Planting and Care of Fine Hardwood Seedlings

Hardwood Tree Improvement and Regeneration Center
North Central Research Station
USDA Forest Service
Department of Forestry and Natural Resources
Purdue University

Financial and Tax Aspects of Tree Planting

William L. Hoover
Department of Forestry and Natural Resources, Purdue University

Trees are planted for many reasons, including soil and water conservation, wildlife habitat, nut and timber production. Altruism motivates many landowners to plant trees. There are, however, those who plant with the expectation of increasing their family's wealth. In this publication I discuss the financial and tax aspects of tree planting projects. The focus is on trees planted for timber production, although other purposes are mentioned to distinguish their treatment with the tax treatment of timber. Internal Revenue Code and associated regulations are cited as authorities for use by tax professionals.

Financial Analysis of Tree Planting

The financial implications of the long time periods involved in recovering tree planting costs and earning an acceptable rate of return on the investment are significant. Money spent on tree planting may not be returned by the sale of timber products for decades. In many cases the cost is borne by one generation and the income received by a later generation. If you do not expect to receive income from a tree-planting project during your lifetime, it is important to ask if planting trees is justified economically. Decisions can also be viewed in broader societal terms, i.e., will society benefit if you plant trees, or would it be better to use your resources on some other project?

The traditional way to answer this question is to conduct a detailed discounted cash flow analysis (DCFA). Such an analysis estimates the net present value of a project using the alternative rate of return, or estimates the rate of return actually earned by the project, referred to as the internal rate of return. DCFA requires you to estimate expenses and revenues many years into the future. You also have to estimate timber growth rates, number of trees per acre, and best years to harvest, among many other assumptions. Benjamin (1996) conducted such an analysis for black walnut plantations and agroforestry projects in Indiana.

A quick way to determine the financial viability of a project is to compare $1 invested in tree planting today, with the value of timber that this $1 would need to grow into in order to cover the cost of tying up the $1 in trees instead of an alternative use. Economists call this cost an opportunity cost, and for timber it is the opportunity cost of time. What the $1 would have returned if it were invested somewhere other than tree planting is measured using an assumed interest rate, usually referred to as the alternative rate of return. This rate depends on the other opportunities for investing an additional dollar.

In this discussion, the opportunity cost of time is assumed to be 3 percent per year. This should be considered to be a real rate of return, that is, the return assuming no inflation.

Table 1 (see page 2) shows the amount by which $1 would have to increase to cover the opportunity cost measured by interest rates from 1 to 10 percent per year. For example, if you are satisfied with a 3 percent real rate of return on your investments, the value of timber produced by each $1 of tree planting would have to be $10.64 in 80 years, more than a 10 fold increase. Example 1 demonstrates how Table 1 could be used.

There are no published estimates of stocking and growth rates for well-managed mixed species hardwood forests initiated by planting in the Central states. Mixed species hardwood plantings are relatively recent developments. The best information is available for black walnut plantations, such as the analysis by Benjamin (1996). There is some published information for natural second growth

