

APPENDIX E-TIMBER ANALYSIS PROCESS

Introduction

This appendix describes the analysis of lands suitable and not suitable for timber production, the Allowable Sale Quantity (ASQ), total timber sale program, and the first decade analysis of the SPECTRUM model.

Timber Suitability Analysis

During forest LRMP revision, the Forest Service is required to identify lands unsuited for timber production (16 USC 1604[k]; 36 CFR 219.14). This identification process involves three stages of analysis. Stage I analysis identifies lands tentatively suitable for timber production. Stage II analysis is designed to explore the financial aspect of varying intensities of timber management on lands identified as tentatively suitable for timber production from Stage I. Stage III analysis identifies lands as unsuited for timber production under the alternatives selected in the revised Forest Land and Resource Management Plan. The National Forest Management Act (NFMA) of 1976 identifies "suitability" as "the appropriateness of applying certain resource management practices to a particular area of land, as determined by an analysis of the economic and environmental consequences and the alternative uses foregone. A unit of land may be suitable for a variety of individual or combined management practices." A more detailed description of the Forests' suitability analysis can be found in Appendix B of the Final Environmental Impact Statement (FEIS).

Stage I: Physical Suitability

The first stage of the timber suitability analysis addresses the administrative and physical suitability of the land administered by the OSFNFs. The primary outcome of the Stage I analysis are the acres remaining after analysis is complete. These acres are considered "tentatively suitable." Stage I lands unsuitable for timber production include:

- ▶ Non-Forest lands.
- ▶ Lands that have been administratively or congressionally withdrawn from timber production by an act of Congress, the Secretary of Agriculture, or the Chief of the Forest Service.
- ▶ Forest lands incapable of producing industrial wood.
- ▶ Lands where technology is not available to ensure timber production from the land without irreversible soil and water resource damage.
- ▶ Lands where there is not reasonable assurance that they can be adequately restocked.
- ▶ Lands where there is inadequate information.

Table E-1 displays the acres that were deducted for the OSFNFs during Stage I analysis.

Table E-1 – Acres Deducted for Stage I Analysis

Classification	Acres
Total OSFNFs Land	1,161,012
Non-Forest Land	-43,218
Administratively Withdrawn	-91,817
Physically Incapable	-66,526
Technologically Restricted	-19,046
Not Adequately Restocked	-0
Inadequate Response Information	-283
Tentatively Suitable	940,122

Stage II: Financial Analysis

The Stage II analysis is designed to explore the financial efficiency of different timber intensities on the lands identified as tentatively suitable for timber production in Stage I. It does not identify any lands as unsuitable for timber production. Stage III analysis considers the results of these financial efficiencies in making the final determination of lands suited for timber production.

Stage III: Identification of Suitable Acres

Lands for which planned periodic timber harvest would preclude the achievement of other non-timber management objectives are subtracted from the tentatively suited acres (Stage I). During alternative formulation, the following lands (Table E-2) were determined to be "not appropriate for timber production."

Table E-2. Stage III Suitability by Alternative.

Deduction Criteria – Stage III	Acres
Tentatively Suited Acres from Stage I Analysis	940,122
Management Areas	
1.B. Wilderness Additions	-268
1.D. Rivers Recommended for Wild & Scenic Rivers	-4,487
1.G Special Interest Areas	-15,937
2.A Ozark-Highlands Trail Corridor	-5,039
2.B. State Parks	-2,251
2.C. Developed Recreation Areas	-2,004
Any 1.H. with an above sub-code (Scenic Byways)	-0
Other	
Cable Ground: % slope \geq 35%*	-102,108
Remaining Land – "unsuitable" CISC codes	-47,448
Total Suitable Acres	760,580

***35% slope was chosen as the break between tractor and cable ground because it is accepted as the industry standard for the area.**

Timber Sale Program

The Allowable Sale Quantity (ASQ) is defined as the maximum amount of timber that may be sold on lands suitable for timber production during a decade of implementing the Forest Plan (FSH 2409.13). The ASQ plus volume produced on lands unsuitable for timber production through achievement of desired condition or salvage operation comprise the total Timber Sale Program. Table E-3 displays a breakdown of the ASQ and total timber sale program for the first decade of the revised Forest Plan. The ASQ is a decadal ceiling; there are no constraints on the amount of volume that can be sold annually on the Forests.

Table E-3. Average Annual ASQ and Total Timber Sale Program for the First Decade.

Timber Sale Program	Volume
Total Allowable Sale Quantity	15 MMCF
Total Non-Scheduled Volume	1.2 MMCF
Total Timber Sale	16.2 MMCF

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