

**WHY ARE TAXES SO
COMPLEX AND WHO
BENEFITS?**

Michelle J. White is Professor of Economics at the University of Michigan. This paper is a revised version of a paper prepared for delivery to the 1988 Internal Revenue Research Conference. Research support was provided by the Law and Social Science and Economics Programs of NSF under grant number SES-8812763. The author expresses gratitude to Richard Lempert, Joel Slemrod, Suzanne Scotchmer, and Ann Witte for helpful comments.

In this article, White argues that both tax professionals and the IRS itself have an interest in a complex tax law. In the paper, the interests of three separate groups in tax law complexity are analyzed: tax professionals who represent taxpayers in disputes with the IRS -- called tax lawyers, tax professionals who prepare tax returns and give advice to taxpayers -- called tax accountants, and the IRS itself. Tax lawyers are shown to prefer an intermediate level of tax law complexity. This is because if tax law is very complex, disputing with the IRS becomes extremely expensive and taxpayers prefer to settle their tax disputes. Since tax lawyers' incomes fall if little disputing occurs, they prefer an intermediate level of tax law complexity. Tax accountants are shown to prefer that tax law be very complex, because a complex tax law increases taxpayers' demand for tax advice and tax preparation services. The IRS' preferences concerning tax law complexity are shown to depend on how an increase in tax law complexity affects its probability of winning disputes with taxpayers. If increased complexity increases the IRS' probability of winning tax disputes, then the IRS prefers that tax law be very complex, and vice versa. The IRS' preferences also depend on whether or not increased complexity resolves uncertainty concerning the outcome of tax disputes. If increased complexity increases uncertainty, then the IRS prefers that tax law be very complex, since greater uncertainty makes risk-averse taxpayers more likely to comply with tax law. Since the IRS' staff writes the rules and regulations, it can influence both the form and level of tax law complexity in line with its own preferences. The author argues that serious efforts to simplify tax law, if they are ever to succeed, will require overcoming the IRS' and tax professionals' vested interests in complexity.

Table of Contents

I. Introduction	341
II. Tax Law Complexity	342
III. Complexity and Dispute Resolution	344

A. Tax Lawyers' Preferences	346
B. The IRS' Preferences	348
IV. Complexity and the Audit Decision	350
A. The IRS' Preferences	351
V. Tax Accountants' Preferences	352
A. Return Preparers	352
B. Advice Givers	353
VI. Conclusion	354

I. INTRODUCTION

Commentators often bemoan the extreme complexity of the tax law and its tendency to become ever more complex each time Congress passes a new tax reform act. Everyone has a favorite example, but recent ones include the 140 pages of Internal Revenue Service regulations interpreting section 704(b) of the Code (relating to partnership distributive shares) and the 441 pages of regulations interpreting the original issue discount rules.^{1/} A recent study for the IRS concluded that taxpayers spent 5.3 billion hours preparing their 1986 tax returns, not including the hours spent completing the complex four-page W-4 withholding form introduced in 1988.^{2/} Other areas of high complexity include the passive activity loss provisions, the allocation of interest deductions among five different categories of interest having different tax treatments, and the foreign tax credit provisions. But despite widespread agreement that tax simplification is needed, none ever seems to be forthcoming.

A number of arguments have been proposed to explain why tax law is complex. One view is that tax law complexity is inevitable because the U.S. economy is itself complex and because tax law is used to accomplish multiple goals in addition to raising revenue, such as encouraging investment.^{3/} Another view is that tax law complexity results because revolving door lawyers working for IRS have an incentive to write complicated regulations so that when they leave for the private sector, they can sell their services as the only person knowledgeable about "their" regulations.^{4/} A third argument places responsibility for tax law complexity at Congress' door. Members of the congressional tax-writing committees "sell" tax benefits to lobbying groups in exchange for campaign contributions. These special provisions and the frequency with which they change (thereby generating new contributions from new sales) cause the tax code to become more and more complex.^{5/} While each of these ideas has a ring of truth, none seems to provide a general explanation of tax law complexity.^{6/}

In this paper, I argue that U.S. tax law is complex because both the IRS and tax professionals have a vested interest in complexity. A general model determining the type and level of tax law complexity is presented and the effects of complexity on the resolution of tax disputes and on incentives for taxpayers to evade taxes are explored.

The IRS is shown to prefer that tax law be complex both because it enables the IRS to collect more in disputes with taxpayers and because complexity discourages tax evasion. Tax professionals are shown to prefer that tax law be complex because complexity raises their incomes.

In section II of the paper, I consider how complexity in the tax law affects the predicted outcomes of disputes between the IRS and taxpayers concerning unpaid taxes. In section III, I model how complexity affects the resolution of existing tax disputes. I also consider what type and level of tax law complexity is preferred by the IRS and by tax lawyers. In section IV, I extend the model to consider how tax law complexity affects the IRS' incentives to engage in more or less auditing and how this decision affects its preferences concerning tax law complexity. In section V, I consider what type and level of tax law complexity is preferred by tax accountants.

II. TAX LAW COMPLEXITY

We first turn to characterizing tax law complexity and how it affects taxpayers' and the IRS' predictions of how disputes between them will be resolved. In any tax dispute, both the IRS and the taxpayer are assumed to predict what the outcome would be if the dispute were decided in court, with the judge finding for either the IRS or the taxpayer. A more complex law is defined as one in which more information is relevant to predicting the outcome of the dispute, and, therefore, both the IRS and the taxpayer (or her lawyer or accountant) must collect and evaluate more information in order to form predictions of the dispute's outcome.

Suppose both the taxpayer and the IRS separately predict the IRS' probability of winning the dispute if it were decided in tax court. The IRS predicts that it will win the dispute with probability $p(\text{sub I})$ and that it will lose (i.e., the taxpayer will win) with probability $1 - p(\text{sub I})$. The taxpayer predicts that the IRS will win with probability $p(\text{sub T})$ and will lose (i.e., the taxpayer will win) with probability $1 - p(\text{sub T})$. Both probabilities are subjective, since each reflects the relevant party's expectations concerning the outcome of the dispute.

Tax law complexity affects both sides' predictions of the IRS' probability of winning. For example, suppose the tax law on a particular topic consisted of a very general statement of principle, such as that legitimate employee business expenses are tax deductible. A taxpayer considering deducting commuting expenses would have little guidance from the statute concerning whether commuting expenses are legitimate employee business expenses for tax purposes. Her best estimate of the probability of the IRS winning the case if she deducted her commuting expenses and were challenged might be $p(\text{sub T}) = .5$ -- the situation in which uncertainty is maximized and the taxpayer has no better method of predicting the court's decision than flipping a coin. The IRS' prediction of its probability of winning also would be near .5.