Table 1. *Value of one dollar at various interest rates after 5 to 100 years.*

	Interest rate									
Years	**0.01**	**0.02**	**0.03**	**0.04**	**0.05**	**0.06**	**0.07**	**0.08**	**0.09**	**0.1**
5	$1.05	$1.10	$1.16	$1.22	$1.28	$1.34	$1	$1	$2	$2
10	$1.10	$1.22	$1.34	$1.48	$1.63	$1.79	$2	$2	$2	$3
15	$1.16	$1.35	$1.56	$1.80	$2.08	$2.40	$3	$3	$4	$4
20	$1.22	$1.49	$1.81	$2.19	$2.65	$3.21	$4	$5	$6	$7
25	$1.28	$1.64	$2.09	$2.67	$3.39	$4.29	$5	$7	$9	$11
30	$1.35	$1.81	$2.43	$3.24	$4.32	$5.74	$8	$10	$13	$17
35	$1.42	$2.00	$2.81	$3.95	$5.52	$7.69	$11	$15	$20	$28
40	$1.49	$2.21	$3.26	$4.80	$7.04	$10.29	$15	$22	$31	$45
45	$1.56	$2.44	$3.78	$5.84	$8.99	$13.76	$21	$32	$48	$73
50	$1.64	$2.69	$4.38	$7.11	$11.47	$18.42	$29	$47	$74	$117
55	$1.73	$2.97	$5.08	$8.65	$14.64	$24.65	$41	$69	$114	$189
60	$1.82	$3.28	$5.89	$10.52	$18.68	$32.99	$58	$101	$176	$304
65	$1.91	$3.62	$6.83	$12.80	$23.84	$44.14	$81	$149	$271	$490
70	$2.01	$4.00	$7.92	$15.57	$30.43	$59.08	$114	$219	$417	$790
75	$2.11	$4.42	$9.18	$18.95	$38.83	$79.06	$160	$321	$641	$1,272
80	$2.22	$4.88	$10.64	$23.05	$49.56	$105.80	$224	$472	$987	$2,048
85	$2.33	$5.38	$12.34	$28.04	$63.25	$141.58	$315	$693	$1,518	$3,299
90	$2.45	$5.94	$14.30	$34.12	$80.73	$189.46	$441	$1,019	$2,336	$5,313
95	$2.57	$6.56	$16.58	$41.51	$103.03	$253.55	$619	$1,497	$3,593	$8,557
100	$2.70	$7.24	$19.22	$50.50	$131.50	$339.30	$868	$2,200	$5,529	$13,781

mixed hardwood stands. Using this information makes it necessary to assume that a well-managed hardwood plantation will emulate a natural stand of timber by the time of the final harvest. With the right management this is possible. A key consideration is emulating natural stand conditions by keeping the number of trees per acre high enough for the trees to self-prune and have trunks with the degree of taper typical for forest-grown trees.

Fisher and Kershaw (1985) reported growth as a function of stocking levels for upland hardwood stands in central and southern Indiana. The maximum growth of 270 board feet per acre per year for heavily stocked stands was 100 trees and 120 sq. ft. basal area per acre. Basal area is a measure of tree density. The productivity of stands in the glaciated regions of northern Indiana is assumed by foresters to be higher than this figure. The upper end of stocking and growth estimates for well-stocked intensively managed stands is approximately 6 MBF per acre and 300 board feet per acre per year. Well-managed stands should produce higher quality timber, providing an average value of $600 or more per MBF, compared to the $330 average assumed in Example 1. Using 6 MBF and $600 per MBF provides a timber liquidation value of $3,600 per acre, approximately what is required for a 3 percent rate of return (discussed in Example 1). Thus, an optimist might be willing to argue that a really good planting on a very good site with management for 80 years could provide a 3 percent real rate of return. But what if the timber is not liquidated in year 80?

An alternative valuation approach is to not assume that stands are liquidated at year 80, but instead are converted to uneven aged stands using a 10-year cutting cycle. This means that every 10 years the stand is evaluated and trees marked for harvest based on financial maturity.[2] This requires estimating the value in year 80 of a harvest every 10 years of 2 to 3 MBF per acre worth $600 per MBF. These values are approximately $3,500 and $5,300.[3] Thus, a growth rate of 300 board feet per acre per year is more than adequate to provide a 3 percent rate of return for a well-managed stand, based on the average values per acre (discussed in Example 1). A growth rate of 200 board feet per acre per year barely provides a 3 percent rate of return.

Example 1. John Jones is considering the establishment of a forest on land that is now pastured. The consulting forester told John that the initial cost would be $250 per acre and $40 per acre in the next 2 years to control grass and herbaceous vegetation. John is satisfied with a 3 percent real rate of return on his investments. We can express the costs for the first 3 years as of the date of planting by discounting the two $40 expenditures back to the time of planting. This makes the total cost of regeneration $327[1] per acre. Assuming the timber would be liquidated in 80 years, and the 3 percent rate of return applies, the appropriate value from Table 1 is $10.64. Multiplying this value from Table 1 by $327 indicates that the timber on each acre of forest would have to be worth at least $3,475 in 80 years. John evaluates the conditions under which an existing stand of timber is worth at least $3,475 per acre and compares these conditions to his situation.

