal level because of possible externalities which result from the very act of providing security.⁸¹ That is, because those who are providing security do not receive all of the benefits, they may very likely under-provide security. Because protecting oneself can generate significant externalities, they must be accounted for and actually encouraged.⁸²

If greater insurance benefits are provided for risks from terrorism, less of the risk of terrorism will remain with individuals. If less risk remains with individuals, one might argue that we may be creating moral hazards for the behavior of these individuals. Because individuals and corporations will not face as great a cost, they may take fewer precautions against becoming victims of terrorism. On an individual level this seems ridiculous. However, such

79. ALEXANDRE C. PIGOU, A STUDY IN PUBLIC FINANCE 61 (3d ed. 1942).

80. KUNREUTHER & HEAL, *supra* note 3.

81. *Id.*

82. *Id.*

insurance is far from perfect. No insurance can ever fully make up for the loss of one's life or the life of a loved one.⁸³ Therefore, the degree of moral hazard created is rather minimal. The majority of the risk will always rest with the taxpayer. Further, as long as the tax code deals symmetrically with losses from terrorism and expenses to protect against terrorism, no moral hazard is created. In that case, the individual actor will face $(1-t)\%$ ⁸⁴ of the costs of being a victim as well as $(1-t)\%$ of the costs of providing security. That is, the tax system will symmetrically reduce the costs of taking precautions against loss as well as the potential loss itself.

II. ANALYSIS OF THE EFFECTS OF THE TAX RULES ON INSURANCE COMPANIES

This section examines the effects of the tax rules on those whose business it is to mitigate risks: insurance companies. It concludes that the current tax system creates some inappropriate incentives. In particular, it creates disincentives to insure against events which result in large-scale losses. This section first examines the tax rules that apply to insurance companies. Then, it examines the effects of the rules on behaviors that relate to losses from terrorism.

A. Taxation of Insurance Companies

The most striking loss from terrorist attacks is clearly the loss of life. However, because the 3,000 or so deaths did not significantly change the rate of death in this country,⁸⁵ life insurance companies did not face the problems of other insurers.⁸⁶ From an insurance perspective, the most troubling losses were those of property. Attack-related losses caused the entire casualty insurance industry to suffer losses. The losses incurred in the terrorist events of 2001 exceeded the profits of the insurance industry for five years.

The taxation of casualty insurance companies is similar in many ways to the taxation of other businesses. Premiums,⁸⁷ as well as income earned by investments, are included in income⁸⁸ and the payouts on the insurance policies are deductible.⁸⁹ For years in which losses not only exceed current income but also exceed income for the last three years,⁹⁰ losses do not generate a current tax benefit. Such losses can be carried forward and reduce the tax owed in future years. The net present value of the future benefits is reduced compared to

83. An exception to this would involve those who commit suicide to earn insurance money, something few are interested in doing.

84. The quantity $(1-t)$ is the proportion of a deductible expense which remains with the taxpayer.

85. Approximately twice as many people as that die every day. Woo, *supra* note 1.

86. This assumes that such large-scale events are unlikely to become very common or that the pattern of terrorism, to strike at symbols rather than population centers, holds.

87. I.R.C. §§ 831, 832 (2000).

88. I.R.C. § 831 (2000).

89. I.R.C. § 832 (2000).

90. I.R.C. § 172 (2000).

obtaining a current benefit. So in years in which the insurance companies incur large losses, the value of the losses for tax purposes is less than their full value, because they may not generate a current tax benefit. The timing effect caused by these limitations can have a significant effect on the value of tax benefits.⁹¹ In fact, empirically, the value of the losses is on the order of three-fourths of the value one would estimate from a simple calculation of the tax rate multiplied by the loss.⁹² This creates an incentive to spread the losses to more diversified pools of losses.⁹³ However, when the profits of the entire industry for a year or two are wiped out, as they were from the events of September 11, there is a large loss which cannot be diversified.⁹⁴ Market risk cannot be diversified, and when losses affect the entire casualty industry,⁹⁵ insurance companies which can often behave in a risk-neutral manner behave in a risk-averse manner.⁹⁶ The natural result of this is that insurance companies will increase insurance premiums and, as a result, will increase the risk aversion of the entire system.⁹⁷ Therefore, there will be a tax disincentive to insure large catastrophic losses.