But now suppose that the tax law on the subject becomes more complex. This might occur because Congress amends the code to include both the general statement of principle and a list of specific expenses which are allowable employee business expenses. Alternately, the courts might over time decide a number of cases involving deductions of particular types of expenses, such as the cost of uniforms or the cost of tools. In the process, case law would accumulate concerning how the statement of principle is interpreted. Either development would make tax law on the subject more complex, but would make the outcome of disputes more predictable. This is because the statutory provision would be clarified concerning a variety of possible employee business expenses that are more or less close in nature to commuting expenses. If the statute or the decided cases specified that commuting expenses were not deductible, then both sides' predictions would rise from around .5 to close to 1, since both the IRS and the taxpayer expect that the IRS is likely to win. If the statute or the decided cases specified that commuting expenses were deductible, then both sides' predictions would fall from around .5 to near 0, since both the IRS and the taxpayer expect that the IRS is likely to lose. However, there might still be ambiguity concerning whether particular types of commuting expenses, such as the expenses of commuting from home to work versus commuting between two jobs, were deductible. This would prevent the parties' predictions from falling to 0 -- they might instead fall only to 0.2.

In this example, the effect of an increase in the complexity level of tax law is to resolve uncertainty. When the law is simple, the parties are unable to predict the outcome of a dispute by any better means than flipping a coin; but as the law becomes more complex, they are able to make more accurate predictions. Figures 1A and 1B illustrate these two types of tax law complexity. In figure 1A, both the taxpayer's and the IRS' predictions of the IRS' probability of winning are around .5 when the tax law is simple, but increases in the level of complexity favor the IRS, so both sides' predictions rise to near one as the law becomes more complex. In figure 1B, increased complexity favors the taxpayer, so that both sides' predictions fall close to zero as the law becomes more complex.

[Figure 1A, Figure 1B, Figure 1C, and Figure 1D omitted.]

However, most discussions of tax law complexity suggest the idea that added complexity increases uncertainty rather than resolving it. For example, suppose the tax code on a particular subject becomes more complex because Congress adopts additional provisions which contain many cross-references and interrelationships -- some of which may be self-contradictory. Or suppose the statute changes frequently or more burdensome recordkeeping requirements are added.⁷⁷ These changes make it more difficult to predict how a judge would decide the case. Also, when the number of pages of regulations interpreting a given provision of the tax code gets very high, even the ability of tax lawyers to understand the regulations may be compromised, resulting in a reduction in predictability. These increases in the level of tax law complexity make predicting the outcome of tax disputes more rather than less uncertain.

An important example occurs when a particular taxpayer's situation could fit more than a single category. Examples include the taxpayer's choice between filing her tax return as a single person versus as a single head of household or the taxpayer's choice between paying the normal income tax or the alternative minimum tax. In the former, the tax code allows taxpayers to choose the alternative which minimizes tax liability, while in the latter, tax law requires them to choose the alternative which maximizes tax liability. A more complicated choice is faced by firms which are sold or merged and can structure their transactions to fit any of a dozen or so tax reorganizations. But their choice is constrained by complicated eligibility restrictions and by the "wildcard" restriction that the choice among alternatives must have a business purpose and so cannot be made for tax avoidance reasons alone. Another complicated choice is the decision by taxpayers concerning how to allocate their interest deductions among five categories of interest having different tax treatments and complicated tracing rules. The more choices there are, the more uncertain is the outcome of litigation between the IRS and the taxpayer. This is because in order to predict the outcome of litigation, the parties must predict how the judge will evaluate more possibilities.

Figures 1C and 1D illustrate the situation in which increased tax law complexity increases uncertainty and reduces predictability. In figure 1C, a simple tax law favors the IRS, i.e., both the IRS and the taxpayer predict that the IRS' probability of winning is near one. But increases in the level of complexity make the outcome increasingly unpredictable -- both $p(\text{sub I})$ and $p(\text{sub T})$ fall from near one to around .5. In figure 1D, a simple tax law favors the taxpayer, but increases in the level of complexity also make the outcome increasingly unpredictable. Both $p(\text{sub I})$ and $p(\text{sub T})$ rise from near zero to around .5.

These four possibilities are referred to in the discussion below as tax law complexity of types A through D. The difference between the IRS' and the taxpayers' predictions of the IRS' probability of winning are referred to as the "disagreement factor." In all four complexity types, the disagreement factor gradually becomes smaller as the level of tax law complexity rises. It should be noted that the four types are not exhaustive. It is possible (although it seems unlikely) that increased information relevant to predicting the outcome of the dispute might simultaneously cause the IRS to predict that its own chance of winning has risen and the taxpayer to predict that the IRS' chance of winning has fallen, i.e., each side becomes more optimistic concerning its own chance of winning.^{8/} Instead, I assume that increases in information change both sides' predictions in the same direction, although the rates of change may differ.^{9/}

III. COMPLEXITY AND DISPUTE RESOLUTION

In this section, I first show how tax law complexity affects the resolution of existing tax disputes. Here the IRS has already audited a particular taxpayer and has found evidence of noncompliance. Then I consider separately what level of tax law complexity is preferred by the IRS and by private tax lawyers.^{10/} (The effect of tax law complexity on

the IRS' incentive to initiate disputes by auditing taxpayers is considered in the next section.)

The IRS is assumed to make a demand that the taxpayer pay an amount equal to her unpaid taxes, plus interest and penalties. This amount is known by both the taxpayer and the IRS and is assumed not to be in dispute. It is referred to as the "amount at stake." Either the IRS and the taxpayer will negotiate a settlement of the IRS' demand at the audit or the case will be tried in court.¹¹ If the case goes to court, the judge will make an all or nothing decision: either the IRS wins and the taxpayer must pay the full amount at stake, or the IRS loses and the taxpayer pays nothing.

Tax professionals in the analysis are divided rather arbitrarily into tax lawyers, who are assumed to represent taxpayers at audit and in court, and tax accountants, who are assumed to give tax advice and prepare tax returns. The interests of tax lawyers are analyzed in this section and the interests of tax accountants are analyzed in section 5 below. In actuality, lawyers often give tax advice and accountants represent taxpayers at audit. This means that the preferences of each professional group concerning tax law complexity actually are a mixture of the preferences of both groups. However, for purposes of the analysis, it is convenient to distinguish between tax professionals specializing in dispute resolution, referred to as lawyers, and tax professionals specializing in preparation of tax returns and the giving of tax advice, referred to as accountants.

The taxpayer thus is assumed to be represented at the audit and in court by a tax lawyer. Tax lawyers charge fees that are higher when the level of tax law complexity is higher, regardless of how the case is resolved. Tax lawyers' fees have both a fixed component and a variable component. The fixed component is the charge for representing the taxpayer at the audit -- it is fixed because the IRS has already initiated the audit. The taxpayer pays the fixed component regardless of whether the case is settled during the audit. If the case is not settled at audit, it goes to court. Then the taxpayer must also pay the extra fee for going to trial, or the variable component. Lawyers' fees for representing taxpayers at audit are assumed to be a constant proportion of the fees for taking the case to trial.¹² The taxpayer is assumed to pay her own lawyer's fee regardless of the outcome. Note that tax lawyers' fees might also vary depending on the amount at stake. This would not change the results developed below as long as lawyers' fees rise less quickly than the amount at stake rises.