The most recent forest inventory conducted by the U. S. Forest Service reports that the average acre of timberland in Indiana contains 3.95 thousand board feet of timber large enough to be harvested for sawlogs (Schmidt et. al., 2000). This average reflects the balance between total annual growth and annual harvest for the entire state. The volume in 80 years for a well-managed stand would be higher. If the stand grew an average of 120 board feet per acre per year the volume in 80 years would be 9.6 million board feet (MBF). An average price for timber sold standing in the forest (stumpage) in 2002 was $330 per MBF (Hoover 2002). This means that on average there is between $1,304 (3.95 MBF x $330 per MBF) and $3,168 (9.6 MBF x $330) worth of timber per acre. John's planting project and timber management program would have to result in a forest in 80 years that is worth about three times the average current forest in Indiana, or about equal to a managed forest that captures an average growth of 120 board feet per acre per year. This is without considering all the other holding and management costs incurred over the 80 years. By using the appropriate tax treatments, however, John's planting project can be made more financially attractive.

Taxes affect many decisions. The favorable tax treatment of tree planting projects helps justify them financially. The tax rules for tree planting are discussed next, followed by estimates of the timber values needed to justify tree planting on an after-tax basis.

Basic Tax Treatment of Tree Planting Expenses

The tax treatment of tree planting expenses depends on the primary purpose for which they are planted.

Landscaping

If trees are planted for residential landscaping, the cost is added to the cost of the property improved (Example 2). The cost of property is referred to as its basis for income tax purposes. The basis of purchased residential property is the price paid plus the cost of improvements, such as landscaping. The basis is not recovered until the property is sold or suffers a casualty loss.

Conservation

The cost for trees planted strictly for conservation purposes would also be added to the basis of the property on which they were planted. The only exception is if the property is a farm and the tree planting was part of a conservation practice approved by the Natural Resources Conservation Service (NRCS), Example 3.[4] For this purpose a farm is property that produces farm income. Gains from the sale of timber are not included in the definition of farm income for purposes of qualifying for the deduction of conservation expenses.[5]

Orchards, Agroforestry, and Silvopastural

Trees planted as an orchard for nut or fruit production are subject to the uniform capitalization (UNICAP) rules.[6] This means that all the costs incurred until the trees start to produce a salable crop must be added to the basis of the trees. At this point these costs are depreciated, i.e., deducted over a period of years. If trees are

Example 2. The Brown's, a married couple, purchased five acres of land in 2000 for $50,000. They built a house on the land at a cost of $150,000. In addition, they paid $2,500 for landscaping, including approximately $600 for 300 trees to provide a wind break and bird habitat. The total basis of the Brown's residential property is $202,500 ($50,000 + $150,000 + $2,500). This basis would be used to determine the gain if the property was sold. For example, if they sold the property for $250,000 they would have a gain of $47,500 ($250,000 - $202,500). In this situation, however, no capital gains tax would have to be paid if they lived in the house because of the exclusion of up $500,000 for owner occupied residential property for a married couple filing a joint return.

The basis is also used to determine the deduction for a casualty loss. Assume that a tornado uprooted most of the trees on the lot. The Brown's hire a real estate appraiser who determined that immediately before the tornado the fair market value of the entire property (house and landscaping) was $280,000, but afterwards its fair market value was $240,000. The Brown's tax preparer compares the $40,000 decline in the fair market value of the property to the $202,500 basis of the property. Since the decline in value is less than the basis of the property, the Brown's deductible loss is $40,000. How much they can actually deduct depends on other factors.