The rules that apply to life insurance are more favorable. The taxable income of life insurance companies includes premiums received and companies are allowed to deduct death benefits paid, reserve increases, policy holder dividends paid, and the operations loss deduction from income.⁹⁸ Life insurance companies are also permitted to deduct a reserve for expected losses.⁹⁹ This deduction serves to smooth out losses, because they are booked at expected value, rather than having to wait until they are actually paid out. As discussed above in conjunction with casualty insurers, waiting for actual deaths could create a great deal of variation in deductions from year to year.¹⁰⁰

B. Effects on Risk-Taking

One of the most interesting conclusions in the public finance literature argues

91. Saman Majd & Stewart Myers, *Tax Asymmetries and Corporate Tax Refunds*, in EFFECTS OF TAXATION ON CAPITAL ACCUMULATION (Martin Feldstein ed., 1987).

92. *Id.*

93. This would smooth out the deductions among different tax years. The expenses would be the premiums paid to the re-insurer and this would occur each year, rather than when the losses occurred. See RICHARD BREALEY & STEWART MYERS, *PRINCIPLES OF CORPORATE FINANCE* (6th ed. 2001); see also I.R.C. § 831 (2000).

94. Woo, *supra* note 1.

95. BREALEY & MYERS, *supra* note 93.

96. *Id.*

97. For an argument that the risk aversion of the total system should be increased by the tax system than rather be decreased, see *infra* note 121 and accompanying text.

98. I.R.C. § 804 (2000).

99. *Id.*

100. William Beaver & Maureen McNichols, *The Characteristics and Valuation of Loss Reserves of Property and Casualty Insurers*, 3 REV. ACCT. STUD. 73 (1998).

that a "pure income tax" can result in more risk-taking by individuals.¹⁰¹ Under this line of analysis, if an income tax with full-loss offsets¹⁰² is imposed, it will result in greater investment in risky assets by taxpayers.¹⁰³ As explained more fully below, these investment shifts occur because such an income tax shifts some of the risk of a taxpayer's investments to the government. This risk shifting results from the government sharing both in the income and the loss of an investment to the same extent.¹⁰⁴ Taxpayers are essentially able to eliminate the tax burden on capital income by shifting more capital to risky assets.¹⁰⁵

This analysis was first put forth by Evsey Domar and Richard Musgrave.¹⁰⁶ They made a number of assumptions in their model. First, as stated above, they assumed the income tax has full loss offsets. Second, they assumed that investments have constant marginal returns.¹⁰⁷ Third, they assumed that transactions costs are zero.¹⁰⁸ Many economists believe that the Domar-Musgrave model describes the U.S. economy.¹⁰⁹

Under the Domar-Musgrave model, an income tax will cause investors to increase the amount of capital allocated to risky investments. The key notion behind these results is that an income tax reduces both the expected return of an investment and the variance (or risk) of the investment proportionately. If the marginal rate of return is constant, investors can return to their pre-tax rate of

101. Louis Kaplow, *Taxation and Risk-Taking: A General Equilibrium Perspective*, 42 NAT'L TAXJ. 457 (1994).

102. This means that if losses are incurred, the tax benefits obtained are symmetrical to the tax costs of earning income (e.g., if there is \$100 of income and the tax rate is 30%, the taxpayer pays \$30 in tax, but if there is a \$100 loss, the taxpayer receives \$30 from the government).

103. This hypothesis was first formulated in Evsey D. Domar & Richard A. Musgrave, *Proportional Income Taxation and Risk-Taking*, 58 Q.J. ECON. 388 (1944). See generally M.G. Allingham, *Risk-Taking and Taxation*, 32 ZEITSCHRIFT FÜR NATIONALÖKONOMIE 203 (1972).