The IRS also has dispute costs. Its costs are more difficult to characterize, since it has its own in-house auditing staff and its own staff of lawyers. To keep the model simple, I assume that the IRS' own costs of auditing and going to court are similar to those of the taxpayer -- they rise when the level of tax law complexity rises and, if the case is settled at audit, they are a constant proportion of the IRS' costs if the case is tried in tax court. (This is equivalent to assuming that the IRS' staff consists of private auditors and tax lawyers who are hired to work for the IRS on a case-by-case basis.) However, it makes sense to assume that the IRS' dispute costs rise less quickly than those of the taxpayer when the level of tax law complexity rises, since the IRS' auditors and lawyers are

involved in many similar cases and can specialize in particular areas of tax law. This means that it takes them less time to prepare cases than it takes private lawyers, especially when the law is complex./13/

Which tax cases are settled at audit and which go to court? Assume that both the IRS and the taxpayer are risk neutral./14/ The IRS' expected gain if the case goes to court is its predicted probability of winning ($p(\text{sub T})$) times the amount at stake, minus the extra dispute costs it incurs if the case goes to court rather than settling at audit. This amount is referred to as the IRS' "minimum demand."/15/ The IRS prefers to settle the case at audit as long as it receives its minimum demand or more from the taxpayer. Similarly, the taxpayer's expected cost if the case goes to court is her predicted probability of the IRS winning times the amount at stake, plus her extra dispute costs if the case goes to court. This amount is referred to as the taxpayer's "maximum offer."/16/ She prefers to settle as long as she pays her maximum offer or less. Thus, a settlement amount exists which both the taxpayer and the IRS prefer over the alternative of going to trial if the IRS' minimum demand is smaller than the taxpayer's maximum offer. To keep the model simple, I assume that cases are settled at audit whenever such a settlement amount exists./17/ When such a settlement amount does not exist, the case will go to court./18/

How does the level of tax law complexity affect the likelihood that a particular case will be settled at audit?/19/ This depends on how an increase in the level of tax law complexity affects the difference between the IRS' minimum demand and the taxpayer's maximum offer. First, both sides' extra dispute costs of going to court rise as the relevant law becomes more complex. Higher dispute costs encourage settlement of the dispute at audit in order to avoid the extra costs of going to court. Second, as the law becomes more complex, the "disagreement factor" falls, i.e., the IRS' and the taxpayers' predictions of the IRS' probability of winning in court move closer together. Greater disagreement encourages continued disputing while greater agreement encourages settlement. Therefore, an increase in the level of complexity makes the parties more likely to settle the case at audit. Thus, if a particular tax dispute involves complex provisions, it is likely to be settled at audit; while if it involves relatively simple provisions, it is more likely to be taken to court.

Figure 2 shows the incentives for the IRS and the taxpayer to settle a particular case. The line labelled aa is the sum of the IRS' and the taxpayers' extra dispute costs if they go to court rather than settling at audit, divided by the amount at stake. These extra dispute costs over stakes rise as the complexity level of tax law rises. The line labelled bb is the "disagreement factor" -- the difference between the IRS' and the taxpayer's predictions of the IRS' probability of winning in tax court. The "disagreement factor" falls as the level of tax law complexity rises. If the "disagreement factor" is greater than the ratio of extra dispute costs over stakes, then the case goes to court. If the "disagreement factor" is smaller than the ratio of extra dispute costs over stakes, then the case is settled at audit. The threshold level of tax law complexity where the parties are indifferent between settling and going to court is labelled c' in the figure./20/ If the relevant provisions of tax law are less complex than c', then the case is tried in court; while if the relevant provisions of tax law are more complex than c', then the case is settled at audit./21/

Turning now to the question of what level of tax law complexity is preferred by private tax lawyers versus by the IRS. Since the same substantive tax law provisions must apply to all tax cases in a particular area, a single level of tax law complexity must prevail. However, tax lawyers need not prefer the same level of tax law complexity that the IRS prefers. The levels preferred by tax lawyers and by the IRS are investigated separately below.

[Figure 2 omitted.]

A. Tax Lawyers' Preferences

In investigating tax lawyers' preferences concerning the level of tax law complexity, I assume that tax lawyers act as a group and that they prefer the level of tax law complexity which maximizes the total income of all tax lawyers. (In actuality, there may be more and less successful tax lawyers and their interests in tax law complexity may differ.)

Tax lawyers are assumed to prefer the level of tax law complexity that maximizes their income from legal fees. Suppose for a moment that all tax cases involving a particular tax law provision have the same amount at stake. Then all such cases would be identical and, as shown in figure 2, all would settle if the level of tax law complexity were greater than c' and all would be tried in tax court if the level of tax law complexity were lower than c' .²² Figure 3 shows how tax lawyers' incomes depend on the level of tax law complexity. The curve dd is tax lawyers' incomes if cases are settled at audit and the higher curve ee is tax lawyers' incomes if cases go to trial in tax court. The heavy portions of lines dd and ee show the amount that tax lawyers earn at different levels of tax law complexity -- dd if the complexity level is higher than c' and ee if the complexity level is lower than c' . Tax lawyers prefer the level of complexity where their earnings are highest, which is just below c' . Thus, tax lawyers prefer that the level of tax law complexity be as high as possible as long as tax cases go to trial rather than settling at audit. They do not want the level of tax law complexity to be higher than c' , since they earn more if cases are tried; but they also do not want the level of tax law complexity to be lower than c' , since their incomes fall as tax law becomes less complex.

[Figures 3 and 4 omitted.]

Now suppose different cases involving a particular tax law provision have differing amounts at stake. (Other characteristics remain the same for all cases.) To be concrete, suppose there are low, medium, and high stakes cases. Then for high stakes cases, the ratio of both sides' extra dispute costs for going to court relative to the amount at stake is low; while for small cases, the ratio of extra dispute costs if the case goes to trial over stakes is high. Figure 4 shows three different curves representing the ratio of extra dispute costs to stakes. The highest curve ff is for the smallest stakes cases, the middle curve gg is for medium stakes cases, and the lowest curve hh is for the high

stakes cases.^{/23/} The curve bb in figure 4 is the "disagreement factor" -- it is the same as curve bb in figure 2.

If tax lawyers could choose a separate level of tax law complexity for each level of stakes, they would prefer the complexity levels c (to the l power), c (to the m power), and c (to the h power), for low, medium, and high stakes cases, respectively. However, a single complexity level must prevail for all cases involving a particular tax law provision. If the low complexity level c (to the l power) were chosen, then all cases would go to court, but tax lawyers' income per case would be low. If c (to the m power) were chosen, tax lawyers' income per case would be higher, but low stakes cases would no longer go to tax court, so the extra income they generate would be lost. If the high complexity level c (to the h power) were chosen, only high stakes cases would go to tax court, but legal fees per case would be very high. Among these three possibilities, tax lawyers prefer the level of tax law complexity for which their total income from all three types of cases is maximized.