Example 3. The Black's, a married couple, jointly operate a cash grain farm. Their gross income in 2003 from the sale of grain was $60,000. Their Soil and Water Conservation District has a watershed program that encourages farmers to install riparian buffer strips of trees and grass. Their NRCS District Conservationist developed a site plan for the stream running through their property. The cost to install this project in 2003 was $18,000. On their 2003 return the Black's can deduct only $15,000 as a soil and water conservation expense because the maximum deduction is 25 percent of gross income from farming. The balance of $3,000 can be carried over for deduction on their 2004 tax return.

planted for both nuts and timber, it is necessary to declare whether the primary purpose is nuts or timber and treat expenses consistently with this primary purpose. Godsey (2001) discusses the tax treatment of agroforestry projects. These projects combine timber and or nut production with row crop agriculture or grazing. Silvopastural systems may combine timber production with livestock grazing and in some cases species of trees that provide browse. Rotational grazing systems are used to reduce soil compaction. If the trees used in the system were for timber production then they would be treated as timber for tax purposes.

Commercial Timber Production

Trees planted for timber production as an investment or business are not subject to the UNICAP rules;[7] however, the costs must be added to the basis of the trees and kept in this basis account until the trees are large enough to be marketable.[8] These accounts are given special names. From the time of planting until the trees are big enough to be sold (merchantable), the account is called the plantation or deferred reforestation account. Once the trees are merchantable, the dollars in the plantation account are transferred to the merchantable timber account. Then, when timber is sold, the depletion allowance for the timber sold is determined using the merchantable timber account, as demonstrated in Example 4. This is also the account used to determine the deduction allowed when timber is stolen, or destroyed in a storm or fire.

Tax Treatment for Commercial Timber Production

Reforestation Tax Credit and Amortization

There is an exception to the basic tax treatment of trees planted for timber demonstrated in Example 4. This exception applies to no more than $10,000 of qualified tree planting expenses per year and consists of a 10 percent tax credit,[10] and an 84-month (8 years with a ½-year convention) amortization of the qualified expenses[11] reduced by one-half of the tax credit claimed.[12]

Election Required

This treatment is an election that must be properly made on a timely filed tax return. For any year in which you claim qualified expenses, the regulations require that you attach a statement to your tax return stating that you are electing to treat qualified expenditures.[13] The statement should specify the amounts of the expenditures, describe the nature of the expenditures, and give the date when each was incurred. It should also state the type of timber being grown and the purpose for which it is being grown. A separate statement must be included for each property where reforestation expenditures are being amortized under Section 194. The election may only be made on a timely return (taking into account extensions of the time for filing) for the taxable year when the amortizable expenditures were made.

Example 4. The Smith's planted fast-growing hybrid poplar trees for timber production. The total cost for establishment of the 40-acre plantation in 1985 was $10,000. This $10,000 expense was placed in a plantation account. Operating and management expenses were deducted annually from other income. For simplicity, the cost of fertilizer treatments of $600 in 1990 and $800 in 1995 were added to the balance in the plantation account.[9] The trees were thinned in 1993 at a cost of $2,500. In 2000 another thinning was made, but this time the trees were big enough to sell as pulpwood. At this time the total amount in the plantation account was $13,900. The volume of timber in the plantation at this time was determined to be 1,200 cords based on a timber cruise, i.e., a statistically based sampling of the size and number of trees in the plantation.

Since the timber was now merchantable, the plantation account was closed out to the merchantable timber account with a dollar balance of $13,900 and a volume balance of 1,200 cords. The logger doing the thinning harvested 400 cords for which he paid $5,300. The depletion unit is $11.58 per cord, determined by dividing $13,900 by 1,200. The taxable gain on the sale would be $668, determined by subtracting the depletion allowance of $4,632 from $5,300. The depletion allowance is determined by multiplying the 400 cords harvested by the depletion unit of $11.58 per cord.