104. Under a pure income tax, if a taxpayer has \$100 in pre-tax income, \$30 or 30% is given to the government. If the taxpayer has a \$100 loss, under a pure income tax there are full loss offsets, so the taxpayer will obtain a benefit (either a check from the government or a reduction in taxes of \$30). Hence, the government will share in both the loss and the gain to the same extent.

105. For an allied idea that income tax insulates consumption by providing insurance, see Kniesner & Ziliak, *supra* note 2.

106. They credit the insight to Henry Simons, although he did not formulate it in any systematic way in his writings. See A.B. Atkinson, *The Collected Papers of Richard A. Musgrave: A Review Article*, 33 J. PUB. ECON. 389, 394 (1987).

107. Constant marginal returns occur when the investor does not affect the return on an asset by investing more or less in that asset. One consequence of this assumption is that the prices of assets do not change as a result of the imposition of the tax. HAL R. VARIAN, *MICROECONOMIC ANALYSIS* (1990).

108. It is also assumed that the investor is risk averse. However, this follows from the fact that there is a premium for risk. For a discussion of this and other restrictions of the model, see Joseph Stiglitz, *The Effects of Income, Wealth and Capital Gains Taxation on Risk-Taking*, 83 Q.J. ECON. 263 (1969).

109. Chorvat, *supra* note 18.

return by shifting more capital to the risky asset. Under the Domar-Musgrave model, the true burden of an income tax is not the revenue paid to the treasury. If all the assumptions are met, there essentially is no burden of the tax to the taxpayer.¹¹⁰ The income tax has effectively made the government a partner in the investments of the taxpayer.

It is easiest to illustrate the operation of the Domar-Musgrave model if we first assume the riskless rate of return is zero. This means that an investment that bears no risk of loss will not produce any income. Only an investment that has a risk of loss will produce a positive return. While this may seem unrealistic, most calculations of the real (i.e., inflation adjusted) riskless rate of return are very small.¹¹¹

We assume that an investor has optimally invested his or her capital before any income tax has been imposed. An income tax imposed on the income from the assets in the portfolio would cause the risky asset to be proportionately less risky and have a proportionately lower rate of return. If the asset had a loss of \$100 and the tax rate was 30%, then the after-tax loss would be only \$70. Conversely, if the asset had a gain of \$100, then the after-tax gain would be only \$70. More generally, both the risk and the return on the investment are reduced to $(1-t)$ multiplied by pre-tax values of risk and return respectively, where t is the tax rate. By shifting more investments into risky assets, the taxpayer can return to pre-tax rates of return.¹¹² An investor can avoid the effects of an income tax by increasing the amount invested in the risky asset to $a/(1-t)$,¹¹³ where a is the proportion of the portfolio invested in the risky asset prior to the imposition of the tax.¹¹⁴ This result occurs with any tax rate below 100%, if there is a positive rate of return on the asset.¹¹⁵

For example, assume that an investor with \$200 can choose between a riskless asset with a zero rate of return and a risky asset that will produce either a 30% gain (with a probability of 50%) or a 10% loss (with a probability of 50%), for a positive expected return of 10%¹¹⁶ in a year. Assume that in a tax-

110. The government is in effect taking on risk and being compensated for doing so. It is, in effect, issuing an insurance policy. See Kniesner & Ziliak, *supra* note 2.

111. The inflation adjusted risk-free rate of return from 1926 to 1996 was .6%. IBBOTSON ASSOCIATES, STOCKS, BONDS, BILLS, AND INFLATION: 1997 YEARBOOK 88 (1997).