Thus, when cases involving a particular tax law provision have differing amounts at stake, tax lawyers' preferred level of complexity reflects a tradeoff. When the level of tax law complexity rises, lawyers' income from cases that are both settled and tried rises. But the number of cases tried in court falls and the number of cases settled rises, causing tax lawyers' incomes to fall since they earn less when cases settle. The level of complexity preferred by lawyers is the level at which these two factors exactly offset each other for any small change in the level of complexity. Note that in this situation, there are both settlements of tax cases at audit and trials in tax court. The model predicts that higher stakes cases are tried in tax court and lower stakes cases are settled at audit, which seems realistic.

The model implies that tax lawyers as a group prefer a level of tax law complexity which can be characterized as intermediate. Their preference for an intermediate level of tax law complexity remains the same regardless of whether tax law complexity is of type A, B, C, or D, since figures 2, 3, and 4 are the same for all four types.^{/24/} The exact level of tax law complexity that lawyers prefer may depend, however, on the size distribution of tax cases. For example, if there are many high stakes cases and few low stakes cases, tax lawyers will prefer a higher level of complexity. If there are many low stakes cases and few high stakes cases, then they will prefer a lower level of complexity.

The results of the model suggest that tax lawyers prefer the tax law to have an intermediate level of complexity. If tax lawyers act as a group according to the model's predictions, then they might attempt to change tax law in the desired direction by having their professional associations lobby Congress to adopt tax provisions having the desired level of complexity. But it should be noted that nothing in the model contradicts the idea that individual tax lawyers act in the best interests of their clients when representing taxpayers.^{/25/}

B. The IRS' Preferences.

We now turn to the IRS' preferences concerning tax law complexity. The IRS is assumed to prefer the level of tax law complexity which maximizes the expected amount it recovers in unpaid taxes, interest, and penalties, net of its own dispute costs.²⁶ The IRS' preferences in this section concern only tax disputes where an audit has already been initiated and tax evasion has been detected.

How does the level of tax law complexity affect the amount that the IRS expects to receive from a case? Suppose again that all tax cases in a particular field involve the same stakes. If the case goes to court rather than settling at audit, then the IRS expects to receive $p(\text{sub I})$ times the amount at stake, minus its extra dispute costs of going to court. The only factors that vary depending on the level of tax law complexity are the IRS' prediction of its probability of winning, $p(\text{sub I})$, and its dispute costs. The IRS' dispute costs rise as the level of complexity rises, regardless of whether the case settles or goes to tax court. But how $p(\text{sub I})$ varies as the level of complexity rises depends on whether the relevant tax law provision is of type A, B, C, or D.²⁷

Suppose first that the provision is of type B or C. In both, increases in the level of tax law complexity lower the IRS' prediction of its probability of winning. Any increase in the level of tax law complexity both lowers the amount of unpaid taxes that the IRS collects and raises its dispute costs. Therefore, it is in the IRS' interest for tax law to be as simple as possible.

Now suppose the provision fits type A or D. In both, increases in the level of tax law complexity raise the IRS' prediction of its probability of winning. This means that the IRS prefers that the level of tax law complexity be higher as long as its probability of winning rises more quickly than its dispute costs (at audit or in court) rise as a proportion of the amount at stake. Figure 5 shows this. Line $0i$ is the IRS' predicted probability of winning, $p(\text{sub I})$, if tax law complexity is of type A or D. (If tax law complexity is of type A, then the line is higher than if complexity is of type D, but it has the same shape in both.) Line jj is the IRS' dispute costs as a proportion of the amount at stake when cases are tried in tax court and the lower line kk is the IRS' dispute costs as a proportion of the amount at stake when cases settle at audit. Since cases settle if the level of tax law complexity is greater than c' and go to tax court otherwise, the IRS' actual dispute costs are the heavy portions of lines jj or kk . The IRS' expected gain per case is the vertical distance between line $0i$ and the heavy portions of lines jj and kk . The IRS prefers the tax law complexity level where this difference is greatest. In figure 5, the IRS, therefore, prefers the high level of tax law complexity cI .

Thus, the IRS' preferences concerning the level of tax law complexity depend on whether its predicted probability of winning in court rises or falls as the level of complexity rises. If its predicted probability of winning falls as complexity rises, then it prefers the simplest possible tax law. If its predicted probability of winning rises as complexity rises, then it prefers that the tax law be very complex. In the former situation, the IRS favors a lower level of tax law complexity than the level preferred by private tax lawyers. In the latter situation, the IRS favors a higher level of tax law complexity than the level preferred by tax lawyers. The IRS' preferences concerning the level of tax law complexity

also differ from private tax lawyers' preferences because private lawyers prefer that tax cases go to trial -- which increases their legal fees, while the IRS prefers that cases settle at audit -- which allows it to save dispute costs.

[Figure 5 omitted.]

We can compare how well the IRS does under each of the four types of tax law complexity. Type B is the worst for the IRS. Here the IRS prefers the simplest possible tax law. But even with the simplest possible tax law, the IRS loses more than half of the cases it takes to court, which means that settlements at audit are also small. Also, many cases go to court, which raises the IRS' dispute costs. Type C is less bad for the IRS. Here the IRS again prefers the simplest possible tax law. With a simple tax law, it wins most cases taken to court. But it still has high dispute costs since many cases go to court. In types A and D, the IRS prefers a high level of tax law complexity. Type A is the best for the IRS, since it wins almost all of the cases that go to court, which means that settlements at audit are high. Also the high level of tax law complexity discourages taxpayers from going to court, so that the IRS' dispute costs are low. Type D is less favorable to the IRS than case A, since even with a high level of tax law complexity, the IRS wins only about half the cases that go to court. Thus, if the IRS could choose both the type and the level of tax law complexity, it would prefer type A and a very high level of tax law complexity.

If varying amounts at stake are reintroduced, then one additional effect must be considered, but the results remain basically the same. Any increase in the level of tax law complexity causes more cases to settle and fewer to be tried in court and any decrease in the level of tax law complexity has the opposite effect. Since the IRS prefers that cases settle in order to save on dispute costs, this means that its preferred level of tax law complexity rises slightly. Therefore, its preferred level of tax law complexity remains very high in types A and D and rises slightly but remains very low in types B and C.

To summarize the results of the model so far, we have shown that both private tax lawyers and the IRS have a vested interest in making the tax law complex. Private tax lawyers prefer that an intermediate level of complexity be adopted regardless of the type of tax law complexity. The IRS, in contrast, may favor either a very simple tax law or an extremely complex tax law, depending on what type of tax law provision is at issue. But if the IRS could choose the type as well as the level of tax law complexity, then it would prefer type A and a very high level of tax law complexity. The IRS would then win almost all its cases if it went to court, so that settlements at audit would be high. Also, very few cases would be tried in court, so that the IRS' dispute costs would be low.