Qualifications

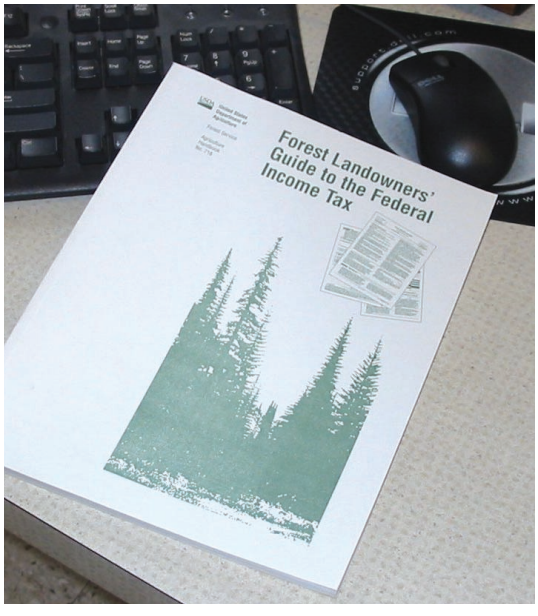
To qualify for the 10 percent tax credit and 84 month amortization, the reforestation must be for the commercial production of timber. This means that eventually you must expect to sell standing timber (stumpage), logs produced from the timber, or process these logs in your own business. The tract planted must be at least one acre, and located in the United States. Trusts do not qualify for the tax credit and amortization deduction.

Expenses that Qualify

Expenses that qualify are any activity directly related to the establishment of a new stand of timber. Although usually referred to as the reforestation tax credit and amortization provisions, these benefits are not limited to reforestation activities, that is, planting on cutover forest land. Expenses for trees planted on land not previously forested qualify. In this case the activity is referred to as afforestation.

Both natural and artificial regeneration qualify. For natural regeneration, the cost of fencing, repellents, or other means of reducing deer browse damage would qualify. Qualified expenses also include mechanical barriers or poison to reduce winter damage from rodents, and herbicide, mulch, or other measures to reduce competition from grass and herbaceous plants. For artificial regeneration, the cost of seeds, seedlings, planting, weed control, and other necessities qualify. The number of years expenses qualify is usually one or two. It could be longer if weed control is necessary for the survival of the seedlings. The cost for direct seeding also qualifies.

Although trusts do not qualify for the credit and amortization deduction, estates do qualify. The benefits must be apportioned among the estate and the beneficiaries. If there is a remainder interest in the property only the life tenant qualifies.



As the owner you cannot pay yourself and count this as a qualifying expenditure. This also applies to your spouse if he or she is a joint owner. Assuming that they are not also owners, you can pay your children to help with this work, assuming they actually provide meaningful labor.

Annual Limitation

The total amount that qualifies in any one year is $10,000 per taxpayer, but the limit also applies to a corporation, partnership, or other type of business, as demonstrated in Example 5. Amounts above $10,000 are placed in the plantation account, as demonstrated in Example 4.

One of the brothers (in Example 5), Marty, spent $8,000 for reforestation on his own land. Since he is individually subject to the $10,000 limit he would claim the credit and amortization on $10,000, consisting of $2,500 from the partnership and $7,500 from his own project. The $500 balance from his project would be placed in his individual plantation account. Thus, he would have a $1,000 tax credit and an amortization deduction of $678.57 on his 2003 Form 1040. The amortization deduction for the next 6 years would be $1,357.14 and the final $678.57 would be deducted in the final year.

Example 5. John Jones and his three brothers Marty, Jack, and Bruce own forestland together as tenants in common. They operate as a partnership and allocate all items of income and expense equally. Each brother also owns tracts of timberland individually. In 2003, the partnership incurred $12,000 of reforestation expenses that qualified for the credit and amortization. However, the partnership is limited to $10,000. The partnership would pass through to each partner $2,500 of reforestation expenses. The $2,000 balance would be put in the partnership's plantation account.

Table 2. Value of one dollar after reforestation tax credit and amortization deduction[1] at various interest rates for 5 to 100 years for a taxpayer in the 25 percent income tax bracket.