112. Domar & Musgrave, *supra* note 103.

113. This is because the after tax rate of return is $(1-t)x$, where t is the tax rate and x is the pre-tax gain. The after-tax risk of the asset is also reduced to $(1-t)y$, where y is the pre-tax loss. If the taxpayer shifts $a/(1-t)$ to the risky asset, where a is the proportion of the portfolio in the risky asset before the tax was imposed, then the after-tax rate of return on the asset is ax or $(ax(1-t)/(1-t))$, and its risk is also ay or $(ay(1-t)/(1-t))$. If the shifts are made, the after-tax rates of risk and return are the pre-tax rates of risk and return.

114. See ANTHONY B. ATKINSON & JOSEPH E. STIGLITZ, LECTURES ON PUBLIC ECONOMICS 118 (1980); see Jan Mossin, *Taxation and Risk-Taking: An Expected Utility Approach*, 35 ECONOMICA 74 (1968) for an alternative derivation of this result.

115. See *supra* note 104. The proportion is undefined at 100%.

116. The calculation is: $[(.3 \times .5) - (.1 \times .5)] = .1$.

free world, the investor would divide the portfolio equally between the risky and the riskless asset (i.e., \$100 in each). After a year, the riskless asset is still worth \$100, and the risky asset is worth either \$130 or \$90. Hence, the investor will have a total of either \$230 or \$190, and an expected total return of \$210.

Imposing a 30% income tax with full loss offsets will decrease the average return on an investment by the amount of the tax. However, it will also reduce the riskiness of the investment by the amount of the tax benefit (i.e., deduction, credit, etc.) that results from a loss.¹¹⁷ The two effects combine so that an investor can avoid the effects of the 30% tax by increasing the amount allocated to the risky asset to \$142.86 and reducing the amount invested in the riskless asset to \$57.14. In that case, at end of the year, the riskless asset is still worth \$57.14. After the income tax is paid, the risky investment will be worth either \$172.86¹¹⁸ or \$132.86.¹¹⁹ The investor will have a 50% chance of having a net worth of \$230 and a 50% chance of having a net worth of \$190 after taxes. The investor is in the same position as if there were no tax at all.

The government collects revenue from capital income even though the investor obtains the same return after the imposition of the tax as before the tax because the income tax has forced the investor to have a portfolio that is riskier on a pre-tax basis. While the private risk to the investor has not changed, total risk undertaken by society has. However, it is the government that bears the additional risk. In essence, the tax revenue is the compensation the government receives for taking the additional risk.¹²⁰

Taxpayers are willing to take on more risk than would be the case in the absence of the tax. This Article will assume that the general level of risk that results from a perfect income tax is appropriate,¹²¹ although there maybe some specific areas in which the income tax may not allocate this risk appropriately. There are good reasons for arguing that society might want to encourage additional risk taking from that which would occur in the absence of an income tax.¹²² One important assumption made in the model is that losses can be utilized at their full value. The more reduced the ability of the taxpayer to currently

117. If there are full loss offsets, then some kind of tax benefit must flow to the taxpayer when there is a loss. See *supra* note 104.

118. Here, the after-tax value of the risky asset is the after-tax rate of return $(1 + (1-t)r$, where r is the pre-tax rate of return) times the amount of capital in the asset $(100/(1-t))$, which equals $(1 + (1-.3).3)(100/[1-.3])$ or 172.86.

119. Here, the value of the risky asset after-tax is the after-tax rate of return $(1 + (1-t)r$ times the amount of capital in the asset $(100/(1-t))$, which equals $(1-(1-.3).1)(100/[1-.3])$ or 132.86.

120. Domar & Musgrave, *supra* note 103. If all of their assets in risky assets have already been invested, then the shift can be accomplished by borrowing. The government is essentially investing in a portfolio of stocks equal to $(1/(1-t))$ of all the assets subject to the tax. This is the capital shifted into the risky assets. See discussion *infra* Part II.B.

121. Chorvat, *supra* note 18; see Terrence Chorvat, *Apologia for the Double Taxation of Corporate Income*, 38 WAKE FOREST L. REV. (forthcoming).