The model also shows that the IRS and private tax lawyers have a conflict over whether to settle tax cases at audit or to litigate them: the IRS always prefers settlement at audit since it saves the costs of going to court, while private tax lawyers prefer that some or all cases go to court, since legal fees are higher. The IRS' interest in settling tax disputes

rather than going to court also leads it to favor high levels of tax law complexity, since settlement is more likely when the tax law is complex than when it is simple.

IV. COMPLEXITY AND THE AUDIT DECISION

Now turn to the effect of tax law complexity on the IRS' incentives to audit taxpayers. The IRS must decide whether or not to audit taxpayers. If the IRS conducts an audit of a particular taxpayer, it may or may not detect noncompliance. When it does detect tax noncompliance, it makes a demand for payment of the full amount of unpaid taxes, interest, and penalties, i.e., the "amount at stake." The resulting dispute is either settled by negotiation at the audit or is tried in tax court, as discussed in the previous section. Thus, the decision by the IRS to conduct audits is in effect a decision to initiate new tax disputes.

When the IRS audits a taxpayer, I assume that it has a probability, denoted α , of detecting noncompliance. This probability may be higher or lower for audits aimed at different provisions of the tax code. It is assumed to reflect use by the IRS of its DIF formulas to pick those taxpayers who are the best candidates for audit.

The IRS' expected benefit from conducting an audit, therefore, equals the probability α of detecting noncompliance times its expected net gain from the dispute. The IRS' expected cost of conducting an audit equals the probability $(1 - \alpha)$ of not detecting noncompliance times the cost of the audit, since the IRS receives nothing if noncompliance is not detected. The IRS is assumed to conduct audits whenever its expected benefit exceeds its expected cost./28/

The IRS' expected gain when it detects tax evasion was analyzed in the previous section. If the case goes to court, then the IRS expects with probability $p(\text{sub I})$ to receive the full amount at stake, minus its extra dispute costs of going to court. This amount equals the IRS' minimum demand. If the case is settled at audit, then the IRS receives its minimum demand or more./29/

How do the IRS' expected benefits and costs of conducting audits vary depending on the level of tax law complexity? First, since the IRS' expected gain when it detects noncompliance in an audit is its minimum demand, this means that its expected gain from auditing depends on which type of tax law complexity is at issue. If tax law complexity is of types A or D, then the IRS' expected gain rises as the level of tax law complexity rises, as long as the level of complexity is less than cI in figure 5. But if tax law complexity is of types B or C, then the IRS' expected gain falls as the level of tax law complexity rises. Second, the IRS' expected probability of detecting noncompliance in an audit, α , may vary as the level of tax law complexity varies. For example, suppose the tax law becomes more complex because there are several ways to treat a transaction for tax purposes and the eligibility rules are complicated. Then the taxpayer may be confused about the law when it is more complex and, therefore, more likely to make a mistake. This would make it easier for the IRS to detect noncompliance in an audit. In this situation, the IRS'

expected gain from auditing rises as the level of tax law complexity rises. Third, the cost of audits which do not result in detecting tax evasion rises when the level of tax law complexity rises. This causes the IRS' expected gain from auditing to fall as the level of tax law complexity rises.

The relative importance of these three effects is difficult to evaluate. But overall, they suggest that when the level of tax law complexity rises, the IRS' expected gain from conducting audits is likely to rise if complexity is of types A or D. If so, then an increase in the level of tax law complexity will result in more audits being conducted by the IRS. But if tax law complexity is of types B or C, then an increase in the level of tax law complexity is likely to lower the IRS' expected gain from conducting audits. Then an increase in the level of tax law complexity will result in fewer audits by the IRS.

A. The IRS' Preferences

Turn now to the IRS' preferences concerning tax law complexity. The IRS' goal is now to maximize the total amount it recovers from all taxpayers that it audits, net of its disputing costs. This problem is more general than the problem faced by the IRS in the previous section, since now the IRS also must decide how many audits to conduct. When the level of tax law complexity rises, there are three effects on the IRS' net collection of unpaid taxes and penalties. First, the number of audits that the IRS finds it worthwhile to conduct changes. The IRS recovers more in total when it conducts more audits, assuming that its expected benefit from each audit exceeds its expected cost. Second, the number of cases that are settled at audit versus tried in court changes. The IRS recovers more unpaid taxes in total when the number of cases settled at audit rises, holding other factors constant, since it saves disputing costs when cases are settled rather than tried. Third, the amount that the IRS recovers net of its disputing costs from cases which are either settled at audit or tried in tax court changes. If tax law becomes more complex, then the IRS recovers more if tax law complexity is of types A or D, while it recovers less if tax law complexity is of types B or C./30/

Figure 6 shows a line representing the variation in the amount at stake, from the smallest tax cases to the largest. The IRS always finds it more worthwhile to audit cases where the amount at stake is larger, since its expected benefits are greater while its costs remain the same or else rise less quickly. Similarly, larger stakes cases are more likely to be tried in court and less likely to be settled at audit. Therefore, the line can be divided into three groups of cases: the smallest cases which the IRS does not find it worthwhile to audit, medium size cases which the IRS decides to audit but which are settled at audit, and the largest cases which are tried in tax court.

S^* in figure 6 is defined to be the threshold level of stakes for which it is just barely worthwhile for the IRS to conduct an audit, given some particular level of tax law complexity./31/ The IRS audits cases having stakes greater than S^* and does not audit cases having stakes lower than S^* . From the analysis above, we know that when the level of tax law complexity rises, the IRS' expected gain from detecting tax evasion falls if tax law complexity rises, the IRS' expected gain from detecting tax evasion falls if tax law

complexity is of types B or C. Therefore, the IRS finds auditing less worthwhile and S^* moves to the right, i.e., only larger cases are audited. However, if tax law complexity is of types A or D, then the opposite occurs. When the level of tax law complexity rises, the IRS' expected gain from detecting tax evasion rises. Therefore, the IRS finds auditing more worthwhile and S^* moves to the left, i.e., smaller cases are worth auditing.

S^{**} in figure 6 is defined to be the threshold level of stakes for which the IRS and the taxpayer are just indifferent between settling a case versus going to trial, given some particular level of tax law complexity. Cases having stakes greater than S^{**} go to court and those having stakes less than S^{**} are settled at audit. From the analysis above, we know that when the level of tax law complexity rises, S^{**} shifts to the right regardless of the type of tax law complexity. This is because an increase in the level of tax law complexity both reduces the disagreement factor and increases the cost of going to court. Therefore, fewer cases are tried in court and more are settled at audit.

[Figure 6 omitted.]