	Interest rate									
Years	**0.01**	**0.02**	**0.03**	**0.04**	**0.05**	**0.06**	**0.07**	**0.08**	**0.09**	**0.1**
5	$0.55	$0.58	$0.61	$0.64	$0.67	$0.71	$1	$1	$1	$1
10	$0.58	$0.64	$0.71	$0.78	$0.86	$0.95	$1	$1	$1	$1
15	$0.61	$0.71	$0.82	$0.95	$1.10	$1.26	$1	$2	$2	$2
20	$0.64	$0.78	$0.95	$1.16	$1.40	$1.69	$2	$2	$3	$4
25	$0.68	$0.87	$1.11	$1.41	$1.79	$2.27	$3	$4	$5	$6
30	$0.71	$0.96	$1.28	$1.71	$2.28	$3.03	$4	$5	$7	$9
35	$0.75	$1.06	$1.49	$2.08	$2.91	$4.06	$6	$8	$11	$15
40	$0.79	$1.17	$1.72	$2.53	$3.72	$5.43	$8	$11	$17	$24
45	$0.83	$1.29	$2.00	$3.08	$4.74	$7.27	$11	$17	$26	$38
50	$0.87	$1.42	$2.31	$3.75	$6.05	$9.72	$16	$25	$39	$62
55	$0.91	$1.57	$2.68	$4.56	$7.73	$13.01	$22	$36	$60	$100
60	$0.96	$1.73	$3.11	$5.55	$9.86	$17.41	$31	$53	$93	$161
65	$1.01	$1.91	$3.61	$6.76	$12.58	$23.30	$43	$79	$143	$259
70	$1.06	$2.11	$4.18	$8.22	$16.06	$31.18	$60	$115	$220	$417
75	$1.11	$2.33	$4.84	$10.00	$20.50	$41.73	$84	$170	$338	$671
80	$1.17	$2.57	$5.62	$12.17	$26.16	$55.84	$118	$249	$521	$1,081
85	$1.23	$2.84	$6.51	$14.80	$33.39	$74.73	$166	$366	$801	$1,741
90	$1.29	$3.14	$7.55	$18.01	$42.61	$100.01	$233	$538	$1,233	$2,804
95	$1.36	$3.46	$8.75	$21.91	$54.38	$133.83	$327	$790	$1,897	$4,516
100	$1.43	$3.82	$10.14	$26.66	$69.41	$179.09	$458	$1,161	$2,918	$7,274

[1] One dollar of qualified expenditure saves $0.10 from the tax credit. The after-tax cost considering the amortization deduction was calculated for the 25 percent tax bracket and 3 percent rate of interest as the present value of the annual after-tax cost over 8 years. This calculation is (0.75 x 0.067857)/1.03^1 + (0.75 x 0.135714)/1.03^2 + (0.75 x 0.135714)/1.03^3 + (0.75 x 0.135714/1.03^4 + (0.75 x 0.135714)/1.03^5 + (0.75 x 0.135714)/1.03^6 + (0.75 x 0.135714)/1.03^7 + (0.75 x 0.067857)/1.03^8. Reducing this by the $0.10 tax credit makes the after-tax cost as of the time of planting $0.53. For discounting purposes the time of planting was considered to be the beginning of year one.

The other brothers would have a $250 tax credit and $169.64 amortization deduction in 2003. Their amortization deduction would be $339.29 for the next 6 years and $169.64 in the final year.

Claiming the Amortization Deduction

The amortization deduction is a deductible business expense if you report timber activities on a business tax return such as Schedule C, F, partnership, or corporate form. If timber activity is not large enough to be a business, file as an investor. This means you report expenses as itemized deductions on Schedule A of your Form 1040. In this case, the amortization deduction is taken as an adjustment to gross income.[14] This means you benefit if you do not itemize your deductions, and if you do itemize it is not subject to the limit for miscellaneous itemized deductions. Miscellaneous itemized deductions contribute to total itemized deductions only to the extent they exceed 2 percent of adjusted gross income.

The total amount amortized is total qualified expenses, up to $10,000, minus one-half of the tax credit claimed. Thus, if the maximum $10,000 expenditure were made, the amount qualifying for amortization would be $9,500. The amortization deduction/adjustment is 1/14 of the total qualified amount in the year of the expenditure, 1/7 for the next 6 years, and 1/14 again the 8th year. The tax savings depends on your marginal income tax rate. For example, if you are in the 25 percent tax bracket, then a dollar spent on reforestation saves you $0.25 in taxes you would otherwise have to pay. This makes the after-tax cost 75 percent of what you spend.