122. Chorvat, *supra* note 28.

utilize losses, the less investment will be shifted to riskier assets.¹²³ If the Code restricts the use of losses, it will reduce risk-taking behavior by the taxpayer.¹²⁴ Hence, because losses are restricted, in the case of insurance, underwriting companies will be more risk-averse than would otherwise be the case.

Fewer restrictions on deductibility of losses for insurance companies, for those risks and investments which are not likely to wipe out their profits, will result in greater acceptance of risk. By contrast, restricting the use of losses, where risks can wipe out insurance company profits, will create more risk aversion and hence higher insurance prices.

III. THE CASE FOR SPECIAL TAX BENEFITS TO IMPROVE PUBLIC POLICY

A. Improvement of Public Policy

While private parties can take precautions, in most instances the party who can most cost-effectively prevent terrorism is the government. The government has a greater knowledge of who potential terrorists are and where they are likely to strike. In general, while the government currently has many non-monetary incentives to prevent terrorism, by adding terrorism benefits to the tax system, the likelihood of an attack will have to be estimated and these facts and assumptions will have to be included in the public debate over the budget. Requiring the government to take a greater share of the losses would force decision-makers to reassess the potential risks and cause a more rational allocation of resources to prevent terrorism.

While it is not always clear that one can treat the government as a rational actor, governmental decisionmakers often do respond to incentives.¹²⁵ In particular, legislators and other government actors are more likely to be rational actors. Terrorism clearly imposes costs on parties other than the government, and it is also clear that the primary defense we have against terrorism is governmental action. Yet, because most of the loss is not borne by the government, arguably the government does not face the proper incentives to avoid terrorism. This argues for governmental insurance of losses caused by terrorism. Of course, the government already insures these losses to the extent of tax benefits that result from such losses.

Under public choice models of decision, legislators and other bureaucrats enact laws to further their own self-interest¹²⁶ While this description may not

123. Stiglitz, *supra* note 108.

124. See Diderik Lund, *Taxation, Uncertainty, and the Cost of Equity*, 9 INT'L TAX'N & PUB. FIN. 483 (2002).

125. The key to rationality is acyclicity of preferences, and Arrow's Impossibility Theorem shows that for democratic governments it can never be proven that the government will always act in non-cyclical manner. Nonetheless, it is fair to say that the government does behave in a manner with costs to it due to the choices, but it does act to minimize costs to some degree. NICHOLSON, *supra* note 28.

126. For a public choice analysis of defense spending measures, see RICHARD A. POSNER,

incorporate all aspects of how governmental decisions are made, the model possesses a fair amount of explanatory power. Legislators, as all individuals do, act to maximize self-interest. They will therefore enact legislation likely to get them re-elected. That is, actions that please contributors or large block of voters are going to be maximized. Public choice models show that, as a result, diffuse interests generally lose out to specific interests.¹²⁷ Here, the defense against terrorism represents a diffuse interest. The terrorist threats apply to very large segments of the population. Alternate interest groups are more likely to be focused and expend significant amount of resources on lobbying.¹²⁸ While one might expect that there would be a significant electoral penalty for allowing terrorist attacks, there appears to have been no political penalty for the acts of terrorism which occurred in the 1990s.¹²⁹ After September 11, the job approval ratings of most elected politicians increased. Therefore, it is not clear what pressure is placed on governmental decisionmakers to avoid terrorist attacks. On the other hand, if legislators react to budgetary pressures at all, causing terrorism to create budget pressure is more likely to result in governmental action.¹³⁰ Therefore, it is necessary to increase the costs decisionmakers face for failing to provide for security against terrorism.