Putting these two effects together, we find that if tax law complexity is of types A or D and the level of tax law complexity rises, then fewer cases are tried (S^{**} moves to the right) and more cases are audited (S^* moves to the left). Both changes increase the total amount of unpaid taxes that the IRS recovers, since the IRS collects more in unpaid taxes when it is worthwhile to conduct more audits and it collects more net of dispute costs when more cases are settled at audit. Furthermore, the IRS collects more from cases that are both settled and tried, since its probability of winning at trial is higher. Therefore, if the tax law is of type A or D, the IRS prefers that the level of tax law complexity be very high.³² Conversely, if tax law complexity is of type B or C and the level of tax law complexity rises, then fewer cases are tried (S^{**} moves to the right) and fewer cases are audited (S^* moves to the right). Settling more cases benefits the IRS, but conducting fewer audits reduces the total amount of unpaid taxes that the IRS recovers. Also, the IRS collects less from cases that are either settled or tried, since its probability of winning at trial is lower. Therefore, if the tax law is of type B or C, the IRS prefers that the level of tax law complexity be very low.

Thus, the IRS prefers that the level of tax law complexity be very high if tax law complexity is of types A or D and prefers that the tax law be very simple if complexity is of types B or C. The IRS' preferences concerning the type and level of tax law complexity are similar regardless of whether the IRS' goal is simply to maximize the net amount it recovers in unpaid taxes from taxpayers that have already been audited or is to maximize the net amount it recovers in unpaid taxes when it must also decide how many audits to conduct. If the IRS could influence both the type and level of tax law complexity, it would prefer that tax law complexity be of type A and that the complexity level be very high.

[Figure 7 omitted.]

V. TAX ACCOUNTANTS' PREFERENCES

Now turn to the preferences of tax accountants concerning tax law complexity. Tax accountants are assumed to provide either of two types of services: first, they calculate taxes due and fill out the taxpayer's return, and, second, they provide tax advice. As indicated above, I assume that accountants do not represent taxpayers at audit. Taxpayers are assumed to choose between using a tax preparer to prepare their taxes versus preparing their tax returns themselves.³³

A. Return Preparers

Taxpayers' costs of preparing their own tax returns includes the costs of time spent recordkeeping in order to document deductions, reading tax publications, doing tax calculations, and filling out the forms. This cost is assumed to rise as the level of tax law complexity rises. Tax accountants' costs are also assumed to rise as the level of tax complexity increases, but more slowly. This is because many of the costs to accountants of increased tax law complexity are fixed costs. For example, as tax law becomes more complex, it is worthwhile for accountants to install computers to do clients' tax calculations and fill out forms. Also, while the cost of researching the tax law rises when it becomes more complex, this cost is a fixed cost.

Curve ll in figure 7 is taxpayers' total cost of tax return preparation as a function of the level of tax law complexity. Curve mm is tax accountants' total cost. The shaded area between the two curves, which rises as the level of tax law complexity rises, is the net efficiency gain from accountants rather than taxpayers preparing tax returns. As shown, this gain is negative (self-preparation is more efficient) when the tax law is very simple. But it rises and becomes increasingly positive as the level of tax law complexity rises.

At any level of tax law complexity, tax accountants must charge a price for their services which is between curve ll (taxpayers' maximum willingness-to-pay) and curve mm (the minimum price at which accountants are willing to provide services). In this simple model, taxpayers choose to use accountants to prepare their taxes as long as the level of complexity exceeds c (to the 0 power) and accountants charge a fee which is less than taxpayers' cost of self-preparation, ll. Higher levels of tax law complexity benefit tax accountants since as tax law becomes more complex, they can charge higher amounts without inducing taxpayers to self-prepare. It should be noted that competition among accountants will tend to drive the price they charge down toward mm. However, unless competition drives accountants' fees all the way down to mm, tax accountants will prefer higher levels of tax law complexity.

Further, suppose individual taxpayers differ in their private cost of self-preparation, i.e., their private costs are either above or below ll by a constant amount. These two cost levels are shown in figure 7 by the two dashed lines. At low levels of tax law complexity, taxpayers whose cost is above ll will hire accountants and taxpayers whose cost is below ll will choose to self-prepare. But as the level of tax law complexity rises, even taxpayers

whose cost of self-preparation is low will eventually prefer to hire accountants. Thus, increases in the level of tax law complexity tend both to increase taxpayers' willingness to pay for accountants' services and to increase the proportion of taxpayers who choose to hire accountants.

Thus, when tax accountants' role is simply to prepare taxpayers' returns, they benefit from higher levels of tax law complexity -- both because more taxpayers choose to hire accountants and because the potential profit per return prepared is higher. This applies regardless of the type of tax law complexity.^{/34/}

B. Advice Givers

Now turn to the advice provided by tax accountants. Taxpayers often use accountants because they are uncertain about whether a particular type of income is taxable or a particular expense deductible. The accountant may advise the taxpayer either to pay taxes on the disputed item or not. Taxpayers are assumed to be more likely to consult accountants (perhaps in the future) if the advice they receive reduces their tax liability.

Tax accountants are assumed to follow a simple rule: they form their own prediction of the IRS' probability of winning a dispute with the taxpayer and then advise taxpayers to pay taxes on the disputed item when the IRS' probability of winning is .5 or greater and not to pay taxes otherwise. Taxpayers are assumed to believe the preparer's prediction. Therefore, $p(\text{sub T})$ is now interpreted as both the taxpayer's and the accountant's prediction of the IRS' probability of winning a tax dispute in court. Taxpayers pay taxes on the disputed item when their prediction of the IRS' probability of winning, $p(\text{sub T})$, is greater than .5 and evade taxes when their prediction of the IRS' probability of winning is less than .5. However, if they are risk-averse, taxpayers may choose to pay taxes when $p(\text{sub T})$ is close to .5 -- the situation of maximum uncertainty -- even though the accountant advises tax evasion. This formulation of tax accountants' role is similar to that of Klepper, Mazur, and Nagin,^{/35/} who argue that the effect of tax accountants is to increase the amount of taxes paid in situations where the law clearly favors the IRS, but to reduce the amount of taxes paid in situations where the law is ambiguous, i.e., where $p(\text{sub T})$ is around .5.

Under this rule, tax accountants in their role as advice givers are better off whenever $p(\text{sub T})$ is less than .5, since when $p(\text{sub T})$ is less than .5, they can advise taxpayers not to pay taxes on the item at issue. This means that the interest of tax accountants depends on the type and level of tax law complexity and is almost exactly the opposite of the IRS' interest in tax law complexity.

For example, case B was shown above to be the worst case for the IRS, but it is the best case for tax accountants. Here $p(\text{sub T})$ is always less than .5, so taxpayers are likely to win their disputes with the IRS. Therefore, accountants advise taxpayers not to pay taxes regardless of the level of tax law complexity. This benefits accountants by increasing demand for their services. Further, increases in the level of tax law complexity benefit accountants by resolving uncertainty in the taxpayers' favor. Thus, a high level of tax law

complexity benefits accountants both by attracting taxpayers seeking tax advice and return preparation and by retaining them since the advice increases their expected gain from tax evasion. Thus, accountants prefer a high level of complexity, while the IRS was shown above to prefer a low level of complexity.