Up-to-date details, including the specific procedures for claiming the tax credit and amortization deduction are on the National Timber Tax Website (NTTW) at http://timbertax.org.

After-Tax Financial Analysis of Tree Planting

Using the reforestation tax credit and amortization provisions makes it easier to justify tree-planting projects financially. Any action that reduces up-front costs helps significantly. Revisiting Example 1, if John was in the 25 percent tax bracket and used the tax credit and amortization provisions his after tax cost in 2003 would be approximately $0.53 on each $1 spent on tree planting. After-tax values for $1 spent by someone in the 25 percent tax bracket are shown in Table 2. After tax, $1 spent on tree planting has to produce timber worth at least $5.62 in 80 years with a 3 percent opportunity cost. This is significantly less than the $10.64 needed on a before tax basis. Applying $5.62 to the $327 cost per acre means the acre must be worth $1,838. The average stand is worth between $1,304 and $3,168, so the plantation must be a little better than average to justify the expenditure on an after-tax basis. Again, we have only considered the 3 years of establishment costs.

Literature Cited

Benjamin, T.J. 1996. *Financial analysis of a black walnut and corn agroforestry system*. Unpublished thesis, Department of Forestry and Natural Resources, Purdue University, December, 109 p.

Fischer, B.C. and J.A. Kershaw. 1985. Growth relationships for upland hardwood sawtimber stands in Indiana. IN: *Proceedings of Fifth Central Hardwood Forest Conference*, April 15-17, Urbana, IL, pp. 111-117.

Godsey, L.D. 2001. Tax considerations for the establishment of agroforestry practices. *Agroforestry in Action 3-2001*, University of Missouri Center for Agroforestry, Columbia, MO, 12 p. http://agebb.missouri.edu/umca/pubs/agrotaxcons.pdf

Hoover, W.L. 2002. 2002 Indiana forest products price report and trend analysis. *The Woodland Steward* 11(3): 7-11.

Internal Revenue Code. 2003. U.S. Department of the Treasury. United States Code Title 26 – Internal Revenue Code of 1986 as Amended.

Mills, W.L. and J.C. Callahan. 1981. *Financial maturity: a guide to when trees should be harvested*. Purdue Cooperative Extension Service, FNR-91.

Schmidt, T.L., M.H. Hanson, and J.A. Solomakos. 2000. *Indiana's forests in 1998*. USDA Forest Service, Resource Bulletin NC-196, 140 p.

Footnotes

[1] Total cost of regeneration = $250 + $40/(1.03)[1] + $40/(1.03)[2]

[2] See Mills and Callahan, 1981.

[3] Capital values of a perpetual series of periodic payments of $1,200 and $1,800. The calculations are $1,200/ (1.03[10]-1) and $1,800/(1.03[10] -1).

[4] Internal Revenue Code (IRC) §175.

[5] IRC Reg. §1.175-3: . . . A taxpayer engaged in forestry or the growing of timber is not thereby engaged in the business of farming. A person cultivating or operating a farm for recreation or pleasure rather than a profit is not engaged in the business of farming.

[6] IRC §263A.

[7] IRC §263A(c)(5).

[8] IRC §611(a), and Reg §1.611(3)(a).

[9] The treatment of fertilization costs is an issue under consideration by the IRS. The recommended treatment is to amortize the cost over the number of years the fertilizer is expected to have an affect on the growth rate.

[10] IRC §48(b)(1).

[11] IRC §194.

[12] IRC §50(c)(1), and IRC §50(3)(c)(A).

[13] IRC §1.194-4.

[14] §1.62-1(c) & §1.62-1T(12).

8

This publication is printed on recycled paper using soy-based inks.

Purdue Extension
Knowledge to Go
1-888-EXT-INFO

NEW 2/04

FNR-214