B. Proposals

As discussed in Part I.B.5, the major provisions that specifically address terrorism apply only to specific terrorist events and were enacted after the occurrence of those events.¹³¹ However, given that these events will likely happen in the future because they have happened in the past (although we can hope they will not), we should apply similar rules to all victims of terrorism. There are at least two benefits that will result from this. First, there are certain procedural benefits that will accrue to codifying these rules. Codifying this relief will result in terrorism costs becoming part of what is referred to as the "tax expenditure budget." This budget reports the "tax expenditures" contained in the Internal Revenue Code. That is, it reports the amount of tax revenue that is lost as a result of provisions in the Code which are not designed to accurately define

ECONOMIC ANALYSIS OF LAW (1992); Dwight R. Lee, *Public Goods, Politics, and Two Cheers for the Military-Industrial Complex*, in *ARMS, POLITICS, AND THE ECONOMY* (Robert Higgs ed., 1990); see also Jeffrey Rogers Hummel & Don Lavote, *National Defense and the Public Goods Problem*, in *ARMS, POLITICS, AND THE ECONOMY* (Robert Higgs ed., 1990).

127. POSNER, *supra* note 126, at 749.

128. The explanation of this is related to the collective action problem. *Id.*

129. There were many terrorist events in the 1990s, including the first World Trade Center bombing, the Oklahoma City bombing, the bombing of the U.S. embassies in Kenya and Tanzania, and the bombing of the U.S.S. Cole.

130. If government budget spending were not a scarce resource, compromises would not have to be reached. NICHOLSON, *supra* note 28.

131. Mark A. Hall & John D. Colombo, *The Donative Theory of the Charitable Tax Exemption*, 52 OHIO ST. L.J. 1379, 1426 (1991).

income for tax purposes, but rather are designed to alter behavior in some ostensibly positive way. This is a budget prepared each year. Both the Joint Committee on Taxation and the Office of Management and Budget prepare their own versions of this budget. By including the expenses of terrorism within the budget, the expenses of providing defense against terrorism can be directly compared, and it will be more clear how to reach an optimal defense. Currently, only the costs of providing the defense are included in the process. Second, these expenses will be included in budget negotiations and the total amount government can spend on other projects without raising taxes will be limited.

As discussed earlier, forcing decisionmakers to face more of the costs of terrorism makes them more likely to provide a level of security closer to the optimum.¹³² There are at least three ways for governmental decision-makers to face more of these costs. First, as discussed in Part II, because the tax system currently treats losses disadvantageously as compared to income, insurance companies should be allowed to more fully utilize the losses which are generated from catastrophic events. There are a number ways to accomplish this.¹³³ The most commonly discussed methods involve unlimited ability to carry losses back to earlier years,¹³⁴ the government paying interest on loss carryforwards, or allowing tax credits for losses. A second way would be to codify special benefits for victims of terrorist attacks. This will result in lower taxes to insurance companies and higher costs to government. These benefits would increase the costs of terrorist events and cause decisionmakers to devote more resources to defending against terrorism. Third, amounts expended on security to protect against terrorism should be given a tax preference, either by a credit which exceeds the tax rate multiplied by the amount of the expense or by other means. In so doing, we need to be careful not to distort decisions on how to provide security (e.g., capital intensive vs. labor intensive). One way to insure this would be to offer in addition to the deductibility of these expenses, a credit for these expenses of 40%. This rate is greater than the current after-tax value of the deduction for such expenses (35% for corporations). One has to note that the optimal level of this credit is ambiguous.

CONCLUSION

By providing additional compensation to victims of terrorism, the U.S. tax rules can significantly improve the efficiency of both the tax system and the entire U.S. economy. Incorporating the costs of terrorism can help to provide correct incentives for individuals, corporations, most importantly, governmental decisionmakers who are responsible for the national defense budget. At present, the costs of terrorism are allocated on an *ad hoc* basis, unsupported by principled economic theory.

132. See discussion *supra* Part III.A

133. For a further discussion, see Majd & Myers, *supra* note 91.

134. This allows for a higher present value of these losses, because it is more likely to result in an immediate disbursement from the government.

Increasing the deductibility of losses for insurance companies will promote higher levels of lower-cost insurance, as well as positive externalities such as increased levels of security against terrorism. Moreover, increasing the deductibility of losses for *all* U.S. corporations will create positive externalities such as increased security measures that will promote an optimal level of security for society as a whole.