Case A, which is the best case for the IRS, is the worst case for tax accountants. Here at a very low level of complexity, tax accountants advise their clients to evade taxes, but if complexity rises above a low level, they must change their advice and advise clients to pay. (Even at a low level of complexity, risk-averse taxpayers may prefer to pay taxes.) Therefore, accountants prefer a very low level of complexity, but this reduces demand for their tax preparation services. The IRS, however, prefers a high level of tax law complexity.

Case C is also bad for tax accountants, although less so. The IRS is likely to win any tax dispute, so that at low or intermediate levels of complexity, accountants advise their clients to pay taxes. However, at high levels of tax law complexity, they change their advice to advocating tax evasion, since the law is very uncertain. Here tax accountants clearly prefer that the level of tax law complexity be high.

Finally, case D is favorable to tax accountants, since they advise taxpayers not to pay taxes at all levels of tax law complexity. Higher levels of tax law complexity reduce taxpayers' probability of winning in a dispute with the IRS, but they also make the law more uncertain so that accountants still advise not paying taxes. (However, very high levels of complexity may discourage risk averse taxpayers from evading taxes.) Tax accountants prefer an intermediate level of complexity in this situation, since they trade off their gain from increased demand for tax preparation services against their loss from reduced demand for tax advice as the level of tax law complexity rises.

To summarize, tax accountants also have an interest in tax law complexity because it increases the demand for both tax preparation services and tax advice, regardless of the form of tax law complexity. Accountants prefer that tax law complexity be of types B or C, in which situations they prefer the highest possible level of tax law complexity. Only if tax law complexity is of types A or D do accountants prefer lower levels of complexity -- in case A they may prefer a low level of tax law complexity and in case C they prefer an intermediate level.

Finally, it is interesting to note the difference between the interests of tax accountants versus tax lawyers in the level of tax law complexity. Tax accountants prefer that the level of tax law complexity be as high as possible in types B and C, but they prefer low or intermediate complexity levels in types A and D. Tax lawyers, in contrast, always prefer an intermediate rather than a high level of tax law complexity, because very high complexity levels reduce the intensity of disputes by encouraging the parties to settle at audit.

VI. CONCLUSION

In this paper, I have argued that U.S. tax law is complex because both the IRS and tax professionals -- lawyers and accountants -- have vested interests in complexity. The exact level of complexity preferred by the IRS, tax lawyers, and tax accountants differs and also depends on whether each can influence the type as well as the level of tax law complexity. Tax lawyers prefer an intermediate level of tax law complexity in all situations. Tax accountants generally prefer a high level of tax law complexity, since high complexity levels increase demand for their tax preparation services. The IRS also prefers a high level of tax law complexity because it encourages taxpayers to pay more taxes. However, the type of law complexity preferred by the IRS and tax professionals differs. The IRS prefers to adopt a type of tax law complexity in which increases in the level of complexity increase the probability of the IRS winning in tax disputes. Tax professionals, in contrast, prefer to adopt a type of tax law complexity in which increases in the level of complexity increase the probability of taxpayers winning over the IRS in tax disputes. But both groups prefer high complexity levels given their preferred type of tax law complexity.

Further, the IRS is itself partly responsible for determining the type and level of tax law complexity, both via its role in advising and lobbying Congress on proposed tax legislation and by writing rules and regulations interpreting existing tax law. Its staff can also write the rules and regulations so increased complexity favors the IRS. It, therefore, can greatly "complexify" tax law, regardless of Congress' intent. Serious efforts to simplify tax law, if they are ever to succeed, will require overcoming the IRS' and tax professionals' vested interests in complexity. Recognizing the existence of these interests is at least a first step.

FOOTNOTES

¹ See Schuyler M. Moore, "A Proposal to Reduce the Complexity of Tax Regulations," *Tax Notes*, December 14, 1987, p. 1167.

² Study by Arthur D. Little, Inc., for IRS, cited in Richard L. Doernberg, "The Market for Tax Reform: Public Pain for Private Gain," *Tax Notes*, November 28, 1988, p. 965.

³ See Stanley S. Surrey, "Complexity and the Internal Revenue Code: The Problem of the Management of Tax Detail," *Law and Contemporary Problems*, vol. 34, Autumn 1969, pp. 673-710.

⁴ See Moore (1987).

⁵ See Doernberg (1988).

⁶ Suzanne Scotchmer, "Who Profits from Taxpayer Confusion?" *Economics Letters*, vol. 29, 1989, pp. 49-55, and Joel Slemrod, "Complexity, Compliance Costs, and Tax Evasion," in J. Roth and J. Scholz, *Why People Pay Taxes: A Social Science Perspective*,

Washington, D.C.: National Academy of Sciences, have argued that the IRS benefits from tax law being confusing, since risk-averse taxpayers are likely to pay more in taxes if they are uncertain (confused) about their true tax liability. This gives the IRS an incentive to make tax law uncertain. However, the relationship between confusion and complexity in tax law is not explicitly considered in their work.

⁷ Previous researchers have assumed that these characteristics are associated with an increase in the level of complexity of tax law. See Susan B. Long, and Judyth A. Swingen, "An Approach to the Measurement of Tax Law Complexity," *Journal of the American Taxation Association*, (Spring 1987), pp. 22-36.

⁸ See Michelle J. White, "Legal Complexity: An Economic Model" CREST working paper, Department of Economics, University of Michigan, 1988, for discussion of the model in the context of legal disputes generally. The possibilities that the parties' predictions of the outcome of a dispute move apart rather than together is considered.

⁹ Note that in all parts of figure 1, the IRS' prediction of its probability of winning the dispute if it were tried in tax court is always higher than the taxpayer's prediction of the IRS' probability of winning, i.e., $p(\text{sub I})$ is greater than $p(\text{sub T})$. This condition seems likely to hold for most tax cases, since the IRS is most likely to initiate disputes (audits) concerning tax law provisions on which it is relatively confident of winning. In order for any case to be tried in tax court, it can be shown that $p(\text{sub I})$ must be greater than $p(\text{sub T})$ at the prevailing level of tax law complexity.

¹⁰ The dispute resolution model used here is an extension of Steven Shavell, "Suit, Settlement, and Trial: A Theoretical Analysis Under Alternative Methods for the Allocation of Legal Costs," *Journal of Legal Studies*, vol. XI, p. 55, Jan. 1982.

¹¹ The IRS' administrative appeals forum, before which taxpayers may be represented by an enrolled agent rather than a tax lawyer, could alternatively be thought of as serving in the role of the "tax court."

¹² Suppose $b(c)$ is the lawyer's fee if the case is tried in tax court, where c denotes the level of tax law complexity. Then $\lambda b(c)$ is the lawyer's fee if the case is settled at audit, where 0 is lesser than λ is lesser than 1 . The taxpayer's extra dispute cost if the case is tried in tax court is $(1 - \lambda)b(c)$.

¹³ Suppose $a(c)$ is the IRS' dispute cost if the case is tried in tax court. $a(c)$ rises when the level of tax law complexity rises, but it is assumed to rise more slowly than $b(c)$. $\lambda a(c)$ is the IRS' dispute cost if the case is settled at audit. Then the IRS' extra dispute cost if the case is tried in tax court is $(1 - \lambda)a(c)$.

¹⁴ The possibility that the taxpayer is risk-averse is considered below.

¹⁵ Suppose the amount at stake is denoted S . The IRS' minimum demand is then $p(\text{sub } I)(c)S - (1 - \lambda)a(c)$, or its expected gain from going to trial minus its extra dispute cost if the case goes to trial.

¹⁶ The taxpayer's maximum offer is $p(\text{sub } T)(c)S + (1 - \lambda)b(c)$.

¹⁷ This implies that cases are settled at audit if $[p(\text{sub } I)(c) - p(\text{sub } T)(c)] \geq (1 - \lambda)(a(c) - b(c))/S$ and go to tax court otherwise.

¹⁸ In actuality, the parties may sometimes fail to agree on a settlement even when a settlement amount exists which makes them both better off than going to trial.

¹⁹ An implicit assumption here is that the value of the case to the IRS as a legal precedent is zero. This seems reasonable for the great majority of cases, although not for all cases. Alternately the IRS might want to litigate cases in order to change an existing law which favors the taxpayer. However, I focus here on tax law complexity rather than precedent as the variable which the IRS might use to change the law in its own favor.

²⁰ Curve aa is $[p(\text{sub } I)(c) - p(\text{sub } T)(c)]$, the disagreement factor. Curve bb is $(1 - \lambda)(a(c) - b(c))/S$ or both sides' extra dispute costs over the amount at stake. At c' , these two amounts are equal.

²¹ If taxpayers are risk-averse rather than risk-neutral (but the IRS is still risk-neutral), then taxpayers more strongly prefer to settle disputes at audit rather than go to tax court, since settlement reduces an uncertain outcome to a certainty. Risk-averse taxpayers' maximum offer equals the certainty equivalent of their expected loss at trial, which is greater than $p(\text{sub } T)(c)S + (1 - 7/8)b(c)$. As a result, the probability of settlement occurring is greater at any given level of tax law complexity. Note that the IRS is better off when taxpayers are risk averse, since risk averse taxpayers are willing to pay larger amounts to settle their cases.

²² Tax lawyers' income per case is $b(c)$ if the case goes to trial and $b(c)(1 - \lambda)$ if the case is settled at audit. They prefer the level of tax law complexity which maximizes income.

²³ Curves ff, gg, and hh all represent the amount $(1 - \lambda) [b(c) + a(c)]S(\text{sub } i)$, where $S(\text{sub } i)$ denotes low, medium, and high amounts at stake, respectively. If dispute costs were higher when the amount at stake is higher, then the diagram would remain the same as long as dispute costs rose less quickly than the amount at stake.

²⁴ The exact level of tax law complexity that tax lawyers would prefer may vary across the four types, but would be an intermediate level in all four.

²⁵ If there are differences among individual tax lawyers, then there may be conflicts of interest among them concerning the preferred level of tax law complexity. For example, it is often asserted that the most successful tax lawyers prefer to handle large rather than

small stakes cases, but prefer to handle cases that settle, since the higher legal fees for going to tax court do not adequately compensate them for their extra time. Then the most successful lawyers would prefer that the level of tax law complexity be high, since at a high level of complexity, even large stakes cases settle at audit. Successful tax lawyers could then handle large cases, but still not have to go to court. Less successful tax lawyers would then handle the remaining cases -- those that go to court and small stakes cases that settle at audit. They would prefer that the tax law be less complex, since then more and larger cases would be tried in court, which would increase their earnings.

²⁶ Theories of bureaucracy might predict that the IRS' preference would be to maximize the sum of the amount it recovers in unpaid taxes plus its dispute costs. This is because bureaucrats wish to maximize their budgets. However, the results of such a model would not be very different from the results here.

²⁷ The IRS expects to receive $p(\text{sub I})(c)S - a(c)$ if the case goes to tax court and $p(\text{sub I})(c)S - (1 - \lambda)a(c)$ if the case is settled at the audit. The IRS is assumed to prefer the level of tax law complexity that maximizes this expression.

²⁸ This ignores the possibility that a tight budget constraint might prevent the IRS from auditing taxpayers even when its expected benefit exceeds its expected cost.

²⁹ If the case is settled at audit, the IRS receives $p(\text{sub I})(c)S - (1 - \lambda)a(c)$ or more. Then the IRS' net gain is this amount minus the cost of the audit or at least $p(\text{sub I})(c)S - (1 - \lambda)a(c) - \lambda a(c) = p(\text{sub I})(c)S - a(c)$. If the case goes to trial in tax court, then the IRS' expected net gain is the same amount, $p(\text{sub I})(c)S - a(c)$. If these two amounts are assumed to be equal, then the IRS' expected benefit minus its expected cost of conducting an audit is $\alpha[p(\text{sub I})(c)S - a(c)] - (1 - \alpha)[\lambda a(c)]$. The IRS is assumed to conduct an audit whenever this expression is positive.

³⁰ Suppose the amount at stake in a particular case is denoted $S(\text{sub } i)$. Then the IRS' expected net gain is the amount $\alpha[p(\text{sub I})(c)S(\text{sub } i) - a(c)] - (1 - \alpha)[\lambda a(c)]$, summed over all cases that it finds worthwhile to audit, which are those for which this expression is positive.

³¹ At an arbitrary level of tax law complexity, the expression $\alpha[p(\text{sub I})(c)S(\text{sub } i) - a(c)] - (1 - \alpha)[\lambda a(c)]$ must equal zero for some amount at stake $S(\text{sub } i)$. This amount is S^* .

³² This does not imply that the IRS prefers the most complex tax law possible. At some high level of complexity, the IRS' costs of disputing would become so high that further increases in the level of complexity would hurt rather than benefit the IRS.

³³ The decision by taxpayers whether or not to use a tax preparer has been investigated by Joel Slemrod and N. Sorum, "The Compliance Cost of the U.S. Individual Income Tax System," *National Tax Journal*, vol. XXXVII (1984), pp. 461-474, James Long and Stephen Caudill, "The Usage and Benefits of Paid Tax Return Preparation," *National Tax*

Journal, vol. XL (1987), p. 27, and Suzanne Scotchmer, "The Effect of Tax Advisers on Tax Compliance," in J. Roth, J. Scholz, and A. Witte (eds.) *Paying Taxes: An Agenda for Compliance Research*. Philadelphia: University of Pennsylvania Press, 1988. These studies all assume the level of tax law complexity to be fixed.

³⁴ James Long and Stephen Caudill, "The Usage and Benefits of Paid Tax Return Preparation," *National Tax Journal*, vol. XL (1987), p. 27, find that taxpayers are more likely to use tax accountants if the individual taxpayer's return is more complex. They measure complexity by the number of tax forms that must be filed.

³⁵ See Steven Klepper, Mark Mazur, and Daniel Nagin, "Expert Intermediaries and Legal Compliance: The Case of Tax Preparers," Working paper, Carnegie Mellon University, 1988.